Illinois Environmental Protection Agency

Bureau of Land • 1021 North Grand Avenue East • P.O. Box 19276 • Springfield • Illinois • 62794-9276

RCRA FACILITY GROUNDWATER, LEACHATE AND GAS REPORTING FORM

This form must be used as a cover sheet for the notices and reports, identified below as required by: (1) a facility's RCRA interim status closure plan; (2) the RCRA interim status regulations; or (3) a facility's RCRA permit. All reports must be submitted to the Illinois EPA's Bureau of Land Permit Section. This form is for use by Hazardous Waste facilities only. Reporting for Solid Waste facilities should be submitted on a separate form. All reports submitted to the Illinois EPA's Bureau of Land Permit Section must contain an original, plus a minimum of two copies.

Note: This form is not to be used with permit or closure plan modification requests. The facility's approved permit or closure plan will state whether the document you are submitting is required as a report or a modification request.

Facility Name: Equilon Enterprises LLC dba Shell Oil Products US

Facility Address: 900 S. Central Ave., Roxana, IL 62048

Site ID #: 1191150002 Fed ID #: ILD 080 012 305

Check the appropriate heading. Only one heading may be checked for each corresponding submittal. Check the appropriate sub-heading, where applicable. Attach the original and all copies behind this form.

☐ LPC-160 Forms

Groundwater	Leachate
___ Quarterly - Enter: 1, 2, 3, or 4	___ Quarterly - Enter: 1, 2, 3, or 4
☐ Semi-Annual	☐ Semi-Annual
☐ Annual	☐ Annual
☐ Biennial	☐ Biennial

☒ Groundwater Data (without LPC-160 Forms)

3 Quarterly - Enter: 1, 2, 3, or 4 ☐ Annual ☐ Semi-Annual ☐ Biennial

☐ Well Construction Information

- ☐ Well Construction Forms, Boring Logs and/or Abandonment Forms
- ☐ Well Survey Data (e.g., Stick-up Elevation Data)

☐ Notice of Statistically Significant Evidence of Groundwater Contamination (35 Ill. Adm. Code 724.198)

☐ Notice of Exceedence of Groundwater Concentration Limit (35 Ill. Adm. Code 724.199(h))

☐ Notice of Alternate Source or Error in Sampling Analysis or Evaluation of Groundwater (35 Ill. Adm. Code 724.199(i))

☐ Gas Monitoring Reports

☐ Other (identify)

_____

_____

AECOM
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October 13, 2015

Mr. Steven F. Nightingale, P.E.
Manager, Permit Section
Illinois Environmental Protection Agency
Bureau of Land
1021 North Grand Avenue East
Springfield, Illinois 62794

Groundwater Monitoring Report – 3rd Quarter 2015
Roxana, Illinois
119115002 – Madison County
Equilon Enterprises LLC d/b/a Shell Oil Products US
Log No. B-43-CA-21

Dear Mr. Nightingale:

On behalf of Shell Oil Products US, AECOM (formerly URS Corporation) is submitting the enclosed report for your review. This sampling was required by Condition 7 of the Agency's letter dated August 5, 2010.

If you have any questions during your review, please contact Kevin Dyer, SOPUS Senior Principal Program Manager, at kevin.dyer@shell.com (618/288-7237), or Bob Billman at bob.billman@aecom.com (314/743-4108).

Sincerely,

AECOM, on behalf of Shell Oil Products US





Nicholas Eldred
Senior Project Manager

Robert B. Billman
Senior Project Manager

Enclosures: RCRA Facility Groundwater, Leachate and Gas Reporting Form, Report (original plus 1 copy)

cc: Kevin Dyer, SOPUS
Eric Petersen, Phillips 66
Amy Boley, IEPA, Springfield
Gina Search, IEPA, Collinsville
Thomas Tunnicliff, Atlantic Richfield Company
Shannon Haney, Greensfelder, Hemker & Gale P.C.
Repositories – Village Hall, Roxana Public Library, website

AECOM

Design and Consulting Services Environment

Submitted to:
Illinois Environmental Protection Agency - Bureau of Land
1021 North Grand Ave. East
Springfield, IL 62794

Submitted by:
AECOM
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3rd Quarter 2015 Interim Groundwater Monitoring Report

Shell Oil Products US Roxana, Illinois

October 2015
Project 60400249

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1 Introduction

AECOM (formerly URS Corporation (URS)) is submitting this report on behalf of Shell Oil Products US (SOPUS) for the 3rd Quarter 2015 (3Q15) groundwater monitoring well gauging and sampling conducted in the Village of Roxana, Illinois (**Figure 1**). The study area within the Village of Roxana (Village) is generally bounded by the alley north of First Street, Illinois Route 111, the West Fenceline of the WRB Refining, LP (WRB)[1] Wood River Refinery (WRR), and the Roxana Public Works Yard. Some groundwater monitoring wells within the WRR were also sampled as part of this event; this was conducted in cooperation with WRB/Phillips 66 (P66)[2]. For purposes of presentation in this report only, the combined area is collectively referred to as the "Investigation Area."

In an August 5, 2010 letter from the Illinois Environmental Protection Agency (IEPA) to SOPUS (IEPA, 2010), IEPA requested various site characterization and monitoring activities, along with initiation of the Interim Groundwater Monitoring Program. This program began in 4th Quarter 2010 (4Q10), and the first report was submitted on January 14, 2011. On March 3, 2011, a conference call was held among representatives of SOPUS, IEPA, and URS to discuss the groundwater monitoring program and IEPA's general comments on the 4Q10 report. Subsequent modifications were incorporated during the 1st Quarter 2011 (1Q11) and 2nd Quarter 2011 (2Q11) Interim Groundwater Monitoring Program. Additional items and comments regarding the Interim Groundwater Monitoring Program were presented by IEPA in June 16, 2011 (IEPA, 2011a) and August 31, 2011 (IEPA, 2011b) letters. These items and comments were addressed in the 3rd Quarter 2011 (3Q11) and 4th Quarter 2011 (4Q11) reports.

In a March 14, 2012 letter (CA-24) from IEPA to SOPUS (IEPA, 2012a), IEPA requested groundwater piezometer ROST-3-PZ and groundwater monitoring well ROST-4-PZ(C) be added to the program. These monitoring locations were added to the program in 2nd Quarter 2012 (2Q12), and the results are incorporated into this report.

In a second letter (CA-25), dated March 14, 2012, from IEPA to SOPUS (IEPA, 2012b), IEPA requested that perched groundwater be evaluated at the following existing groundwater monitoring piezometers: P-60-12S, P-60-13S, ROST-5-PZ, ROST-7-PZ, ROST-10-PZ, and ROST-21-PZ. These perched groundwater monitoring piezometers were incorporated into the program beginning in 2Q12 and continue to be evaluated. In a letter dated August 16, 2013, URS, on behalf of SOPUS, informed the IEPA of the determination that the perched groundwater monitoring piezometers are either dry, based on the criteria given in their March 14, 2012 letter, or not able to be sampled per the groundwater sampling standard operating procedure (SOP) due to slow recharge. The IEPA, during phone conversations, requested that certain piezometers remain in the program. In response to this request, a letter dated January 14, 2014 was submitted to IEPA (URS, 2014b), stating that these piezometers will remain in the program. A separate letter dated January 14, 2014 was submitted to the IEPA (URS, 2014a), requesting removal of ROST-5-PZ and ROST-10-PZ based on Condition 8(a) of the March 14, 2012 IEPA letter (CA-25), which states that ROST-5-PZ and ROST-10-PZ must remain within the program for one year before the determination is made that these wells are dry.

In the same March 14, 2012 letter (CA-25), IEPA also requested the installation of groundwater monitoring wells in the Village to evaluate potential light non-aqueous phase liquid (LNAPL). These groundwater monitoring wells were

[1] WRB, formed January 1, 2007, is a 50/50 joint venture between ConocoPhillips (COP) and EnCana US Refineries, LLC (now known as Cenovus Energy, Inc.).

[2] ConocoPhillips Company announced the separation of the Refining and Marketing business from the Exploration & Production business on July 14, 2011. The separation included an ownership change as well as a name change that became effective May 1, 2012. Phillips 66 is now the operator of the WRB WRR.

installed during 4th Quarter 2012 (4Q12), with the last well being completed on December 8, 2012. These groundwater monitoring wells were incorporated into the program beginning in 1st Quarter 2013 (1Q13).

On May 31, 2012, IEPA verbally requested the following be incorporated into the 2Q12 report:

- The ROST-4 series of groundwater monitoring wells and piezometers in the groundwater elevation contour maps;
- A groundwater contour map focusing on the West Fenceline area in the Village; and
- A Roxana site and WRR LNAPL map.

In an April 8, 2013 letter from IEPA to SOPUS (IEPA, 2013b), IEPA requested a discussion of irregular potentiometric contours in the ROST-4-PZ area and P-60 area wells. This response was submitted to the IEPA in a letter dated July 29, 2013 (URS, 2013).

In a July 18, 2013 letter from IEPA to SOPUS (IEPA, 2013c), IEPA approved a change in gauging frequencies for wells in the Interim Groundwater Monitoring Program. The list of wells to be gauged on a weekly basis was reduced and a new list of wells to be gauged on a monthly basis was initiated. This letter also requested that any free phase hydrocarbon (FPH) and photoionization detector (PID) data collected at the well heads be included in the quarterly groundwater monitoring reports. The modified gauging frequencies for wells began the week of July 22, 2013. The list of wells gauged during each routine event is reviewed on a regular basis and modified to meet the conditions requested by the IEPA. The additional reporting requirements were first incorporated in the 3rd Quarter 2013 (3Q13) report.

In a June 13, 2014 letter from IEPA to SOPUS (IEPA, 2014a), IEPA requested the installation of four groundwater monitoring wells in the Village to monitor the extent and effectiveness of corrective action efforts within the residential area. The access agreement with the Village was signed on August 12, 2014, and well installation began in September 2014 and was completed in October 2014.

In an October 9, 2014 letter from IEPA to SOPUS (IEPA, 2014b), IEPA approved the installation plan for a groundwater monitoring well located on BP property with certain conditions and modifications. This well was installed during January 2015 and was added to the Interim Groundwater Monitoring Program in 1st Quarter 2015 (1Q15).

In a letter dated November 25, 2014 (IEPA, 2014c), IEPA approved the proposed plan for groundwater corrective action (submitted to IEPA on November 14, 2013), with the following conditions:

- The 1Q15 groundwater samples obtained from: (1) the current monitoring well network; (2) the four new wells required by the modified permit issued June 13, 2014; and (3) the new well required by the October 9, 2014, letter must be used in a demonstration to verify the extent of groundwater contamination has been delineated; or
- If SOPUS cannot define the extent of contamination, a proposal for additional investigation must be submitted.

On April 16, 2015, a letter was submitted to IEPA by AECOM, on behalf of SOPUS, delineating the extent of groundwater contamination (AECOM, 2015). A response to this demonstration is pending as of the date of this report.

On December 5, 2014, a letter was submitted to IEPA by URS (URS, 2014c), on behalf of SOPUS, requesting a reduction in the routine gauging performed as part of the Interim Groundwater Monitoring Program. A response to this request is pending as of the date of this report.

In a letter dated May 22, 2015, IEPA provided approval for the April 3, 2013, *Groundwater Monitoring Well and Vapor Monitoring Point Installation Report* (IEPA, 2015a).

Groundwater samples were collected and analyzed during 3Q15 to meet the requirements of the Interim Groundwater Monitoring Program, as specified in the above guidance. **Figure 2** shows the groundwater monitoring wells that were sampled during 3Q15 as part of the interim monitoring well network.

2 Groundwater Sampling and Analytical Procedures

The groundwater monitoring well gauging, sample collection and analytical procedures are discussed in this section. Gauging and sampling procedures are based on the Interim Groundwater Monitoring Program, as outlined in the IEPA's letter dated August 5, 2010 (IEPA, 2010), and as modified based on other correspondence outlined in **Section 1** above.

2.1 Additional Activities or Modifications

The following additional work activities or modifications were conducted during 3Q15:

- Groundwater monitoring well P-114 was unable to be gauged during 2nd Quarter 2015 (2Q15) and 3Q15 gauging events. A groundwater sample was collected from this location in both 2Q15 and 3Q15, and the analytical results were comparable to historical results, with no exceedances detected at this location. In a Class 1* Permit Modification submitted on May 14, 2015, IEPA was notified that P-114 was unable to be gauged. IEPA responded to this Class 1* Permit Modification in a letter dated July 29, 2015 which requested that P-114 be replaced (IEPA, 2015b). P-114 was replaced on September 14-16, 2015.

2.2 Groundwater Monitoring Well Gauging and Sampling

Groundwater Monitoring Well Gauging

The comprehensive quarterly groundwater monitoring well gauging event was conducted between July 6 and 9, 2015. The 3Q15 gauging activities were conducted in conjunction with the 3Q15 gauging event for the WRR to evaluate groundwater flow direction and identify possible separate phase LNAPL in the Investigation Area. Depth to LNAPL (if present) and depth to water were noted in electronic format using Panasonic Toughbook® technology (Toughbook®), or similar, and on groundwater field gauging sheets. Quarterly groundwater monitoring well gauging results can be found in **Table 1a**. Weekly and monthly gauging data are collected from a subset of the quarterly program wells to assess the absence or presence of LNAPL. Monthly and weekly gauging results for 3Q15 can be found in **Table 1b**. The groundwater gauging data tables also include well-head PID results.

Low-Flow Groundwater Purging and Sampling

Groundwater samples were collected from groundwater monitoring wells from July 8 through July 15, 2015. Data are included in this report and discussed in **Section 3**.

Groundwater samples were collected via low-flow groundwater purging and sampling procedures. Prior to groundwater monitoring well sampling, the initial water level was measured and recorded in the Toughbook® and on groundwater field data sheets.

Groundwater monitoring wells MW-1 through MW-14, MW-16, MW-22 through MW-28, P-54, P-56 through P-59, P-66, P-74, P-93A, P-93C, ROST-3-MW, ROST-4-PZ(C), and T-12 were purged and sampled using a stainless steel submersible pump, low-flow controller, and designated polyethylene tubing[3]. The submersible pump, with the proper length of designated polyethylene tubing, was slowly lowered into the groundwater monitoring well to be sampled and the pump intake was set near the midpoint of the groundwater monitoring well screen.

Groundwater monitoring wells P-93B and P-93D, located on the WRR North Property, and P-114, located on the WRR West Property, were purged and sampled using a dedicated submersible stainless steel QED Well Wizard®

[3] All designated tubing is stored in a sealed bag designated for a particular groundwater monitoring well between sampling events.

sampling pump and dedicated bonded polyethylene tubing. The dedicated pump intake is positioned near the midpoint of the well screen and the pump is operated using a QED MP50 Micropurge Controller/Compressor.

For both sampling methods, the tubing from the sampling pump was connected to a flow-through cell, which discharged into a 5-gallon plastic container. Pumping was performed at a low flow rate (≤400 mL/minute) to minimize drawdown of the water level within the groundwater monitoring well. During groundwater purging, water quality parameters (pH, temperature, specific conductivity, turbidity, dissolved oxygen (DO), and oxidation-reduction potential (ORP)) were measured and recorded on the groundwater field data sheets after every flow-through cell volume. Purging continued until a minimum of three flow-through cell volumes of water were removed and the groundwater quality parameters stabilized, or a maximum purge time of two hours was reached. The final water quality parameters were recorded in the Toughbook® and on groundwater field data sheets. Once stabilization was achieved or a maximum purge time of 2 hours was reached, the groundwater flow was diverted from the flow-through cell and groundwater samples were collected for volatile organic compound (VOC) and semi-volatile organic compound (SVOC) analysis.

Perched groundwater monitoring piezometers ROST-5-PZ, ROST-7-PZ, ROST-10-PZ, and ROST-21-PZ in the Village, and P-60-12S and P-60-13S in the WRR, could not be sampled according to the Standard Operating Procedure (SOP), due to slow recharge rates or lack of water. Groundwater monitoring wells P-55R and P-68, located inside the WRR, contained LNAPL and, therefore, were not sampled. Groundwater sampling field parameters can be found in **Tables 2a and 2b**, and groundwater sampling data sheets are included in **Appendix A**.

2.3 Health & Safety, Decontamination, and Investigative Derived Waste

Health & Safety

The quarterly sampling activities were performed in accordance with the Rand Avenue, Roxana / Route 111, and WRR Investigation and Remediation Health and Safety Plan (HASP), dated January 1, 2015 – December 31, 2015 (URS, 2015).

Prior to beginning site work and at the start of work each day, a daily safety meeting was held. The purpose of this meeting was to discuss the day's planned activities and to address any potential health and safety concerns. As a part of the daily safety meeting, job safety analyses (JSAs) were reviewed to address task specific safety concerns.

AECOM field personnel wore U.S. Environmental Protection Agency (USEPA) modified Level D personal protective equipment (PPE), which included hard hat, steel-toed boots, safety glasses, etc. In addition, work within the WRR was performed wearing flame retardant clothing (FRCs) per WRR requirements (in areas where required).

A PID with a 10.6 electron volt (eV) lamp, combustible gas indicator (CGI), and individual hydrogen sulfide gas detectors (for locations inside WRR) were used during the field activities to monitor air quality. A benzene gas monitor with a 9.8 eV lamp was available during field activities to monitor benzene levels, if necessary. Field instruments were calibrated prior to use each day in accordance with the manufacturer's specifications.

There were no PPE upgrades or exceedances of HASP action levels during the 3Q15 sampling event.

Decontamination

Field personnel and equipment underwent decontamination procedures to ensure the health and safety of those present, to maintain sample integrity, and to minimize cross contamination. Sampling equipment (e.g., groundwater pump) was decontaminated after each sample location by spraying and/or wiping down with isopropyl alcohol, then washing with LiquiNox® and distilled water, and finishing with a distilled water rinse. The wash and rinse water are replaced periodically throughout the day, at least at mid-day. Interface probes were decontaminated by wiping down with isopropyl alcohol and LiquiNox® followed by a distilled water rinse. Personnel and small equipment decontamination were performed at the sample locations.

Investigative Derived Waste

Investigative derived waste (IDW), such as purge water and decontamination fluid generated during groundwater sampling activities, was collected, stored, and disposed in accordance with the Resource Conservation and Recovery Act (RCRA) and United States Department of Transportation (DOT) regulations. Expendable materials (e.g., disposable sampling equipment such as gloves and tubing) were decontaminated if necessary, collected in trash bags and disposed as municipal waste.

Decontamination fluid and purge water from groundwater monitoring wells MW-4, MW-7, MW-8, and MW-25 were initially collected in 5-gallon buckets, then transferred to a 55-gallon steel drum, which was staged at the Public Works Yard (satellite accumulation area), and removed by Heritage Environmental Services, LLC (Heritage) within 48 hours. This material is managed as hazardous waste based on prior characterization and was disposed at the Heritage facility in Indianapolis, Indiana.

Decontamination fluid and purge water from other groundwater monitoring wells in the Village were initially collected in 5-gallon buckets then transferred to 55-gallon steel drums located near the northeastern portion of the former Tannery Property. This material is managed as non-hazardous waste based on prior characterization and was disposed at the Heritage facility in Indianapolis, Indiana.

Decontamination fluid and purge water related to, or generated from, work within the WRR was collected and discharged through the WRR's National Pollutant Discharge Elimination System (NPDES)-permitted Wastewater Treatment Plant (WWTP).

2.4 Groundwater Sample Handling and Laboratory Testing

Samples were collected in pre-preserved laboratory-supplied containers and labeled in the field. Sample information was recorded on a chain of custody (COC) form at the time of collection. The sample identification data (ID) format is "well ID-ROX-date". COCs are included with laboratory analytical reports in **Appendix B**.

Upon collection and labeling, sample containers were immediately placed inside an iced cooler, packed in such a way as to help prevent breakage and maintain sample temperature within 0-6°C without freezing. The samples were then delivered via overnight courier, under the proper COC documentation, to the laboratory for analysis.

Samples were analyzed by Accutest Laboratories in Marlborough, Massachusetts for VOCs via USEPA Methods 8260C and 8011, for SVOCs via USEPA Method 8270D, and for Polycyclic Aromatic Hydrocarbons (PAHs) via USEPA Method 8270D Low Level (LL). USEPA Method 8011 was used for select VOCs (1,2-dibromoethane and 1,2-dibromo-3-chloropropane) in order to achieve lower reporting limits specified in the WRR RCRA Part B Permit (IEPA, 2013a). Per direction from IEPA, the Interim Groundwater Monitoring Program concentration limits need to be consistent with those in the Permit.

2.5 Data Quality Review and Data Management

Laboratory data were provided in electronic form and included data qualifiers on the basis of the laboratory's quality control or to indicate sample analysis information. The data were independently reviewed and qualified by AECOM. One hundred percent of the data were subjected to a data quality review (Level III data review) and 10% of the data were subjected to a data validation (Level IV data validation). Evaluation of the data followed procedures outlined in the USEPA Contract Laboratory Program National Functional Guidelines for Superfund Organic Methods Data Review (USEPA, 2014). Data qualifiers were also added by AECOM, as appropriate, and are included on **Table 3** and in the laboratory results in **Appendix B**. The results of the data quality review are discussed in **Section 3.2**.

Field data and documentation collected as part of this scope of work became part of the project file. AECOM maintains the files for the site and the database management system.

The following documentation was completed and supplements the COC records:

- Field logbooks;
- Equipment calibration forms;
- Groundwater field gauging sheets;
- Groundwater field data sheets;
- Field sample collection data via electronic Toughbook®; and
- Safety documentation.

3 Groundwater Sampling Results

This section presents the results of the 3Q15 groundwater gauging and sampling event.

3.1 Groundwater Monitoring Well Gauging Results

The comprehensive quarterly groundwater monitoring well gauging for the 3Q15 event was conducted between July 6 and 9, 2015. This groundwater monitoring well gauging was conducted in accordance with the Interim Groundwater Monitoring Program, and the results can be found in **Table 1a**. Groundwater levels in the vicinity of the West Fenceline have risen approximately 0.5 to 1 foot since 2Q15. Groundwater levels in most wells in the WRR have risen approximately 0.5 to 1.5 feet since 2Q15. Water levels are above the top of the screens in the majority of the wells gauged during the 3Q15 event. Water levels are within the screened intervals for the majority of the wells along the West Fenceline. The potentiometric surface observed during the 3Q15 groundwater monitoring well gauging (**Figures 3a and 3b**) illustrates groundwater flow toward the WRR groundwater production wells. P66 began operating new groundwater production well W-89 on November 17, 2014. This well is shown on **Figures 3a** and **b**, east of the Public Works Yard. The effect this well has on groundwater elevations can continue to be seen in the 3Q15 gauging event.

During the review of the 3Q15 quarterly groundwater gauging data, the gauging result for groundwater monitoring well P-59 was found to be anomalous. This was concluded by reviewing gauging results from previous quarters and comparing them to the 3Q15 gauging results for P-59 and nearby groundwater monitoring wells. Historically, gauging results for groundwater monitoring well P-59 have been within a few tenths of a foot of the gauging results from wells in the surrounding area. During 3Q15, gauging results from P-59 were within about 1.5 feet of wells in the surrounding area. As a result of this difference, the 3Q15 gauging result for P-59 was concluded to be invalid and was not used to generate groundwater contours for **Figures 3a** and **3b**. To help reduce the potential for anomalous readings, gauging along the West Fenceline (both in the Village and in the WRR) will be conducted within 24-hours, when possible. In addition, field-checking protocols have been revised. The table below show gauging results for pairs of wells along the West Fenceline for gauging events conducted during 3Q15. These data indicate a groundwater gradient from the Village to the refinery throughout 3Q15.

Village of Roxana			WRR West Fenceline		
Well ID	**Date Gauged**	**Groundwater Elevation**	**Well ID**	**Date Gauged**	**Groundwater Elevation**
3Q15 Quarterly Gauging Event					
MW-17	7/6/15	398.84	T-12	7/9/15	398.60
MW-19	7/6/15	398.78	P-59	7/9/15	400.36[4]
MW-20	7/6/15	398.84	P-56	7/9/15	398.68
MW-21	7/6/15	398.85	P-57	7/9/15	398.74
August Monthly Gauging Event					
MW-17	8/3/15	399.83	T-12	8/4/15	399.64
MW-19	8/3/15	399.87	P-59	8/4/15	399.64
MW-20	8/3/15	399.90	P-56	8/4/15	399.81
MW-21	8/3/15	400.00	P-57	8/4/15	399.94
September Monthly Gauging Event					
MW-17	9/2/15	400.75	T-12	9/1/15	400.54
MW-19	9/2/15	400.66	P-59	9/1/15	400.45
MW-20	9/2/15	400.67	P-56	9/1/15	400.59
MW-21	9/2/15	400.73	P-57	9/1/15	400.62

Perched groundwater was evaluated in the Village and in the WRR along the West Fenceline during 3Q15. During the 3Q15 event, groundwater was encountered in P-60-13S, ROST-7-PZ, and ROST-21-PZ; and groundwater was not encountered in P-60-12S, ROST-5-PZ, or ROST-10-PZ. P-60-12S has been dry for two consecutive quarters, ROST-5-PZ has been dry for eight consecutive quarters, and ROST-10-PZ has been dry for at least twelve consecutive quarters. The 3Q15 gauging results for perched groundwater monitoring wells and piezometers can be found in **Table 1a**.

During the 3Q15 quarterly groundwater monitoring well gauging event, LNAPL was detected in five Interim Groundwater Monitoring Program groundwater monitoring wells. Four of these monitoring wells (P-55R, P-60, P-60-S and P-68) are located in the WRR and one monitoring well (ROST-4-PZ(E)) is located within the Village **(Table 1a)**. In these wells, LNAPL thicknesses ranged from 0.03 to 0.14 feet. LNAPL was observed within the screened intervals of P-55R, P-60, P-60-S, P-68, and ROST-4-PZ(E). During 3Q15 weekly and monthly gauging events, LNAPL was detected in six groundwater monitoring wells. Four of these wells are located in the WRR (P-55R, P-60, P-60-S, and P-68) and two are located in the Village (ROST-4-PZ(E) and ROST-4-PZ(G)). This routine gauging data can be found in **Table 1b** and is summarized below.

Monitoring Well	Range of LNAPL Thickness (feet)	Comments
P-55R	0.01-0.38	Observed each week
P-60	0.06-0.14	Observed in 12 of 13 weeks
P-60-S	0.05-0.06	Observed in 3 of 13 weeks
P-68	0.06-0.08	Observed each week
ROST-4-PZ(E)	0.01-0.03	Observed in 11 of 13 weeks
ROST-4-PZ(G)	0.01	Observed in 1 of 13 weeks

[4] Measurement determined to be anomalous; not used for contouring.

LNAPL observed in groundwater monitoring wells located on the WRR property was removed and placed in a double-walled lube cube, which is staged on WRR North Property, prior to being taken to the WRR oil-water separators for reprocessing. Removal of LNAPL, if observed exceeding the minimum thickness for recovery (0.10 feet) in the Village and WRR, is conducted during quarterly, monthly, and weekly gauging events. **Figures 4a and 4b** illustrate the measured LNAPL thickness observed along the West Fenceline and inside the refinery, respectively, during the 3Q15 gauging event.

3.2 Data Quality Review Results

A total of seven sample delivery groups (SDGs) were prepared and sent to Accutest Laboratories in Marlborough, MA for the 3Q15 event. Forty-eight different groundwater sample sets were prepared and analyzed for VOCs and SVOCs (including PAHs). This included forty different investigative sample sets, four field duplicate sets, and two matrix spike/matrix spike duplicate (MS/MSD) sets. SDGs for 3Q15 are presented in **Appendix B**.

Trip blanks (TBs), equipment blanks (EBs), and laboratory method blanks were analyzed to evaluate for the existence and magnitude of any contamination resulting from field and laboratory activities. Four different EB sets were collected for this quarter. A TB set was included in every cooler that contained samples for VOC analysis. A total of thirteen TB sets were analyzed for groundwater VOCs. Laboratory method blanks were analyzed with every analytical batch.

Based on laboratory control sample/laboratory control sample duplicate (LCS/LCSD), matrix spike/matrix spike duplicate (MS/MSD), surrogate, holding time, and field duplicate criteria, the groundwater analytical results reported were accepted for their intended use. Analytical results qualified by AECOM are specified in the data reviews presented in **Appendix B**.

3.3 Analytical Results and Discussion

Tables 2a and 2b present cumulative information on groundwater sampling field parameters for main aquifer and perched wells, respectively. These results are consistent with those observed in the 2Q15 sampling event. The laboratory analytical results for the groundwater samples collected during this event are presented in **Table 3**.

Analytical detections were compared to the concentration limits as provided in Condition IV(E) of the Permit for the WRB Refining LP Wood River Refinery[5]. These concentration limits include the Groundwater Quality Standards for Class I: Potable Resource Groundwater (35 IAC 620, Subpart D, Section 410) (Part 620), the IEPA Tiered Approach to Corrective Action Objectives (TACO) Tier 1 Groundwater Remediation Objectives for the Groundwater Component of the Groundwater Ingestion Route (35 IAC 742 Appendix B, Table E), and the IEPA Toxicity Assessment Unit (Chemicals not in TACO, Tier 1 Tables). Where screening values were available from multiple sources from the ones mentioned above, screening values from Part 620 were used preferentially over the screening values found in TACO and Chemicals not in TACO sources. All three sources are checked on a quarterly basis to ensure the most current published screening values are being used. The results of this comparison are presented in **Table 3**.

[5] IEPA requested that the Interim Groundwater Monitoring Program be consistent with the RCRA Part B Permit.

Samples from eighteen groundwater monitoring wells in the Interim Groundwater Monitoring Program (eight in the Village, ten in the WRR along the West Fenceline) exhibited exceedances of the groundwater screening criteria for one or more of the following constituents:

- Benzene
- Ethylbenzene
- Tetrachloroethene
- 1,2,3-Trichlorobenzene
- 1,3,5-Trimethylbenzene
- bis(2-Chloroethyl)ether
- Phenol
- Carbon Disulfide
- Naphthalene
- Toluene
- Trichloroethene
- Xylenes (Total)
- 2-Methylnaphthalene

Figure 5 presents concentrations of analytes that exceeded the indicated screening criteria for 3Q15. **Figure 6** presents a plan view depiction of benzene analytical results in groundwater across the site. **Figure 7** presents a cross-section along Chaffer Street with a vertical distribution of the benzene concentrations in groundwater superimposed. **Figure 8** presents a cross-section across the Roxana Public Works Yard with a vertical distribution of the benzene analytical results in groundwater superimposed.

AECOM conducted the 3Q15 Interim Groundwater Monitoring Program, and the following conclusions are based on the data and information collected as part of this program:

- During 3Q15, groundwater level data indicates groundwater flow from the Investigation Area is moving toward groundwater production wells at the WRR. Groundwater levels observed in the vicinity of the West Fenceline were approximately 0.5 to 1 foot higher than in the previous quarter. Groundwater levels observed in most monitoring wells in the WRR were approximately 0.5 to 1.5 feet higher than in the previous quarter.
- Perched groundwater was evaluated at groundwater monitoring wells P-60-12S, P-60-13S, ROST-5-PZ, ROST-7-PZ, ROST-10-PZ, and ROST-21-PZ. During the evaluation, groundwater sampling could not be performed per the SOP due to slow recharge or lack of water.
- The analytical results from 3Q15 are generally similar to those from previous quarters.

3.4 Limitations

SOPUS shall have the right to make and retain copies of and use all Work Product provided. However, such use shall be limited to the particular Site and project for which the Work Product is provided. SOPUS and its agents may release the Work Product to third parties at its sole risk and discretion. This report is based on data, site conditions, and other information that is generally applicable as of the date of this report, and the conclusions and recommendations herein are therefore applicable only to that time frame and to the report in its entirety.

Historic data has been furnished to AECOM by SOPUS or SOPUS' contractors, which AECOM has used in preparing this report. AECOM has relied on this information as furnished, and is neither responsible for, nor has confirmed the accuracy of this information.

4 References

35 Illinois Administrative Code 620, Subpart D, Section 410. *Groundwater Quality Standards for Class 1: Potable Resource Groundwater*.

35 Illinois Administrative Code 742, Tiered Approach to Corrective Action Objectives. Appendix B. *Table E – Tier 1 Groundwater Remediation Objectives for the Groundwater Component of the Groundwater Ingestion Route*.

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Tables

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
MW-01											
4Q12	442.65	10/1/2012	NE	40.92	NA	NA	NA	401.73	393.85 - 383.85 (48.80 - 58.80)	0.0	*
1Q13		1/3/2013	NE	41.95	NA	NA	NA	400.70		0.0	*
2Q13		4/1/2013	NE	42.63	NA	NA	NA	400.02		54.0	*
3Q13		7/1/2013	NE	39.80	NA	NA	NA	402.85		8.7	*
4Q13		10/1/2013	NE	40.23	NA	NA	NA	402.42		0.0	*
1Q14		2/10/2014	NE	42.77	NA	NA	NA	399.88		5.8	*
2Q14		4/1/2014	NE	43.17	NA	NA	NA	399.48		18.9	*
3Q14		7/1/2014	NE	42.22	NA	NA	NA	400.43		1.3	*
4Q14		10/1/2014	NE	41.11	NA	NA	NA	401.54		0.0	*
1Q15		1/6/2015	NE	42.64	NA	NA	NA	400.01		43.9	*
2Q15		4/2/2015	NE	44.11	NA	NA	NA	398.54		0.0	*
3Q15		7/6/2015	NE	43.39	NA	NA	NA	399.26		0.0	*
MW-02											
4Q12	443.77	10/1/2012	NE	42.10	NA	NA	NA	401.67	393.90 - 383.90 (49.87 - 59.87)	13.0	*
1Q13		1/3/2013	NE	43.10	NA	NA	NA	400.67		54.7	*
2Q13		4/1/2013	NE	43.81	NA	NA	NA	399.96		232.0	*
3Q13		7/1/2013	NE	41.15	NA	NA	NA	402.62		208.0	*
4Q13		10/1/2013	NE	41.56	NA	NA	NA	402.21		109.7	*
1Q14		2/10/2014	NE	44.00	NA	NA	NA	399.77		98.7	*
2Q14		4/1/2014	NE	44.45	NA	NA	NA	399.32		50.0	*
3Q14		7/1/2014	NE	43.45	NA	NA	NA	400.32		119.0	*
4Q14		10/1/2014	NE	42.37	NA	NA	NA	401.40		130.1	*
1Q15		1/6/2015	NE	44.05	NA	NA	NA	399.72		91.1	*
2Q15		4/2/2015	NE	45.45	NA	NA	NA	398.32		147.3	*
3Q15		7/6/2015	NE	44.85	NA	NA	NA	398.92		124.0	*
MW-03											
4Q12	430.08	10/1/2012	NE	28.13	NA	NA	NA	401.95	395.41 - 385.41 (34.67 - 44.67)	0.0	*
1Q13		1/3/2013	NE	29.22	NA	NA	NA	400.86		0.0	*
2Q13		4/1/2013	NE	29.88	NA	NA	NA	400.20		3.5	*
3Q13		7/1/2013	NE	26.65	NA	NA	NA	403.43		0.4	*
4Q13		10/2/2013	NE	27.21	NA	NA	NA	402.87		0.0	*
1Q14		2/10/2014	NE	29.91	NA	NA	NA	400.17		2.5	*
2Q14		4/1/2014	NE	30.30	NA	NA	NA	399.78		0.3	*
3Q14		7/1/2014	NE	29.26	NA	NA	NA	400.82		1.2	*
4Q14		10/1/2014	NE	28.14	NA	NA	NA	401.94		0.0	*
1Q15		1/6/2015	NE	29.57	NA	NA	NA	400.51		3.6	*
2Q15		4/2/2015	NE	31.16	NA	NA	NA	398.92		0.2	*
3Q15		7/6/2015	NE	30.15	NA	NA	NA	399.93		0.0	*
MW-04											
4Q12	441.14	10/1/2012	NE	39.27	NA	NA	NA	401.87	395.08 - 385.08 (46.06 - 56.06)	48.6	*
1Q13		1/3/2013	NE	40.27	NA	NA	NA	400.87		35.3	*
2Q13		4/1/2013	NE	41.00	NA	NA	NA	400.14		104.0	*
3Q13		7/1/2013	NE	38.07	NA	NA	NA	403.07		131.6	*
4Q13		10/2/2013	NE	38.49	NA	NA	NA	402.65		39.4	*
1Q14		2/10/2014	NE	41.09	NA	NA	NA	400.05		52.3	*
2Q14		4/1/2014	NE	41.52	NA	NA	NA	399.62		75.0	*
3Q14		7/1/2014	NE	40.50	NA	NA	NA	400.64		97.2	*
4Q14		10/1/2014	NE	39.44	NA	NA	NA	401.70		27.4	*
1Q15		1/6/2015	NE	41.01	NA	NA	NA	400.13		69.0	*
2Q15		4/2/2015	NE	42.58	NA	NA	NA	398.56	395.08 - 385.08 (45.06 - 55.06)	12.5	*
3Q15		7/6/2015	NE	41.25	NA	NA	NA	399.89		56.1	*
MW-05											
4Q12	429.80	10/1/2012	NE	27.80	NA	NA	NA	402.00	395.83 - 385.83 (33.97 - 43.97)	0.0	*
1Q13		1/3/2013	NE	28.86	NA	NA	NA	400.94		0.0	*
2Q13		4/1/2013	NE	29.53	NA	NA	NA	400.27		0.1	*
3Q13		7/1/2013	NE	26.37	NA	NA	NA	403.43		1.0	*
4Q13		10/2/2013	NE	26.85	NA	NA	NA	402.95		0.0	*
1Q14		2/10/2014	NE	29.59	NA	NA	NA	400.21		1.4	*
2Q14		4/1/2014	NE	29.96	NA	NA	NA	399.84		0.0	*
3Q14		7/2/2014	NE	28.93	NA	NA	NA	400.87		0.3	*
4Q14		10/2/2014	NE	27.74	NA	NA	NA	402.06		0.0	*
1Q15		1/6/2015	NE	29.34	NA	NA	NA	400.46		0.5	*
2Q15		4/2/2015	NE	30.91	NA	NA	NA	398.89		0.0	*
3Q15		7/6/2015	NE	28.88	NA	NA	NA	400.92		0.3	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
MW-06A											
4Q12	432.14	10/1/2012	NE	28.81	NA	NA	NA	403.33	397.31 - 387.31 (34.83 - 44.83)	0.0	*
1Q13		1/3/2013	NE	30.80	NA	NA	NA	401.34		0.0	*
2Q13		4/1/2013	NE	31.57	NA	NA	NA	400.57		0.1	*
3Q13		7/1/2013	NE	28.48	NA	NA	NA	403.66		0.6	*
4Q13		10/2/2013	NE	28.75	NA	NA	NA	403.39		0.0	*
1Q14		2/10/2014	NE	31.62	NA	NA	NA	400.52		2.3	*
2Q14		4/1/2014	NE	32.03	NA	NA	NA	400.11		10.4	*
3Q14		7/1/2014	NE	30.90	NA	NA	NA	401.24		1.4	*
4Q14		10/2/2014	NE	29.74	NA	NA	NA	402.40		0.0	*
1Q15		1/6/2015	NE	31.48	NA	NA	NA	400.66		0.3	*
2Q15		4/2/2015	NE	33.05	NA	NA	NA	399.09		0.0	*
3Q15		7/6/2015	NE	31.98	NA	NA	NA	400.16		0.1	*
MW-06B											
4Q12	432.29	10/1/2012	NE	29.86	NA	NA	NA	402.43	368.24 - 363.24 (64.05 - 69.05)	0.0	*
1Q13		1/3/2013	NE	30.87	NA	NA	NA	401.42		0.0	*
2Q13		4/1/2013	NE	31.63	NA	NA	NA	400.66		2.7	*
3Q13		7/1/2013	NE	28.53	NA	NA	NA	403.76		0.0	*
4Q13		10/2/2013	NE	28.80	NA	NA	NA	403.49		0.5	*
1Q14		2/10/2014	NE	31.67	NA	NA	NA	400.62		6.0	*
2Q14		4/1/2014	NE	32.10	NA	NA	NA	400.19		4.8	*
3Q14		7/1/2014	NE	30.93	NA	NA	NA	401.36		2.1	*
4Q14		10/2/2014	NE	29.78	NA	NA	NA	402.51		0.0	*
1Q15		1/6/2015	NE	31.52	NA	NA	NA	400.77		5.6	*
2Q15		4/2/2015	NE	33.10	NA	NA	NA	399.19		29.1	*
3Q15		7/6/2015	NE	32.01	NA	NA	NA	400.28		0.2	*
MW-06C											
4Q12	432.11	10/1/2012	NE	29.70	NA	NA	NA	402.41	347.16 - 342.16 (84.95 - 89.95)	0.0	*
1Q13		1/3/2013	NE	30.65	NA	NA	NA	401.46		0.0	*
2Q13		4/1/2013	NE	31.40	NA	NA	NA	400.71		1.1	*
3Q13		7/1/2013	NE	28.32	NA	NA	NA	403.79		0.2	*
4Q13		10/2/2013	NE	28.58	NA	NA	NA	403.53		0.0	*
1Q14		2/10/2014	NE	31.48	NA	NA	NA	400.63		3.8	*
2Q14		4/1/2014	NE	31.89	NA	NA	NA	400.22		2.5	*
3Q14		7/1/2014	NE	30.74	NA	NA	NA	401.37		2.1	*
4Q14		10/2/2014	NE	29.58	NA	NA	NA	402.53		0.0	*
1Q15		1/6/2015	NE	31.31	NA	NA	NA	400.80		42.0	*
2Q15		4/2/2015	NE	32.89	NA	NA	NA	399.22		0.0	*
3Q15		7/6/2015	NE	31.79	NA	NA	NA	400.32		0.0	*
MW-06D											
4Q12	431.99	10/1/2012	NE	29.51	NA	NA	NA	402.48	327.27 - 322.27 (104.72 - 109.72)	0.0	*
1Q13		1/3/2013	NE	30.51	NA	NA	NA	401.48		0.0	*
2Q13		4/1/2013	NE	31.26	NA	NA	NA	400.73		4.2	*
3Q13		7/1/2013	NE	28.17	NA	NA	NA	403.82		0.7	*
4Q13		10/2/2013	NE	28.45	NA	NA	NA	403.54		0.0	*
1Q14		2/10/2014	NE	31.33	NA	NA	NA	400.66		1.3	*
2Q14		4/1/2014	NE	31.73	NA	NA	NA	400.26		1.6	*
3Q14		7/1/2014	NE	30.58	NA	NA	NA	401.41		13.3	*
4Q14		10/2/2014	NE	29.43	NA	NA	NA	402.56		0.0	*
1Q15		1/6/2015	NE	31.16	NA	NA	NA	400.83		5.9	*
2Q15		4/2/2015	NE	32.74	NA	NA	NA	399.25		43.0	*
3Q15		7/6/2015	NE	31.83	NA	NA	NA	400.16		0.1	*
MW-07											
4Q12	443.10	10/1/2012	NE	41.10	NA	NA	NA	402.00	400.18 - 390.18 (42.92 - 52.92)	0.0	*
1Q13		1/3/2013	NE	42.10	NA	NA	NA	401.00		0.0	*
2Q13		4/1/2013	NE	42.90	NA	NA	NA	400.20		0.0	*
3Q13		7/1/2013	NE	40.08	NA	NA	NA	403.02		357.0	*
4Q13		10/2/2013	NE	40.33	NA	NA	NA	402.77		OVR	*
1Q14		2/10/2014	NE	42.94	NA	NA	NA	400.16		720.3	
2Q14		4/3/2014	NE	43.41	NA	NA	NA	399.69		6.2	
3Q14		7/1/2014	NE	42.39	NA	NA	NA	400.71		170.1	*
4Q14		10/1/2014	NE	41.32	NA	NA	NA	401.78		4259	*
1Q15		1/6/2015	NE	43.18	NA	NA	NA	399.92		9.7	
2Q15		4/2/2015	NE	44.68	NA	NA	NA	398.42		0.0	
3Q15		7/6/2015	NE	43.90	NA	NA	NA	399.20		0.0	

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
MW-08											
4Q12	434.11	10/1/2012	NE	32.17	NA	NA	NA	401.94	400.51 - 390.51 (33.60 - 43.60)	0.0	*
1Q13		1/3/2013	NE	33.21	NA	NA	NA	400.90		11.2	*
2Q13		4/1/2013	NE	33.94	NA	NA	NA	400.17		0.2	
3Q13		7/1/2013	NE	30.90	NA	NA	NA	403.21		883.0	*
4Q13		10/2/2013	NE	31.26	NA	NA	NA	402.85		684.6	*
1Q14		2/10/2014	NE	34.02	NA	NA	NA	400.09		7.2	
2Q14		4/3/2014	NE	34.36	NA	NA	NA	399.75		2.8	
3Q14		7/2/2014	NE	33.35	NA	NA	NA	400.76		13.2	*
4Q14		10/2/2014	NE	32.19	NA	NA	NA	401.92		102.7	*
1Q15		1/6/2015	NE	33.91	NA	NA	NA	400.20		101.0	
2Q15		4/2/2015	NE	35.46	NA	NA	NA	398.65		0.0	
3Q15		7/7/2015	NE	34.51	NA	NA	NA	399.60		0.0	
MW-09											
4Q12	445.20	10/1/2012	NE	42.75	NA	NA	NA	402.45	398.75 - 388.75 (46.45 - 56.45)	0.0	*
1Q13		1/2/2013	NE	43.92	NA	NA	NA	401.28		0.0	*
2Q13		4/1/2013	NE	44.76	NA	NA	NA	400.44		0.8	*
3Q13		7/1/2013	NE	42.35	NA	NA	NA	402.85		0.8	*
4Q13		10/1/2013	NE	42.29	NA	NA	NA	402.91		0.0	*
1Q14		2/10/2014	NE	44.47	NA	NA	NA	400.73		0.6	*
2Q14		4/1/2014	NE	44.95	NA	NA	NA	400.25		1.7	*
3Q14		7/1/2014	NE	44.49	NA	NA	NA	400.71		0.0	*
4Q14		10/1/2014	NE	43.54	NA	NA	NA	401.66		0.3	*
1Q15		1/5/2015	NE	44.16	NA	NA	NA	401.04		12.8	*
2Q15		4/2/2015	NE	45.45	NA	NA	NA	399.75		0.0	*
3Q15		7/6/2015	NE	44.83	NA	NA	NA	400.37		0.0	*
MW-10											
4Q12	445.03	10/1/2012	NE	42.69	NA	NA	NA	402.34	400.60 - 390.60 (44.43 - 54.43)	0.0	*
1Q13		1/2/2013	NE	43.81	NA	NA	NA	401.22		0.0	*
2Q13		4/1/2013	NE	44.72	NA	NA	NA	400.31		0.0	
3Q13		7/1/2013	NE	42.55	NA	NA	NA	402.48		13.4	*
4Q13		10/1/2013	NE	42.45	NA	NA	NA	402.58		0.0	*
1Q14		2/10/2014	NE	44.42	NA	NA	NA	400.61		0.4	*
2Q14		4/1/2014	NE	44.99	NA	NA	NA	400.04		177.6	
3Q14		7/1/2014	NE	44.55	NA	NA	NA	400.48		0.0	
4Q14		10/1/2014	NE	43.65	NA	NA	NA	401.38		0.2	*
1Q15		1/5/2015	NE	44.19	NA	NA	NA	400.84		0.0	*
2Q15		4/2/2015	NE	45.38	NA	NA	NA	399.65		0.0	
3Q15		7/6/2015	NE	44.92	NA	NA	NA	400.11		169.6	
MW-11											
4Q12	442.33	10/1/2012	NE	40.42	NA	NA	NA	401.91	400.67 - 390.67 (41.66 - 51.66)	0.0	*
1Q13		1/2/2013	NE	41.49	NA	NA	NA	400.84		0.0	*
2Q13		4/1/2013	NE	42.18	NA	NA	NA	400.15		2.3	
3Q13		7/1/2013	NE	39.49	NA	NA	NA	402.84		0.3	*
4Q13		10/1/2013	NE	39.84	NA	NA	NA	402.49		0.0	*
1Q14		2/10/2014	NE	42.16	NA	NA	NA	400.17		0.3	
2Q14		4/1/2014	NE	42.55	NA	NA	NA	399.78		0.0	
3Q14		7/1/2014	NE	41.92	NA	NA	NA	400.41		0.0	
4Q14		10/1/2014	NE	39.93	NA	NA	NA	402.40		0.0	*
1Q15		1/5/2015	NE	41.72	NA	NA	NA	400.61		2.0	
2Q15		4/2/2015	NE	43.16	NA	NA	NA	399.17		0.0	
3Q15		7/6/2015	NE	42.52	NA	NA	NA	399.81		0.0	
MW-12											
4Q12	442.60	10/1/2012	NE	40.78	NA	NA	NA	401.82	400.68 - 390.68 (41.92 - 51.92)	0.0	*
1Q13		1/3/2013	NE	41.86	NA	NA	NA	400.74		0.0	*
2Q13		4/1/2013	NE	42.46	NA	NA	NA	400.14		0.0	
3Q13		7/1/2013	NE	39.57	NA	NA	NA	403.03		1.2	*
4Q13		10/1/2013	NE	40.05	NA	NA	NA	402.55		0.0	*
1Q14		2/10/2014	NE	42.54	NA	NA	NA	400.06		1.5	
2Q14		4/2/2014	NE	42.97	NA	NA	NA	399.63		0.7	
3Q14		7/1/2014	NE	42.10	NA	NA	NA	400.50		1.1	
4Q14		10/1/2014	NE	41.02	NA	NA	NA	401.58		0.0	*
1Q15		1/5/2015	NE	42.13	NA	NA	NA	400.47		33.2	
2Q15		4/2/2015	NE	43.71	NA	NA	NA	398.89		0.2	
3Q15		7/6/2015	NE	42.92	NA	NA	NA	399.68		0.0	

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
MW-13											
4Q12	430.27	10/2/2012	NE	27.99	NA	NA	NA	402.28	404.70 - 394.70 (25.57 - 35.57)	0.0	
1Q13		1/7/2013	NE	29.07	NA	NA	NA	401.20		24.0	
2Q13		4/2/2013	NE	29.62	NA	NA	NA	400.65		0.0	
3Q13		7/2/2013	NE	25.97	NA	NA	NA	404.30		2.9	
4Q13		10/2/2013	NE	26.69	NA	NA	NA	403.58		54.8	
1Q14		2/11/2014	NE	29.63	NA	NA	NA	400.64		10.1	
2Q14		4/4/2014	NE	30.11	NA	NA	NA	400.16		0.2	
3Q14		7/2/2014	NE	28.72	NA	NA	NA	401.55		1.1	
4Q14		10/3/2014	NE	27.66	NA	NA	NA	402.61		0.4	
1Q15		1/12/2015	NE	29.23	NA	NA	NA	401.04		0.0	
2Q15		4/3/2015	NE	30.83	NA	NA	NA	399.44		1.7	
3Q15		7/8/2015	NE	29.16	NA	NA	NA	401.11		254.3	
MW-14											
4Q12	434.44	10/2/2012	NE	31.86	NA	NA	NA	402.58	401.02 - 391.02 (33.42 - 43.42)	17.8	*
1Q13		1/7/2013	NE	32.71	NA	NA	NA	401.73		26.0	*
2Q13		4/2/2013	NE	33.68	NA	NA	NA	400.76		44.3	
3Q13		7/2/2013	NE	30.69	NA	NA	NA	403.75		7.4	*
4Q13		10/2/2013	NE	30.58	NA	NA	NA	403.86		20.5	*
1Q14		2/11/2014	NE	33.67	NA	NA	NA	400.77		45.1	
2Q14		4/4/2014	NE	34.21	NA	NA	NA	400.23		50.2	
3Q14		7/2/2014	NE	33.03	NA	NA	NA	401.41		52.0	*
4Q14		10/3/2014	NE	31.93	NA	NA	NA	402.51		83.3	*
1Q15		1/9/2015	NE	33.64	NA	NA	NA	400.80		41.8	
2Q15		4/3/2015	NE	35.20	NA	NA	NA	399.24		78.2	
3Q15		7/7/2015	NE	34.11	NA	NA	NA	400.33		207.7	
MW-16											
1Q13	443.39	1/23/2013	NE	43.05	NA	NA	NA	400.34	406.33 - 396.33 (37.06 - 47.06)	0.0	Installed during 4Q12
2Q13		4/1/2013	NE	43.55	NA	NA	NA	399.84		0.0	
3Q13		7/1/2013	NE	40.86	NA	NA	NA	402.53		0.0	
4Q13		10/1/2013	NE	41.43	NA	NA	NA	401.96		0.0	
1Q14		2/10/2014	NE	43.76	NA	NA	NA	399.63		0.5	
2Q14		4/1/2014	NE	44.19	NA	NA	NA	399.20		0.6	
3Q14		7/1/2014	NE	43.45	NA	NA	NA	399.94		0.0	
4Q14		10/1/2014	NE	42.35	NA	NA	NA	401.04		0.0	
1Q15		1/5/2015	NE	43.45	NA	NA	NA	399.94		0.0	
2Q15		4/2/2015	NE	44.93	NA	NA	NA	398.46		0.0	
3Q15		7/6/2015	NE	44.31	NA	NA	NA	399.08		0.0	
MW-17											
1Q13	441.57	2/11/2013	NE	41.75	NA	NA	NA	399.82	407.28 - 392.28 (34.29 - 49.29)	0.2	Installed during 4Q12
2Q13		4/1/2013	NE	41.85	NA	NA	NA	399.72		0.5	
3Q13		7/1/2013	NE	39.42	NA	NA	NA	402.15		0.0	
4Q13		10/1/2013	NE	40.18	NA	NA	NA	401.39		0.0	
1Q14		2/10/2014	NE	42.25	NA	NA	NA	399.32		0.0	
2Q14		4/3/2014	NE	42.76	NA	NA	NA	398.81		2.1	
3Q14		7/1/2014	NE	41.92	NA	NA	NA	399.65		0.0	
4Q14		10/1/2014	NE	41.07	NA	NA	NA	400.50		0.0	
1Q15		1/5/2015	NE	41.86	NA	NA	NA	399.71		1.9	
2Q15		4/2/2015	NE	43.20	NA	NA	NA	398.37		0.0	
3Q15		7/6/2015	NE	42.73	NA	NA	NA	398.84		0.0	
MW-18											
1Q13	442.04	2/11/2013	NE	42.25	NA	NA	NA	399.79	407.12 - 392.12 (34.92 - 49.92)	0.0	Installed during 4Q12
2Q13		4/1/2013	NE	42.38	NA	NA	NA	399.66		0.0	
3Q13		7/1/2013	NE	39.89	NA	NA	NA	402.15		0.0	
4Q13		10/1/2013	NE	40.85	NA	NA	NA	401.19		0.0	
1Q14		2/11/2014	NE	42.85	NA	NA	NA	399.19		0.0	
2Q14		4/1/2014	NE	43.41	NA	NA	NA	398.63		0.0	
3Q14		7/1/2014	NE	42.49	NA	NA	NA	399.55		0.9	
4Q14		10/1/2014	NE	41.67	NA	NA	NA	400.37		0.0	
1Q15		1/5/2015	NE	42.55	NA	NA	NA	399.49		0.3	
2Q15		4/2/2015	NE	44.53	NA	NA	NA	397.51		0.0	
3Q15		7/6/2015	NE	43.44	NA	NA	NA	398.60		0.0	
MW-19											
1Q13	442.77	2/11/2013	NE	42.88	NA	NA	NA	399.89	406.43 - 391.43 (36.34 - 51.34)	0.9	Installed during 4Q12
2Q13		4/1/2013	NE	43.04	NA	NA	NA	399.73		10.3	
3Q13		7/1/2013	NE	40.50	NA	NA	NA	402.27		0.0	
4Q13		10/2/2013	NE	41.24	NA	NA	NA	401.53		0.0	
1Q14		2/10/2014	NE	43.41	NA	NA	NA	399.36		0.9	
2Q14		4/1/2014	NE	43.92	NA	NA	NA	398.85		0.0	
3Q14		7/1/2014	NE	42.92	NA	NA	NA	399.85		0.6	
4Q14		10/1/2014	NE	42.02	NA	NA	NA	400.75		0.0	
1Q15		1/5/2015	NE	43.13	NA	NA	NA	399.64		0.0	
2Q15		4/2/2015	NE	43.94	NA	NA	NA	398.83		0.0	
3Q15		7/6/2015	NE	43.99	NA	NA	NA	398.78		0.0	

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
MW-20											
1Q13	443.67	2/11/2013	NE	43.66	NA	NA	NA	400.01	407.79 - 392.79 (35.88 - 50.88)	0.0	Installed during 4Q12
2Q13		4/1/2013	NE	43.89	NA	NA	NA	399.78		0.1	
3Q13		7/1/2013	NE	41.23	NA	NA	NA	402.44		0.0	
4Q13		10/1/2013	NE	41.77	NA	NA	NA	401.90		0.0	
1Q14		2/10/2014	NE	44.09	NA	NA	NA	399.58		1.4	
2Q14		4/2/2014	NE	44.65	NA	NA	NA	399.02		0.0	
3Q14		7/1/2014	NE	43.64	NA	NA	NA	400.03		1.3	
4Q14		10/1/2014	NE	42.63	NA	NA	NA	401.04		0.0	
1Q15		1/5/2015	NE	43.93	NA	NA	NA	399.74		0.0	
2Q15		4/2/2015	NE	45.39	NA	NA	NA	398.28		0.0	
3Q15		7/6/2015	NE	44.83	NA	NA	NA	398.84		0.0	
MW-21											
1Q13	443.81	2/11/2013	NE	43.53	NA	NA	NA	400.28	408.80 - 393.80 (35.01 - 50.01)	0.1	Installed during 4Q12
2Q13		4/1/2013	NE	43.79	NA	NA	NA	400.02		0.3	
3Q13		7/1/2013	NE	41.05	NA	NA	NA	402.76		0.0	
4Q13		10/2/2013	NE	41.40	NA	NA	NA	402.41		0.0	
1Q14		2/10/2014	NE	43.91	NA	NA	NA	399.90		32.5	
2Q14		4/3/2014	NE	44.38	NA	NA	NA	399.43		1.8	
3Q14		7/2/2014	NE	43.38	NA	NA	NA	400.43		0.0	
4Q14		10/1/2014	NE	42.28	NA	NA	NA	401.53		0.0	
1Q15		1/6/2015	NE	44.15	NA	NA	NA	399.66		13.8	
2Q15		4/2/2015	NE	45.58	NA	NA	NA	398.23		0.0	
3Q15		7/6/2015	NE	44.96	NA	NA	NA	398.85		0.0	
MW-22											
1Q13	442.16	1/23/2013	NE	41.80	NA	NA	NA	400.36	404.28 - 394.28 (37.88 - 47.88)	2.0	Installed during 4Q12
2Q13		4/1/2013	NE	42.31	NA	NA	NA	399.85		2.8	
3Q13		7/5/2013	NE	39.60	NA	NA	NA	402.56		0.6	
4Q13		10/1/2013	NE	40.23	NA	NA	NA	401.93		0.0	
1Q14		2/10/2014	NE	42.49	NA	NA	NA	399.67		0.3	
2Q14		4/3/2014	NE	42.90	NA	NA	NA	399.26		0.2	
3Q14		7/1/2014	NE	42.18	NA	NA	NA	399.98		0.1	
4Q14		10/1/2014	NE	41.20	NA	NA	NA	400.96		0.0	
1Q15		1/6/2015	NE	42.13	NA	NA	NA	400.03		0.0	
2Q15		4/2/2015	NE	43.53	NA	NA	NA	398.63		0.2	
3Q15		7/6/2015	NE	42.94	NA	NA	NA	399.22		0.0	
MW-23											
2Q15	431.41	4/2/2015	NE	32.21	NA	NA	NA	399.20	402.39 - 392.39 (29.02 - 39.02)	0.0	Installed during 1Q15
3Q15		7/7/2015	NE	30.74	NA	NA	NA	400.67		8.3	
MW-24											
2Q13	443.42	4/1/2013	NE	43.44	NA	NA	NA	399.98	404.53 - 394.53 (38.89 - 48.89)	0.5	Installed during 1Q13
3Q13		7/3/2013	NE	40.59	NA	NA	NA	402.83		0.0	
4Q13		10/1/2013	NE	41.08	NA	NA	NA	402.34		134.4	
1Q14		2/10/2014	NE	43.47	NA	NA	NA	399.95		14.2	
2Q14		4/1/2014	NE	43.86	NA	NA	NA	399.56		4.9	
3Q14		7/1/2014	NE	43.15	NA	NA	NA	400.27		0.0	
4Q14		10/1/2014	NE	42.13	NA	NA	NA	401.29		13.8	
1Q15		1/5/2015	NE	43.00	NA	NA	NA	400.42		120.0	
2Q15		4/2/2015	NE	44.50	NA	NA	NA	398.92		0.3	
3Q15		7/6/2015	NE	43.76	NA	NA	NA	399.66		1.2	
MW-25											
4Q14	438.35	10/1/2014	NE	36.50	NA	NA	NA	401.85	402.76 - 392.76 (35.59 - 45.59)	0.0	Installed during 3Q14
1Q15		1/6/2015	NE	38.16	NA	NA	NA	400.19		1.3	
2Q15		4/2/2015	NE	39.69	NA	NA	NA	398.66		1.2	
3Q15		7/6/2015	NE	38.84	NA	NA	NA	399.51		0.1	
MW-26											
4Q14	441.02	10/2/2014	NE	39.41	NA	NA	NA	401.61	402.87 - 392.87 (38.15 - 48.15)	8.2	Installed during 3Q14
1Q15		1/6/2015	NE	40.99	NA	NA	NA	400.03		NA	
2Q15		4/2/2015	NE	42.48	NA	NA	NA	398.54		22.9	
3Q15		7/6/2015	NE	41.77	NA	NA	NA	399.25		0.8	
MW-27											
1Q15	443.40	1/5/2015	NE	41.95	NA	NA	NA	401.45	403.61 - 393.61 (39.79 - 49.79)	NA	Installed during 4Q14
2Q15		4/2/2015	NE	43.28	NA	NA	NA	400.12		10.9	
3Q15		7/6/2015	NE	43.07	NA	NA	NA	400.33		0.0	
MW-28											
4Q14	443.34	10/1/2014	NE	41.10	NA	NA	NA	402.24	409.73 - 399.73 (33.61 - 43.61)	0.0	Installed during 3Q14
1Q15		1/5/2015	NE	41.05	NA	NA	NA	402.29		NA	
2Q15		4/2/2015	NE	42.12	NA	NA	NA	401.22		0.0	
3Q15		7/7/2015	NE	42.39	NA	NA	NA	400.95		0.0	

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-01											
4Q12	442.56	10/1/2012	NE	32.35	NA	NA	NA	410.21	380.61 - 375.61 (61.95 - 66.95)	0.0	*
1Q13		1/3/2013	NE	33.96	NA	NA	NA	408.60		0.0	*
2Q13		4/1/2013	NE	33.68	NA	NA	NA	408.88		0.4	*
3Q13		7/3/2013	NE	30.60	NA	NA	NA	411.96		0.0	*
4Q13		10/1/2013	NE	33.13	NA	NA	NA	409.43		0.6	*
1Q14		2/12/2014	NE	35.21	NA	NA	NA	407.35		0.1	*
2Q14		4/2/2014	NE	35.61	NA	NA	NA	406.95		0.0	*
3Q14		7/3/2014	NE	34.33	NA	NA	NA	408.23		0.2	*
4Q14		10/1/2014	NE	33.96	NA	NA	NA	408.60		0.0	*
1Q15	442.73	1/5/2015	NM	NM	NA	NA	NA	NA	380.78 - 375.78 (61.95 - 66.95)	NM	Inaccessible due to ice
2Q15		4/6/2015	NE	34.46	NA	NA	NA	408.27		0.2	*
3Q15		7/6/2015	NE	31.98	NA	NA	NA	410.75		0.1	*
P-4U											
4Q12	442.50	10/1/2012	NE	33.65	NA	NA	NA	408.85	361.35 - 359.35 (81.15 - 83.15)	0.5	*
1Q13		1/3/2013	NE	35.10	NA	NA	NA	407.40		0.0	*
2Q13		4/1/2013	NE	35.95	NA	NA	NA	406.55		0.5	*
3Q13		7/3/2013	NE	32.80	NA	NA	NA	409.70		0.0	*
4Q13		10/1/2013	NE	34.72	NA	NA	NA	407.78		0.2	*
1Q14		2/12/2014	NE	36.76	NA	NA	NA	405.74		51.0	*
2Q14		4/4/2014	NE	39.91	NA	NA	NA	402.59		0.2	*
3Q14		7/3/2014	NE	36.64	NA	NA	NA	405.86		0.0	*
4Q14		10/1/2014	NE	36.22	NA	NA	NA	406.28		0.0	*
1Q15	442.54	1/5/2015	NE	36.01	NA	NA	NA	406.53	361.39 - 359.39 (81.15 - 83.15)	0.0	*
2Q15		4/6/2015	NE	35.88	NA	NA	NA	406.66		0.4	*
3Q15		7/6/2015	NE	34.58	NA	NA	NA	407.96		0.2	*
P-5L											
4Q12	443.79	10/1/2012	NE	33.60	NA	NA	NA	410.19	303.39 - 301.39 (140.40 - 142.40)	0.0	*
1Q13		1/3/2013	NE	35.17	NA	NA	NA	408.62		0.0	*
2Q13		4/1/2013	NE	35.84	NA	NA	NA	407.95		0.0	*
3Q13		7/3/2013	NE	31.51	NA	NA	NA	412.28		0.0	*
4Q13		10/1/2013	NE	34.35	NA	NA	NA	409.44		0.4	*
1Q14		2/12/2014	NE	36.88	NA	NA	NA	406.91		0.2	*
2Q14		4/4/2014	NE	41.40	NA	NA	NA	402.39		2.0	*
3Q14		7/3/2014	NE	36.65	NA	NA	NA	407.14		0.0	*
4Q14		10/1/2014	NE	36.38	NA	NA	NA	407.41		0.0	*
1Q15	443.84	1/5/2015	NE	36.83	NA	NA	NA	407.01	303.44 - 301.44 (140.40 - 142.40)	0.0	*
2Q15		4/6/2015	NE	36.21	NA	NA	NA	407.63		0.1	*
3Q15		7/7/2015	NE	34.32	NA	NA	NA	409.52		0.0	*
P-5U											
4Q12	444.15	10/1/2012	NE	35.00	NA	NA	NA	409.15	313.52 - 311.52 (130.63 - 132.63)	0.8	*
1Q13		1/3/2013	NE	36.41	NA	NA	NA	407.74		0.0	*
2Q13		4/1/2013	NE	37.24	NA	NA	NA	406.91		0.0	*
3Q13		7/3/2013	NE	33.53	NA	NA	NA	410.62		0.0	*
4Q13		10/1/2013	NE	35.88	NA	NA	NA	408.27		0.0	*
1Q14		2/12/2014	NE	38.00	NA	NA	NA	406.15		0.5	*
2Q14		4/4/2014	NE	50.04	NA	NA	NA	394.11		0.2	*
3Q14		7/3/2014	NE	37.95	NA	NA	NA	406.20		0.0	*
4Q14		10/1/2014	NE	37.56	NA	NA	NA	406.59		0.0	*
1Q15	444.24	1/5/2015	NE	46.14	NA	NA	NA	398.10	313.61 - 311.61 (130.63 - 132.63)	0.1	*
2Q15		4/6/2015	NE	37.23	NA	NA	NA	407.01		0.1	*
3Q15		7/7/2015	NE	35.71	NA	NA	NA	408.53		0.0	*
P-6U											
4Q12	443.35	10/1/2012	NE	30.40	NA	NA	NA	412.95	362.85 - 360.85 (80.50 - 82.50)	0.2	*
1Q13		1/3/2013	NE	35.86	NA	NA	NA	407.49		0.0	*
2Q13		4/1/2013	NE	36.88	NA	NA	NA	406.47		0.0	*
3Q13		7/3/2013	NE	33.17	NA	NA	NA	410.18		0.0	*
4Q13		10/1/2013	NE	35.31	NA	NA	NA	408.04		0.1	*
1Q14		2/12/2014	NE	37.45	NA	NA	NA	405.90		0.7	*
2Q14		4/4/2014	NE	42.10	NA	NA	NA	401.25		1.5	*
3Q14		7/3/2014	NE	37.52	NA	NA	NA	405.83		0.1	*
4Q14		10/1/2014	NE	37.17	NA	NA	NA	406.18		0.0	*
1Q15	443.45	1/5/2015	NE	37.12	NA	NA	NA	406.33	362.95 - 360.95 (80.50 - 82.50)	0.0	*
2Q15		4/6/2015	NE	36.85	NA	NA	NA	406.60		0.1	*
3Q15		7/7/2015	NE	35.43	NA	NA	NA	408.02		0.0	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-7U											
4Q12	443.80	10/1/2012	NE	34.55	NA	NA	NA	409.25	382.72 - 380.72 (61.08 - 63.08)	0.0	*
1Q13		1/3/2013	NE	36.12	NA	NA	NA	407.68		0.0	*
2Q13		4/1/2013	NE	37.12	NA	NA	NA	406.68		0.0	*
3Q13		7/3/2013	NE	33.11	NA	NA	NA	410.69		0.0	*
4Q13		10/1/2013	NE	35.54	NA	NA	NA	408.26		0.1	*
1Q14		2/12/2014	NE	37.76	NA	NA	NA	406.04		2.0	*
2Q14		4/2/2014	NE	43.67	NA	NA	NA	400.13		0.2	*
3Q14		7/3/2014	NE	37.81	NA	NA	NA	405.99		0.3	*
4Q14		10/1/2014	NE	37.52	NA	NA	NA	406.28		0.0	*
1Q15	443.91	1/6/2015	NE	37.49	NA	NA	NA	406.42	382.83 - 380.83 (61.08 - 63.08)	0.0	*
2Q15		4/6/2015	NE	37.22	NA	NA	NA	406.69		0.5	*
3Q15		7/6/2015	NE	35.66	NA	NA	NA	408.25		0.1	*
P-8U											
4Q12	441.87	10/1/2012	NE	34.77	NA	NA	NA	407.10	382.35 - 380.35 (59.52 - 61.52)	0.2	*
1Q13		1/3/2013	NE	35.97	NA	NA	NA	405.90		0.0	*
2Q13		4/1/2013	NE	37.30	NA	NA	NA	404.57		0.0	*
3Q13		7/3/2013	NE	34.48	NA	NA	NA	407.39		0.0	*
4Q13		10/1/2013	NE	35.70	NA	NA	NA	406.17		0.0	*
1Q14		2/12/2014	NE	37.54	NA	NA	NA	404.33		0.4	*
2Q14		4/1/2014	NE	38.43	NA	NA	NA	403.44		0.0	*
3Q14		7/1/2014	NE	38.00	NA	NA	NA	403.87		0.0	*
4Q14		10/3/2014	NE	37.73	NA	NA	NA	404.14		0.0	*
1Q15	441.85	1/5/2015	NE	37.08	NA	NA	NA	404.77	382.33 - 380.33 (59.52 - 61.52)	0.0	*
2Q15		4/6/2015	NE	37.06	NA	NA	NA	404.79		0.1	*
3Q15		7/6/2015	NE	36.24	NA	NA	NA	405.61		0.1	*
P-9U											
4Q12	444.91	10/1/2012	NE	38.59	NA	NA	NA	406.32	344.32 - 342.32 (100.59 - 102.59)	0.0	*
1Q13		1/3/2013	NE	40.11	NA	NA	NA	404.80		0.0	*
2Q13		4/1/2013	NE	41.20	NA	NA	NA	403.71		0.0	*
3Q13		7/3/2013	NE	39.74	NA	NA	NA	405.17		0.5	*
4Q13		10/1/2013	NE	39.93	NA	NA	NA	404.98		0.0	*
1Q14		2/12/2014	NE	41.36	NA	NA	NA	403.55		0.1	*
2Q14		4/1/2014	NE	42.28	NA	NA	NA	402.63		0.0	*
3Q14		7/2/2014	NE	42.07	NA	NA	NA	402.84		0.0	*
4Q14		10/3/2014	NE	41.81	NA	NA	NA	403.10		0.0	*
1Q15	445.04	1/6/2015	NE	41.41	NA	NA	NA	403.63	344.45 - 342.45 (100.59 - 102.59)	0.0	*
2Q15		4/6/2015	NE	41.60	NA	NA	NA	403.44		0.1	*
3Q15		7/6/2015	NE	40.70	NA	NA	NA	404.34		0.1	*
P-11L											
4Q12	442.80	10/1/2012	NE	35.56	NA	NA	NA	407.24	332.59 - 330.59 (110.21 - 112.21)	0.0	*
1Q13		1/3/2013	NE	37.20	NA	NA	NA	405.60		0.0	*
2Q13		4/1/2013	NE	37.97	NA	NA	NA	404.83		0.0	*
3Q13		7/3/2013	NE	37.85	NA	NA	NA	404.95		0.0	*
4Q13		10/1/2013	NE	36.60	NA	NA	NA	406.20		1.0	*
1Q14		2/12/2014	NE	38.37	NA	NA	NA	404.43		8.9	*
2Q14		4/4/2014	NE	42.89	NA	NA	NA	399.91		7.1	*
3Q14		7/1/2014	NE	38.58	NA	NA	NA	404.22		0.0	*
4Q14		10/2/2014	NE	38.10	NA	NA	NA	404.70		0.0	*
1Q15	442.55	1/6/2015	NE	37.70	NA	NA	NA	404.85	332.34 - 330.34 (110.21 - 112.21)	0.0	*
2Q15		4/6/2015	NE	37.51	NA	NA	NA	405.04		0.2	*
3Q15		7/7/2015	NE	36.88	NA	NA	NA	405.67		0.0	*
P-11U											
4Q12	443.09	10/1/2012	NE	36.19	NA	NA	NA	406.90	343.17 - 341.17 (99.92 - 101.92)	0.0	*
1Q13		1/3/2013	NE	37.80	NA	NA	NA	405.29		0.0	*
2Q13		4/1/2013	NE	38.62	NA	NA	NA	404.47		0.0	*
3Q13		7/3/2013	NE	36.40	NA	NA	NA	406.69		0.0	*
4Q13		10/1/2013	NE	37.20	NA	NA	NA	405.89		0.0	*
1Q14		2/12/2014	NE	38.98	NA	NA	NA	404.11		0.9	*
2Q14		4/4/2014	NE	39.74	NA	NA	NA	403.35		0.2	*
3Q14		7/1/2014	NE	39.18	NA	NA	NA	403.91		0.0	*
4Q14		10/2/2014	NE	38.74	NA	NA	NA	404.35		0.0	*
1Q15	443.17	1/6/2015	NE	37.32	NA	NA	NA	405.85	343.25 - 341.25 (99.92 - 101.92)	0.1	*
2Q15		4/6/2015	NE	38.13	NA	NA	NA	405.04		0.2	*
3Q15		7/7/2015	NE	37.51	NA	NA	NA	405.66		0.1	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-14											
4Q12	442.65	10/1/2012	NE	32.39	NA	NA	NA	410.26	395.32 - 385.32 (47.33 - 57.33)	0.0	*
1Q13		1/3/2013	NE	34.01	NA	NA	NA	408.64		0.0	*
2Q13		4/1/2013	NE	33.74	NA	NA	NA	408.91		0.0	*
3Q13		7/3/2013	NE	30.67	NA	NA	NA	411.98		0.0	*
4Q13		10/1/2013	NE	33.18	NA	NA	NA	409.47		4.6	*
1Q14		2/12/2014	NE	35.26	NA	NA	NA	407.39		12.8	*
2Q14		4/2/2014	NE	35.67	NA	NA	NA	406.98		0.0	*
3Q14		7/3/2014	NE	34.40	NA	NA	NA	408.25		25.7	*
4Q14		10/1/2014	NE	34.05	NA	NA	NA	408.60		0.0	*
1Q15	442.74	1/5/2015	NM	NM	NA	NA	NA	NA	395.41 - 385.41 (47.33 - 57.33)	NM	Inaccessible due to ice
2Q15		4/6/2015	NE	34.49	NA	NA	NA	408.25		0.7	*
3Q15		7/6/2015	NE	32.06	NA	NA	NA	410.68		0.2	*
P-15											
4Q12	443.35	10/1/2012	NE	34.35	NA	NA	NA	409.00	397.90 - 387.90 (45.45 - 55.45)	0.6	*
1Q13		1/3/2013	NE	35.81	NA	NA	NA	407.54		0.0	*
2Q13		4/1/2013	NE	36.46	NA	NA	NA	406.89		0.0	*
3Q13		7/3/2013	NE	33.48	NA	NA	NA	409.87		0.0	*
4Q13		10/1/2013	NE	35.03	NA	NA	NA	408.32		0.2	*
1Q14		2/12/2014	NE	37.08	NA	NA	NA	406.27		1.5	*
2Q14		4/4/2014	NE	39.02	NA	NA	NA	404.33		0.3	*
3Q14		7/3/2014	NE	37.04	NA	NA	NA	406.31		0.0	*
4Q14		10/1/2014	NE	36.57	NA	NA	NA	406.78		0.0	*
1Q15	443.69	1/5/2015	NE	36.49	NA	NA	NA	407.20	398.24 - 388.24 (45.45 - 55.45)	0.0	*
2Q15		4/6/2015	NE	36.56	NA	NA	NA	407.13		1.4	*
3Q15		7/6/2015	NE	35.09	NA	NA	NA	408.60		1.8	*
P-16											
4Q12	442.31	10/4/2012	NE	33.35	NA	NA	NA	408.96	396.57 - 386.57 (45.74 - 55.74)	0.0	*
1Q13		1/3/2013	NE	34.80	NA	NA	NA	407.51		0.0	*
2Q13		4/1/2013	NE	35.55	NA	NA	NA	406.76		0.0	*
3Q13		7/3/2013	NE	32.10	NA	NA	NA	410.21		0.0	*
4Q13		10/1/2013	NE	33.96	NA	NA	NA	408.35		0.3	*
1Q14		2/12/2014	NE	36.08	NA	NA	NA	406.23		10.1	*
2Q14		4/3/2014	NE	37.82	NA	NA	NA	404.49		42.2	*
3Q14		7/3/2014	NE	36.15	NA	NA	NA	406.16		0.7	*
4Q14		10/1/2014	NE	35.77	NA	NA	NA	406.54		0.0	*
1Q15	442.68	1/5/2015	NE	35.72	NA	NA	NA	406.96	396.94 - 386.94 (45.74 - 55.74)	0.0	*
2Q15		4/6/2015	NE	35.78	NA	NA	NA	406.90		0.3	*
3Q15		7/7/2015	NE	33.98	NA	NA	NA	408.70		0.0	*
P-43											
4Q12	444.07	10/1/2012	NE	36.80	NA	NA	NA	407.27	380.51 - 370.51 (63.56 - 73.56)	0.0	*
1Q13		1/3/2013	NE	38.21	NA	NA	NA	405.86		0.0	*
2Q13		4/1/2013	NE	39.10	NA	NA	NA	404.97		0.0	*
3Q13		7/3/2013	NE	37.04	NA	NA	NA	407.03		0.0	*
4Q13		10/1/2013	NE	37.73	NA	NA	NA	406.34		0.1	*
1Q14		2/12/2014	NE	39.52	NA	NA	NA	404.55		1.2	*
2Q14		4/4/2014	NE	41.35	NA	NA	NA	402.72		0.2	*
3Q14		7/1/2014	NE	39.73	NA	NA	NA	404.34		0.0	*
4Q14		10/2/2014	NE	39.31	NA	NA	NA	404.76		8.5	*
1Q15	444.44	1/6/2015	NE	38.78	NA	NA	NA	405.66	380.88 - 370.88 (63.56 - 73.56)	0.0	*
2Q15		4/6/2015	NE	39.01	NA	NA	NA	405.43		0.3	*
3Q15		7/7/2015	NE	38.03	NA	NA	NA	406.41		0.1	*
P-53											
4Q12	446.23	10/1/2012	NE	41.88	NA	NA	NA	404.35	407.73 - 382.73 (38.50 - 63.50)	0.0	
1Q13		1/2/2013	NE	43.06	NA	NA	NA	403.17		0.0	
2Q13		4/1/2013	NE	44.29	NA	NA	NA	401.94		0.1	
3Q13		7/2/2013	NE	42.84	NA	NA	NA	403.39		0.4	
4Q13		10/2/2013	NE	42.20	NA	NA	NA	404.03		0.0	
1Q14		2/10/2014	NE	43.66	NA	NA	NA	402.57		0.0	
2Q14		4/1/2014	NE	44.32	NA	NA	NA	401.91		0.3	
3Q14		7/1/2014	NE	44.49	NA	NA	NA	401.74		0.0	
4Q14		10/2/2014	NE	43.81	NA	NA	NA	402.42		0.0	
1Q15	446.41	1/8/2015	NE	43.82	NA	NA	NA	402.59	407.91 - 382.91 (38.50 - 63.50)	0.0	
2Q15		4/2/2015	NE	44.65	NA	NA	NA	401.76		0.0	
3Q15		7/7/2015	NE	44.16	NA	NA	NA	402.25		0.0	

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-54											
4Q12	442.18	10/1/2012	NE	40.44	NA	NA	NA	401.74	404.18 - 379.18 (38.00 - 63.00)	0.0	
1Q13		1/3/2013	NE	41.62	NA	NA	NA	400.56		0.0	
2Q13		4/1/2013	NE	42.26	NA	NA	NA	399.92		0.0	
3Q13		7/1/2013	NE	39.40	NA	NA	NA	402.78		0.8	
4Q13		10/1/2013	NE	39.74	NA	NA	NA	402.44		0.0	
1Q14		2/10/2014	NE	42.20	NA	NA	NA	399.98		0.2	
2Q14		4/3/2014	NE	42.59	NA	NA	NA	399.59		0.2	
3Q14		7/1/2014	NE	41.88	NA	NA	NA	400.30		0.0	
4Q14		10/1/2014	NE	40.82	NA	NA	NA	401.36		0.0	
1Q15	442.32	1/5/2015	NE	41.69	NA	NA	NA	400.63	404.32 - 379.32 (38.00 - 63.00)	0.0	
2Q15		4/2/2015	NE	43.20	NA	NA	NA	399.12		0.0	
3Q15		7/6/2015	NE	42.40	NA	NA	NA	399.92		0.0	
P-55R (P-55)											
4Q12	445.95	10/1/2012	NE	44.17	NA	NA	NA	401.78	406.13 - 381.13 (39.82 - 64.82)	3.0	
1Q13		1/8/2013	NE	45.24	NA	NA	NA	400.71		0.0	
2Q13	443.78	4/2/2013	NE	43.87	NA	NA	NA	399.91	403.35 - 393.35 (40.43 - 50.43)	202.0	Replaced during 4Q12
3Q13		7/5/2013	NE	41.43	NA	NA	NA	402.35		136.4	
4Q13		10/2/2013	NE	41.58	NA	NA	NA	402.20		52.4	
1Q14		2/13/2014	43.24	43.37	400.41	400.54	0.13	400.51		93.3	
2Q14		4/4/2014	44.32	44.37	399.41	399.46	0.05	399.45		29.1	
3Q14		7/1/2014	43.63	43.76	400.02	400.15	0.13	400.12		192.0	
4Q14		10/3/2014	42.81	43.02	400.76	400.97	0.21	400.93		53.8	
1Q15	443.79	1/8/2015	42.94	43.19	400.60	400.85	0.25	400.80	403.36 - 393.36 (40.43 - 50.43)	93.9	
2Q15		4/1/2015	44.63	44.76	399.03	399.16	0.13	399.13		51.6	
3Q15		7/9/2015	44.16	44.27	399.52	399.63	0.11	399.61		0.3	
P-56											
4Q12	446.02	10/2/2012	NE	44.76	NA	NA	NA	401.26	405.20 - 380.20 (40.82 - 65.82)	0.0	
1Q13		1/4/2013	NE	45.65	NA	NA	NA	400.37		0.6	
2Q13		4/2/2013	NE	46.40	NA	NA	NA	399.62		0.0	
3Q13		7/5/2013	NE	43.60	NA	NA	NA	402.42		0.0	
4Q13		10/2/2013	NE	44.29	NA	NA	NA	401.73		0.1	
1Q14		2/13/2014	NE	46.35	NA	NA	NA	399.67		0.0	
2Q14		4/4/2014	NE	47.32	NA	NA	NA	398.70		0.3	
3Q14		7/1/2014	NE	46.14	NA	NA	NA	399.88		0.0	
4Q14		10/3/2014	NE	45.20	NA	NA	NA	400.82		0.0	
1Q15	446.14	1/8/2015	NE	46.24	NA	NA	NA	399.90	405.32 - 380.32 (40.82 - 65.82)	0.2	
2Q15		4/1/2015	NE	48.02	NA	NA	NA	398.12		0.0	
3Q15		7/9/2015	NE	47.46	NA	NA	NA	398.68		0.0	
P-57											
4Q12	446.53	10/1/2012	NE	44.78	NA	NA	NA	401.75	406.07 - 381.07 (40.46 - 65.46)	0.0	
1Q13		1/4/2013	NE	45.82	NA	NA	NA	400.71		0.0	
2Q13		4/2/2013	NE	46.63	NA	NA	NA	399.90		0.0	
3Q13		7/5/2013	NE	43.70	NA	NA	NA	402.83		0.0	
4Q13		10/2/2013	NE	44.12	NA	NA	NA	402.41		1.8	
1Q14		2/12/2014	NE	46.57	NA	NA	NA	399.96		2.0	
2Q14		4/7/2014	NE	47.27	NA	NA	NA	399.26		4.1	
3Q14		7/1/2014	NE	46.12	NA	NA	NA	400.41		0.0	
4Q14		10/3/2014	NE	45.25	NA	NA	NA	401.28		0.0	
1Q15	446.96	1/5/2015	NE	47.37	NA	NA	NA	399.59	402.77 - 392.77 (44.19 - 54.19)	0.0	Replaced during 4Q14
2Q15		4/1/2015	NE	45.87	NA	NA	NA	401.09		0.0	
3Q15		7/9/2015	NE	48.22	NA	NA	NA	398.74		0.0	
P-58											
4Q12	444.92	10/2/2012	NE	42.90	NA	NA	NA	402.02	404.70 - 379.70 (40.21 - 65.21)	0.2	
1Q13		1/4/2013	NE	43.80	NA	NA	NA	401.12		0.0	
2Q13		4/2/2013	NE	44.75	NA	NA	NA	400.17		0.0	
3Q13		7/5/2013	NE	41.85	NA	NA	NA	403.07		0.0	
4Q13		10/2/2013	NE	41.97	NA	NA	NA	402.95		4.9	
1Q14		2/12/2014	NE	44.66	NA	NA	NA	400.26		3.6	
2Q14		4/4/2014	NE	45.39	NA	NA	NA	399.53		0.3	
3Q14		7/2/2014	NE	44.25	NA	NA	NA	400.67		0.0	
4Q14		10/3/2014	NE	43.13	NA	NA	NA	401.79		0.0	
1Q15	444.94	1/8/2015	NE	44.98	NA	NA	NA	399.96	404.73 - 379.73 (40.21 - 65.21)	6.3	
2Q15		4/1/2015	NE	46.79	NA	NA	NA	398.15		0.0	
3Q15		7/9/2015	NE	46.01	NA	NA	NA	398.93		0.0	

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-59											
4Q12	446.78	10/2/2012	NE	45.83	NA	NA	NA	400.95	398.87 - 373.87 (47.91 - 72.91)	389.0	*
1Q13		1/4/2013	NE	46.54	NA	NA	NA	400.24		417.0	*
2Q13		4/2/2013	NE	47.20	NA	NA	NA	399.58		116.0	*
3Q13		7/5/2013	NE	44.47	NA	NA	NA	402.31		186.4	*
4Q13		10/2/2013	NE	45.37	NA	NA	NA	401.41		131.4	*
1Q14		2/13/2014	NE	47.35	NA	NA	NA	399.43		111.4	*
2Q14		4/4/2014	NE	49.04	NA	NA	NA	397.74		0.3	
3Q14		7/1/2014	NE	47.17	NA	NA	NA	399.61		292.1	*
4Q14		10/3/2014	NE	46.39	NA	NA	NA	400.39		397.3	*
1Q15	446.86	1/8/2015	NE	47.00	NA	NA	NA	399.86	398.95 - 373.95 (47.91 - 72.91)	377.9	*
2Q15		4/1/2015	NE	48.86	NA	NA	NA	398.00		0.0	
3Q15		7/9/2015	NE	46.50	NA	NA	NA	400.36		0.0	* Gauging result anomalous.
P-60											
4Q12	446.57	10/2/2012	45.33	45.44	401.13	401.24	0.11	401.22	403.12 - 383.12 (43.45 - 63.45)	44.0	
1Q13		1/4/2013	NE	46.19	NA	NA	NA	400.38		9.9	
2Q13		4/2/2013	46.96	47.04	399.53	399.61	0.08	399.60		8.8	
3Q13		7/5/2013	44.41	44.46	402.11	402.16	0.05	402.15		42.7	
4Q13		10/2/2013	44.91	44.99	401.58	401.66	0.08	401.65		28.3	
1Q14		2/13/2014	46.68	46.79	399.78	399.89	0.11	399.87		2.4	
2Q14		4/4/2014	47.74	47.77	398.80	398.83	0.03	398.83		25.1	
3Q14		7/1/2014	46.85	46.93	399.64	399.72	0.08	399.71		309.3	
4Q14		10/3/2014	46.09	46.17	400.40	400.48	0.08	400.47		127.9	
1Q15	446.69	1/8/2015	46.29	46.49	400.20	400.40	0.20	400.36	403.24 - 383.24 (43.45 - 63.45)	6.1	
2Q15		4/1/2015	48.04	48.07	398.62	398.65	0.03	398.64		20.0	
3Q15		7/9/2015	47.61	47.75	398.94	399.08	0.14	399.05		0.0	
P-60-11											
4Q12	446.18	10/2/2012	44.32	44.41	401.77	401.86	0.09	401.84	413.03 - 383.03 (33.15 - 63.15)	0.1	
1Q13		1/4/2013	NE	45.06	NA	NA	NA	401.12		2.0	
2Q13		4/2/2013	NE	45.72	NA	NA	NA	400.46		0.0	
3Q13		7/5/2013	NE	43.81	NA	NA	NA	402.37		0.0	
4Q13		10/2/2013	NE	43.43	NA	NA	NA	402.75		0.0	
1Q14		2/13/2014	NE	44.99	NA	NA	NA	401.19		0.0	
2Q14		4/4/2014	NE	45.58	NA	NA	NA	400.60		0.2	
3Q14		7/1/2014	NE	45.74	NA	NA	NA	400.44		1.3	
4Q14		10/3/2014	NE	44.62	NA	NA	NA	401.56		0.0	
1Q15	446.26	1/8/2015	NE	44.85	NA	NA	NA	401.41	413.11 - 383.11 (33.15 - 63.15)	0.0	
2Q15		4/1/2015	NE	46.22	NA	NA	NA	400.04		0.0	
3Q15		7/8/2015	NE	46.16	NA	NA	NA	400.10		0.7	
P-60-12											
4Q12	443.31	10/2/2012	NE	44.15	NA	NA	NA	399.16	383.31 - 373.31 (60.00 - 70.00)	0.0	*
1Q13		1/4/2013	NE	42.97	NA	NA	NA	400.34		2.4	*
2Q13		4/2/2013	NE	43.77	NA	NA	NA	399.54		0.0	*
3Q13		7/5/2013	NE	41.20	NA	NA	NA	402.11		0.0	*
4Q13		10/2/2013	NE	41.72	NA	NA	NA	401.59		1.1	*
1Q14		2/13/2014	NE	43.45	NA	NA	NA	399.86		72.6	*
2Q14		4/4/2014	NE	44.54	NA	NA	NA	398.77		43.5	*
3Q14		7/1/2014	NE	43.66	NA	NA	NA	399.65		46.2	*
4Q14		10/3/2014	NE	42.93	NA	NA	NA	400.38		0.6	*
1Q15	443.43	1/8/2015	NE	43.16	NA	NA	NA	400.27	383.43 - 373.43 (60.00 - 70.00)	28.1	*
2Q15		4/1/2015	NE	44.83	NA	NA	NA	398.60		86.9	*
3Q15		7/9/2015	NE	45.42	NA	NA	NA	398.01		0.0	*
P-60-12S											
4Q12	443.33	10/2/2012	NE	19.04	NA	NA	NA	424.29	429.49 - 419.49 (13.84 - 23.84)	0.0	
1Q13		1/4/2013	NE	19.35	NA	NA	NA	423.98		3.5	
2Q13		4/2/2013	NM	NM	NA	NA	NA	NA		NM	
3Q13		7/5/2013	NE	17.73	NA	NA	NA	425.60		0.0	
4Q13		10/2/2013	NE	19.03	NA	NA	NA	424.30		0.3	
1Q14		2/13/2014	NE	19.02	NA	NA	NA	424.31		0.0	
2Q14		4/4/2014	NE	19.03	NA	NA	NA	424.30		0.5	
3Q14		7/1/2014	NE	18.00	NA	NA	NA	425.33		1.6	
4Q14		10/3/2014	NE	18.95	NA	NA	NA	424.38		0.3	
1Q15	443.43	1/8/2015	NE	20.50	NA	NA	NA	422.93	429.59 - 419.59 (13.84 - 23.84)	1.1	
2Q15		4/1/2015	NE	NE	NA	NA	NA	NA		0.0	Well Dry
3Q15		7/9/2015	NE	NE	NA	NA	NA	NA		0.0	Well Dry

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-60-13											
4Q12		10/2/2012	NE	40.61	NA	NA	NA	401.82		0.0	
1Q13		1/4/2013	NE	41.55	NA	NA	NA	400.88		0.7	
2Q13		4/2/2013	NM	NM	NA	NA	NA	NA		NM	
3Q13		7/5/2013	NE	40.53	NA	NA	NA	401.90		0.0	
4Q13	442.43	10/2/2013	NE	39.98	NA	NA	NA	402.45	402.43 - 382.43 (40.00 - 60.00)	0.6	*
1Q14		2/13/2014	NM	NM	NA	NA	NA	NA		NM	
2Q14		4/4/2014	NE	42.81	NA	NA	NA	399.62		0.7	
3Q14		7/1/2014	NE	42.31	NA	NA	NA	400.12		0.0	
4Q14		10/3/2014	NE	40.78	NA	NA	NA	401.65		15.0	
1Q15		1/8/2015	NE	40.61	NA	NA	NA	402.31		4.5	
2Q15	442.92	4/1/2015	NE	41.22	NA	NA	NA	401.70	402.92 - 382.92 (40.00 - 60.00)	0.0	
3Q15		7/9/2015	NE	41.20	NA	NA	NA	401.72		0.0	
P-60-13S											
4Q12		10/2/2012	NE	17.97	NA	NA	NA	424.42		0.7	
1Q13		1/4/2013	NM	NM	NA	NA	NA	NA		NM	
2Q13		4/2/2013	NM	NM	NA	NA	NA	NA		NM	
3Q13		7/5/2013	NE	15.66	NA	NA	NA	426.73		8.2	
4Q13	442.39	10/2/2013	NE	17.60	NA	NA	NA	424.79	432.39 - 422.39 (10.00 - 20.00)	2.8	
1Q14		2/13/2014	NM	NM	NA	NA	NA	NA		NM	
2Q14		4/4/2014	NE	17.16	NA	NA	NA	425.23		0.3	
3Q14		7/1/2014	NE	17.16	NA	NA	NA	425.23		0.0	
4Q14		10/3/2014	NE	17.44	NA	NA	NA	424.95		0.0	
1Q15		1/8/2015	NE	17.81	NA	NA	NA	425.09		0.2	
2Q15	442.90	4/1/2015	NE	18.80	NA	NA	NA	424.10	432.90 - 422.90 (10.00 - 20.00)	0.7	
3Q15		7/9/2015	NE	16.90	NA	NA	NA	426.00		0.0	
P-60-S											
4Q12		10/4/2012	43.94	45.84	401.14	403.04	1.90	402.66		0.3	
1Q13		1/4/2013	45.34	45.95	401.03	401.64	0.61	401.52		0.0	
2Q13		4/2/2013	46.33	46.39	400.59	400.65	0.06	400.64		0.1	
3Q13		7/5/2013	NE	44.45	NA	NA	NA	402.53		0.0	
4Q13	446.98	10/2/2013	43.56	44.49	402.49	403.42	0.93	403.23	410.50 - 395.50 (36.48 - 51.48)	0.2	
1Q14		2/13/2014	45.48	45.86	401.12	401.50	0.38	401.42		0.3	
2Q14		4/4/2014	46.38	46.57	400.41	400.60	0.19	400.56		0.2	
3Q14		7/1/2014	46.35	46.37	400.61	400.63	0.02	400.63		0.1	
4Q14		10/3/2014	NE	45.38	NA	NA	NA	401.60		0.9	
1Q15		1/8/2015	45.08	45.70	401.14	401.76	0.62	401.64		9.1	
2Q15	446.84	4/1/2015	46.62	47.07	399.77	400.22	0.45	400.13	410.36 - 395.36 (36.48 - 51.48)	0.1	
3Q15		7/9/2015	46.84	46.90	399.94	400.00	0.06	399.99		0.0	
P-61											
4Q12		10/2/2012	NE	43.36	NA	NA	NA	400.91		24.3	*
1Q13		1/4/2013	43.82	45.95	398.32	400.45	2.13	400.02		38.8	*
2Q13		4/2/2013	44.78	46.64	397.63	399.49	1.86	399.12		23.1	*
3Q13		7/5/2013	42.52	42.56	401.71	401.75	0.04	401.74		186.4	*
4Q13	444.27	10/2/2013	43.08	43.14	401.13	401.19	0.06	401.18	398.59 - 373.59 (45.68 - 70.68)	10.9	*
1Q14		2/12/2014	44.62	46.17	398.10	399.65	1.55	399.34		410.7	*
2Q14		4/4/2014	45.80	45.81	398.46	398.47	0.01	398.47		13.0	
3Q14		7/2/2014	44.75	45.49	398.78	399.52	0.74	399.37		150.6	*
4Q14		10/2/2014	43.47	44.23	400.04	400.80	0.76	400.64		269.9	*
1Q15		1/5/2015	44.62	46.14	398.33	399.85	1.52	399.55		431.0	*
2Q15	444.47	4/1/2015	46.06	48.03	396.44	398.41	1.97	398.02	398.80 - 373.80 (45.68 - 70.68)	0.0	
3Q15		7/9/2015	45.99	47.05	397.42	398.48	1.06	398.27		0.1	
P-62											
4Q12		10/1/2012	40.61	42.35	399.97	401.71	1.74	401.37		3.2	*
1Q13		1/8/2013	NE	30.39	NA	NA	NA	411.93		0.0	*
2Q13		4/2/2013	42.81	44.32	398.00	399.51	1.51	399.21		0.0	
3Q13		7/1/2013	40.77	41.88	400.44	401.55	1.11	401.33		32.6	*
4Q13	442.32	10/2/2013	40.61	42.26	400.06	401.71	1.65	401.38	400.85 - 375.85 (41.47 - 66.47)	62.6	*
1Q14		2/12/2014	42.35	43.85	398.47	399.97	1.50	399.67		198.1	
2Q14		4/4/2014	43.51	45.28	397.04	398.81	1.77	398.46		0.8	
3Q14		7/2/2014	42.58	43.69	398.63	399.74	1.11	399.52		0.0	
4Q14		10/3/2014	41.64	42.89	399.43	400.68	1.25	400.43		0.9	
1Q15		1/9/2015	42.48	43.96	398.47	399.95	1.48	399.65		0.4	
2Q15	442.43	4/1/2015	43.65	45.18	397.25	398.78	1.53	398.47	400.96 - 375.96 (41.47 - 66.47)	0.0	
3Q15		7/8/2015	43.49	44.42	398.01	398.94	0.93	398.75		0.3	

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-63											
4Q12	445.75	10/1/2012	NE	44.55	NA	NA	NA	401.20	398.46 - 373.46 (47.29 - 72.29)	104.0	*
1Q13		1/4/2013	NE	46.03	NA	NA	NA	399.72		0.0	*
2Q13		4/1/2013	NE	46.98	NA	NA	NA	398.77		0.0	*
3Q13		7/5/2013	NE	45.41	NA	NA	NA	400.34		142.0	*
4Q13		10/2/2013	44.98	45.01	400.74	400.77	0.03	400.76		33.4	*
1Q14		2/12/2014	NE	45.06	NA	NA	NA	400.69		22.9	*
2Q14		4/4/2014	47.98	48.14	397.61	397.77	0.16	397.74		0.3	
3Q14		7/2/2014	46.80	46.82	398.93	398.95	0.02	398.95		47.5	*
4Q14		10/2/2014	45.90	45.94	399.81	399.85	0.04	399.84		70.3	*
1Q15	445.85	1/9/2015	46.23	46.25	399.60	399.62	0.02	399.62	398.56 - 373.56 (47.29 - 72.29)	14.6	*
2Q15		4/1/2015	47.30	47.70	398.15	398.55	0.40	398.47		12.8	
3Q15		7/7/2015	47.18	47.54	398.31	398.67	0.36	398.60		13.8	*
P-64											
4Q12	446.52	10/1/2012	45.62	45.68	400.84	400.90	0.06	400.89	399.29 - 374.29 (47.23 - 72.23)	34.5	*
1Q13		1/4/2013	NE	47.84	NA	NA	NA	398.68		103.0	
2Q13		4/1/2013	NE	48.23	NA	NA	NA	398.29		0.0	
3Q13		7/5/2013	46.95	46.97	399.55	399.57	0.02	399.57		96.5	*
4Q13		10/2/2013	46.25	46.31	400.21	400.27	0.06	400.26		41.4	*
1Q14		2/12/2014	47.93	47.94	398.58	398.59	0.01	398.59		114.2	
2Q14		4/4/2014	49.60	49.68	396.84	396.92	0.08	396.90		6.8	
3Q14		7/2/2014	48.08	48.36	398.16	398.44	0.28	398.38		0.0	
4Q14		10/2/2014	47.30	47.62	398.90	399.22	0.32	399.16		336.2	
1Q15	446.89	1/9/2015	47.29	47.51	399.38	399.60	0.22	399.56	399.66 - 374.66 (47.23 - 72.23)	12.6	
2Q15		4/1/2015	48.44	49.20	397.69	398.45	0.76	398.30		79.7	
3Q15		7/7/2015	48.38	48.62	398.27	398.51	0.24	398.46		171.4	
P-65											
4Q12	444.53	10/1/2012	NE	43.00	NA	NA	NA	401.53	396.91 - 371.91 (47.62 - 72.62)	0.5	*
1Q13		1/4/2013	NE	44.61	NA	NA	NA	399.92		0.0	*
2Q13		4/1/2013	NM	NM	NA	NA	NA	NA		NM	Well damaged
3Q13		7/3/2013	NM	NM	NA	NA	NA	NA		NM	Well damaged
4Q13	444.60	10/2/2013	NE	43.11	NA	NA	NA	401.49	397.58 - 372.58 (47.02 - 72.02)	21.2	** Well repaired during 3Q13; Well surveyed during 4Q13
1Q14		2/12/2014	NE	44.91	NA	NA	NA	399.69		2.3	*
2Q14		4/4/2014	NE	46.68	NA	NA	NA	397.92		0.6	*
3Q14		7/2/2014	NE	45.37	NA	NA	NA	399.23		0.0	*
4Q14		10/2/2014	NE	44.44	NA	NA	NA	400.16		16.5	*
1Q15		1/5/2015	NE	44.46	NA	NA	NA	400.14		5.5	*
2Q15		4/3/2015	NE	46.27	NA	NA	NA	398.33		7.6	*
3Q15		7/7/2015	NE	46.08	NA	NA	NA	398.52		2.9	*
P-66											
4Q12	436.70	10/2/2012	NE	34.55	NA	NA	NA	402.15	401.98 - 376.98 (34.72 - 59.72)	5.0	*
1Q13		1/2/2013	NE	35.40	NA	NA	NA	401.30		66.2	
2Q13		4/2/2013	NE	36.41	NA	NA	NA	400.29		0.6	
3Q13		7/2/2013	NE	33.55	NA	NA	NA	403.15		3.5	*
4Q13		10/2/2013	NE	33.44	NA	NA	NA	403.26		54.0	*
1Q14		2/11/2014	NE	36.39	NA	NA	NA	400.31		13.1	
2Q14		4/4/2014	NE	36.99	NA	NA	NA	399.71		0.2	
3Q14		7/2/2014	NE	35.80	NA	NA	NA	400.90		0.9	
4Q14		10/3/2014	NE	34.77	NA	NA	NA	401.93		0.4	
1Q15	436.81	1/9/2015	NE	36.73	NA	NA	NA	400.08	402.09 - 377.09 (34.72 - 59.72)	52.6	
2Q15		4/3/2015	NE	38.26	NA	NA	NA	398.55		0.0	
3Q15		7/7/2015	NE	37.34	NA	NA	NA	399.47		0.2	
P-67											
4Q12	444.13	10/2/2012	NE	40.81	NA	NA	NA	403.32	402.16 - 377.16 (41.98 - 66.98)	0.0	*
1Q13		1/2/2013	NE	41.69	NA	NA	NA	402.44		11.1	*
2Q13		4/2/2013	42.79	42.80	401.33	401.34	0.01	401.34		46.5	
3Q13		7/2/2013	NE	40.29	NA	NA	NA	403.84		0.0	*
4Q13		10/2/2013	39.78	39.80	404.33	404.35	0.02	404.35		17.3	*
1Q14		2/11/2014	42.60	42.63	401.50	401.53	0.03	401.52		60.9	
2Q14		4/4/2014	NE	43.35	NA	NA	NA	400.78		1.2	
3Q14		7/3/2014	NE	42.39	NA	NA	NA	401.74		1.8	
4Q14		10/3/2014	NE	41.37	NA	NA	NA	402.76		45.9	*
1Q15	444.10	1/9/2015	42.59	42.61	401.49	401.51	0.02	401.51	402.12 - 377.12 (41.98 - 66.98)	23.0	
2Q15		4/3/2015	NE	44.16	NA	NA	NA	399.94		0.1	
3Q15		7/7/2015	NE	43.27	NA	NA	NA	400.83		0.0	

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-68											
4Q12	445.07	10/2/2012	43.85	44.04	401.03	401.22	0.19	401.18	399.81 - 374.81 (45.26 - 70.26)	349.0	*
1Q13		1/4/2013	NM	NM	NA	NA	NA	NA		NM	
2Q13		4/2/2013	45.40	45.54	399.53	399.67	0.14	399.64		74.3	
3Q13		7/5/2013	43.05	43.12	401.95	402.02	0.07	402.01		197.0	*
4Q13		10/2/2013	43.42	43.52	401.55	401.65	0.10	401.63		101.6	*
1Q14		2/13/2014	45.18	45.29	399.78	399.89	0.11	399.87		172.6	*
2Q14		4/7/2014	45.94	46.28	398.79	399.13	0.34	399.06		9.3	
3Q14		7/2/2014	45.27	45.32	399.75	399.80	0.05	399.79		215.5	
4Q14		10/3/2014	44.56	44.67	400.40	400.51	0.11	400.49		254.8	*
1Q15	445.18	1/8/2015	44.80	44.85	400.33	400.38	0.05	400.37	399.92 - 374.92 (45.26 - 70.26)	277.7	*
2Q15		4/1/2015	46.52	46.63	398.55	398.66	0.11	398.64		206.4	
3Q15		7/9/2015	46.33	46.41	398.77	398.85	0.08	398.83		6.9	
P-69											
4Q12	443.18	10/2/2012	NE	42.46	NA	NA	NA	400.72	402.36 - 377.36 (40.82 - 65.82)	0.8	
1Q13		1/4/2013	NE	43.85	NA	NA	NA	399.33		0.0	
2Q13		4/2/2013	NE	43.94	NA	NA	NA	399.24		0.0	
3Q13		7/5/2013	NE	41.36	NA	NA	NA	401.82		0.0	
4Q13		10/2/2013	NE	42.17	NA	NA	NA	401.01		0.5	
1Q14		2/13/2014	NE	43.85	NA	NA	NA	399.33		79.9	
2Q14		4/7/2014	NE	44.88	NA	NA	NA	398.30		0.2	
3Q14		7/2/2014	NE	44.00	NA	NA	NA	399.18		0.0	
4Q14		10/2/2014	NE	43.01	NA	NA	NA	400.17		0.0	
1Q15	443.40	1/9/2015	NE	44.05	NA	NA	NA	399.35	402.58 - 377.58 (40.82 - 65.82)	0.9	
2Q15		4/3/2015	NE	45.51	NA	NA	NA	397.89		0.0	
3Q15		7/9/2015	NE	45.08	NA	NA	NA	398.32		0.1	
P-70											
4Q12	442.83	10/1/2012	NE	41.67	NA	NA	NA	401.16	398.16 - 373.16 (44.67 - 69.67)	0.0	*
1Q13		1/4/2013	NE	42.72	NA	NA	NA	400.11		1.7	*
2Q13		4/2/2013	NE	43.59	NA	NA	NA	399.24		211.0	*
3Q13		7/5/2013	NE	41.06	NA	NA	NA	401.77		134.2	*
4Q13		10/2/2013	NE	41.52	NA	NA	NA	401.31		99.1	*
1Q14		2/12/2014	NE	43.28	NA	NA	NA	399.55		85.0	*
2Q14		4/4/2014	44.21	45.35	397.48	398.62	1.14	398.39		200.7	*
3Q14		7/2/2014	43.22	43.88	398.95	399.61	0.66	399.48		319.6	*
4Q14		10/2/2014	42.08	42.72	400.11	400.75	0.64	400.62		299.6	*
1Q15	442.95	1/8/2015	42.79	43.42	399.53	400.16	0.63	400.03	398.28 - 373.28 (44.67 - 69.67)	208.3	*
2Q15		4/1/2015	44.42	45.77	397.18	398.53	1.35	398.26		180.4	
3Q15		7/7/2015	44.34	44.95	398.00	398.61	0.61	398.49		270.4	*
P-71											
4Q12	444.83	10/2/2012	42.69	42.75	402.08	402.14	0.06	402.13	402.22 - 377.22 (42.61 - 67.61)	23.0	
1Q13		1/4/2013	NE	43.83	NA	NA	NA	401.00		1.1	
2Q13		4/2/2013	NE	44.54	NA	NA	NA	400.29		1.2	
3Q13		7/5/2013	NE	42.65	NA	NA	NA	402.18		82.5	
4Q13		10/2/2013	NE	42.53	NA	NA	NA	402.30		53.0	*
1Q14		2/13/2014	NE	44.35	NA	NA	NA	400.48		0.0	
2Q14		4/4/2014	NE	45.48	NA	NA	NA	399.35		0.8	
3Q14		7/3/2014	NE	44.61	NA	NA	NA	400.22		3.9	
4Q14		10/2/2014	NE	43.43	NA	NA	NA	401.40		185.5	
1Q15	444.94	1/5/2015	NE	4.28	NA	NA	NA	440.66	402.33 - 377.33 (42.61 - 67.61)	72.6	*
2Q15		4/1/2015	NE	45.83	NA	NA	NA	399.11		0.4	
3Q15		7/7/2015	NE	45.02	NA	NA	NA	399.92		0.0	Gauging result anomalous.
P-72											
4Q12	444.43	10/1/2012	NE	41.88	NA	NA	NA	402.55	398.66 - 373.66 (45.77 - 70.77)	5.1	*
1Q13		1/4/2013	NE	43.27	NA	NA	NA	401.16		2.2	*
2Q13		4/1/2013	NE	44.23	NA	NA	NA	400.20		0.3	*
3Q13		7/5/2013	NE	42.36	NA	NA	NA	402.07		2.0	*
4Q13		10/2/2013	NE	41.88	NA	NA	NA	402.55		2.7	*
1Q14		2/12/2014	NE	43.86	NA	NA	NA	400.57		37.2	*
2Q14		4/4/2014	NE	45.12	NA	NA	NA	399.31		2.2	*
3Q14		7/2/2014	NE	44.19	NA	NA	NA	400.24		6.5	*
4Q14		10/2/2014	NE	43.02	NA	NA	NA	401.41		16.2	*
1Q15	444.49	1/8/2015	NE	43.63	NA	NA	NA	400.86	398.72 - 373.72 (45.77 - 70.77)	23.1	*
2Q15		4/1/2015	NE	45.72	NA	NA	NA	398.77		12.8	*
3Q15		7/7/2015	NE	45.56	NA	NA	NA	398.93		1.6	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-73											
4Q12		10/2/2012	NE	42.02	NA	NA	NA	401.74		7.5	
1Q13		1/4/2013	NE	43.04	NA	NA	NA	400.72		0.0	
2Q13		4/1/2013	NE	43.93	NA	NA	NA	399.83		0.0	
3Q13		7/5/2013	NE	41.48	NA	NA	NA	402.28		18.3	*
4Q13	443.76	10/2/2013	NE	41.68	NA	NA	NA	402.08	402.16 - 377.16 (41.59 - 66.59)	50.3	
1Q14		2/12/2014	NE	43.98	NA	NA	NA	399.78		70.1	
2Q14		4/7/2014	NE	44.82	NA	NA	NA	398.94		0.4	
3Q14		7/2/2014	NE	43.54	NA	NA	NA	400.22		0.0	
4Q14		10/3/2014	NE	42.69	NA	NA	NA	401.07		0.7	
1Q15		1/5/2015	NE	45.24	NA	NA	NA	398.62		8.0	
2Q15	443.86	4/3/2015	NE	46.59	NA	NA	NA	397.27	402.27 - 377.27 (41.59 - 66.59)	0.0	
3Q15		7/9/2015	NE	46.16	NA	NA	NA	397.70		0.1	
P-74											
4Q12		10/2/2012	NE	41.78	NA	NA	NA	400.85		0.0	*
1Q13		1/4/2013	NE	42.55	NA	NA	NA	400.08		0.2	*
2Q13		4/2/2013	NE	43.23	NA	NA	NA	399.40		0.0	*
3Q13		7/5/2013	NE	40.55	NA	NA	NA	402.08		0.0	*
4Q13	442.63	10/2/2013	NE	41.49	NA	NA	NA	401.14	398.20 - 373.20 (44.43 - 69.43)	0.5	*
1Q14		1/14/2014	NE	43.18	NA	NA	NA	399.45		2.8	*
2Q14		4/7/2014	NE	43.86	NA	NA	NA	398.77		7.5	*
3Q14		7/2/2014	NE	43.25	NA	NA	NA	399.38		0.1	*
4Q14		10/2/2014	NE	42.21	NA	NA	NA	400.42		0.0	*
1Q15		1/9/2015	NE	43.63	NA	NA	NA	399.09		0.1	*
2Q15	442.72	4/3/2015	NE	44.85	NA	NA	NA	397.87	398.29 - 373.29 (44.43 - 69.43)	0.0	
3Q15		7/9/2015	NE	48.03	NA	NA	NA	394.69		0.1	Gauging result anomalous.
P-75											
4Q12		10/2/2012	44.10	44.20	402.12	402.22	0.10	402.20		1.9	
1Q13		1/2/2013	NE	44.87	NA	NA	NA	401.45		3.1	
2Q13		4/2/2013	NE	46.03	NA	NA	NA	400.29		0.7	
3Q13		7/2/2013	NE	43.43	NA	NA	NA	402.89		0.0	
4Q13	446.32	10/2/2013	NE	42.92	NA	NA	NA	403.40	403.19 - 378.19 (43.13 - 68.13)	3.7	*
1Q14		2/11/2014	NE	46.05	NA	NA	NA	400.27		4.1	
2Q14		4/4/2014	NE	46.69	NA	NA	NA	399.63		0.3	
3Q14		7/3/2014	NE	45.59	NA	NA	NA	400.73		0.0	
4Q14		10/3/2014	NE	44.52	NA	NA	NA	401.80		0.1	
1Q15		1/9/2015	NE	46.74	NA	NA	NA	399.68		0.1	
2Q15	446.42	4/3/2015	48.23	48.25	398.17	398.19	0.02	398.19	403.29 - 378.29 (43.13 - 68.13)	0.0	
3Q15		7/7/2015	NE	47.44	NA	NA	NA	398.98		0.0	
P-82A											
4Q12		10/2/2012	NE	29.07	NA	NA	NA	405.62		0.0	*
1Q13		1/3/2013	NE	30.09	NA	NA	NA	404.60		0.0	*
2Q13		4/2/2013	NE	30.77	NA	NA	NA	403.92		0.2	*
3Q13		7/2/2013	NE	27.75	NA	NA	NA	406.94		0.0	*
4Q13	434.69	10/2/2013	NE	28.20	NA	NA	NA	406.49	401.48 - 386.48 (33.21 - 48.21)	0.0	*
1Q14		2/10/2014	NE	30.47	NA	NA	NA	404.22		8.9	*
2Q14		4/4/2014	NE	32.21	NA	NA	NA	402.48		0.0	*
3Q14		7/2/2014	NE	30.08	NA	NA	NA	404.61		0.6	*
4Q14		10/2/2014	NE	29.25	NA	NA	NA	405.44		0.0	*
1Q15		1/8/2015	NE	29.59	NA	NA	NA	405.43		0.1	*
2Q15	435.02	4/3/2015	NE	30.99	NA	NA	NA	404.03	401.81 - 386.81 (33.21 - 48.21)	0.0	*
3Q15		7/6/2015	NE	29.31	NA	NA	NA	405.71		0.3	*
P-82B											
4Q12		10/2/2012	NE	28.81	NA	NA	NA	405.63		0.0	*
1Q13		1/3/2013	NE	29.82	NA	NA	NA	404.62		0.0	*
2Q13		4/2/2013	NE	30.50	NA	NA	NA	403.94		0.4	*
3Q13		7/2/2013	NE	27.49	NA	NA	NA	406.95		0.0	*
4Q13	434.44	10/2/2013	NE	27.94	NA	NA	NA	406.50	370.84 - 368.84 (63.60 - 65.60)	0.0	*
1Q14		2/10/2014	NE	30.20	NA	NA	NA	404.24		0.3	*
2Q14		4/4/2014	NE	32.93	NA	NA	NA	401.51		0.0	*
3Q14		7/2/2014	NE	29.79	NA	NA	NA	404.65		0.7	*
4Q14		10/2/2014	NE	28.94	NA	NA	NA	405.50		0.0	*
1Q15		1/8/2015	NE	29.32	NA	NA	NA	405.16		0.2	*
2Q15	434.48	4/3/2015	NE	30.73	NA	NA	NA	403.75	370.88 - 368.88 (63.60 - 65.60)	0.0	*
3Q15		7/6/2015	NE	29.60	NA	NA	NA	404.88		0.2	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-82C											
4Q12	434.16	10/2/2012	NE	28.85	NA	NA	NA	405.31	351.39 - 349.39 (82.77 - 84.77)	0.0	*
1Q13		1/3/2013	NE	29.86	NA	NA	NA	404.30		0.0	*
2Q13		4/2/2013	NE	30.54	NA	NA	NA	403.62		0.8	*
3Q13		7/2/2013	NE	27.51	NA	NA	NA	406.65		0.0	*
4Q13		10/2/2013	NE	27.95	NA	NA	NA	406.21		0.0	*
1Q14		2/10/2014	NE	30.23	NA	NA	NA	403.93		0.2	*
2Q14		4/4/2014	NE	28.42	NA	NA	NA	405.74		0.1	*
3Q14		7/2/2014	NE	29.65	NA	NA	NA	404.51		0.7	*
4Q14		10/2/2014	NE	29.09	NA	NA	NA	405.07		0.0	*
1Q15	434.21	1/8/2015	NE	29.02	NA	NA	NA	405.19	351.44 - 349.44 (82.77 - 84.77)	0.2	*
2Q15		4/3/2015	NE	30.44	NA	NA	NA	403.77		0.4	*
3Q15		7/6/2015	NE	29.32	NA	NA	NA	404.89		0.2	*
P-82D											
4Q12	434.85	10/2/2012	NE	29.62	NA	NA	NA	405.23	323.43 - 321.43 (111.42 - 113.42)	0.0	*
1Q13		1/3/2013	NE	30.65	NA	NA	NA	404.20		0.0	*
2Q13		4/2/2013	NE	31.31	NA	NA	NA	403.54		0.2	*
3Q13		7/2/2013	NE	28.24	NA	NA	NA	406.61		0.0	*
4Q13		10/2/2013	NE	28.74	NA	NA	NA	406.11		0.0	*
1Q14		2/10/2014	NE	31.00	NA	NA	NA	403.85		14.5	*
2Q14		4/4/2014	NE	35.40	NA	NA	NA	399.45		0.2	*
3Q14		7/2/2014	NE	30.61	NA	NA	NA	404.24		0.4	*
4Q14		10/2/2014	NE	29.74	NA	NA	NA	405.11		0.0	*
1Q15	434.89	1/6/2015	NE	29.80	NA	NA	NA	405.09	323.47 - 321.47 (111.42 - 113.42)	0.1	*
2Q15		4/3/2015	NE	31.24	NA	NA	NA	403.65		0.4	*
3Q15		7/6/2015	NE	30.02	NA	NA	NA	404.87		0.2	*
P-83A											
4Q12	445.23	10/1/2012	NE	42.29	NA	NA	NA	402.94	398.58 - 383.58 (46.65 - 61.65)	0.0	*
1Q13		1/3/2013	NE	43.85	NA	NA	NA	401.38		0.0	*
2Q13		4/2/2013	NE	44.75	NA	NA	NA	400.48		0.0	*
3Q13		7/3/2013	NE	43.44	NA	NA	NA	401.79		0.0	*
4Q13		10/1/2013	NE	43.55	NA	NA	NA	401.68		0.2	*
1Q14		2/11/2014	NE	44.72	NA	NA	NA	400.51		0.6	*
2Q14		4/1/2014	NE	45.74	NA	NA	NA	399.49		0.0	*
3Q14		7/1/2014	NE	45.12	NA	NA	NA	400.11		0.0	*
4Q14		10/1/2014	NE	44.60	NA	NA	NA	400.63		0.0	*
1Q15	445.36	1/6/2015	NE	44.80	NA	NA	NA	400.56	398.71 - 383.71 (46.65 - 61.65)	0.0	*
2Q15		4/6/2015	NE	45.02	NA	NA	NA	400.34		0.1	*
3Q15		7/6/2015	NE	44.22	NA	NA	NA	401.14		0.7	*
P-83B											
4Q12	445.47	10/1/2012	NE	42.57	NA	NA	NA	402.90	375.82 - 373.82 (69.65 - 71.65)	0.0	*
1Q13		1/3/2013	NE	44.13	NA	NA	NA	401.34		0.0	*
2Q13		4/2/2013	NE	44.99	NA	NA	NA	400.48		0.0	*
3Q13		7/3/2013	NE	43.71	NA	NA	NA	401.76		0.0	*
4Q13		10/1/2013	NE	43.80	NA	NA	NA	401.67		0.2	*
1Q14		2/11/2014	NE	44.97	NA	NA	NA	400.50		0.3	*
2Q14		4/1/2014	NE	46.01	NA	NA	NA	399.46		0.0	*
3Q14		7/1/2014	NE	45.39	NA	NA	NA	400.08		0.0	*
4Q14		10/1/2014	NE	44.87	NA	NA	NA	400.60		0.0	*
1Q15	445.55	1/6/2015	NE	44.94	NA	NA	NA	400.61	375.90 - 373.90 (69.65 - 71.65)	0.0	*
2Q15		4/6/2015	NE	45.43	NA	NA	NA	400.12		0.1	*
3Q15		7/6/2015	NE	44.48	NA	NA	NA	401.07		2.7	*
P-83C											
4Q12	445.64	10/1/2012	NE	43.04	NA	NA	NA	402.60	353.25 - 351.25 (92.39 - 94.39)	0.0	*
1Q13		1/3/2013	NE	44.59	NA	NA	NA	401.05		0.0	*
2Q13		4/2/2013	NE	45.41	NA	NA	NA	400.23		0.0	*
3Q13		7/3/2013	NE	44.17	NA	NA	NA	401.47		0.0	*
4Q13		10/1/2013	NE	44.27	NA	NA	NA	401.37		0.6	*
1Q14		2/11/2014	NE	45.43	NA	NA	NA	400.21		13.7	*
2Q14		4/1/2014	NE	46.40	NA	NA	NA	399.24		0.0	*
3Q14		7/1/2014	NE	45.84	NA	NA	NA	399.80		0.0	*
4Q14		10/1/2014	NE	45.00	NA	NA	NA	400.64		0.4	*
1Q15	445.78	1/6/2015	NE	45.53	NA	NA	NA	400.25	353.39 - 351.39 (92.39 - 94.39)	0.0	*
2Q15		4/6/2015	NE	45.42	NA	NA	NA	400.36		0.1	*
3Q15		7/6/2015	NE	44.93	NA	NA	NA	400.85		0.6	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-83D											
4Q12	445.55	10/1/2012	NE	42.98	NA	NA	NA	402.57	311.84 - 309.84 (133.71 - 135.71)	0.0	*
1Q13		1/3/2013	NE	44.54	NA	NA	NA	401.01		0.0	*
2Q13		4/2/2013	NE	45.38	NA	NA	NA	400.17		0.0	*
3Q13		7/3/2013	NE	44.12	NA	NA	NA	401.43		0.0	*
4Q13		10/1/2013	NE	44.21	NA	NA	NA	401.34		0.1	*
1Q14		2/11/2014	NE	45.40	NA	NA	NA	400.15		0.4	*
2Q14		4/1/2014	NE	46.36	NA	NA	NA	399.19		0.0	*
3Q14		7/1/2014	NE	45.79	NA	NA	NA	399.76		0.0	*
4Q14		10/1/2014	NE	45.05	NA	NA	NA	400.50		0.1	*
1Q15	445.70	1/6/2015	NE	45.32	NA	NA	NA	400.38	311.99 - 309.99 (133.71 - 135.71)	0.0	*
2Q15		4/6/2015	NE	45.38	NA	NA	NA	400.32		0.1	*
3Q15		7/6/2015	NE	44.88	NA	NA	NA	400.82		4.0	*
P-84A											
4Q12	446.39	10/2/2012	NE	43.10	NA	NA	NA	403.29	397.89 - 382.89 (48.50 - 63.50)	0.0	*
1Q13		1/4/2013	NE	44.20	NA	NA	NA	402.19		0.0	*
2Q13		4/3/2013	NE	45.51	NA	NA	NA	400.88		0.0	*
3Q13		7/5/2013	NE	43.85	NA	NA	NA	402.54		0.0	*
4Q13		10/4/2013	NE	43.56	NA	NA	NA	402.83		0.2	*
1Q14		2/13/2014	NE	44.73	NA	NA	NA	401.66		0.0	*
2Q14		4/4/2014	NE	46.73	NA	NA	NA	399.66		0.3	*
3Q14		7/3/2014	NE	45.55	NA	NA	NA	400.84		0.0	*
4Q14		10/3/2014	NE	44.95	NA	NA	NA	401.44		0.0	*
1Q15	446.49	1/12/2015	NE	44.96	NA	NA	NA	401.53	397.99 - 382.99 (48.50 - 63.50)	0.0	*
2Q15		4/6/2015	NE	45.65	NA	NA	NA	400.84		0.2	*
3Q15		7/7/2015	NE	45.11	NA	NA	NA	401.38		0.0	*
P-84B											
4Q12	446.10	10/2/2012	NE	42.84	NA	NA	NA	403.26	372.60 - 370.60 (73.50 - 75.50)	0.1	*
1Q13		1/4/2013	NE	43.92	NA	NA	NA	402.18		0.0	*
2Q13		4/3/2013	NE	45.24	NA	NA	NA	400.86		0.0	*
3Q13		7/5/2013	NE	43.59	NA	NA	NA	402.51		0.0	*
4Q13		10/4/2013	NE	43.30	NA	NA	NA	402.80		0.0	*
1Q14		2/13/2014	NE	44.33	NA	NA	NA	401.77		0.0	*
2Q14		4/4/2014	NE	46.45	NA	NA	NA	399.65		0.0	*
3Q14		7/3/2014	NE	45.31	NA	NA	NA	400.79		0.0	*
4Q14		10/3/2014	NE	44.73	NA	NA	NA	401.37		0.0	*
1Q15	446.21	1/12/2015	NE	44.68	NA	NA	NA	401.53	372.71 - 370.71 (73.50 - 75.50)	0.0	*
2Q15		4/6/2015	NE	45.38	NA	NA	NA	400.83		0.5	*
3Q15		7/7/2015	NE	44.90	NA	NA	NA	401.31		0.0	*
P-84C											
4Q12	446.13	10/2/2012	NE	43.15	NA	NA	NA	402.98	352.08 - 350.08 (94.05 - 96.05)	0.0	*
1Q13		1/4/2013	NE	44.39	NA	NA	NA	401.74		0.0	*
2Q13		4/3/2013	NE	45.52	NA	NA	NA	400.61		0.0	*
3Q13		7/5/2013	NE	43.85	NA	NA	NA	402.28		0.0	*
4Q13		10/4/2013	NE	43.62	NA	NA	NA	402.51		0.0	*
1Q14		2/13/2014	NE	44.80	NA	NA	NA	401.33		0.0	*
2Q14		4/4/2014	NE	49.46	NA	NA	NA	396.67		0.7	*
3Q14		7/3/2014	NE	45.63	NA	NA	NA	400.50		0.0	*
4Q14		10/3/2014	NE	45.03	NA	NA	NA	401.10		1.1	*
1Q15	446.22	1/12/2015	NE	44.69	NA	NA	NA	401.53	352.17 - 350.17 (94.05 - 96.05)	0.0	*
2Q15		4/6/2015	NE	45.38	NA	NA	NA	400.84		0.2	*
3Q15		7/7/2015	NE	44.93	NA	NA	NA	401.29		0.0	*
P-84D											
4Q12	446.14	10/2/2012	NE	43.18	NA	NA	NA	402.96	324.99 - 322.99 (121.15 - 123.15)	0.4	*
1Q13		1/4/2013	NE	44.41	NA	NA	NA	401.73		0.0	*
2Q13		4/3/2013	NE	45.52	NA	NA	NA	400.62		0.0	*
3Q13		7/5/2013	NE	44.00	NA	NA	NA	402.14		0.0	*
4Q13		10/4/2013	NE	43.62	NA	NA	NA	402.52		0.0	*
1Q14		2/13/2014	NE	44.80	NA	NA	NA	401.34		0.0	*
2Q14		4/4/2014	NE	49.46	NA	NA	NA	396.68		0.0	*
3Q14		7/3/2014	NE	45.62	NA	NA	NA	400.52		0.0	*
4Q14		10/3/2014	NE	45.02	NA	NA	NA	401.12		0.0	*
1Q15	446.24	1/12/2015	NE	44.70	NA	NA	NA	401.54	325.09 - 323.09 (121.15 - 123.15)	0.0	*
2Q15		4/6/2015	NE	45.38	NA	NA	NA	400.86		0.2	*
3Q15		7/7/2015	NE	44.92	NA	NA	NA	401.32		0.0	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-88A											
4Q12	443.12	10/2/2012	NE	34.58	NA	NA	NA	408.54	404.72 - 389.72 (38.40 - 53.40)	0.0	*
1Q13		1/2/2013	NE	35.80	NA	NA	NA	407.32		0.0	*
2Q13		4/2/2013	NE	36.74	NA	NA	NA	406.38		0.0	*
3Q13		7/2/2013	NE	35.05	NA	NA	NA	408.07		0.0	*
4Q13		10/2/2013	NE	34.33	NA	NA	NA	408.79		0.0	*
1Q14		2/11/2014	NE	36.13	NA	NA	NA	406.99		0.2	*
2Q14		4/4/2014	NE	37.98	NA	NA	NA	405.14		0.1	*
3Q14		7/3/2014	NE	36.62	NA	NA	NA	406.50		0.0	*
4Q14		10/3/2014	NE	36.04	NA	NA	NA	407.08		0.1	*
1Q15	443.09	1/9/2015	NE	35.54	NA	NA	NA	407.55	404.69 - 389.69 (38.40 - 53.40)	0.0	*
2Q15		4/3/2015	NE	36.41	NA	NA	NA	406.68		0.0	*
3Q15		7/7/2015	NE	35.93	NA	NA	NA	407.16		0.0	*
P-88B											
4Q12	443.17	10/2/2012	NE	34.56	NA	NA	NA	408.61	371.17 - 369.17 (72.00 - 74.00)	0.0	*
1Q13		1/2/2013	NE	35.82	NA	NA	NA	407.35		0.0	*
2Q13		4/2/2013	NE	36.79	NA	NA	NA	406.38		0.0	*
3Q13		7/2/2013	NE	35.15	NA	NA	NA	408.02		0.0	*
4Q13		10/2/2013	NE	34.33	NA	NA	NA	408.84		0.0	*
1Q14		2/11/2014	NE	36.19	NA	NA	NA	406.98		0.3	*
2Q14		4/4/2014	NE	38.04	NA	NA	NA	405.13		0.5	*
3Q14		7/3/2014	NE	36.58	NA	NA	NA	406.59		0.0	*
4Q14		10/3/2014	NE	36.09	NA	NA	NA	407.08		0.1	*
1Q15	443.16	1/9/2015	NE	35.61	NA	NA	NA	407.55	371.16 - 369.16 (72.00 - 74.00)	0.0	*
2Q15		4/3/2015	NE	36.48	NA	NA	NA	406.68		0.0	*
3Q15		7/7/2015	NE	35.94	NA	NA	NA	407.22		0.0	*
P-88C											
4Q12	443.16	10/2/2012	NE	34.83	NA	NA	NA	408.33	350.86 - 348.86 (92.30 - 94.30)	0.0	*
1Q13		1/2/2013	NE	36.10	NA	NA	NA	407.06		0.0	*
2Q13		4/2/2013	NE	37.07	NA	NA	NA	406.09		0.5	*
3Q13		7/2/2013	NE	35.44	NA	NA	NA	407.72		0.0	*
4Q13		10/2/2013	NE	34.61	NA	NA	NA	408.55		0.0	*
1Q14		2/11/2014	NE	36.45	NA	NA	NA	406.71		0.2	*
2Q14		4/4/2014	NE	41.00	NA	NA	NA	402.16		0.2	*
3Q14		7/3/2014	NE	36.87	NA	NA	NA	406.29		0.0	*
4Q14		10/3/2014	NE	35.74	NA	NA	NA	407.42		0.3	*
1Q15	443.13	1/9/2015	NE	35.59	NA	NA	NA	407.54	350.83 - 348.83 (92.30 - 94.30)	0.0	*
2Q15		4/3/2015	NE	36.42	NA	NA	NA	406.71		3.2	*
3Q15		7/7/2015	NE	36.21	NA	NA	NA	406.92		0.0	*
P-88D											
4Q12	443.23	10/2/2012	NE	34.99	NA	NA	NA	408.24	329.53 - 327.53 (113.70 - 115.70)	0.0	*
1Q13		1/2/2013	NE	36.23	NA	NA	NA	407.00		0.0	*
2Q13		4/2/2013	NE	37.21	NA	NA	NA	406.02		1.6	*
3Q13		7/2/2013	NE	35.51	NA	NA	NA	407.72		0.0	*
4Q13		10/2/2013	NE	34.72	NA	NA	NA	408.51		0.0	*
1Q14		2/11/2014	NE	36.59	NA	NA	NA	406.64		1.7	*
2Q14		4/4/2014	NE	41.45	NA	NA	NA	401.78		0.1	*
3Q14		7/3/2014	NE	36.95	NA	NA	NA	406.28		0.6	*
4Q14		10/3/2014	NE	36.43	NA	NA	NA	406.80		0.0	*
1Q15	443.20	1/9/2015	NE	35.78	NA	NA	NA	407.42	329.50 - 327.50 (113.70 - 115.70)	0.0	*
2Q15		4/3/2015	NE	36.57	NA	NA	NA	406.63		0.0	*
3Q15		7/7/2015	NE	36.30	NA	NA	NA	406.90		0.0	*
P-89B											
4Q12	447.35	10/1/2012	NE	41.62	NA	NA	NA	405.73	369.99 - 367.99 (77.36 - 79.36)	0.0	*
1Q13		1/3/2013	NE	43.23	NA	NA	NA	404.12		0.0	*
2Q13		4/1/2013	NE	43.96	NA	NA	NA	403.39		0.0	*
3Q13		7/3/2013	NE	42.83	NA	NA	NA	404.52		0.0	*
4Q13		10/1/2013	NE	42.67	NA	NA	NA	404.68		25.2	*
1Q14		2/12/2014	NE	44.24	NA	NA	NA	403.11		0.2	*
2Q14		4/1/2014	NE	45.09	NA	NA	NA	402.26		0.0	*
3Q14		7/1/2014	NE	44.59	NA	NA	NA	402.76		0.0	*
4Q14		10/2/2014	NE	44.19	NA	NA	NA	403.16		0.0	*
1Q15	447.44	1/9/2015	NE	43.31	NA	NA	NA	404.13	370.08 - 368.08 (77.36 - 79.36)	0.0	*
2Q15		4/3/2015	NE	44.10	NA	NA	NA	403.34		0.0	*
3Q15		7/7/2015	NE	43.36	NA	NA	NA	404.08		0.0	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-89C											
4Q12	447.68	10/1/2012	NE	41.94	NA	NA	NA	405.74	350.05 - 348.05 (97.63 - 99.63)	0.0	*
1Q13		1/3/2013	NE	43.58	NA	NA	NA	404.10		0.0	*
2Q13		4/2/2013	NE	44.28	NA	NA	NA	403.40		1.7	*
3Q13		7/3/2013	NE	43.20	NA	NA	NA	404.48		2.3	*
4Q13		10/1/2013	NE	43.02	NA	NA	NA	404.66		0.1	*
1Q14		2/12/2014	NE	44.58	NA	NA	NA	403.10		186.4	*
2Q14		4/1/2014	NE	45.47	NA	NA	NA	402.21		0.0	*
3Q14		7/1/2014	NE	44.94	NA	NA	NA	402.74		0.0	*
4Q14		10/2/2014	NE	44.53	NA	NA	NA	403.15		0.0	*
1Q15	447.76	1/9/2015	NE	43.68	NA	NA	NA	404.08	350.13 - 348.13 (97.63 - 99.63)	0.7	*
2Q15		4/3/2015	NE	44.45	NA	NA	NA	403.31		0.0	*
3Q15		7/7/2015	NE	43.73	NA	NA	NA	404.03		0.0	*
P-89D											
4Q12	447.54	10/1/2012	NE	41.94	NA	NA	NA	405.60	307.20 - 305.20 (140.34 - 142.34)	0.0	*
1Q13		1/3/2013	NE	43.52	NA	NA	NA	404.02		0.0	*
2Q13		4/1/2013	NE	44.20	NA	NA	NA	403.34		0.0	*
3Q13		7/3/2013	NE	43.20	NA	NA	NA	404.34		0.0	*
4Q13		10/1/2013	NE	43.01	NA	NA	NA	404.53		0.2	*
1Q14		2/12/2014	NE	44.68	NA	NA	NA	402.86		7.4	*
2Q14		4/1/2014	NE	45.45	NA	NA	NA	402.09		0.0	*
3Q14		7/1/2014	NE	44.92	NA	NA	NA	402.62		0.0	*
4Q14		10/2/2014	NE	44.55	NA	NA	NA	402.99		0.0	*
1Q15	447.63	1/9/2015	NE	43.67	NA	NA	NA	403.96	307.29 - 305.29 (140.34 - 142.34)	0.0	*
2Q15		4/3/2015	NE	44.32	NA	NA	NA	403.31		0.0	*
3Q15		7/7/2015	NE	43.73	NA	NA	NA	403.90		0.0	*
P-91A											
4Q12	447.19	10/1/2012	NE	46.72	NA	NA	NA	400.47	395.68 - 380.68 (51.51 - 66.51)	0.5	*
1Q13		1/4/2013	NE	48.92	NA	NA	NA	398.27		0.0	*
2Q13		4/1/2013	NE	49.58	NA	NA	NA	397.61		0.4	*
3Q13		7/3/2013	NE	48.64	NA	NA	NA	398.55		182.3	*
4Q13		10/2/2013	NE	47.88	NA	NA	NA	399.31		14.8	*
1Q14		2/12/2014	48.21	54.71	392.48	398.98	6.50	397.68		178.7	*
2Q14		4/4/2014	50.20	55.10	392.09	396.99	4.90	396.01		15.9	*
3Q14		7/2/2014	48.74	52.68	394.51	398.45	3.94	397.66		295.2	*
4Q14		10/2/2014	48.10	51.99	395.20	399.09	3.89	398.31		22.9	*
1Q15	447.24	1/9/2015	47.98	51.84	395.40	399.26	3.86	398.49	395.72 - 380.72 (51.51 - 66.51)	15.0	*
2Q15		4/3/2015	50.02	50.12	397.12	397.22	0.10	397.20		45.5	*
3Q15		7/7/2015	49.55	49.59	397.65	397.69	0.04	397.68		17.6	*
P-91B											
4Q12	447.26	10/1/2012	NE	46.79	NA	NA	NA	400.47	372.57 - 370.57 (74.69 - 76.69)	0.6	*
1Q13		1/4/2013	NE	49.10	NA	NA	NA	398.16		0.0	*
2Q13		4/1/2013	NE	49.70	NA	NA	NA	397.56		0.0	*
3Q13		7/3/2013	NE	48.72	NA	NA	NA	398.54		2.5	*
4Q13		10/2/2013	NE	48.04	NA	NA	NA	399.22		0.0	*
1Q14		2/12/2014	NE	49.61	NA	NA	NA	397.65		9.5	*
2Q14		4/4/2014	NE	51.19	NA	NA	NA	396.07		0.4	*
3Q14		7/2/2014	NE	49.64	NA	NA	NA	397.62		17.5	*
4Q14		10/2/2014	NE	48.96	NA	NA	NA	398.30		29.1	*
1Q15	447.28	1/9/2015	NE	48.86	NA	NA	NA	398.42	372.59 - 370.59 (74.69 - 76.69)	1.9	*
2Q15		4/3/2015	NE	50.08	NA	NA	NA	397.20		2.1	*
3Q15		7/7/2015	NE	49.62	NA	NA	NA	397.66		2.2	*
P-91C											
4Q12	447.02	10/1/2012	NE	46.54	NA	NA	NA	400.48	352.29 - 350.29 (94.73 - 96.73)	0.0	*
1Q13		1/4/2013	NE	48.84	NA	NA	NA	398.18		0.0	*
2Q13		4/2/2013	NE	49.40	NA	NA	NA	397.62		0.2	*
3Q13		7/3/2013	NE	48.46	NA	NA	NA	398.56		0.0	*
4Q13		10/2/2013	NE	47.77	NA	NA	NA	399.25		0.6	*
1Q14		2/12/2014	NE	49.36	NA	NA	NA	397.66		2.7	*
2Q14		4/4/2014	NE	51.00	NA	NA	NA	396.02		0.2	*
3Q14		7/2/2014	NE	49.39	NA	NA	NA	397.63		0.3	*
4Q14		10/2/2014	NE	48.71	NA	NA	NA	398.31		0.1	*
1Q15	447.07	1/9/2015	NE	48.61	NA	NA	NA	398.46	352.34 - 350.34 (94.73 - 96.73)	0.1	*
2Q15		4/3/2015	NE	49.88	NA	NA	NA	397.19		0.0	*
3Q15		7/7/2015	NE	49.39	NA	NA	NA	397.68		0.0	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-91D											
4Q12	447.02	10/1/2012	NE	46.53	NA	NA	NA	400.49	278.70 - 276.70 (168.32 - 170.32)	0.0	*
1Q13		1/4/2013	NE	48.82	NA	NA	NA	398.20		0.0	*
2Q13		4/1/2013	NE	49.42	NA	NA	NA	397.60		0.0	*
3Q13		7/3/2013	NE	48.46	NA	NA	NA	398.56		6.6	*
4Q13		10/2/2013	NE	47.76	NA	NA	NA	399.26		1.9	*
1Q14		2/12/2014	NE	49.35	NA	NA	NA	397.67		6.2	*
2Q14		4/4/2014	NE	51.02	NA	NA	NA	396.00		6.9	*
3Q14		7/2/2014	NE	49.37	NA	NA	NA	397.65		0.4	*
4Q14		10/2/2014	NE	48.71	NA	NA	NA	398.31		0.0	*
1Q15	447.06	1/9/2015	NE	48.60	NA	NA	NA	398.46	278.74 - 276.74 (168.32 - 170.32)	0.1	*
2Q15		4/3/2015	NE	49.87	NA	NA	NA	397.19		1.0	*
3Q15		7/7/2015	NE	49.39	NA	NA	NA	397.67		0.0	*
P-92A											
4Q12	446.12	10/1/2012	NE	45.04	NA	NA	NA	401.08	398.55 - 383.55 (47.57 - 62.57)	3.5	*
1Q13		1/4/2013	46.83	46.84	399.28	399.29	0.01	399.29		0.0	*
2Q13		4/1/2013	47.59	47.71	398.41	398.53	0.12	398.51		105.0	
3Q13		7/5/2013	46.31	46.40	399.72	399.81	0.09	399.79		17.0	*
4Q13		10/2/2013	45.36	45.42	400.70	400.76	0.06	400.75		55.1	*
1Q14		2/12/2014	47.20	47.28	398.84	398.92	0.08	398.90		153.9	*
2Q14		4/4/2014	49.06	49.16	396.96	397.06	0.10	397.04		0.9	
3Q14		7/2/2014	47.55	47.57	398.55	398.57	0.02	398.57		17.5	*
4Q14		10/2/2014	46.73	46.76	399.36	399.39	0.03	399.38		130.2	*
1Q15	446.24	1/9/2015	46.31	46.35	399.89	399.93	0.04	399.92	398.67 - 383.67 (47.57 - 62.57)	34.9	*
2Q15		4/1/2015	48.06	48.08	398.16	398.18	0.02	398.18		12.8	
3Q15		7/7/2015	NE	48.05	NA	NA	NA	398.19		72.5	
P-92B											
4Q12	446.07	10/1/2012	NE	44.97	NA	NA	NA	401.10	372.42 - 370.42 (73.65 - 75.65)	3.4	*
1Q13		1/4/2013	NE	46.80	NA	NA	NA	399.27		0.0	*
2Q13		4/1/2013	NE	47.57	NA	NA	NA	398.50		1.9	*
3Q13		7/5/2013	NE	46.29	NA	NA	NA	399.78		0.0	*
4Q13		10/2/2013	NE	45.31	NA	NA	NA	400.76		0.3	*
1Q14		2/12/2014	NE	47.12	NA	NA	NA	398.95		1.7	*
2Q14		4/4/2014	NE	49.03	NA	NA	NA	397.04		0.2	*
3Q14		7/2/2014	NE	47.52	NA	NA	NA	398.55		0.0	*
4Q14		10/2/2014	NE	46.70	NA	NA	NA	399.37		0.6	*
1Q15	446.18	1/9/2015	NE	46.28	NA	NA	NA	399.90	372.53 - 370.53 (73.65 - 75.65)	0.0	*
2Q15		4/1/2015	NE	48.03	NA	NA	NA	398.15		0.0	*
3Q15		7/7/2015	NE	48.02	NA	NA	NA	398.16		0.5	*
P-92C											
4Q12	445.98	10/1/2012	NE	45.04	NA	NA	NA	400.94	352.54 - 350.54 (93.44 - 95.44)	0.0	*
1Q13		1/4/2013	NE	46.83	NA	NA	NA	399.15		0.0	*
2Q13		4/1/2013	NE	47.47	NA	NA	NA	398.51		0.0	*
3Q13		7/5/2013	NE	46.31	NA	NA	NA	399.67		0.4	*
4Q13		10/2/2013	NE	45.33	NA	NA	NA	400.65		0.8	*
1Q14		2/12/2014	NE	47.29	NA	NA	NA	398.69		0.2	*
2Q14		4/4/2014	NE	48.80	NA	NA	NA	397.18		0.4	*
3Q14		7/2/2014	NM	NM	NA	NA	NA	NA		NM	Well damaged
4Q14		10/2/2014	NM	NM	NA	NA	NA	NA		NM	Well damaged
1Q15	446.17	1/9/2015	NE	46.25	NA	NA	NA	399.92	353.21 - 348.21 (92.96 - 97.96)	4.4	* Replaced during 4Q14
2Q15		4/1/2015	NE	48.02	NA	NA	NA	398.15		2.9	*
3Q15		7/7/2015	NE	48.02	NA	NA	NA	398.15		0.7	*
P-92D											
4Q12	445.90	10/1/2012	NE	44.82	NA	NA	NA	401.08	304.90 - 302.90 (141.00 - 143.00)	0.0	*
1Q13		1/4/2013	NE	46.72	NA	NA	NA	399.18		0.0	*
2Q13		4/1/2013	NE	47.47	NA	NA	NA	398.43		0.0	*
3Q13		7/5/2013	NE	46.22	NA	NA	NA	399.68		0.0	*
4Q13		10/2/2013	NE	45.21	NA	NA	NA	400.69		0.1	*
1Q14		2/12/2014	NE	47.07	NA	NA	NA	398.83		0.4	*
2Q14		4/4/2014	NE	48.94	NA	NA	NA	396.96		0.3	*
3Q14		7/2/2014	NE	47.42	NA	NA	NA	398.48		0.0	*
4Q14		10/2/2014	NE	46.62	NA	NA	NA	399.28		0.2	*
1Q15	446.00	1/9/2015	NE	46.10	NA	NA	NA	399.90	305.00 - 303.00 (141.00 - 143.00)	0.4	*
2Q15		4/1/2015	NE	47.91	NA	NA	NA	398.09		0.0	*
3Q15		7/7/2015	NE	47.88	NA	NA	NA	398.12		2.2	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-93A											
4Q12	446.58	10/2/2012	NE	44.72	NA	NA	NA	401.86	398.41 - 383.41 (48.17 - 63.17)	0.0	*
1Q13		1/8/2013	NE	45.73	NA	NA	NA	400.84		0.0	*
2Q13		4/2/2013	NE	46.58	NA	NA	NA	400.00		0.0	*
3Q13		7/5/2013	NE	43.68	NA	NA	NA	402.90		0.0	*
4Q13		10/2/2013	NE	44.00	NA	NA	NA	402.58		0.1	*
1Q14		2/12/2014	NE	46.53	NA	NA	NA	400.04		3.6	*
2Q14		4/4/2014	NE	47.28	NA	NA	NA	399.29		1.3	*
3Q14		7/1/2014	NE	46.10	NA	NA	NA	400.48		0.0	*
4Q14		10/3/2014	NE	45.09	NA	NA	NA	401.48		2.2	*
1Q15	445.12	1/8/2015	NE	46.84	NA	NA	NA	398.28	402.05 - 392.05 (43.07 - 53.07)	0.0	Replaced during 4Q14
2Q15		4/1/2015	NE	47.05	NA	NA	NA	398.07		0.0	
3Q15		7/9/2015	NE	46.39	NA	NA	NA	398.73		0.0	
P-93B											
4Q12	446.46	10/2/2012	NE	44.80	NA	NA	NA	401.66	371.86 - 369.86 (74.60 - 76.60)	0.0	*
1Q13		1/8/2013	NE	45.77	NA	NA	NA	400.69		0.0	*
2Q13		4/2/2013	NE	46.70	NA	NA	NA	399.76		0.0	*
3Q13		7/5/2013	NE	43.71	NA	NA	NA	402.75		0.0	*
4Q13		10/2/2013	NE	44.09	NA	NA	NA	402.37		18.4	*
1Q14		2/12/2014	NE	46.58	NA	NA	NA	399.88		70.0	*
2Q14		4/4/2014	NE	47.33	NA	NA	NA	399.13		0.5	*
3Q14		7/1/2014	NE	46.15	NA	NA	NA	400.31		0.0	*
4Q14		10/3/2014	NE	45.13	NA	NA	NA	401.33		1.0	*
1Q15	446.52	1/9/2015	NE	47.10	NA	NA	NA	399.42	371.92 - 369.92 (74.60 - 76.60)	0.1	*
2Q15		4/1/2015	NE	48.44	NA	NA	NA	398.08		51.9	*
3Q15		7/9/2015	NE	47.76	NA	NA	NA	398.76		0.1	*
P-93C											
4Q12	446.51	10/2/2012	NE	44.68	NA	NA	NA	401.83	352.26 - 350.26 (94.26 - 96.26)	0.2	*
1Q13		1/8/2013	NE	45.66	NA	NA	NA	400.85		0.0	*
2Q13		4/2/2013	NE	46.51	NA	NA	NA	400.00		0.0	*
3Q13		7/5/2013	NE	43.59	NA	NA	NA	402.92		0.0	*
4Q13		10/2/2013	NE	43.94	NA	NA	NA	402.57		0.3	*
1Q14		2/12/2014	NE	46.44	NA	NA	NA	400.07		1.3	*
2Q14		4/4/2014	NE	47.20	NA	NA	NA	399.31		0.0	*
3Q14		7/1/2014	NE	46.03	NA	NA	NA	400.48		0.0	*
4Q14		10/3/2014	NE	45.01	NA	NA	NA	401.50		0.4	*
1Q15	446.28	1/8/2015	NE	46.36	NA	NA	NA	399.92	353.81 - 348.81 (92.47 - 97.47)	2.3	* Replaced during 4Q14
2Q15		4/1/2015	NE	48.24	NA	NA	NA	398.04		12.8	*
3Q15		7/9/2015	NE	47.55	NA	NA	NA	398.73		0.1	*
P-93D											
4Q12	446.89	10/2/2012	NE	44.43	NA	NA	NA	402.46	321.14 - 319.14 (125.75 - 127.75)	0.6	*
1Q13		1/8/2013	NE	45.84	NA	NA	NA	401.05		0.0	*
2Q13		4/2/2013	NE	46.67	NA	NA	NA	400.22		0.0	*
3Q13		7/5/2013	NE	43.75	NA	NA	NA	403.14		0.0	*
4Q13		10/2/2013	NE	44.06	NA	NA	NA	402.83		0.2	*
1Q14		2/12/2014	NE	46.62	NA	NA	NA	400.27		4.1	*
2Q14		4/4/2014	NE	47.36	NA	NA	NA	399.53		3.1	*
3Q14		7/1/2014	NE	46.17	NA	NA	NA	400.72		0.0	*
4Q14		10/3/2014	NE	45.16	NA	NA	NA	401.73		14.4	*
1Q15	446.73	1/8/2015	NE	46.82	NA	NA	NA	399.91	320.98 - 318.98 (125.75 - 127.75)	10.8	*
2Q15		4/1/2015	NE	48.64	NA	NA	NA	398.09		13.7	*
3Q15		7/9/2015	NE	47.96	NA	NA	NA	398.77		0.0	*
P-94											
4Q12	444.65	10/1/2012	NE	38.02	NA	NA	NA	406.63	398.80 - 383.80 (45.85 - 60.85)	0.0	*
1Q13		1/3/2013	NE	39.75	NA	NA	NA	404.90		0.0	*
2Q13		4/2/2013	NE	40.64	NA	NA	NA	404.01		0.0	*
3Q13		7/3/2013	NE	38.49	NA	NA	NA	406.16		0.0	*
4Q13		10/1/2013	NE	39.17	NA	NA	NA	405.48		2.6	*
1Q14		2/11/2014	NE	40.93	NA	NA	NA	403.72		0.4	*
2Q14		4/1/2014	NE	41.85	NA	NA	NA	402.80		0.0	*
3Q14		7/1/2014	NE	41.46	NA	NA	NA	403.19		0.0	*
4Q14		10/1/2014	NE	41.10	NA	NA	NA	403.55		0.0	*
1Q15	445.14	1/6/2015	NE	41.09	NA	NA	NA	404.05	399.29 - 384.29 (45.85 - 60.85)	0.0	*
2Q15		4/6/2015	NE	41.00	NA	NA	NA	404.14		0.1	*
3Q15		7/6/2015	NE	39.97	NA	NA	NA	405.17		0.2	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-95											
4Q12	443.44	10/2/2012	NE	32.52	NA	NA	NA	410.92	406.92 - 391.92 (36.52 - 51.52)	0.0	*
1Q13		1/2/2013	NE	33.87	NA	NA	NA	409.57		0.0	*
2Q13		4/2/2013	NE	34.91	NA	NA	NA	408.53		0.2	*
3Q13		7/2/2013	NE	33.31	NA	NA	NA	410.13		0.0	*
4Q13		10/2/2013	NE	32.59	NA	NA	NA	410.85		0.0	*
1Q14		2/10/2014	NE	34.28	NA	NA	NA	409.16		1.2	*
2Q14		4/4/2014	NE	36.19	NA	NA	NA	407.25		0.0	*
3Q14		7/3/2014	NE	34.73	NA	NA	NA	408.71		0.0	*
4Q14		10/3/2014	NE	34.39	NA	NA	NA	409.05		0.0	*
1Q15	443.42	1/12/2015	NE	34.16	NA	NA	NA	409.26	406.90 - 391.90 (36.52 - 51.52)	0.2	*
2Q15		4/3/2015	NE	34.52	NA	NA	NA	408.90		0.0	*
3Q15		7/7/2015	NE	33.83	NA	NA	NA	409.59		0.0	*
P-102											
4Q12	444.91	10/2/2012	NE	35.69	NA	NA	NA	409.22	402.16 - 382.16 (42.75 - 62.75)	0.0	*
1Q13		1/2/2013	NE	36.98	NA	NA	NA	407.93		0.0	*
2Q13		4/2/2013	NE	37.95	NA	NA	NA	406.96		0.2	*
3Q13		7/2/2013	NE	36.53	NA	NA	NA	408.38		0.0	*
4Q13		10/2/2013	NE	36.24	NA	NA	NA	408.67		20.0	*
1Q14		2/11/2014	NE	37.81	NA	NA	NA	407.10		2.9	*
2Q14		4/4/2014	NE	38.55	NA	NA	NA	406.36		7.5	*
3Q14		7/3/2014	NE	38.25	NA	NA	NA	406.66		0.0	*
4Q14		10/3/2014	NE	37.87	NA	NA	NA	407.04		6.8	*
1Q15	444.97	1/9/2015	NE	37.20	NA	NA	NA	407.77	402.22 - 382.22 (42.75 - 62.75)	0.0	*
2Q15		4/3/2015	NE	37.85	NA	NA	NA	407.12		0.1	*
3Q15		7/7/2015	NE	37.02	NA	NA	NA	407.95		0.2	*
P-114											
4Q12	432.40	10/2/2012	NE	30.51	NA	NA	NA	401.90	399.73 - 379.73 (32.67 - 52.67)	0.0	*
1Q13		1/7/2013	NE	30.22	NA	NA	NA	402.18		0.0	*
2Q13		4/2/2013	NE	31.99	NA	NA	NA	400.42		0.9	*
3Q13		7/2/2013	NE	27.65	NA	NA	NA	404.76		0.3	*
4Q13		10/2/2013	NE	29.03	NA	NA	NA	403.38		0.0	*
1Q14		2/11/2014	NE	32.11	NA	NA	NA	400.29		0.5	*
2Q14		4/4/2014	NM	NM	NA	NA	NA	NA		NM	
3Q14		7/2/2014	NE	30.87	NA	NA	NA	401.54		3.5	*
4Q14		10/3/2014	NE	29.83	NA	NA	NA	402.58		0.4	*
1Q15	432.45	1/12/2015	NM	NM	NA	NA	NA	NA	399.78 - 379.78 (32.67 - 52.67)	NM	Well damaged
2Q15		4/3/2015	NM	NM	NA	NA	NA	NA		NM	Well damaged
3Q15		7/8/2015	NM	NM	NA	NA	NA	NA		NM	Well damaged
P-115											
4Q12	433.31	10/2/2012	NE	31.51	NA	NA	NA	401.80	401.01 - 381.01 (32.30 - 52.30)	0.0	*
1Q13		1/7/2013	NE	32.60	NA	NA	NA	400.71		0.0	
2Q13		4/2/2013	NE	32.92	NA	NA	NA	400.39		0.5	
3Q13		7/2/2013	NE	28.30	NA	NA	NA	405.01		0.5	*
4Q13		10/2/2013	NE	29.99	NA	NA	NA	403.32		0.0	*
1Q14		2/11/2014	NE	33.07	NA	NA	NA	400.24		0.6	
2Q14		4/7/2014	NE	33.10	NA	NA	NA	400.21		57.2	
3Q14		7/2/2014	NE	31.61	NA	NA	NA	401.70		0.9	*
4Q14		10/3/2014	NE	30.52	NA	NA	NA	402.79		0.2	*
1Q15	433.36	1/12/2015	NE	32.17	NA	NA	NA	401.19	401.06 - 381.06 (32.30 - 52.30)	0.0	*
2Q15		4/3/2015	NE	33.81	NA	NA	NA	399.55		0.3	
3Q15		7/8/2015	NE	30.94	NA	NA	NA	402.42		4.8	*
P-116											
4Q12	436.45	10/2/2012	NE	34.97	NA	NA	NA	401.48	399.01 - 379.01 (37.44 - 57.44)	0.0	*
1Q13		1/7/2013	NE	36.10	NA	NA	NA	400.35		0.0	*
2Q13		4/2/2013	NE	36.32	NA	NA	NA	400.13		3.9	*
3Q13		7/2/2013	NE	31.49	NA	NA	NA	404.96		0.0	*
4Q13		10/2/2013	NE	33.43	NA	NA	NA	403.02		18.3	*
1Q14		2/11/2014	NE	36.50	NA	NA	NA	399.95		0.9	*
2Q14		4/4/2014	NE	36.91	NA	NA	NA	399.54		0.1	*
3Q14		7/2/2014	NE	34.94	NA	NA	NA	401.51		0.8	*
4Q14		10/3/2014	NE	33.85	NA	NA	NA	402.60		0.2	*
1Q15	436.63	1/12/2015	NE	35.54	NA	NA	NA	401.09	399.19 - 379.19 (37.44 - 57.44)	0.0	*
2Q15		4/3/2015	NE	37.15	NA	NA	NA	399.48		2.3	*
3Q15		7/8/2015	NE	34.11	NA	NA	NA	402.52		1.6	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-117											
4Q12		10/2/2012	NE	31.19	NA	NA	NA	401.48		0.0	*
1Q13		1/7/2013	NE	32.45	NA	NA	NA	400.22		0.0	*
2Q13		4/2/2013	NE	32.51	NA	NA	NA	400.16		75.8	*
3Q13		7/2/2013	NE	27.61	NA	NA	NA	405.06		0.0	*
4Q13	432.67	10/2/2013	NE	29.63	NA	NA	NA	403.04	399.74 - 379.74 (32.93 - 52.93)	0.0	*
1Q14		2/11/2014	NE	32.77	NA	NA	NA	399.90		0.6	*
2Q14		4/4/2014	NE	33.14	NA	NA	NA	399.53		0.0	
3Q14		7/2/2014	NE	31.10	NA	NA	NA	401.57		1.0	*
4Q14		10/3/2014	NE	30.03	NA	NA	NA	402.64		0.0	*
1Q15		1/12/2015	NE	35.54	NA	NA	NA	397.17		0.0	
2Q15	432.71	4/3/2015	NE	33.39	NA	NA	NA	399.32	399.78 - 379.78 (32.93 - 52.93)	2.8	
3Q15		7/8/2015	NE	30.16	NA	NA	NA	402.55		1.6	*
P-118											
4Q12		10/2/2012	NE	30.40	NA	NA	NA	400.92		0.0	*
1Q13		1/7/2013	NE	31.60	NA	NA	NA	399.72		0.0	
2Q13		4/2/2013	NE	31.53	NA	NA	NA	399.79		0.2	
3Q13		7/2/2013	NE	26.10	NA	NA	NA	405.22		0.0	*
4Q13	431.32	10/2/2013	NE	28.82	NA	NA	NA	402.50	400.20 - 384.27 (31.12 - 47.05)	0.0	*
1Q14		2/11/2014	NE	31.91	NA	NA	NA	399.41		5.3	
2Q14		4/4/2014	NE	32.11	NA	NA	NA	399.21		0.0	
3Q14		7/2/2014	NE	29.78	NA	NA	NA	401.54		0.8	*
4Q14		10/3/2014	NE	28.71	NA	NA	NA	402.61		0.5	*
1Q15		1/12/2015	NE	30.73	NA	NA	NA	400.58		0.0	*
2Q15	431.31	4/3/2015	NE	32.22	NA	NA	NA	399.09	400.19 - 384.26 (31.12 - 47.05)	0.0	
3Q15		7/8/2015	NE	28.19	NA	NA	NA	403.12		1.5	*
P-119											
4Q12		10/2/2012	NE	29.45	NA	NA	NA	402.47		0.0	*
1Q13		1/7/2013	NE	30.46	NA	NA	NA	401.46		0.0	*
2Q13		4/2/2013	NE	31.10	NA	NA	NA	400.82		0.4	
3Q13		7/2/2013	NE	27.48	NA	NA	NA	404.44		0.0	*
4Q13	431.92	10/2/2013	NE	28.09	NA	NA	NA	403.83	401.25 - 385.32 (30.67 - 46.60)	0.0	*
1Q14		2/11/2014	NE	31.03	NA	NA	NA	400.89		1.0	
2Q14		4/4/2014	NE	31.55	NA	NA	NA	400.37		0.0	
3Q14		7/2/2014	NE	30.06	NA	NA	NA	401.86		1.1	*
4Q14		10/3/2014	NE	29.14	NA	NA	NA	402.78		0.0	*
1Q15		1/12/2015	NE	30.61	NA	NA	NA	401.29		0.0	*
2Q15	431.90	4/3/2015	NE	32.15	NA	NA	NA	399.75	401.23 - 385.30 (30.67 - 46.60)	0.0	
3Q15		7/8/2015	NE	30.41	NA	NA	NA	401.49		0.2	*
P-120											
4Q12		10/2/2012	NE	29.90	NA	NA	NA	402.88		0.0	*
1Q13		1/7/2013	NE	31.00	NA	NA	NA	401.78		0.0	*
2Q13		4/2/2013	NE	31.42	NA	NA	NA	401.36		0.0	
3Q13		7/2/2013	NE	27.26	NA	NA	NA	405.52		0.0	*
4Q13	432.78	10/2/2013	NE	28.43	NA	NA	NA	404.35	401.40 - 385.47 (31.38 - 47.31)	0.0	*
1Q14		2/11/2014	NE	31.38	NA	NA	NA	401.40		1.0	
2Q14		4/4/2014	NE	32.01	NA	NA	NA	400.77		0.0	
3Q14		7/2/2014	NE	30.11	NA	NA	NA	402.67		1.0	*
4Q14		10/3/2014	NE	29.22	NA	NA	NA	403.56		0.9	*
1Q15		1/12/2015	NE	30.70	NA	NA	NA	402.12		0.0	*
2Q15	432.82	4/3/2015	NE	32.26	NA	NA	NA	400.56	401.44 - 385.51 (31.38 - 47.31)	0.0	
3Q15		7/8/2015	NE	29.79	NA	NA	NA	403.03		0.2	*
P-129											
4Q12		10/2/2012	NE	32.84	NA	NA	NA	399.62		0.0	
1Q13		1/7/2013	NE	34.12	NA	NA	NA	398.34		0.0	
2Q13		4/2/2013	NE	33.30	NA	NA	NA	399.16		3.5	
3Q13		7/2/2013	NE	26.81	NA	NA	NA	405.65		0.0	*
4Q13	432.46	10/2/2013	NE	31.35	NA	NA	NA	401.11	400.49 - 384.56 (31.97 - 47.90)	0.0	*
1Q14		2/11/2014	NE	34.37	NA	NA	NA	398.09		1.6	
2Q14		4/4/2014	NE	34.27	NA	NA	NA	398.19		0.0	
3Q14		7/2/2014	NE	30.93	NA	NA	NA	401.53		0.7	*
4Q14		10/3/2014	NE	30.31	NA	NA	NA	402.15		0.0	*
1Q15		1/12/2015	NE	33.06	NA	NA	NA	399.37		0.0	
2Q15	432.43	4/3/2015	NE	34.38	NA	NA	NA	398.05	400.46 - 384.53 (31.97 - 47.90)	0.0	
3Q15		7/8/2015	NE	27.81	NA	NA	NA	404.62		0.0	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
GP-9-PZ											
4Q12		10/2/2012	NE	41.32	NA	NA	NA	401.09		0.0	
1Q13		1/4/2013	NE	42.21	NA	NA	NA	400.20		0.0	
2Q13		4/2/2013	NE	42.90	NA	NA	NA	399.51		0.0	
3Q13		7/5/2013	NE	40.22	NA	NA	NA	402.19		0.0	
4Q13	442.41	10/2/2013	NE	40.98	NA	NA	NA	401.43	404.81 - 394.81 (37.60 - 47.60)	1.1	
1Q14		2/13/2014	NM	NM	NA	NA	NA	NA		NM	
2Q14		4/4/2014	NE	44.86	NA	NA	NA	397.55		0.5	
3Q14		7/2/2014	NE	42.66	NA	NA	NA	399.75		0.0	
4Q14		10/3/2014	NE	41.85	NA	NA	NA	400.56		0.0	
1Q15		1/8/2015	NE	42.76	NA	NA	NA	399.80		217.3	
2Q15	442.56	4/1/2015	NE	44.24	NA	NA	NA	398.32	404.96 - 394.96 (37.60 - 47.60)	0.0	
3Q15		7/9/2015	NE	43.69	NA	NA	NA	398.87		0.1	
ROST-3-MW (ROST-3-PZ)											
4Q12	442.29	10/1/2012	NE	40.55	NA	NA	NA	401.74	402.29 - 392.29 (40.00 - 50.00)	0.0	
1Q13		1/2/2013	NE	41.50	NA	NA	NA	400.79		0.0	2" Well Installed to replace ROST-3-PZ
2Q13		4/1/2013	NE	42.26	NA	NA	NA	400.03		5.6	
3Q13		7/1/2013	NE	39.83	NA	NA	NA	402.46		147.0	
4Q13		10/1/2013	NE	39.98	NA	NA	NA	402.31		267.2	
1Q14		2/10/2014	NE	42.20	NA	NA	NA	400.09		2.6	
2Q14	442.29	4/1/2014	NE	42.68	NA	NA	NA	399.61	404.48 - 394.48 (37.81 - 47.81)	1.2	
3Q14		7/1/2014	NE	42.10	NA	NA	NA	400.19		0.1	
4Q14		10/1/2014	NE	41.16	NA	NA	NA	401.13		0.0	
1Q15		1/5/2015	NE	41.82	NA	NA	NA	400.47		167.7	
2Q15		4/2/2015	NE	43.23	NA	NA	NA	399.06		0.0	
3Q15		7/6/2015	NE	42.69	NA	NA	NA	399.60		5.7	
ROST-4-PZ											
4Q12		10/1/2012	NE	39.52	NA	NA	NA	402.61		0.0	
1Q13		1/2/2013	NE	40.52	NA	NA	NA	401.61		0.0	
2Q13		4/1/2013	41.38	41.46	400.67	400.75	0.08	400.73		0.3	
3Q13		7/1/2013	NE	39.60	NA	NA	NA	402.53		0.0	
4Q13		10/1/2013	NE	38.88	NA	NA	NA	403.25		38.9	
1Q14	442.13	2/10/2014	NE	40.97	NA	NA	NA	401.16	407.20 - 397.20 (34.93 - 44.93)	1.2	
2Q14		4/1/2014	NE	41.22	NA	NA	NA	400.91		0.3	
3Q14		7/1/2014	NE	41.42	NA	NA	NA	400.71		0.0	
4Q14		10/1/2014	NE	40.25	NA	NA	NA	401.88		4.4	
1Q15		1/5/2015	NE	40.80	NA	NA	NA	401.33		10.3	
2Q15		4/2/2015	NE	41.75	NA	NA	NA	400.38		0.0	
3Q15		7/6/2015	NE	41.86	NA	NA	NA	400.27		0.0	
ROST-4-PZ(A)											
4Q12		10/1/2012	NE	38.95	NA	NA	NA	403.16		0.0	
1Q13		1/2/2013	NE	40.60	NA	NA	NA	401.51		0.0	
2Q13		4/1/2013	NE	41.86	NA	NA	NA	400.25		0.7	
3Q13		7/1/2013	NE	39.66	NA	NA	NA	402.45		0.2	
4Q13		10/1/2013	NE	38.76	NA	NA	NA	403.35		0.0	
1Q14	442.11	2/10/2014	NE	41.29	NA	NA	NA	400.82	407.34 - 397.34 (34.77 - 44.77)	0.6	
2Q14		4/1/2014	NE	41.81	NA	NA	NA	400.30		0.4	
3Q14		7/1/2014	NE	39.69	NA	NA	NA	402.42		0.0	
4Q14		10/1/2014	NE	39.74	NA	NA	NA	402.37		0.0	
1Q15		1/5/2015	NE	41.26	NA	NA	NA	400.85		0.0	
2Q15		4/2/2015	NE	42.45	NA	NA	NA	399.66		0.0	
3Q15		7/6/2015	NE	42.07	NA	NA	NA	400.04		0.0	
ROST-4-PZ(B)											
4Q12		10/1/2012	NE	39.62	NA	NA	NA	402.76		0.0	
1Q13		1/2/2013	NE	40.61	NA	NA	NA	401.77		0.0	
2Q13		4/1/2013	NE	41.55	NA	NA	NA	400.83		0.5	
3Q13		7/1/2013	NE	39.52	NA	NA	NA	402.86		0.0	
4Q13		10/1/2013	NE	38.58	NA	NA	NA	403.80		1.1	
1Q14	442.38	2/10/2014	NE	40.84	NA	NA	NA	401.54	407.33 - 397.33 (35.05 - 45.05)	0.3	
2Q14		4/1/2014	NE	41.18	NA	NA	NA	401.20		0.0	
3Q14		7/1/2014	NE	41.38	NA	NA	NA	401.00		0.0	
4Q14		10/1/2014	NE	40.00	NA	NA	NA	402.38		0.0	
1Q15		1/5/2015	NE	40.55	NA	NA	NA	401.83		0.0	
2Q15		4/2/2015	NE	42.22	NA	NA	NA	400.16		6.1	
3Q15		7/6/2015	NE	41.84	NA	NA	NA	400.54		0.0	

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
ROST-4-PZ(C)											
4Q12	442.66	10/1/2012	NE	40.43	NA	NA	NA	402.23	407.71 - 397.71 (34.95 - 44.95)	0.0	
1Q13		1/2/2013	NE	41.42	NA	NA	NA	401.24		0.0	
2Q13		4/1/2013	NE	42.34	NA	NA	NA	400.32		0.0	
3Q13		7/1/2013	NE	40.57	NA	NA	NA	402.09		0.2	
4Q13		10/1/2013	NE	39.77	NA	NA	NA	402.89		0.0	
1Q14		2/10/2014	NE	41.92	NA	NA	NA	400.74		0.2	
2Q14		4/1/2014	NE	42.19	NA	NA	NA	400.47		0.0	
3Q14		7/1/2014	NE	42.38	NA	NA	NA	400.28		0.0	
4Q14		10/1/2014	NE	41.28	NA	NA	NA	401.38		0.0	
1Q15		1/5/2015	NE	41.74	NA	NA	NA	400.92		0.0	
2Q15		4/2/2015	NE	42.80	NA	NA	NA	399.86		0.0	
3Q15		7/6/2015	NE	42.78	NA	NA	NA	399.88		1.1	
ROST-4-PZ(D)											
4Q12	442.98	10/1/2012	NE	NE	NA	NA	NA	NA	408.01 - 398.01 (34.97 - 44.97)	0.0	Well Dry
1Q13		1/2/2013	NE	NE	NA	NA	NA	NA		0.0	Well Dry
2Q13		4/1/2013	NE	NE	NA	NA	NA	NA		3.4	Well Dry
3Q13		7/1/2013	NE	NE	NA	NA	NA	NA		0.0	Well Dry
4Q13		10/1/2013	NE	39.63	NA	NA	NA	403.35		0.0	
1Q14		2/10/2014	NE	41.78	NA	NA	NA	401.20		0.6	
2Q14		4/1/2014	NE	42.10	NA	NA	NA	400.88		0.6	
3Q14		7/1/2014	NE	42.22	NA	NA	NA	400.76		0.0	
4Q14		10/1/2014	NE	41.06	NA	NA	NA	401.92		0.0	
1Q15		1/5/2015	NE	41.54	NA	NA	NA	401.44		43.0	
2Q15		4/2/2015	42.59	42.65	400.33	400.39	0.06	400.38		0.0	
3Q15		7/6/2015	NE	42.65	NA	NA	NA	400.33		0.3	
ROST-4-PZ(E)											
4Q12	441.96	10/1/2012	39.28	39.31	402.65	402.68	0.03	402.67	407.21 - 397.21 (34.75 - 44.75)	0.0	
1Q13		1/2/2013	NE	40.02	NA	NA	NA	401.94		0.0	
2Q13		4/1/2013	NE	40.80	NA	NA	NA	401.16		1.2	
3Q13		7/1/2013	NE	39.58	NA	NA	NA	402.38		0.0	
4Q13		10/1/2013	NE	38.70	NA	NA	NA	403.26		1.9	
1Q14		2/10/2014	40.60	40.62	401.34	401.36	0.02	401.36		0.3	
2Q14		4/1/2014	NE	40.38	NA	NA	NA	401.58		0.0	
3Q14		7/1/2014	NE	40.59	NA	NA	NA	401.37		1.1	
4Q14		10/1/2014	NE	39.71	NA	NA	NA	402.25		0.0	
1Q15		1/5/2015	NE	39.95	NA	NA	NA	402.01		1.9	
2Q15		4/2/2015	NE	41.22	NA	NA	NA	400.74		0.0	
3Q15		7/6/2015	41.41	41.44	400.52	400.55	0.03	400.54		0.0	
ROST-4-PZ(F)											
4Q12	442.12	10/1/2012	NE	39.46	NA	NA	NA	402.66	407.59 - 397.59 (34.53 - 44.53)	0.0	
1Q13		1/2/2013	NE	40.30	NA	NA	NA	401.82		0.0	
2Q13		4/1/2013	NE	41.12	NA	NA	NA	401.00		0.8	
3Q13		7/1/2013	NE	39.67	NA	NA	NA	402.45		0.0	
4Q13		10/1/2013	NE	38.83	NA	NA	NA	403.29		1.0	
1Q14		2/10/2014	NE	40.22	NA	NA	NA	401.90		0.3	
2Q14		4/1/2014	NE	40.45	NA	NA	NA	401.67		1.0	
3Q14		7/1/2014	NE	40.51	NA	NA	NA	401.61		2.4	
4Q14		10/1/2014	NE	39.79	NA	NA	NA	402.33		0.0	
1Q15		1/5/2015	39.92	39.93	402.19	402.20	0.01	402.20		0.0	
2Q15		4/2/2015	NE	40.54	NA	NA	NA	401.58		0.0	
3Q15		7/6/2015	NE	40.81	NA	NA	NA	401.31		0.0	
ROST-4-PZ(G)											
4Q12	442.13	10/1/2012	NE	40.54	NA	NA	NA	401.59	407.85 - 397.85 (34.28 - 44.28)	0.0	
1Q13		1/2/2013	NE	41.49	NA	NA	NA	400.64		0.0	
2Q13		4/1/2013	NE	42.14	NA	NA	NA	399.99		0.0	
3Q13		7/1/2013	NE	39.68	NA	NA	NA	402.45		49.3	
4Q13		10/1/2013	NE	40.22	NA	NA	NA	401.91		40.6	
1Q14		2/10/2014	NE	42.35	NA	NA	NA	399.78		0.1	
2Q14		4/1/2014	NE	42.79	NA	NA	NA	399.34		0.5	
3Q14		7/1/2014	NE	42.08	NA	NA	NA	400.05		0.2	
4Q14		10/1/2014	NE	41.26	NA	NA	NA	400.87		0.0	
1Q15		1/5/2015	NE	41.97	NA	NA	NA	400.16		3.3	
2Q15		4/2/2015	NE	43.29	NA	NA	NA	398.84		0.0	
3Q15		7/6/2015	NE	42.80	NA	NA	NA	399.33		0.0	

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
ROST-5-PZ											
4Q12	442.22	10/1/2012	NE	NE	NA	NA	NA	NA	429.02 - 419.02 (13.20 - 23.20)	0.0	Well Dry
1Q13		1/2/2013	NE	NE	NA	NA	NA	NA		0.0	Well Dry
2Q13		4/1/2013	NE	NE	NA	NA	NA	NA		0.0	Well Dry
3Q13		7/1/2013	NE	22.98	NA	NA	NA	419.24		0.6	
4Q13		10/1/2013	NE	NE	NA	NA	NA	NA		0.0	Well Dry
1Q14		2/10/2014	NE	NE	NA	NA	NA	NA		0.2	Well Dry
2Q14		4/3/2014	NE	NE	NA	NA	NA	NA		5.1	Well Dry
3Q14		7/2/2014	NE	NE	NA	NA	NA	NA		0.0	Well Dry
4Q14		10/1/2014	NE	NE	NA	NA	NA	NA		0.0	Well Dry
1Q15		1/5/2015	NE	NE	NA	NA	NA	NA		3.3	Well Dry
2Q15		4/2/2015	NE	NE	NA	NA	NA	NA		0.0	Well Dry
3Q15		7/6/2015	NE	NE	NA	NA	NA	NA		0.0	Well Dry
ROST-7-PZ											
4Q12	442.19	10/1/2012	NE	23.86	NA	NA	NA	418.33	422.19 - 412.19 (20.00 - 30.00)	0.0	
1Q13		1/3/2013	NM	NM	NA	NA	NA	NA		NM	
2Q13		4/1/2013	NE	25.51	NA	NA	NA	416.68		15.0	
3Q13		7/5/2013	NE	22.28	NA	NA	NA	419.91		12.5	
4Q13		10/1/2013	NE	22.41	NA	NA	NA	419.78		0.0	
1Q14		2/10/2014	NE	23.49	NA	NA	NA	418.70		0.3	
2Q14		4/3/2014	NE	23.88	NA	NA	NA	418.31		1.4	
3Q14		7/1/2014	NE	22.88	NA	NA	NA	419.31		0.0	
4Q14		10/1/2014	NE	21.81	NA	NA	NA	420.38		0.0	
1Q15		1/6/2015	NE	NE	NA	NA	NA	NA		0.0	Well Dry
2Q15		4/2/2015	NE	21.71	NA	NA	NA	420.48		0.0	
3Q15		7/6/2015	NE	20.54	NA	NA	NA	421.65		0.1	
ROST-10-PZ											
4Q12	444.51	10/1/2012	NE	NE	NA	NA	NA	NA	434.51 - 424.51 (10.00 - 20.00)	0.0	Well Dry
1Q13		1/3/2013	NE	NE	NA	NA	NA	NA		0.0	Well Dry
2Q13		4/1/2013	NE	NE	NA	NA	NA	NA		1.5	Well Dry
3Q13		7/1/2013	NE	NE	NA	NA	NA	NA		0.5	Well Dry
4Q13		10/1/2013	NE	NE	NA	NA	NA	NA		0.0	Well Dry
1Q14		2/10/2014	NE	NE	NA	NA	NA	NA		0.7	Well Dry
2Q14		4/2/2014	NE	NE	NA	NA	NA	NA		0.1	Well Dry
3Q14		7/1/2014	NE	NE	NA	NA	NA	NA		0.0	Well Dry
4Q14		10/1/2014	NE	NE	NA	NA	NA	NA		0.0	Well Dry
1Q15		1/5/2015	NE	NE	NA	NA	NA	NA		0.0	Well Dry
2Q15		4/2/2015	NE	NE	NA	NA	NA	NA		0.0	Well Dry
3Q15		7/6/2015	NE	NE	NA	NA	NA	NA		0.0	Well Dry
ROST-21-PZ											
4Q12	443.72	10/1/2012	NE	NE	NA	NA	NA	NA	433.72 - 423.72 (10.00 - 20.00)	0.0	Well Dry
1Q13		1/3/2013	NE	NE	NA	NA	NA	NA		0.0	Well Dry
2Q13		4/1/2013	NE	NE	NA	NA	NA	NA		4.6	Well Dry
3Q13		7/1/2013	NE	18.42	NA	NA	NA	425.30		0.2	
4Q13		10/1/2013	NE	19.38	NA	NA	NA	424.34		1.9	
1Q14		2/10/2014	NE	NE	NA	NA	NA	NA		4.9	Well Dry
2Q14		4/1/2014	NE	NE	NA	NA	NA	NA		0.5	Well Dry
3Q14		7/1/2014	NE	19.13	NA	NA	NA	424.59		0.0	
4Q14		10/1/2014	NE	19.38	NA	NA	NA	424.34		0.0	
1Q15		1/5/2015	NE	19.62	NA	NA	NA	424.10		0.0	
2Q15		4/2/2015	NE	19.70	NA	NA	NA	424.02		0.0	
3Q15		7/6/2015	NE	18.88	NA	NA	NA	424.84		0.0	
S-1											
4Q12	443.79	10/1/2012	NE	41.93	NA	NA	NA	401.86	Unknown	32.0	
1Q13		1/4/2013	NE	43.35	NA	NA	NA	400.44		0.0	
2Q13		4/1/2013	NE	44.20	NA	NA	NA	399.59		15.1	
3Q13		7/5/2013	NE	42.12	NA	NA	NA	401.67		126.0	
4Q13		10/2/2013	NE	41.99	NA	NA	NA	401.80		52.0	
1Q14		2/12/2014	43.95	43.96	399.83	399.84	0.01	399.84		123.9	
2Q14		4/4/2014	NE	45.28	NA	NA	NA	398.51		0.2	
3Q14		7/2/2014	44.00	44.01	399.78	399.79	0.01	399.79		195.7	
4Q14		10/2/2014	42.80	42.82	400.97	400.99	0.02	400.99		256.4	
1Q15	443.90	1/5/2015	43.77	45.18	398.72	400.13	1.41	399.85		225.8	
2Q15		4/1/2015	45.40	46.07	397.83	398.50	0.67	398.37		201.5	
3Q15		7/7/2015	45.37	45.68	398.22	398.53	0.31	398.47		30.5	

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
T-1											
4Q12	445.40	10/1/2012	NE	42.90	NA	NA	NA	402.50	398.40 - 388.40 (47.00 - 57.00)	0.2	*
1Q13		1/3/2013	NE	44.17	NA	NA	NA	401.23		0.0	*
2Q13		4/2/2013	NE	44.94	NA	NA	NA	400.46		0.3	*
3Q13		7/3/2013	NE	42.85	NA	NA	NA	402.55		4.2	*
4Q13		10/1/2013	NE	42.61	NA	NA	NA	402.79		1.5	*
1Q14		2/11/2014	NE	44.35	NA	NA	NA	401.05		1.1	*
2Q14		4/1/2014	NE	44.84	NA	NA	NA	400.56		0.0	*
3Q14		7/1/2014	NE	44.87	NA	NA	NA	400.53		0.0	*
4Q14		10/2/2014	NE	43.94	NA	NA	NA	401.46		0.2	*
1Q15		1/6/2015	NE	44.51	NA	NA	NA	400.89		0.2	*
2Q15		4/3/2015	NE	45.35	NA	NA	NA	400.05		0.0	*
3Q15		7/7/2015	NE	44.86	NA	NA	NA	400.54		0.0	*
T-2											
4Q12	443.12	10/1/2012	NE	41.11	NA	NA	NA	402.02	392.63 - 372.48 (50.49 - 70.64)	0.3	*
1Q13		1/3/2013	NE	43.39	NA	NA	NA	399.74		0.0	*
2Q13		4/2/2013	NE	43.35	NA	NA	NA	399.78		0.7	*
3Q13		7/3/2013	NE	41.48	NA	NA	NA	401.64		0.0	*
4Q13		10/1/2013	NE	41.34	NA	NA	NA	401.78		0.0	*
1Q14		2/11/2014	NE	42.83	NA	NA	NA	400.30		0.7	*
2Q14		4/1/2014	NE	43.69	NA	NA	NA	399.44		0.0	*
3Q14		7/1/2014	NE	43.11	NA	NA	NA	400.02		0.0	*
4Q14		10/2/2014	NE	42.36	NA	NA	NA	400.76		0.0	*
1Q15	443.21	1/6/2015	NE	42.77	NA	NA	NA	400.44	392.72 - 372.56 (50.49 - 70.64)	0.2	*
2Q15		4/3/2015	NE	43.78	NA	NA	NA	399.43		0.0	*
3Q15		7/7/2015	NE	43.32	NA	NA	NA	399.89		0.0	*
T-3											
4Q12	450.91	10/1/2012	NE	50.04	NA	NA	NA	400.87	403.65 - 388.65 (47.26 - 62.26)	7.3	
1Q13		1/4/2013	NE	51.55	NA	NA	NA	399.36		2.1	
2Q13		4/1/2013	NE	52.35	NA	NA	NA	398.56		0.0	
3Q13		7/3/2013	NE	50.95	NA	NA	NA	399.96		4.8	
4Q13		10/1/2013	NE	50.78	NA	NA	NA	400.13		10.2	
1Q14		2/12/2014	NE	52.01	NA	NA	NA	398.90		56.2	
2Q14		4/1/2014	NE	53.18	NA	NA	NA	397.73		0.0	
3Q14		7/2/2014	NE	52.21	NA	NA	NA	398.70		0.8	
4Q14		10/2/2014	NE	51.58	NA	NA	NA	399.33		3.4	
1Q15	451.07	1/9/2015	NE	51.44	NA	NA	NA	399.63	403.81 - 388.81 (47.26 - 62.26)	2.5	
2Q15	449.03	4/3/2015	NE	50.57	NA	NA	NA	398.46	403.81 - 388.81 (45.22 - 60.22)	0.1	Well casing trimmed to make well more accessible
3Q15		7/7/2015	NE	50.18	NA	NA	NA	398.85		0.0	
T-4											
4Q12	447.95	10/1/2012	NE	46.78	NA	NA	NA	401.17	398.24 - 383.24 (49.71 - 64.71)	0.0	*
1Q13		1/4/2013	NE	48.60	NA	NA	NA	399.35		0.0	*
2Q13		4/1/2013	NE	49.26	NA	NA	NA	398.69		0.0	*
3Q13		7/3/2013	NE	49.33	NA	NA	NA	398.62		1.1	*
4Q13		10/1/2013	NE	47.84	NA	NA	NA	400.11		0.1	*
1Q14		2/12/2014	NE	49.97	NA	NA	NA	397.98		4.5	
2Q14		4/4/2014	NE	52.42	NA	NA	NA	395.53		0.3	
3Q14		7/1/2014	NE	49.71	NA	NA	NA	398.24		0.0	
4Q14		10/2/2014	NE	49.63	NA	NA	NA	398.32		0.1	*
1Q15	448.03	1/9/2015	NE	49.11	NA	NA	NA	398.92	398.32 - 383.32 (49.71 - 64.71)	1.1	*
2Q15	446.63	4/6/2015	NE	49.83	NA	NA	NA	396.80	398.32 - 383.32 (48.31 - 63.31)	0.3	Well casing trimmed to make well more accessible
3Q15		7/7/2015	NE	48.26	NA	NA	NA	398.37		0.0	*
T-5											
4Q12	443.46	10/1/2012	NE	41.08	NA	NA	NA	402.38	395.13 - 378.58 (48.33 - 64.88)	9.8	*
1Q13		1/4/2013	NE	42.57	NA	NA	NA	400.89		0.0	*
2Q13		4/1/2013	NE	43.42	NA	NA	NA	400.04		0.0	*
3Q13		7/5/2013	NE	41.67	NA	NA	NA	401.79		0.0	*
4Q13		10/1/2013	NE	41.14	NA	NA	NA	402.32		18.2	*
1Q14		2/13/2014	NE	42.96	NA	NA	NA	400.50		174.5	*
2Q14		4/4/2014	NE	44.53	NA	NA	NA	398.93		8.0	*
3Q14		7/2/2014	NE	43.47	NA	NA	NA	399.99		5.4	*
4Q14		10/2/2014	NE	42.44	NA	NA	NA	401.02		0.5	*
1Q15	443.47	1/9/2015	NE	42.54	NA	NA	NA	400.93	395.14 - 378.59 (48.33 - 64.88)	1.9	*
2Q15		4/1/2015	NE	44.23	NA	NA	NA	399.24		0.8	*
3Q15		7/7/2015	NE	44.19	NA	NA	NA	399.28		20.0	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
T-6											
4Q12	446.55	10/2/2012	NE	44.86	NA	NA	NA	401.69	394.79 - 380.54 (51.76 - 66.01)	0.1	*
1Q13		1/4/2013	NE	45.84	NA	NA	NA	400.71		0.0	*
2Q13		4/2/2013	NE	46.69	NA	NA	NA	399.86		0.0	*
3Q13		7/5/2013	NE	43.81	NA	NA	NA	402.74		0.0	*
4Q13		10/1/2013	NE	44.28	NA	NA	NA	402.27		10.0	*
1Q14		2/12/2014	NE	46.63	NA	NA	NA	399.92		6.1	*
2Q14		4/4/2014	NE	47.43	NA	NA	NA	399.12		2.3	*
3Q14		7/1/2014	NE	46.23	NA	NA	NA	400.32		0.0	*
4Q14		10/3/2014	NE	45.18	NA	NA	NA	401.37		0.6	*
1Q15	446.61	1/8/2015	NE	46.78	NA	NA	NA	399.83	394.85 - 380.60 (51.76 - 66.01)	0.2	*
2Q15		4/1/2015	NE	48.56	NA	NA	NA	398.05		0.0	*
3Q15		7/9/2015	NE	47.97	NA	NA	NA	398.64		0.3	*
T-7											
4Q12	444.01	10/2/2012	40.80	40.83	403.18	403.21	0.03	403.20	395.29 - 380.29 (48.72 - 63.72)	0.3	*
1Q13		1/2/2013	41.66	41.67	402.34	402.35	0.01	402.35		2.4	*
2Q13		4/2/2013	NE	42.78	NA	NA	NA	401.23		9.2	*
3Q13		7/2/2013	NE	40.21	NA	NA	NA	403.80		0.0	*
4Q13		10/2/2013	NE	39.72	NA	NA	NA	404.29		5.1	*
1Q14		2/11/2014	NE	42.60	NA	NA	NA	401.41		4.7	*
2Q14		4/4/2014	NE	43.34	NA	NA	NA	400.67		2.5	*
3Q14		7/3/2014	NE	42.36	NA	NA	NA	401.65		2.4	*
4Q14		10/3/2014	NE	41.33	NA	NA	NA	402.68		6.9	*
1Q15	444.04	1/9/2015	NE	42.58	NA	NA	NA	401.46	395.32 - 380.32 (48.72 - 63.72)	1.8	*
2Q15		4/3/2015	NE	44.17	NA	NA	NA	399.87		5.7	*
3Q15		7/7/2015	NE	43.24	NA	NA	NA	400.80		3.8	*
T-12											
4Q12	444.69	10/2/2012	NE	43.86	NA	NA	NA	400.83	398.23 - 372.23 (46.46 - 72.46)	0.5	*
1Q13		1/4/2013	NE	44.65	NA	NA	NA	400.04		0.2	*
2Q13		4/2/2013	NE	45.19	NA	NA	NA	399.50		0.0	*
3Q13		7/5/2013	NE	43.59	NA	NA	NA	401.10		1.4	*
4Q13		10/1/2013	NE	43.64	NA	NA	NA	401.05		5.5	*
1Q14		2/13/2014	NE	45.26	NA	NA	NA	399.43		0.5	*
2Q14		4/4/2014	NE	46.38	NA	NA	NA	398.31		5.1	*
3Q14		7/1/2014	NE	45.31	NA	NA	NA	399.38		0.0	*
4Q14		10/3/2014	NE	44.63	NA	NA	NA	400.06		2.7	*
1Q15	444.80	1/8/2015	NE	44.92	NA	NA	NA	399.88	398.34 - 372.34 (46.46 - 72.46)	2.0	*
2Q15		4/1/2015	NE	46.73	NA	NA	NA	398.07		0.5	
3Q15		7/9/2015	NE	46.20	NA	NA	NA	398.60		4.4	*
T-13											
4Q12	443.46	10/2/2012	NE	40.81	NA	NA	NA	402.65	396.46 - 370.46 (47.00 - 73.00)	2.9	*
1Q13		1/2/2013	NE	41.96	NA	NA	NA	401.50		0.0	*
2Q13		4/3/2013	NE	42.96	NA	NA	NA	400.50		0.0	*
3Q13		7/5/2013	NE	40.79	NA	NA	NA	402.67		0.0	*
4Q13		10/3/2013	NE	40.72	NA	NA	NA	402.74		0.0	*
1Q14		2/10/2014	NE	42.54	NA	NA	NA	400.92		0.0	*
2Q14		4/4/2014	NE	43.19	NA	NA	NA	400.27		0.4	*
3Q14		7/1/2014	NE	42.79	NA	NA	NA	400.67		0.0	*
4Q14		10/1/2014	NE	41.98	NA	NA	NA	401.48		0.0	*
1Q15	443.96	1/5/2015	NE	42.41	NA	NA	NA	401.55	396.96 - 370.96 (47.00 - 73.00)	0.0	*
2Q15		4/2/2015	NE	43.45	NA	NA	NA	400.51		0.0	*
3Q15		7/8/2015	NE	42.90	NA	NA	NA	401.06		0.1	*
T-15											
4Q12	445.03	10/1/2012	NE	42.81	NA	NA	NA	402.22	396.99 - 370.99 (48.04 - 74.04)	0.0	*
1Q13		1/3/2013	NE	44.24	NA	NA	NA	400.79		0.0	*
2Q13		4/2/2013	NE	45.11	NA	NA	NA	399.92		0.0	*
3Q13		7/3/2013	NE	43.58	NA	NA	NA	401.45		0.2	*
4Q13		10/1/2013	NE	43.48	NA	NA	NA	401.55		11.5	*
1Q14		2/11/2014	NE	44.75	NA	NA	NA	400.28		0.5	*
2Q14		4/1/2014	NE	45.69	NA	NA	NA	399.34		0.0	*
3Q14		7/1/2014	NE	45.12	NA	NA	NA	399.91		0.0	*
4Q14		10/1/2014	NE	44.41	NA	NA	NA	400.62		0.0	*
1Q15	445.14	1/6/2015	NE	44.68	NA	NA	NA	400.46	397.10 - 371.10 (48.04 - 74.04)	0.1	*
2Q15		4/3/2015	NE	45.58	NA	NA	NA	399.56		0.0	*
3Q15		7/7/2015	NE	44.93	NA	NA	NA	400.21		0.0	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
T-17											
4Q12	445.90	10/1/2012	NE	40.92	NA	NA	NA	404.98	401.80 - 375.80 (44.10 - 70.10)	0.0	*
1Q13		1/3/2013	NE	42.70	NA	NA	NA	403.20		0.0	*
2Q13		4/2/2013	NE	43.61	NA	NA	NA	402.29		0.0	*
3Q13		7/3/2013	NE	42.34	NA	NA	NA	403.56		1.3	*
4Q13		10/1/2013	NE	42.46	NA	NA	NA	403.44		0.0	*
1Q14		2/11/2014	NE	43.93	NA	NA	NA	401.97		2.1	*
2Q14		4/1/2014	NE	45.04	NA	NA	NA	400.86		0.0	
3Q14		7/3/2014	NE	44.50	NA	NA	NA	401.40		0.0	
4Q14		10/1/2014	NE	44.00	NA	NA	NA	401.90		0.0	*
1Q15	446.01	1/6/2015	NE	43.75	NA	NA	NA	402.26	401.91 - 375.91 (44.10 - 70.10)	0.1	*
2Q15		4/3/2015	NE	44.17	NA	NA	NA	401.84		0.6	
3Q15		7/7/2015	NE	43.22	NA	NA	NA	402.79		0.0	*
T-19											
4Q12	446.71	10/1/2012	NE	45.41	NA	NA	NA	401.30	395.94 - 369.94 (50.77 - 76.77)	0.0	*
1Q13		1/4/2013	NE	47.44	NA	NA	NA	399.27		0.0	*
2Q13		4/1/2013	NE	48.09	NA	NA	NA	398.62		0.7	*
3Q13		7/3/2013	NE	48.04	NA	NA	NA	398.67		37.2	*
4Q13		10/1/2013	NE	46.40	NA	NA	NA	400.31		0.8	*
1Q14		2/12/2014	NE	48.54	NA	NA	NA	398.17		24.3	*
2Q14		4/4/2014	NE	50.98	NA	NA	NA	395.73		11.7	
3Q14		7/1/2014	NE	48.42	NA	NA	NA	398.29		4.6	*
4Q14		10/2/2014	NE	48.28	NA	NA	NA	398.43		20.1	*
1Q15	446.79	1/9/2015	NE	47.58	NA	NA	NA	399.21	396.02 - 370.02 (50.77 - 76.77)	1.4	*
2Q15		4/6/2015	NE	48.84	NA	NA	NA	397.95		51.2	*
3Q15		7/7/2015	NE	48.40	NA	NA	NA	398.39		21.6	*
T-21											
4Q12	444.00	10/2/2012	NE	32.62	NA	NA	NA	411.38	412.04 - 386.04 (31.96 - 57.96)	0.0	
1Q13		1/2/2013	NE	33.96	NA	NA	NA	410.04		0.0	
2Q13		4/2/2013	NE	34.98	NA	NA	NA	409.02		0.4	
3Q13		7/2/2013	NE	33.45	NA	NA	NA	410.55		0.0	
4Q13		10/2/2013	NE	32.82	NA	NA	NA	411.18		0.0	
1Q14		2/11/2014	NE	34.47	NA	NA	NA	409.53		0.2	
2Q14		4/4/2014	NE	35.28	NA	NA	NA	408.72		0.2	
3Q14		7/3/2014	NE	34.83	NA	NA	NA	409.17		0.0	
4Q14		10/3/2014	NE	34.47	NA	NA	NA	409.53		0.1	
1Q15	443.99	1/9/2015	NE	34.26	NA	NA	NA	409.73	412.03 - 386.03 (31.96 - 57.96)	0.0	
2Q15		4/3/2015	NE	34.80	NA	NA	NA	409.19		0.0	
3Q15		7/7/2015	NE	33.88	NA	NA	NA	410.11		0.0	
T-22											
4Q12	442.21	10/2/2012	NE	34.45	NA	NA	NA	407.76	410.66 - 384.96 (31.55 - 57.25)	0.0	
1Q13		1/2/2013	NE	35.62	NA	NA	NA	406.59		0.0	
2Q13		4/2/2013	NE	36.44	NA	NA	NA	405.77		0.1	
3Q13		7/2/2013	NE	34.04	NA	NA	NA	408.17		0.0	
4Q13		10/2/2013	NE	33.85	NA	NA	NA	408.36		0.0	
1Q14		2/11/2014	NE	35.93	NA	NA	NA	406.28		0.7	
2Q14		4/4/2014	NE	36.61	NA	NA	NA	405.60		0.2	
3Q14		7/3/2014	NE	35.96	NA	NA	NA	406.25		0.0	
4Q14		10/3/2014	NE	35.19	NA	NA	NA	407.02		0.1	
1Q15	442.19	1/9/2015	NE	35.29	NA	NA	NA	406.90	410.64 - 384.94 (31.55 - 57.25)	0.0	
2Q15		4/3/2015	NE	36.38	NA	NA	NA	405.81		0.2	
3Q15		7/7/2015	NE	35.51	NA	NA	NA	406.68		10.7	
T-23											
4Q12	432.64	10/2/2012	NE	27.37	NA	NA	NA	405.27	405.41 - 379.41 (27.23 - 53.23)	0.0	
1Q13		1/3/2013	NE	28.35	NA	NA	NA	404.29		0.0	
2Q13		4/2/2013	NE	29.04	NA	NA	NA	403.60		0.2	
3Q13		7/2/2013	NE	26.95	NA	NA	NA	405.69		0.0	*
4Q13		10/2/2013	NE	26.40	NA	NA	NA	406.24		0.0	*
1Q14		2/10/2014	NE	28.80	NA	NA	NA	403.84		0.1	
2Q14		4/4/2014	NE	29.45	NA	NA	NA	403.19		0.0	
3Q14		7/2/2014	NE	28.37	NA	NA	NA	404.27		0.8	
4Q14		10/2/2014	NE	27.29	NA	NA	NA	405.35		0.0	
1Q15	432.69	1/8/2015	NE	28.04	NA	NA	NA	404.65	405.46 - 379.46 (27.23 - 53.23)	0.9	
2Q15		4/6/2015	NM	NM	NA	NA	NA	NA		NM	Unable to locate well due to landscaping
3Q15		7/6/2015	NE	27.93	NA	NA	NA	404.76		0.3	

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
T-24											
4Q12	443.72	10/1/2012	42.02	44.87	398.85	401.70	2.85	401.13	402.22 - 376.57 (41.50 - 67.15)	5.8	
1Q13		1/4/2013	NE	43.20	NA	NA	NA	400.52		4.3	
2Q13		4/2/2013	44.58	44.64	399.08	399.14	0.06	399.13		0.0	
3Q13		7/2/2013	42.16	42.55	401.17	401.56	0.39	401.48		10.0	
4Q13		10/2/2013	42.20	42.22	401.50	401.52	0.02	401.51		0.8	
1Q14		2/12/2014	43.35	45.60	398.12	400.37	2.25	399.92		8.2	
2Q14		4/4/2014	44.95	45.44	398.28	398.77	0.49	398.67		0.4	
3Q14		7/2/2014	44.09	44.26	399.46	399.63	0.17	399.59		0.0	
4Q14		10/3/2014	43.12	44.01	399.71	400.60	0.89	400.42		1.6	
1Q15	443.81	1/9/2015	43.75	45.39	398.42	400.06	1.64	399.73	402.31 - 376.66 (41.50 - 67.15)	3.4	
2Q15		4/1/2015	45.02	46.10	397.71	398.79	1.08	398.57		0.0	
3Q15		7/8/2015	NM	NM	NA	NA	NA	NA		NM	Unsafe condition
T-28											
4Q12	444.22	10/1/2012	NE	40.88	NA	NA	NA	403.34	Unknown	0.0	
1Q13		1/3/2013	NE	42.56	NA	NA	NA	401.66		0.0	
2Q13		4/2/2013	NE	43.42	NA	NA	NA	400.80		0.0	
3Q13		7/3/2013	NE	42.40	NA	NA	NA	401.82		0.0	
4Q13		10/1/2013	NE	39.17	NA	NA	NA	405.05		2.1	
1Q14		2/11/2014	NE	43.72	NA	NA	NA	400.50		0.8	
2Q14		4/1/2014	NE	44.84	NA	NA	NA	399.38		0.0	
3Q14		7/1/2014	NE	44.05	NA	NA	NA	400.17		0.0	
4Q14		10/1/2014	NE	43.60	NA	NA	NA	400.62		0.0	
1Q15	444.43	1/6/2015	NE	43.46	NA	NA	NA	400.97		0.0	
2Q15		4/6/2015	NE	43.93	NA	NA	NA	400.50		1.1	
3Q15		7/8/2015	NM	NM	NA	NA	NA	NA		NM	Unsafe condition
T-37											
4Q12	447.15	10/1/2012	NE	41.44	NA	NA	NA	405.71	398.30 - 378.30 (48.85 - 68.85)	0.0	*
1Q13		1/3/2013	NE	43.07	NA	NA	NA	404.08		0.0	*
2Q13		4/1/2013	NE	43.79	NA	NA	NA	403.36		0.0	*
3Q13		7/3/2013	NE	42.66	NA	NA	NA	404.49		0.0	*
4Q13		10/1/2013	NE	42.51	NA	NA	NA	404.64		0.1	*
1Q14		2/12/2014	NE	44.08	NA	NA	NA	403.07		4.1	*
2Q14		4/1/2014	NE	44.91	NA	NA	NA	402.24		0.0	*
3Q14		7/1/2014	NE	44.44	NA	NA	NA	402.71		0.0	*
4Q14		10/2/2014	NE	44.03	NA	NA	NA	403.12		17.4	*
1Q15	447.25	1/9/2015	NE	43.17	NA	NA	NA	404.08	398.40 - 378.40 (48.85 - 68.85)	1.4	*
2Q15		4/3/2015	NE	43.93	NA	NA	NA	403.32		0.0	*
3Q15		7/7/2015	NE	43.21	NA	NA	NA	404.04		0.0	*
T-38											
4Q12	445.62	10/1/2012	NE	38.61	NA	NA	NA	407.01	396.48 - 376.48 (49.14 - 69.14)	0.0	*
1Q13		1/3/2013	NE	40.06	NA	NA	NA	405.56		0.0	*
2Q13		4/1/2013	NM	NM	NA	NA	NA	NA		NM	Unsafe condition
3Q13		7/3/2013	NM	NM	NA	NA	NA	NA		NM	Unsafe condition
4Q13		10/1/2013	NM	NM	NA	NA	NA	NA		NM	Unsafe condition
1Q14		2/12/2014	NE	41.21	NA	NA	NA	404.41		0.3	*
2Q14		4/3/2014	NE	41.38	NA	NA	NA	404.24		0.0	*
3Q14		7/1/2014	NE	41.39	NA	NA	NA	404.23		0.0	*
4Q14		10/2/2014	NE	40.96	NA	NA	NA	404.66		0.0	*
1Q15	445.67	1/9/2015	NE	39.96	NA	NA	NA	405.71	396.53 - 376.53 (49.14 - 69.14)	0.0	*
2Q15		4/3/2015	NE	40.64	NA	NA	NA	405.03		0.0	*
3Q15		7/7/2015	NE	39.66	NA	NA	NA	406.01		0.0	*
T-62											
4Q12	431.73	10/2/2012	NE	29.28	NA	NA	NA	402.45	412.02 - 382.02 (19.71 - 49.71)	0.0	
1Q13		1/7/2013	NE	30.39	NA	NA	NA	401.34		0.0	
2Q13		4/2/2013	NE	30.80	NA	NA	NA	400.93		0.0	
3Q13		7/2/2013	NE	26.91	NA	NA	NA	404.82		0.0	
4Q13		10/2/2013	NE	27.81	NA	NA	NA	403.92		0.0	
1Q14		2/11/2014	NE	30.81	NA	NA	NA	400.92		31.0	
2Q14		4/7/2014	NE	31.37	NA	NA	NA	400.36		0.0	
3Q14		7/2/2014	NM	NM	NA	NA	NA	NA		NM	
4Q14		10/3/2014	NE	28.62	NA	NA	NA	403.11		0.1	
1Q15	431.99	1/12/2015	NE	30.15	NA	NA	NA	401.84	412.28 - 382.28 (19.71 - 49.71)	0.0	
2Q15		4/3/2015	NE	31.72	NA	NA	NA	400.27		0.0	
3Q15		7/8/2015	NE	29.43	NA	NA	NA	402.56		35.4	

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
T-63											
4Q12	431.24	10/2/2012	NE	29.19	NA	NA	NA	402.05	411.26 - 381.26 (19.98 - 49.98)	0.0	
1Q13		1/7/2013	NE	30.45	NA	NA	NA	400.79		0.0	
2Q13		4/2/2013	NE	30.61	NA	NA	NA	400.63		0.0	
3Q13		7/2/2013	NE	25.92	NA	NA	NA	405.32		0.0	
4Q13		10/2/2013	NE	27.63	NA	NA	NA	403.61		0.0	
1Q14		2/11/2014	NE	30.74	NA	NA	NA	400.50		0.5	
2Q14		4/7/2014	NE	30.80	NA	NA	NA	400.44		0.1	
3Q14		7/2/2014	NE	29.21	NA	NA	NA	402.03		1.0	
4Q14		10/3/2014	NE	28.11	NA	NA	NA	403.13		0.0	
1Q15	431.43	1/5/2015	NM	NM	NA	NA	NA	NA	411.45 - 381.45 (19.98 - 49.98)	NM	Inaccessible due to ice
2Q15		4/3/2015	NE	31.52	NA	NA	NA	399.91		0.5	
3Q15		7/8/2015	NM	NM	NA	NA	NA	NA		NM	Unsafe condition
T-64											
4Q12	428.80	10/2/2012	NE	27.44	NA	NA	NA	401.36	408.99 - 378.99 (19.81 - 49.81)	0.0	
1Q13		1/7/2013	NE	28.89	NA	NA	NA	399.91		0.0	
2Q13		4/2/2013	NE	28.63	NA	NA	NA	400.17		0.1	
3Q13		7/2/2013	NE	23.15	NA	NA	NA	405.65		0.2	
4Q13		10/2/2013	NE	25.86	NA	NA	NA	402.94		0.0	
1Q14		2/11/2014	NE	29.03	NA	NA	NA	399.77		0.4	
2Q14		4/4/2014	NE	29.29	NA	NA	NA	399.51		0.0	
3Q14		7/2/2014	NE	26.90	NA	NA	NA	401.90		0.8	
4Q14		10/3/2014	NE	25.81	NA	NA	NA	402.99		0.0	
1Q15	428.93	1/12/2015	NE	27.96	NA	NA	NA	400.97	409.12 - 379.12 (19.81 - 49.81)	0.9	
2Q15		4/3/2015	NE	29.46	NA	NA	NA	399.47		1.6	
3Q15		7/8/2015	NE	25.37	NA	NA	NA	403.56		172.1	
PZ-1-85											
4Q12	445.50	10/1/2012	NE	43.06	NA	NA	NA	402.44	369.70 - 359.70 (75.80 - 85.80)	0.0	*
1Q13		1/3/2013	NE	44.35	NA	NA	NA	401.15		0.0	*
2Q13		4/1/2013	NE	45.12	NA	NA	NA	400.38		0.6	*
3Q13		7/1/2013	NE	42.68	NA	NA	NA	402.82		0.0	*
4Q13		10/1/2013	NE	42.63	NA	NA	NA	402.87		1.5	*
1Q14		2/10/2014	NE	44.82	NA	NA	NA	400.68		1.9	*
2Q14		4/1/2014	NE	45.30	NA	NA	NA	400.20		3.3	*
3Q14		7/1/2014	NE	44.82	NA	NA	NA	400.68		4.4	*
4Q14	445.48	10/1/2014	NE	43.88	NA	NA	NA	401.60	369.70 - 359.70 (75.78 - 85.78)	0.1	*
1Q15		1/5/2015	NE	44.48	NA	NA	NA	401.00		0.0	*
2Q15		4/2/2015	NE	45.81	NA	NA	NA	399.67		0.6	*
3Q15		7/6/2015	NE	45.17	NA	NA	NA	400.31		0.0	*
PZ-1-101											
4Q12	445.52	10/1/2012	NE	42.95	NA	NA	NA	402.57	354.52 - 344.52 (91.00 - 101.00)	0.0	*
1Q13		1/3/2013	NE	44.21	NA	NA	NA	401.31		0.0	*
2Q13		4/1/2013	NE	45.04	NA	NA	NA	400.48		0.1	*
3Q13		7/1/2013	NE	42.50	NA	NA	NA	403.02		0.0	*
4Q13		10/1/2013	NE	42.50	NA	NA	NA	403.02		0.6	*
1Q14		2/10/2014	NE	44.69	NA	NA	NA	400.83		0.4	*
2Q14		4/1/2014	NE	45.17	NA	NA	NA	400.35		0.0	*
3Q14		7/1/2014	NE	44.69	NA	NA	NA	400.83		3.6	*
4Q14	445.49	10/1/2014	NE	43.74	NA	NA	NA	401.75	354.52 - 344.52 (90.97 - 100.97)	0.1	*
1Q15		1/5/2015	NE	44.36	NA	NA	NA	401.13		0.0	*
2Q15		4/2/2015	NE	45.67	NA	NA	NA	399.82		0.0	*
3Q15		7/6/2015	NE	45.04	NA	NA	NA	400.45		0.0	*
PZ-2-70.5											
4Q12	443.15	10/1/2012	NE	41.32	NA	NA	NA	401.83	382.65 - 372.65 (60.50 - 70.50)	0.0	*
1Q13		1/3/2013	NE	42.40	NA	NA	NA	400.75		0.0	*
2Q13		4/1/2013	NE	43.03	NA	NA	NA	400.12		8.4	*
3Q13		7/1/2013	NE	40.13	NA	NA	NA	403.02		0.0	*
4Q13		10/1/2013	NE	40.22	NA	NA	NA	402.93		212.2	*
1Q14		2/10/2014	NE	43.11	NA	NA	NA	400.04		12.5	*
2Q14		4/2/2014	NE	43.53	NA	NA	NA	399.62		44.6	*
3Q14		7/1/2014	NE	42.58	NA	NA	NA	400.57		1.1	*
4Q14	443.06	10/1/2014	NE	41.50	NA	NA	NA	401.56	382.65 - 372.65 (60.41 - 70.41)	143.5	*
1Q15		1/5/2015	NE	42.60	NA	NA	NA	400.46		66.0	*
2Q15		4/2/2015	NE	44.18	NA	NA	NA	398.88		3.7	*
3Q15		7/6/2015	NE	43.43	NA	NA	NA	399.63		41.8	*

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TABLE 1a
QUARTERLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & QUARTER	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
PZ-2-84											
4Q12	443.12	10/1/2012	NE	41.21	NA	NA	NA	401.91	371.12 - 359.12 (72.00 - 84.00)	0.0	*
1Q13		1/3/2013	NE	42.32	NA	NA	NA	400.80		0.0	*
2Q13		4/1/2013	NE	42.95	NA	NA	NA	400.17		0.0	*
3Q13		7/1/2013	NE	40.03	NA	NA	NA	403.09		0.4	*
4Q13		10/1/2013	NE	40.55	NA	NA	NA	402.57		0.0	*
1Q14		2/10/2014	NE	43.02	NA	NA	NA	400.10		0.5	*
2Q14		4/2/2014	NE	43.47	NA	NA	NA	399.65		0.0	*
3Q14		7/1/2014	NE	42.45	NA	NA	NA	400.67		1.2	*
4Q14	443.00	10/1/2014	NE	41.39	NA	NA	NA	401.61	371.12 - 359.12 (71.88 - 83.88)	0.0	*
1Q15		1/5/2015	NE	42.50	NA	NA	NA	400.50		85.5	*
2Q15		4/2/2015	NE	44.08	NA	NA	NA	398.92		5.2	*
3Q15		7/6/2015	NE	43.28	NA	NA	NA	399.72		44.7	*

NOTES:
1) Elevations presented in this table are relative to the NAVD 88 datum.
2) The corrected water level elevations presented in this table were corrected by a specific gravity of 0.80 for the wells in which LNAPL was identified.
3) PID values measured with a 10.6 electron volt (eV) lamp photoionization detector.
4) NA = Not Applicable; NE = Not Encountered; NM = Not Measured
5) * Indicates that the LNAPL and/or water level is above the top of the screened interval of the well.
6) Table includes comprehensive groundwater monitoring well gauging data from the combined Village of Roxana Interim Groundwater Monitoring Program and the WRB Refining LP Wood River Refinery Program.
7) Wells in the WRR were resurveyed during 4Q14.

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TABLE 1b
3Q15 WEEKLY/MONTHLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & EVENT	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
MW-01											
Monthly	442.65	8/4/2015	NE	42.15	NA	NA	NA	400.50	393.85 - 383.85 (48.80 - 58.80)	0.0	*
		9/2/2015	NE	41.51	NA	NA	NA	401.14		0.0	*
MW-02											
Monthly	443.77	8/4/2015	NE	43.73	NA	NA	NA	400.04	393.90 - 383.90 (49.87 - 59.87)	17.6	*
		9/2/2015	NE	43.04	NA	NA	NA	400.73		141.0	*
MW-03											
Monthly	430.08	8/4/2015	NE	28.74	NA	NA	NA	401.34	395.41 - 385.41 (34.67 - 44.67)	0.0	*
		9/2/2015	NE	28.22	NA	NA	NA	401.86		0.0	*
MW-04											
Monthly	441.14	8/4/2015	NE	40.46	NA	NA	NA	400.68	396.08 - 386.08 (45.06 - 55.06)	32.6	*
		9/2/2015	NE	39.88	NA	NA	NA	401.26		12.0	*
MW-05											
Monthly	429.80	8/3/2015	NE	28.54	NA	NA	NA	401.26	395.83 - 385.83 (33.97 - 43.97)	0.1	*
		9/2/2015	NE	28.03	NA	NA	NA	401.77		0.2	*
MW-06A											
Monthly	432.14	8/4/2015	NM	NM	NA	NA	NA	NA	397.31 - 387.31 (34.83 - 44.83)	NM	Well inaccessible due to construction
		9/2/2015	NE	30.23	NA	NA	NA	401.91		0.0	*
MW-06B											
Monthly	432.29	8/4/2015	NM	NM	NA	NA	NA	NA	368.24 - 363.24 (64.05 - 69.05)	NM	Well inaccessible due to construction
		9/2/2015	NE	30.27	NA	NA	NA	402.02		0.0	*
MW-06C											
Monthly	432.11	8/4/2015	NM	NM	NA	NA	NA	NA	347.16 - 342.16 (84.95 - 89.95)	NM	Well inaccessible due to construction
		9/2/2015	NE	30.07	NA	NA	NA	402.04		0.0	*
MW-06D											
Monthly	431.99	8/4/2015	NM	NM	NA	NA	NA	NA	327.27 - 322.27 (104.72 - 109.72)	NM	Well inaccessible due to construction
		9/2/2015	NE	29.90	NA	NA	NA	402.09		0.0	*
MW-07											
Monthly	443.10	8/3/2015	NE	41.71	NA	NA	NA	401.39	400.18 - 390.18 (42.92 - 52.92)	9.0	*
		9/2/2015	NE	42.11	NA	NA	NA	400.99		0.0	*
MW-08											
Monthly	434.11	8/4/2015	NE	33.21	NA	NA	NA	400.90	400.51 - 390.51 (33.60 - 43.60)	70.4	*
		9/2/2015	NE	32.69	NA	NA	NA	401.42		401.0	*
MW-09											
Monthly	445.20	8/3/2015	NE	43.83	NA	NA	NA	401.37	398.75 - 388.75 (46.45 - 56.45)	0.0	*
		9/1/2015	NE	42.98	NA	NA	NA	402.22		0.0	*
MW-10											
Monthly	445.03	8/3/2015	NE	44.07	NA	NA	NA	400.96	400.60 - 390.60 (44.43 - 54.43)	0.1	*
		9/1/2015	NE	43.16	NA	NA	NA	401.87		0.2	*
MW-11											
Monthly	442.33	8/4/2015	NE	41.33	NA	NA	NA	401.00	400.67 - 390.67 (41.66 - 51.66)	0.0	*
		9/2/2015	NE	40.56	NA	NA	NA	401.77		0.0	*
MW-12											
Monthly	442.60	8/4/2015	NE	41.65	NA	NA	NA	400.95	400.68 - 390.68 (41.92 - 51.92)	0.0	*
		9/2/2015	NE	40.98	NA	NA	NA	401.62		0.0	*
MW-14											
Monthly	434.44	8/4/2015	NE	32.91	NA	NA	NA	401.53	401.02 - 391.02 (33.42 - 43.42)	39.7	*
		9/1/2015	NE	32.41	NA	NA	NA	402.03		8.9	*
MW-16											
Monthly	443.39	8/4/2015	NE	43.16	NA	NA	NA	400.23	406.33 - 396.33 (37.06 - 47.06)	0.6	
		9/2/2015	NE	42.44	NA	NA	NA	400.95		12.2	
MW-17											
Monthly	441.57	8/3/2015	NE	41.74	NA	NA	NA	399.83	407.28 - 392.28 (34.29 - 49.29)	0.0	
		9/2/2015	NE	40.82	NA	NA	NA	400.75		0.0	
MW-18											
Monthly	442.04	8/3/2015	NE	42.42	NA	NA	NA	399.62	407.12 - 392.12 (34.92 - 49.92)	0.0	
		9/2/2015	NE	41.54	NA	NA	NA	400.50		0.3	
MW-19											
Weekly	442.77	7/15/2015	NE	43.82	NA	NA	NA	398.95	406.43 - 391.43 (36.34 - 51.34)	0.2	
		7/20/2015	NE	43.42	NA	NA	NA	399.35		0.0	
		7/28/2015	NE	43.16	NA	NA	NA	399.61		0.0	
Monthly		8/3/2015	NE	42.90	NA	NA	NA	399.87		0.0	
Weekly		8/12/2015	NE	42.66	NA	NA	NA	400.11		0.0	
		8/18/2015	NE	42.36	NA	NA	NA	400.41		0.0	
		8/24/2015	NE	42.30	NA	NA	NA	400.47		0.0	
Monthly		9/2/2015	NE	42.11	NA	NA	NA	400.66		8.2	
Weekly		9/9/2015	NE	41.98	NA	NA	NA	400.79		0.0	
		9/14/2015	NE	41.92	NA	NA	NA	400.85		0.0	
		9/22/2015	NE	41.63	NA	NA	NA	401.14		0.0	
MW-20											
Monthly	443.67	8/3/2015	NE	43.77	NA	NA	NA	399.90	407.79 - 392.79 (35.88 - 50.88)	0.0	
		9/2/2015	NE	43.00	NA	NA	NA	400.67		0.1	
MW-21											
Monthly	443.67	8/3/2015	NE	43.81	NA	NA	NA	400.00	408.80 - 393.80 (35.01 - 50.01)	1.2	
		9/2/2015	NE	43.08	NA	NA	NA	400.73		0.0	

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TABLE 1b
3Q15 WEEKLY/MONTHLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & EVENT	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
MW-22											
Weekly	442.16	7/15/2015	NE	42.63	NA	NA	NA	399.53	404.28 - 394.28 (37.88 - 47.88)	0.2	
		7/20/2015	NE	42.35	NA	NA	NA	399.81		0.0	
		7/28/2015	NE	42.08	NA	NA	NA	400.08		0.0	
Monthly		8/4/2015	NE	41.80	NA	NA	NA	400.36		0.0	
Weekly		8/12/2015	NM	NM	NA	NA	NA	NA		NM	Well inaccessible, car parked on well
		8/18/2015	NE	41.24	NA	NA	NA	400.92		0.0	
		8/24/2015	NE	41.17	NA	NA	NA	400.99		0.0	
Monthly		9/1/2015	NM	NM	NA	NA	NA	NA		NM	Well inaccessible, car parked on well
Weekly		9/9/2015	NM	NM	NA	NA	NA	NA		NM	Well inaccessible, car parked on well
		9/14/2015	NE	42.91	NA	NA	NA	399.25		0.0	
		9/22/2015	NE	40.72	NA	NA	NA	401.44		0.0	
MW-23											
Monthly	431.41	8/4/2015	NE	29.20	NA	NA	NA	402.21	402.39 - 392.39 (29.02 - 39.02)	0.5	
		9/2/2015	NE	28.84	NA	NA	NA	402.57		0.8	*
MW-24											
Monthly	443.42	8/4/2015	NE	42.55	NA	NA	NA	400.87	404.53 - 394.53 (38.89 - 48.89)	0.0	
		9/2/2015	NE	41.80	NA	NA	NA	401.62		1.6	
MW-25											
Monthly	438.35	8/3/2015	NE	37.56	NA	NA	NA	400.79	402.76 - 392.76 (35.59 - 45.59)	0.0	
		9/2/2015	NE	36.98	NA	NA	NA	401.37		2.9	
MW-26											
Monthly	441.02	8/4/2015	NE	40.46	NA	NA	NA	400.56	402.87 - 392.87 (38.15 - 48.15)	0.3	
		9/2/2015	NE	39.83	NA	NA	NA	401.19		1.6	
MW-27											
Monthly	443.40	8/3/2015	NE	42.27	NA	NA	NA	401.13	403.61 - 393.61 (39.79 - 49.79)	0.0	
		9/1/2015	NE	41.11	NA	NA	NA	402.29		0.2	
MW-28											
Monthly	443.34	8/3/2015	NE	41.87	NA	NA	NA	401.47	409.73 - 399.73 (33.61 - 43.61)	0.0	
		9/1/2015	NE	40.78	NA	NA	NA	402.56		0.0	
P-54											
Monthly	442.32	8/4/2015	NE	41.10	NA	NA	NA	401.22	404.32 - 379.32 (38.00 - 63.00)	0.0	
		9/2/2015	NE	40.38	NA	NA	NA	401.94		0.0	
P-55R											
Weekly	443.78	7/7/2015	44.16	44.27	399.52	399.63	0.11	399.61	403.36 - 393.36 (40.43 - 50.43)	0.3	
		7/15/2015	43.93	44.08	399.71	399.86	0.15	399.83		397.3	
		7/20/2015	43.71	43.72	400.07	400.08	0.01	400.08		364.4	
		7/28/2015	43.49	43.63	400.16	400.30	0.14	400.27		29.7	
Monthly		8/4/2015	43.27	43.38	400.41	400.52	0.11	400.50		60.2	
Weekly		8/12/2015	42.93	43.08	400.71	400.86	0.15	400.83		398.2	
		8/18/2015	42.60	42.68	401.11	401.19	0.08	401.17		178.0	
		8/24/2015	42.56	42.65	401.14	401.23	0.09	401.21		53.8	
Monthly		9/1/2015	42.35	42.54	401.25	401.44	0.19	401.40		207.2	
Weekly		9/9/2015	42.27	42.46	401.32	401.51	0.19	401.47		24.0	
		9/14/2015	42.24	42.50	401.28	401.54	0.26	401.49		186.6	
		9/22/2015	42.05	42.43	401.35	401.73	0.38	401.65		283.0	
P-56											
Monthly	446.14	8/4/2015	NE	46.33	NA	NA	NA	399.81	405.32 - 380.32 (40.82 - 65.82)	0.1	
		9/1/2015	NE	45.55	NA	NA	NA	400.59		0.3	
P-57											
Monthly	446.96	8/4/2015	NE	47.02	NA	NA	NA	399.94	402.77 - 392.77 (44.19 - 54.19)	0.1	
		9/1/2015	NE	46.34	NA	NA	NA	400.62		3.2	
P-58											
Monthly	444.94	8/4/2015	NE	44.76	NA	NA	NA	400.18	404.73 - 379.73 (40.21 - 65.21)	0.1	
		9/1/2015	NE	44.13	NA	NA	NA	400.81		0.2	
P-59											
Monthly	446.86	8/4/2015	NE	47.22	NA	NA	NA	399.64	398.95 - 373.95 (47.91 - 72.91)	180.5	*
		9/1/2015	NE	46.41	NA	NA	NA	400.45		269.7	*
P-60											
Weekly	446.57	7/7/2015	47.61	47.75	398.94	399.08	0.14	399.05	403.24 - 383.24 (43.45 - 63.45)	0.0	
		7/15/2015	47.35	47.44	399.25	399.34	0.09	399.32		406.4	
		7/20/2015	NE	47.11	NA	NA	NA	399.58		206.7	
		7/28/2015	46.89	46.96	399.73	399.80	0.07	399.79		33.1	
Monthly		8/4/2015	46.65	46.72	399.97	400.04	0.07	400.03		104.6	
Weekly		8/12/2015	46.34	46.40	400.29	400.35	0.06	400.34		514.8	
		8/18/2015	46.00	46.07	400.62	400.69	0.07	400.68		109.6	
		8/24/2015	45.95	46.03	400.66	400.74	0.08	400.72		417.0	
Monthly		9/1/2015	45.72	45.79	400.90	400.97	0.07	400.96		22.7	
Weekly		9/9/2015	45.65	45.73	400.84	400.92	0.08	400.91		91.6	
		9/14/2015	45.66	45.73	400.84	400.91	0.07	400.90		120.9	
		9/22/2015	45.44	45.52	401.05	401.13	0.08	401.12		105.8	
P-60-11											
Monthly	446.26	8/4/2015	NE	45.48	NA	NA	NA	400.78	413.11 - 383.11 (33.15 - 63.15)	0.1	
		9/1/2015	NE	44.55	NA	NA	NA	401.71		5.5	
P-60-12											
Monthly	443.43	8/4/2015	NE	43.47	NA	NA	NA	399.96	383.43 - 373.43 (60.00 - 70.00)	35.5	*
		9/1/2015	NE	42.56	NA	NA	NA	400.87		0.2	*

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TABLE 1b
3Q15 WEEKLY/MONTHLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & EVENT	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
P-60-12S											
Monthly	443.43	8/4/2015	NE	NE	NA	NA	NA	NA	429.59 - 419.59 (13.84 - 23.84)	0.1	
		9/1/2015	NE		NA	NA	NA	NA		0.2	
P-60-13											
Monthly	442.92	8/4/2015	NE	40.87	NA	NA	NA	402.05	402.92 - 382.92 (40.00 - 60.00)	3.4	
		9/1/2015	NE	40.35	NA	NA	NA	402.57		0.2	
P-60-13S											
Monthly	442.90	8/4/2015	NE	17.31	NA	NA	NA	425.59	432.90 - 422.90 (10.00 - 20.00)	0.0	
		9/1/2015	NE	17.53	NA	NA	NA	425.37		0.2	
P-60-S											
Weekly	446.84	7/7/2015	46.84	46.90	399.94	400.00	0.06	399.99	410.36 - 395.36 (36.48 - 51.48)	0.0	
		7/15/2015	46.65	46.70	400.14	400.19	0.05	400.18		0.8	
		7/20/2015	NE	46.53	NA	NA	NA	400.31		0.3	
		7/28/2015	NE	46.39	NA	NA	NA	400.45		0.3	
Monthly		8/4/2015	NE	46.19	NA	NA	NA	400.65		0.4	
Weekly		8/12/2015	NE	45.96	NA	NA	NA	400.88		2.0	
		8/18/2015	NE	45.62	NA	NA	NA	401.22		0.0	
		8/24/2015	NE	45.56	NA	NA	NA	401.28		0.2	
Monthly		9/1/2015	NE	45.29	NA	NA	NA	401.55		0.3	
Weekly		9/9/2015	NE	45.12	NA	NA	NA	401.72		0.0	
		9/14/2015	NE	45.10	NA	NA	NA	401.74		0.5	
		9/22/2015	NE	44.95	NA	NA	NA	401.89		0.0	
P-66											
Monthly	436.81	8/4/2015	NE	36.15	NA	NA	NA	400.66	402.09 - 377.09 (34.72 - 59.72)	0.4	
		9/1/2015	NE	35.61	NA	NA	NA	401.20		0.0	
P-68											
Weekly	445.18	7/7/2015	46.33	46.41	398.77	398.85	0.08	398.83	399.92 - 374.92 (45.26 - 70.26)	6.9	
		7/15/2015	46.05	46.11	399.07	399.13	0.06	399.12		225.5	
		7/20/2015	45.83	45.89	399.29	399.35	0.06	399.34		9.3	
		7/28/2015	45.59	45.65	399.53	399.59	0.06	399.58		48.8	
Monthly		8/4/2015	45.35	45.43	399.75	399.83	0.08	399.81		142.5	
Weekly		8/12/2015	45.02	45.09	400.09	400.16	0.07	400.15		229.4	*
		8/18/2015	44.67	44.75	400.43	400.51	0.08	400.49		305.9	*
		8/24/2015	44.64	44.72	400.46	400.54	0.08	400.52		213.9	*
Monthly		9/1/2015	44.44	44.50	400.68	400.74	0.06	400.73		199.5	*
Weekly		9/9/2015	44.33	44.40	400.78	400.85	0.07	400.84		244.9	*
		9/14/2015	44.33	44.40	400.78	400.85	0.07	400.84		192.7	*
		9/22/2015	44.10	44.17	401.01	401.08	0.07	401.07		209.7	*
P-74											
Monthly	442.72	8/4/2015	NE	43.31	NA	NA	NA	399.41	398.29 - 373.29 (44.43 - 69.43)	1.1	*
		9/1/2015	NE	42.47	NA	NA	NA	400.25		0.6	*
P-93A											
Monthly	445.12	8/4/2015	NE	45.16	NA	NA	NA	399.96	402.05 - 392.05 (43.07 - 53.07)	0.1	
		9/1/2015	NE	44.49	NA	NA	NA	400.63		0.1	
P-93B											
Monthly	446.52	8/4/2015	NE	46.56	NA	NA	NA	399.96	371.92 - 369.92 (74.60 - 76.60)	1.4	*
		9/1/2015	NE	46.04	NA	NA	NA	400.48		0.3	*
P-93C											
Monthly	446.28	8/4/2015	NE	46.35	NA	NA	NA	399.93	353.81 - 348.81 (92.47 - 97.47)	0.8	*
		9/1/2015	NE	45.68	NA	NA	NA	400.60		1.7	*
P-93D											
Monthly	446.73	8/4/2015	NE	46.74	NA	NA	NA	399.99	320.98 - 318.98 (125.75 - 127.75)	0.1	*
		9/1/2015	NE	46.11	NA	NA	NA	400.62		0.2	*
PZ-1-85											
Monthly	445.48	8/3/2015	NE	44.14	NA	NA	NA	401.34	369.70 - 359.70 (75.78 - 85.78)	0.8	*
		9/1/2015	NE	43.31	NA	NA	NA	402.17		25.8	*
PZ-1-101											
Monthly	445.49	8/3/2015	NE	44.03	NA	NA	NA	401.46	354.52 - 344.52 (90.97 - 100.97)	0.0	*
		9/1/2015	NE	43.19	NA	NA	NA	402.30		1.3	*
PZ-2-70.5											
Monthly	443.06	8/4/2015	NE	42.14	NA	NA	NA	400.92	382.65 - 372.65 (60.41 - 70.41)	1.6	*
		9/2/2015	NE	41.48	NA	NA	NA	401.58		1.4	*
PZ-2-84											
Monthly	443.00	8/4/2015	NE	42.02	NA	NA	NA	400.98	371.12 - 359.12 (71.88 - 83.88)	0.3	*
		9/2/2015	NE	41.34	NA	NA	NA	401.66		0.0	*
GP-9-PZ											
Monthly	442.56	8/4/2015	NE	43.80	NA	NA	NA	398.76	404.96 - 394.96 (37.60 - 47.60)	0.1	
		9/1/2015	NE	42.01	NA	NA	NA	400.55		0.2	

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TABLE 1b
3Q15 WEEKLY/MONTHLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & EVENT	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
ROST-3-MW											
Weekly	442.29	7/15/2015	NE	42.39	NA	NA	NA	399.90	404.48 - 394.48 (37.81 - 47.81)	0.4	
Weekly		7/20/2015	NE	42.15	NA	NA	NA	400.14		0.0	
Weekly		7/28/2015	NE	41.91	NA	NA	NA	400.38		0.0	
Monthly		8/4/2015	NE	41.64	NA	NA	NA	400.65		0.0	
Weekly		8/12/2015	NE	41.38	NA	NA	NA	400.91		0.5	
Weekly		8/18/2015	NE	41.07	NA	NA	NA	401.22		0.6	
Weekly		8/24/2015	NE	41.00	NA	NA	NA	401.29		0.1	
Monthly		9/2/2015	NE	40.79	NA	NA	NA	401.50		0.0	
Weekly		9/9/2015	NE	40.75	NA	NA	NA	401.54		0.0	
Weekly		9/14/2015	NE	40.73	NA	NA	NA	401.56		0.0	
Weekly		9/22/2015	NE	40.57	NA	NA	NA	401.72		0.0	
ROST-4-PZ											
Weekly	442.13	7/15/2015	NE	41.72	NA	NA	NA	400.41	407.20 - 397.20 (34.93 - 44.93)	0.2	
Weekly		7/20/2015	NE	41.56	NA	NA	NA	400.57		0.0	
Weekly		7/28/2015	NE	41.42	NA	NA	NA	400.71		0.0	
Monthly		8/4/2015	NE	41.22	NA	NA	NA	400.91		0.0	
Weekly		8/12/2015	NE	40.96	NA	NA	NA	401.17		0.2	
Weekly		8/18/2015	NE	40.63	NA	NA	NA	401.50		0.0	
Weekly		8/24/2015	NE	40.50	NA	NA	NA	401.63		0.0	
Monthly		9/2/2015	NE	40.18	NA	NA	NA	401.95		0.0	
Weekly		9/9/2015	NE	40.08	NA	NA	NA	402.05		0.0	
Weekly		9/14/2015	NE	40.00	NA	NA	NA	402.13		0.0	
Weekly		9/22/2015	NE	39.85	NA	NA	NA	402.28		0.0	
ROST-4-PZ(A)											
Weekly	442.11	7/15/2015	NE	41.99	NA	NA	NA	400.12	407.34 - 397.34 (34.77 - 44.77)	0.2	
Weekly		7/20/2015	NE	41.54	NA	NA	NA	400.57		0.0	
Weekly		7/28/2015	NE	41.35	NA	NA	NA	400.76		0.0	
Monthly		8/3/2015	NE	41.18	NA	NA	NA	400.93		0.4	
Weekly		8/12/2015	NE	40.94	NA	NA	NA	401.17		0.0	
Weekly		8/18/2015	NE	40.59	NA	NA	NA	401.52		0.0	
Weekly		8/24/2015	NE	40.57	NA	NA	NA	401.54		0.6	
Monthly		9/1/2015	NE	40.32	NA	NA	NA	401.79		3.6	
Weekly		9/9/2015	NE	40.35	NA	NA	NA	401.76		0.0	
Weekly		9/14/2015	NE	40.21	NA	NA	NA	401.90		0.0	
Weekly		9/22/2015	NE	40.06	NA	NA	NA	402.05		0.0	
ROST-4-PZ(B)											
Weekly	442.38	7/15/2015	NE	41.60	NA	NA	NA	400.78	407.33 - 397.33 (35.05 - 45.05)	0.8	
Weekly		7/20/2015	NE	41.34	NA	NA	NA	401.04		36.9	
Weekly		7/28/2015	NE	41.01	NA	NA	NA	401.37		0.0	
Monthly		8/3/2015	NE	40.80	NA	NA	NA	401.58		0.0	
Weekly		8/12/2015	NE	40.54	NA	NA	NA	401.84		0.6	
Weekly		8/18/2015	NE	40.31	NA	NA	NA	402.07		0.0	
Weekly		8/24/2015	NE	40.15	NA	NA	NA	402.23		0.0	
Monthly		9/1/2015	NE	39.89	NA	NA	NA	402.49		0.0	
Weekly		9/9/2015	NE	39.79	NA	NA	NA	402.59		0.0	
Weekly		9/14/2015	NE	39.67	NA	NA	NA	402.71		0.0	
Weekly		9/22/2015	NE	39.52	NA	NA	NA	402.86		0.0	
ROST-4-PZ(C)											
Weekly	442.66	7/15/2015	NE	42.64	NA	NA	NA	400.02	407.71 - 397.71 (34.95 - 44.95)	0.3	
Weekly		7/20/2015	NE	42.49	NA	NA	NA	400.17		0.0	
Weekly		7/28/2015	NE	42.33	NA	NA	NA	400.33		0.0	
Monthly		8/4/2015	NE	42.14	NA	NA	NA	400.52		0.0	
Weekly		8/12/2015	NE	41.91	NA	NA	NA	400.75		0.0	
Weekly		8/18/2015	NE	41.56	NA	NA	NA	401.10		0.0	
Weekly		8/24/2015	NE	41.44	NA	NA	NA	401.22		0.0	
Monthly		9/2/2015	NE	41.11	NA	NA	NA	401.55		0.0	
Weekly		9/9/2015	NE	41.02	NA	NA	NA	401.64		0.0	
Weekly		9/14/2015	NE	40.93	NA	NA	NA	401.73		0.0	
Weekly		9/22/2015	NE	40.76	NA	NA	NA	401.90		0.0	
ROST-4-PZ(D)											
Weekly	442.98	7/15/2015	NE	42.48	NA	NA	NA	400.50	408.01 - 398.01 (34.97 - 44.97)	0.3	
Weekly		7/20/2015	NE	42.31	NA	NA	NA	400.67		0.0	
Weekly		7/28/2015	NE	42.17	NA	NA	NA	400.81		0.0	
Monthly		8/4/2015	NE	41.98	NA	NA	NA	401.00		0.0	
Weekly		8/12/2015	NE	41.77	NA	NA	NA	401.21		0.1	
Weekly		8/18/2015	NE	41.39	NA	NA	NA	401.59		0.6	
Weekly		8/24/2015	NE	41.27	NA	NA	NA	401.71		0.0	
Monthly		9/2/2015	NE	40.96	NA	NA	NA	402.02		0.4	
Weekly		9/9/2015	NE	40.87	NA	NA	NA	402.11		0.0	
Weekly		9/14/2015	NE	40.78	NA	NA	NA	402.20		0.0	
Weekly		9/22/2015	NE	40.62	NA	NA	NA	402.36		0.2	

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 1b
3Q15 WEEKLY/MONTHLY GROUNDWATER MONITORING WELL GAUGING RESULTS

WELL ID & EVENT	TOP OF CASING (elev.[1])	DATE GAUGED	DEPTH TO PRODUCT (ft btoc)	DEPTH TO WATER (ft btoc)	WATER-PRODUCT INTERFACE (elev.[1])	PRODUCT (elev.[1])	PRODUCT THICKNESS (ft)	CORRECTED WATER LEVEL[2] (elev.[1])	SCREENED INTERVAL (elev.[1]) (ft btoc)	WELL HEAD PID[3] (ppm)	COMMENTS
ROST-4-PZ(E)											
Weekly	441.96	7/15/2015	41.33	41.36	400.60	400.63	0.03	400.62	407.21 - 397.21 (34.75 - 44.75)	0.3	
		7/20/2015	NE	41.14	NA	NA	NA	400.82		0.0	
		7/28/2015	40.94	40.97	400.99	401.02	0.03	401.01		0.0	
Monthly		8/3/2015	40.74	40.77	401.19	401.22	0.03	401.21		0.0	
Weekly		8/12/2015	40.56	40.59	401.37	401.40	0.03	401.39		0.1	
		8/18/2015	40.24	40.26	401.70	401.72	0.02	401.72		0.0	
		8/24/2015	40.12	40.13	401.83	401.84	0.01	401.84		0.0	
Monthly		9/1/2015	39.79	39.80	402.16	402.17	0.01	402.17		1.2	
Weekly		9/9/2015	39.67	39.68	402.28	402.29	0.01	402.29		0.0	
		9/14/2015	39.60	39.61	402.35	402.36	0.01	402.36		0.0	
		9/22/2015	NE	39.52	NA	NA	NA	402.44		0.6	
ROST-4-PZ(F)											
Weekly	442.12	7/15/2015	NE	40.49	NA	NA	NA	401.63	407.59 - 397.59 (34.53 - 44.53)	0.2	
		7/20/2015	NE	40.42	NA	NA	NA	401.70		0.0	
		7/28/2015	NE	40.34	NA	NA	NA	401.78		0.0	
Monthly		8/3/2015	NE	40.25	NA	NA	NA	401.87		0.0	
Weekly		8/12/2015	NE	40.12	NA	NA	NA	402.00		0.1	
		8/18/2015	NE	39.97	NA	NA	NA	402.15		0.0	
		8/24/2015	NE	39.90	NA	NA	NA	402.22		0.0	
Monthly		9/1/2015	NE	39.71	NA	NA	NA	402.41		0.0	
Weekly		9/9/2015	NE	39.65	NA	NA	NA	402.47		0.0	
		9/14/2015	NE	39.62	NA	NA	NA	402.50		0.0	
		9/22/2015	NE	39.55	NA	NA	NA	402.57		0.2	
ROST-4-PZ(G)											
Weekly	442.13	7/15/2015	NE	42.58	NA	NA	NA	399.55	407.85 - 397.85 (34.28 - 44.28)	0.2	
		7/20/2015	NE	42.28	NA	NA	NA	399.85		0.0	
		7/28/2015	42.03	42.04	400.09	400.10	0.01	400.10		0.0	
Monthly		8/4/2015	NE	41.80	NA	NA	NA	400.33		0.0	
Weekly		8/12/2015	NE	41.54	NA	NA	NA	400.59		0.0	
		8/18/2015	NE	41.19	NA	NA	NA	400.94		0.0	
		8/24/2015	NE	41.14	NA	NA	NA	400.99		0.0	
Monthly		9/2/2015	NE	40.94	NA	NA	NA	401.19		0.0	
Weekly		9/9/2015	NE	40.86	NA	NA	NA	401.27		0.0	
		9/14/2015	NE	40.86	NA	NA	NA	401.27		0.0	
		9/22/2015	NE	40.67	NA	NA	NA	401.46		0.0	
ROST-5-PZ											
Monthly	442.22	8/4/2015	NE	NE	NA	NA	NA	NA	429.02 - 419.02 (13.2 - 23.2)	0.0	Well dry
		9/2/2015	NE	NE	NA	NA	NA	NA		0.3	Well dry
ROST-7-PZ											
Monthly	442.19	8/4/2015	NE	20.33	NA	NA	NA	421.86	422.19 - 412.19 (20.00 - 30.00)	1.8	
		NM	NM	NA	NA	NA	NA	NA		NM	
ROST-10-PZ											
Monthly	444.51	8/4/2015	NE	NE	NA	NA	NA	NA	434.51 - 424.51 (10.00 - 20.00)	0.0	Well dry
		9/2/2015	NE	NE	NA	NA	NA	NA		1.2	Well dry
ROST-21-PZ											
Monthly	443.72	8/4/2015	NE	18.84	NA	NA	NA	424.88	433.72 - 423.72 (10.00 - 20.00)	0.0	
		9/2/2015	NE	19.22	NA	NA	NA	424.50		0.0	
T-12											
Monthly	444.80	8/4/2015	NE	45.16	NA	NA	NA	399.64	398.34 - 372.34 (46.46 - 72.46)	3.0	*
		9/1/2015	NE	44.26	NA	NA	NA	400.54		1.9	*

NOTES:
1) Elevations presented in this table are relative to the 1988 NAVD datum.
2) The corrected water level elevations presented in this table were corrected by a specific gravity of 0.80 for the wells in which LNAPL was identified.
3) PID values measured with a 10.6 electron volt (eV) lamp photoionization detector.
4) NA = Not Applicable; NE = Not Encountered; NM = Not Measured
5) * Indicates that the LNAPL and/or water level is above the top of the screened zone of the well.

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 2a
SUMMARY OF MAIN AQUIFER GROUNDWATER MONITORING WELL FIELD PARAMETERS

Well ID	pH	Temp (C)	Specific Cond (mS/cm)	Turbidity (NTUs)	DO (mg/L)	ORP (mV)	General Notes
MW-01							
4Q12	6.63	18.38	*	5.10	0.00	47	Initial Sample
	7.64	17.47	1.226	6.88	0.00	-12	Confirmation Sample
1Q13	6.73	18.14	*	8.16	0.20	-0.02	
2Q13	6.70	18.71	1.096	7.39	0.01	-117	
3Q13	6.76	19.26	1.068	28.82	0.90	-35	
4Q13	6.71	19.07	1.332	9.26	0.00	-27	
1Q14	6.77	18.29	1.203	9.97	0.00	-3	
2Q14	6.73	18.29	1.145	4.81	0.07	20	
3Q14	6.76	19.63	1.799	7.12	0.00	-59	
4Q14	6.77	18.93	1.170	8.10	0.02	-36	
1Q15	6.75	17.35	1.127	18.42	0.04	-49	
2Q15	6.78	18.34	1.130	0.59	0.08	-68	
3Q15	6.76	18.63	1.274	8.68	0.13	11	
MW-02							
4Q12	6.61	18.86	*	6.41	0.00	-37	
1Q13	6.67	18.53	*	12.39	0.05	-0.11	
2Q13	6.64	20.21	1.204	7.15	0.01	-159	
3Q13	6.76	21.55	1.320	9.69	0.00	-105	
4Q13	6.72	20.79	1.279	5.91	0.00	-99	
1Q14	6.61	19.24	1.256	17.36	0.03	-107	
2Q14	6.68	20.81	1.280	16.03	0.09	-105	
3Q14	6.74	21.58	*	8.24	0.00	-99	
4Q14	6.67	20.16	1.438	5.95	0.00	-116	
1Q15	6.80	19.08	1.486	4.72	0.02	-146	
2Q15	6.86	20.39	1.390	0.00	0.07	-115	
3Q15	6.77	21.71	1.317	13.95	0.01	-106	
MW-03							
4Q12	6.80	20.10	*	1.81	0.00	-61	
1Q13	6.88	19.17	1.333	2.67	0.01	-243	
2Q13	6.92	19.83	1.078	2.64	0.02	-207	
3Q13	6.99	20.05	1.084	8.73	0.00	-143	
4Q13	6.93	19.92	1.402	9.94	0.00	-123	
1Q14	6.90	18.04	1.689	8.24	0.01	-125	Initial Sample
	6.95	18.63	1.373	6.56	0.24	-143	Confirmation Sample
2Q14	6.85	19.35	1.267	1.91	0.64	-137	
3Q14	6.95	20.06	*	8.43	0.00	-134	
4Q14	6.92	18.95	1.352	3.87	0.00	-142	
1Q15	7.02	16.89	1.153	7.82	0.00	-152	
2Q15	6.94	19.39	1.542	0.87	0.02	-140	
3Q15	7.02	19.81	1.348	3.45	0.04	-157	
MW-04							
4Q12	6.78	19.13	*	8.68	0.00	-66	
1Q13	6.83	18.75	*	25.45	0.21	-113	Initial Sample
	7.26	18.37	1.296	6.07	0.04	-108	Confirmation Sample
2Q13	6.81	19.74	1.283	8.50	0.00	-151	
3Q13	6.76	20.36	1.481	8.03	0.00	-105	
4Q13	6.79	18.67	1.505	8.67	0.00	-103	
1Q14	6.84	17.90	1.457	9.36	0.00	-113	
2Q14	6.81	18.59	1.434	7.85	0.00	-99	
3Q14	6.85	19.57	*	8.29	0.00	-116	
4Q14	6.86	18.96	1.315	9.22	0.00	-120	
1Q15	6.92	18.28	1.177	28.46	0.03	-110	
2Q15	7.02	18.60	1.660	16.36	0.00	-77	
3Q15	6.96	20.69	1.230	16.98	0.00	-120	
MW-05							
4Q12	6.79	18.67	*	8.72	0.00	-67	
1Q13	6.83	19.18	*	11.85	0.04	-124	
2Q13	6.79	19.64	1.010	8.72	0.00	-166	
3Q13	6.85	20.57	1.113	12.87	0.00	-129	
4Q13	6.86	19.97	1.115	9.55	0.00	-114	
1Q14	6.82	17.75	1.142	28.73	0.00	-119	
2Q14	6.77	20.42	1.165	8.64	0.00	-126	
3Q14	6.79	19.91	*	9.32	0.00	-118	
4Q14	6.83	19.07	1.209	18.04	0.00	-125	
1Q15	6.90	17.89	1.222	17.31	0.00	-132	
2Q15	6.77	19.24	1.410	0.00	0.03	-128	
3Q15	6.76	21.54	1.552	8.31	0.02	-130	
MW-06A							
4Q12	6.65	19.52	*	8.32	0.00	-57	
1Q13	7.00	20.21	0.690	20.50	0.02	-132	
2Q13	6.84	18.96	0.848	7.09	0.00	-255	
3Q13	6.77	20.15	0.928	9.62	0.00	-128	
4Q13	6.67	19.52	1.339	9.08	0.00	-116	
1Q14	6.72	17.88	1.418	8.64	0.00	-114	
2Q14	6.58	19.29	1.852	9.74	0.05	-128	
3Q14	6.69	19.70	*	7.30	0.00	-114	
4Q14	6.69	19.14	1.594	24.72	0.02	-123	
1Q15	6.72	17.00	1.698	151.20	0.00	-117	
2Q15	6.78	18.57	1.548	8.35	0.07	-108	
3Q15	6.50	19.73	1.758	27.24	0.00	-99	
MW-06B							
4Q12	6.89	19.49	*	7.40	0.00	-34	
1Q13	6.82	18.11	1.127	7.34	0.00	-79	
2Q13	6.80	18.21	1.557	1.11	0.04	-132	
3Q13	6.92	19.68	1.210	9.92	0.19	-85	
4Q13	6.89	18.56	1.424	7.08	0.00	-88	
1Q14	6.96	17.14	1.221	17.54	0.01	-88	
2Q14	6.93	18.42	1.203	1.60	0.14	-117	
3Q14	6.92	19.60	*	9.10	0.00	-89	
4Q14	6.93	18.62	1.235	9.83	0.09	-94	
1Q15	6.99	16.50	1.150	9.27	0.02	-114	
2Q15	6.98	18.06	1.204	9.72	0.09	-86	
3Q15	6.91	20.80	1.266	4.64	0.00	-92	

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 2a
SUMMARY OF MAIN AQUIFER GROUNDWATER MONITORING WELL FIELD PARAMETERS

Well ID	pH	Temp (C)	Specific Cond (mS/cm)	Turbidity (NTUs)	DO (mg/L)	ORP (mV)	General Notes
MW-06C							
4Q12	6.94	19.04	*	0.51	0.00	-63	
1Q13	6.94	17.60	0.828	6.48	0.01	-103	
2Q13	7.70	18.38	1.051	4.91	0.05	-178	
3Q13	7.03	19.24	1.050	6.30	0.10	-124	
4Q13	6.99	17.83	1.168	8.60	0.00	-122	
1Q14	7.03	17.02	1.153	6.78	0.00	-118	
2Q14	7.01	17.94	1.102	11.44	0.17	-136	
3Q14	7.08	18.97	*	4.81	0.00	-125	
4Q14	7.07	18.22	1.040	8.88	0.06	-128	
1Q15	7.08	16.29	0.970	7.72	0.02	-133	
2Q15	7.13	18.33	0.953	3.49	0.06	-131	
3Q15	7.08	20.21	0.977	0.61	0.04	-126	
MW-06D							
4Q12	7.03	19.07	*	5.16	0.00	-61	
1Q13	7.07	17.15	0.929	6.69	0.00	-116	
2Q13	8.27	18.20	1.131	7.93	0.00	-172	
3Q13	7.04	18.60	1.373	8.93	0.00	-134	
4Q13	6.98	17.47	1.611	8.40	0.00	-124	
1Q14	7.08	16.88	1.424	6.80	0.00	-127	
2Q14	7.05	17.34	1.424	8.46	0.06	-147	
3Q14	7.01	18.57	*	18.02	0.00	-135	
4Q14	7.04	17.79	1.633	9.39	0.04	-142	
1Q15	7.02	16.32	1.464	93.69	0.00	-139	
2Q15	7.10	17.49	1.270	12.27	0.06	-12	
3Q15	7.03	19.07	1.308	36.17	0.00	-140	
MW-07							
4Q12	6.75	18.34	*	6.24	0.17	-15	
1Q13	6.90	18.28	1.056	8.57	0.00	-91	
2Q13	6.86	19.35	1.123	3.37	0.07	-148	
3Q13	6.76	19.76	1.254	21.67	0.09	-91	
4Q13	6.78	18.89	1.442	9.42	0.05	-76	
1Q14	6.88	18.24	1.569	9.44	0.22	-151	
2Q14	6.87	18.98	1.610	8.87	0.07	-89	
3Q14	6.83	20.22	*	9.55	0.05	-93	
4Q14	6.86	19.78	1.606	9.88	0.00	-104	
1Q15	6.91	17.63	1.789	6.77	0.03	-72	
2Q15	6.97	19.00	2.848	8.22	0.06	-64	
3Q15	6.72	20.11	1.585	18.56	0.05	-94	
MW-08							
4Q12	6.52	17.81	*	5.83	0.12	0.0	
1Q13	6.58	17.83	0.863	9.84	0.00	-56	
2Q13	6.50	19.71	0.890	7.19	0.05	-124	
3Q13	6.57	19.86	2.092	8.65	0.07	-60	
4Q13	6.52	18.42	2.225	8.90	0.00	-46	
1Q14	6.59	18.12	1.741	8.77	0.11	-130	
2Q14	6.56	18.82	1.777	9.15	0.02	-65	
3Q14	6.72	19.81	*	8.40	0.00	-95	
4Q14	6.76	19.31	1.772	9.39	0.00	-89	
1Q15	6.70	17.67	1.658	9.76	0.00	-84	
2Q15	6.81	19.46	2.652	6.05	0.05	-62	
3Q15	6.62	20.88	1.485	13.30	0.00	-95	
MW-09							
4Q12	6.69	17.19	*	5.51	0.00	-10	
1Q13	6.73	17.96	1.367	25.29	0.00	-111	
2Q13	6.69	18.01	1.126	9.51	0.00	-125	
3Q13	6.75	18.84	1.213	9.52	0.13	-76	
4Q13	6.71	18.47	1.440	7.91	0.00	-91	
1Q14	6.82	17.06	1.322	0.19	0.02	-54	
2Q14	6.75	17.34	1.273	1.20	0.42	-48	
3Q14	6.75	19.67	*	7.03	0.11	-67	
4Q14	6.73	18.98	1.408	8.14	0.20	-58	
1Q15	6.72	16.83	1.377	4.68	0.01	-59	
2Q15	6.73	18.21	1.421	1.59	0.04	-82	
3Q15	6.75	18.00	1.478	11.86	0.18	-76	
MW-10							
4Q12	6.78	17.36	*	7.57	0.00	-20	Initial Sample
	7.61	17.42	1.222	6.93	0.00	-126	Confirmation Sample
1Q13	6.89	18.36	1.082	9.43	0.00	-173	Initial Sample
	6.88	16.98	*	8.89	0.04	-101	Confirmation Sample
2Q13	6.78	18.85	1.210	8.71	0.02	-260	
3Q13	6.90	20.11	1.360	9.57	0.02	-127	
4Q13	6.92	19.56	1.373	8.91	0.00	-129	
1Q14	6.85	17.17	1.632	9.92	0.01	-124	
2Q14	6.83	17.96	1.734	9.43	0.06	-162	
3Q14	6.89	19.54	*	7.27	0.00	-123	
4Q14	6.83	19.57	1.849	9.85	0.05	-121	
1Q15	6.84	15.93	1.465	15.33	0.14	-110	
2Q15	6.86	18.48	1.825	7.06	0.08	-102	
3Q15	6.81	18.67	1.971	13.36	0.09	-110	
MW-11							
4Q12	6.68	18.82	*	8.44	0.00	-41	
1Q13	6.76	17.64	1.586	1.94	0.00	-179	
2Q13	6.75	18.16	1.313	5.58	0.01	-310	
3Q13	6.78	19.55	1.336	10.06	0.08	-94	
4Q13	6.73	17.76	1.676	9.66	0.00	-98	
1Q14	6.77	16.61	1.587	9.79	0.02	-100	
2Q14	6.74	17.19	1.677	9.63	0.08	-116	
3Q14	6.78	19.16	*	7.69	0.01	-99	
4Q14	6.76	18.19	1.553	12.87	0.00	-121	
1Q15	6.68	15.59	1.604	17.97	0.01	-85	
2Q15	6.79	17.63	1.442	9.62	0.11	-84	
3Q15	6.72	17.47	1.519	13.78	0.11	-82	

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 2a
SUMMARY OF MAIN AQUIFER GROUNDWATER MONITORING WELL FIELD PARAMETERS

Well ID	pH	Temp (C)	Specific Cond (mS/cm)	Turbidity (NTUs)	DO (mg/L)	ORP (mV)	General Notes
MW-12							
4Q12	6.81	19.19	*	6.47	0.00	90	
1Q13	6.79	17.34	1.006	5.83	0.06	1	
2Q13	6.86	19.24	0.958	1.01	0.09	-285	
3Q13	6.85	19.61	1.003	4.21	0.13	261	
4Q13	6.83	18.87	1.030	7.86	0.01	69	
1Q14	6.79	17.15	0.977	4.91	0.14	56	
2Q14	6.80	18.59	0.969	3.00	0.19	98	
3Q14	6.85	19.68	*	9.27	0.20	103	
4Q14	6.84	19.09	1.035	19.80	0.32	202	
1Q15	6.78	16.62	1.091	6.01	0.39	115	
2Q15	6.88	18.04	1.153	5.13	0.15	126	
3Q15	6.90	18.65	0.959	46.10	1.63	161	
MW-13							
4Q12	6.60	20.73	*	9.02	0.04	-35	
1Q13	6.64	18.59	1.019	3.55	0.01	-178	
2Q13	6.60	19.69	1.260	2.35	0.00	-152	
3Q13	6.69	20.60	1.355	9.26	0.04	-122	
4Q13	6.54	19.63	1.527	7.87	0.00	-93	
1Q14	6.75	19.40	1.449	9.22	0.00	-107	
2Q14	6.71	20.02	1.459	3.40	0.00	-115	
3Q14	6.84	20.85	1.494	9.21	0.00	-124	
4Q14	6.72	19.48	1.491	7.92	0.00	-115	
1Q15	6.88	18.38	1.424	84.72	0.05	-110	
2Q15	6.81	20.23	1.415	5.22	0.03	-108	
3Q15	6.82	19.49	1.100	4.91	0.02	-120	
MW-14							
4Q12	6.61	19.59	1.137	7.69	0.03	-129	
1Q13	6.65	18.92	0.804	8.18	0.06	-100	
2Q13	6.48	19.09	1.138	5.68	0.03	-129	
3Q13	6.73	20.30	1.076	4.75	0.24	-113	
4Q13	6.70	19.37	1.262	1.83	0.05	-109	
1Q14	6.66	16.71	1.156	3.11	0.03	-90	
2Q14	6.74	19.27	1.371	2.17	0.65	-107	
3Q14	6.80	21.27	1.093	3.92	0.06	-117	
4Q14	6.74	18.78	1.204	4.11	0.00	-107	
1Q15	6.83	17.81	1.591	2.41	0.03	-92	
2Q15	6.77	19.34	1.490	1.59	0.03	-84	
3Q15	6.80	18.99	0.957	9.92	0.05	-110	
MW-16							
1Q13	*	19.17	0.851	7.03	0.00	-98	Added to Interim GW Monitoring Program in 1Q13
2Q13	6.57	19.56	0.826	0.96	0.03	-288	
3Q13	6.56	21.37	0.986	9.33	0.28	-63	
4Q13	6.49	18.69	1.283	8.13	0.00	-42	
1Q14	6.55	16.61	1.579	9.95	0.05	-66	
2Q14	6.47	19.14	1.466	4.29	0.04	-95	
3Q14	6.55	20.83	*	9.79	0.00	-87	
4Q14	6.61	20.95	1.474	12.38	0.05	-99	
1Q15	6.61	16.64	1.627	1.20	0.01	-98	
2Q15	6.63	19.06	1.792	0.00	0.02	-104	
3Q15	6.64	19.49	1.749	8.67	0.14	-108	
MW-22							
1Q13	11.15	17.69	1.096	9.20	0.00	-111	Added to Interim GW Monitoring Program in 1Q13
2Q13	6.76	19.91	1.150	1.64	0.07	-282	
3Q13	6.74	21.40	1.101	21.29	0.01	-105	
4Q13	6.72	20.53	1.171	9.24	0.02	-107	
1Q14	6.78	19.54	1.115	7.57	0.04	-104	
2Q14	6.75	21.83	1.066	8.03	0.05	-108	
3Q14	6.77	23.02	*	7.61	0.00	-106	
4Q14	6.74	20.55	1.242	10.99	0.00	-108	
1Q15	6.86	18.34	1.124	27.97	0.02	-113	
2Q15	6.71	20.51	1.068	7.14	0.05	-102	
3Q15	6.65	23.12	1.030	15.64	0.15	-121	
MW-23							
1Q15	6.69	16.88	1.168	20.72	0.00	-92	Added to Interim GW Monitoring Program 1Q15
2Q15	6.82	19.15	0.943	8.16	0.00	-111	
3Q15	6.75	18.81	1.096	20.33	0.00	-115	
MW-24							
2Q13	6.73	18.63	1.203	3.04	0.24	-219	Added to Interim GW Monitoring Program in 2Q13
3Q13	6.75	19.12	1.169	9.18	0.34	207	
4Q13	6.75	18.59	1.371	9.32	1.62	74	
1Q14	6.75	16.98	1.338	8.15	0.08	91	
2Q14	6.69	18.35	1.264	1.63	1.34	98	
3Q14	6.79	19.63	*	7.14	1.03	132	
4Q14	6.81	19.40	1.321	7.42	1.89	146	
1Q15	6.88	16.76	1.340	1.60	0.97	67	
2Q15	6.85	18.63	1.374	1.21	0.24	100	
3Q15	6.86	18.93	1.383	17.98	1.00	-107	
MW-25							
4Q14	6.73	20.05	1.786	20.33	0.00	-98	Added to Interim GW Monitoring Program in 4Q14
1Q15	6.83	17.88	1.759	9.14	0.00	-86	
2Q15	6.94	18.87	1.945	4.87	0.00	-69	
3Q15	6.79	20.10	1.280	12.85	0.00	-110	
MW-26							
4Q14	6.81	19.62	1.023	9.02	0.06	53	Added to Interim GW Monitoring Program in 4Q14
1Q15	6.73	17.24	0.841	8.43	0.16	166	
2Q15	6.90	19.04	1.036	0.00	0.10	89	
3Q15	6.84	18.46	0.947	4.19	0.19	184	
MW-27							
4Q14	6.74	18.71	1.322	7.04	1.11	-62	Added to Interim GW Monitoring Program in 4Q14
1Q15	6.89	15.73	1.176	8.67	2.45	-22	
2Q15	6.84	18.94	1.130	22.35	0.43	77	
3Q15	6.82	19.25	1.144	26.42	1.49	11	

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 2a
SUMMARY OF MAIN AQUIFER GROUNDWATER MONITORING WELL FIELD PARAMETERS

Well ID	pH	Temp (C)	Specific Cond (mS/cm)	Turbidity (NTUs)	DO (mg/L)	ORP (mV)	General Notes
MW-28							
4Q14	6.75	18.72	1.420	8.32	0.00	-95	Added to Interim GW Monitoring Program in 4Q14
1Q15	6.70	16.96	2.112	5.76	0.01	-75	
2Q15	6.64	18.28	2.240	1.68	0.00	-100	
3Q15	6.57	20.80	2.785	22.65	0.00	-91	
P-54							
4Q12	6.72	17.62	1.167	4.76	0.17	146	
1Q13	6.75	17.50	1.061	4.97	0.11	-23	
2Q13	6.70	18.08	1.105	2.88	0.11	-96	Initial Sample
	6.73	17.51	1.035	4.36	0.63	165	Confirmation Sample
3Q13	6.80	18.42	1.091	8.66	4.22	293	
4Q13	6.80	18.09	1.475	6.74	2.46	68	
1Q14	6.74	16.08	1.147	7.53	1.40	108	
2Q14	6.69	17.89	1.065	2.80	2.28	140	
3Q14	6.81	19.11	*	1.04	2.50	117	
4Q14	6.76	18.30	1.432	4.50	2.79	173	
1Q15	6.89	15.57	1.339	8.49	3.85	100	
2Q15	6.79	17.29	1.465	11.72	1.96	146	
3Q15	6.87	18.33	1.256	10.69	4.84	135	
P-55R (P-55)							
4Q12	NM	NM	NM	NM	NM	NM	Well damaged. No sample collected.
1Q13	*	17.37	0.635	7.68	0.00	-125	Well Replaced during 4Q12
2Q13	6.86	21.33	0.799	0.06	0.02	-174	
3Q13	6.91	21.72	0.785	9.58	0.01	-133	
4Q13	6.87	21.40	0.950	3.17	0.03	-115	
2Q14	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
4Q14	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
1Q15	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
2Q15	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
3Q15	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
P-56							
4Q12	6.51	22.60	*	7.52	0.02	-7	
1Q13	*	20.98	1.106	4.56	0.00	-47	
2Q13	6.61	22.69	1.218	3.00	0.00	-122	
3Q13	6.70	25.57	1.395	6.56	0.02	-115	
4Q13	6.63	24.88	1.319	1.79	0.01	-91	
1Q14	6.66	21.79	1.248	1.13	0.05	-100	
2Q14	6.68	20.97	1.227	1.79	0.00	-92	
3Q14	6.66	25.62	0.126	8.34	0.04	-107	
4Q14	6.65	23.68	1.243	6.14	0.00	-110	
1Q15	6.75	21.54	1.445	17.99	0.04	-112	
2Q15	6.65	22.76	1.411	1.42	0.00	-102	
3Q15	6.79	24.25	1.709	6.80	0.05	-180	
P-57							
4Q12	6.59	18.72	*	5.19	0.00	-28	
1Q13	*	20.16	1.116	6.22	0.00	-104	
2Q13	6.53	20.78	1.331	6.97	0.00	-146	
3Q13	6.59	22.45	1.235	8.81	0.00	-109	
4Q13	6.60	21.55	1.284	4.52	0.00	-120	
1Q14	6.66	20.29	1.271	9.67	0.00	-178	
2Q14	6.61	21.26	1.309	19.65	0.04	-106	
3Q14	6.63	23.22	*	9.69	0.00	-108	
4Q14	6.62	21.75	1.414	8.91	0.00	-120	
1Q15	6.65	21.28	1.207	20.64	0.00	-85	
2Q15	6.58	22.71	1.319	1.80	0.08	-93	
3Q15	6.65	23.79	1.693	2.14	0.00	-130	
P-58							
4Q12	6.49	18.76	*	8.22	0.00	11	Initial Sample
	7.45	18.15	1.259	13.60	0.01	-112	Confirmation Sample
1Q13	6.57	16.48	0.964	23.26	0.00	-67	
2Q13	6.50	18.92	1.174	23.19	0.03	-109	
3Q13	6.53	21.63	1.201	9.42	0.05	-87	
4Q13	6.52	19.70	1.430	6.70	0.02	-84	
1Q14	6.55	18.92	1.201	8.00	0.04	-163	
2Q14	6.53	19.72	1.187	11.10	0.11	-65	
3Q14	6.60	22.73	*	7.88	0.02	-86	
4Q14	6.58	21.05	1.441	6.77	0.00	-89	
1Q15	6.44	20.05	1.437	4.70	0.02	-80	
	6.47	19.54	1.511	3.21	0.00	-56	
2Q15	6.47	21.90	1.519	4.53	0.09	-48	
3Q15	6.52	26.26	1.719	3.29	0.00	-110	
P-59							
4Q12	6.57	17.90	*	7.16	0.00	14	
1Q13	6.64	16.36	1.208	4.99	0.00	-82	
2Q13	6.54	18.74	1.109	3.91	0.00	-119	
3Q13	6.64	21.34	1.202	3.31	0.05	-107	
4Q13	6.63	20.31	1.318	4.96	0.00	-96	
1Q14	6.57	17.87	1.486	11.88	0.04	-203	
2Q14	6.61	18.96	1.514	17.69	0.18	-92	
3Q14	6.61	23.29	*	6.10	0.00	-105	
4Q14	6.62	21.78	1.361	8.52	0.00	-103	
1Q15	6.58	21.25	1.580	9.89	0.02	-98	
2Q15	6.62	24.48	1.476	9.55	0.05	-87	
3Q15	6.71	29.00	1.723	17.21	0.00	-140	

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 2a
SUMMARY OF MAIN AQUIFER GROUNDWATER MONITORING WELL FIELD PARAMETERS

Well ID	pH	Temp (C)	Specific Cond (mS/cm)	Turbidity (NTUs)	DO (mg/L)	ORP (mV)	General Notes
P-66							
4Q12	6.44	18.80	1.353	21.29	0.00	-161	
1Q13	6.48	19.00	0.943	14.28	0.00	-79	
2Q13	6.40	19.20	1.198	13.65	0.00	-133	
3Q13	6.46	20.78	1.173	8.99	0.04	-81	
4Q13	6.46	20.11	1.429	13.42	0.02	-82	
1Q14	6.44	18.56	1.221	9.76	0.04	-87	
2Q14	6.45	21.06	1.203	7.90	0.00	-83	
3Q14	6.58	22.67	1.065	7.24	0.07	-89	
4Q14	6.50	19.76	1.098	10.97	0.00	-86	
1Q15	6.61	19.11	1.164	35.14	0.03	-74	
2Q15	6.50	20.30	1.058	7.24	0.01	-69	
3Q15	6.50	19.84	0.979	5.92	0.07	-90	
P-68							
4Q12	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
1Q13	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
2Q13	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
3Q13	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
4Q13	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
1Q14	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
2Q14	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
3Q14	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
4Q14	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
1Q15	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
2Q15	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
3Q15	NM	NM	NM	NM	NM	NM	LNAPL encountered in well. No sample collected.
P-74							
4Q12	6.60	18.13	*	14.87	0.00	-22	
1Q13	*	16.88	0.445	24.29	0.00	-39	
2Q13	6.99	16.19	0.175	14.65	1.42	-93	
3Q13	6.92	20.80	0.318	9.99	0.04	-122	
4Q13	6.68	18.27	0.447	19.33	0.00	-81	
1Q14	6.61	16.61	0.686	14.25	0.00	-103	
2Q14	7.36	16.48	0.316	10.22	4.52	-3	
3Q14	6.84	20.10	0.260	9.50	0.06	-133	
4Q14	7.26	18.44	0.165	9.64	7.10	68	
1Q15	6.60	17.61	0.691	5.70	0.00	-129	
2Q15	7.49	19.23	1.885	5.99	3.60	-15	
3Q15	7.02	22.91	0.145	26.68	7.56	-140	
P-93A							
4Q12	6.63	20.47	*	32.40	4.64	15	
1Q13	6.79	20.25	1.198	36.06	4.26	-66	
2Q13	6.85	19.70	1.433	33.41	5.83	-86	
3Q13	6.99	23.07	1.654	36.18	4.25	-83	
4Q13	7.15	26.33	1.618	72.75	5.89	-50	
1Q14	6.99	19.48	1.872	24.97	4.65	-74	
2Q14	7.02	20.74	2.104	18.21	4.97	-60	
3Q14	6.87	21.30	*	10.96	4.31	-50	
4Q14	6.77	20.15	1.949	9.66	3.50	-56	
1Q15	6.84	18.54	1.953	5.56	0.04	-111	
2Q15	6.73	21.51	1.599	9.30	0.18	-7	
3Q15	6.71	22.11	1.620	16.25	0.01	-60	
P-93B							
4Q12	6.77	17.79	*	0.76	0.00	-48	
1Q13	6.80	17.81	1.731	2.92	0.12	-116	
2Q13	6.84	17.21	1.666	3.54	0.97	-99	
3Q13	6.80	20.05	1.644	1.56	0.05	-117	
4Q13	6.85	18.53	1.928	9.70	1.75	-0.10	
1Q14	6.84	15.74	1.605	4.53	1.62	-87	
2Q14	6.93	18.96	1.454	3.43	3.47	-76	
3Q14	6.88	20.02	*	9.67	0.98	-108	
4Q14	6.87	18.71	1.642	2.85	0.18	-115	
1Q15	6.89	15.29	1.583	3.04	0.67	-94	Initial Sample
	6.91	15.48	1.651	4.58	0.02	-105	Confirmation Sample
2Q15	6.82	18.50	1.399	14.68	2.13	-93	
3Q15	6.88	18.65	1.420	0.75	0.04	-120	
P-93C							
4Q12	6.78	18.27	*	0.00	0.02	19	
1Q13	6.91	17.76	0.916	0.83	0.12	-118	
2Q13	6.91	17.09	0.961	0.00	0.89	-74	
3Q13	6.83	20.08	1.550	0.69	0.08	-81	Initial Sample
	6.87	20.60	1.270	0.03	0.08	-111	Confirmation Sample
4Q13	6.91	18.92	1.366	0.28	0.87	-82	
1Q14	6.94	15.83	1.298	0.12	1.88	-67	
2Q14	6.89	18.31	1.308	4.81	0.95	-57	
3Q14	6.92	19.88	*	2.59	2.03	-74	
4Q14	6.91	18.37	1.320	8.93	0.00	-81	
1Q15	6.90	18.02	1.377	73.30	0.00	-104	Initial Sample
	7.04	16.91	1.289	4.15	0.10	-190	Confirmation Sample
2Q15	7.19	20.18	1.144	0.45	0.06	-83	
3Q15	7.02	21.17	1.221	0.41	0.00	-180	
P-93D							
4Q12	7.76	17.20	1.623	2.10	NM	NM	
1Q13	7.07	16.25	1.187	4.91	0.00	-77	
2Q13	7.08	18.02	1.211	3.37	0.17	-111	
3Q13	7.04	21.16	1.306	1.21	0.12	-120	
4Q13	6.98	20.50	1.467	0.43	0.00	-103	
1Q14	6.93	17.14	1.378	0.58	0.04	-274	
2Q14	6.97	17.61	1.378	4.61	0.00	-103	
3Q14	7.01	20.51	*	5.34	0.00	-127	
4Q14	6.91	18.72	1.725	5.38	0.00	-99	
1Q15	6.92	17.30	1.424	6.10	0.05	-122	Initial Sample
	6.98	17.38	1.573	7.01	0.00	-90	Confirmation Sample
2Q15	6.99	16.10	1.931	48.24	0.82	-89	
3Q15	7.04	18.98	1.405	0.60	0.20	-160	

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 2a
SUMMARY OF MAIN AQUIFER GROUNDWATER MONITORING WELL FIELD PARAMETERS

Well ID	pH	Temp (C)	Specific Cond (mS/cm)	Turbidity (NTUs)	DO (mg/L)	ORP (mV)	General Notes
P-114							
4Q12	7.12	21.18	*	12.12	3.00	15	
1Q13	7.25	19.52	0.782	9.14	1.53	-96	
2Q13	7.33	20.80	0.941	31.68	1.83	-144	
3Q13	7.45	22.10	1.095	17.89	3.10	-103	
4Q13	7.16	20.73	1.191	15.82	2.36	-95	
1Q14	7.13	18.07	1.228	47.51	2.25	-86	
2Q14	7.36	20.07	1.245	18.06	1.85	-91	
3Q14	7.98	22.69	*	8.46	3.54	-110	
4Q14	7.30	20.31	1.382	29.21	2.65	-112	
1Q15	7.26	18.07	1.228	384.90	2.94	-94	
2Q15	6.97	20.49	1.224	74.05	2.30	-83	
3Q15	7.31	19.52	1.177	33.39	2.40	-100	
ROST-3-MW (ROST-3-PZ)							
4Q12	6.84	15.50	*	6.38	0.63	-9	Added to Interim GW Monitoring Program in 2Q12
1Q13	*	16.92	0.723	6.82	0.00	-124	
2Q13	6.94	18.60	0.751	11.04	0.01	-319	
3Q13	6.95	18.57	0.773	33.57	0.00	-128	
4Q13	6.89	18.00	0.915	8.72	0.00	-111	
1Q14	6.95	16.14	0.939	9.80	0.00	-116	
2Q14	6.89	18.62	0.974	5.54	0.00	-127	
3Q14	6.88	19.20	*	9.54	0.00	-128	
4Q14	6.83	18.00	1.127	7.26	0.00	-117	
1Q15	6.92	16.56	1.151	4.72	0.01	-118	
2Q15	6.82	17.70	1.152	5.33	0.04	-123	
3Q15	6.95	18.83	1.373	12.56	0.00	-130	
ROST-4-PZ(C)							
4Q12	6.75	18.50	*	0.81	0.02	-47	Added to Interim GW Monitoring Program in 2Q12
1Q13	6.77	19.35	1.091	7.82	0.00	-173	
2Q13	6.75	19.22	1.334	1.67	0.01	-148	
3Q13	6.85	20.00	1.089	4.00	0.13	-111	
4Q13	6.69	18.87	1.769	5.71	0.00	-119	
1Q14	6.64	17.08	1.888	3.68	0.01	-79	
2Q14	6.61	20.07	2.351	5.94	0.09	-80	
3Q14	6.78	19.88	*	5.00	0.01	-104	
4Q14	6.75	19.09	1.662	5.57	0.00	-114	
1Q15	6.72	16.56	2.578	5.92	0.07	-101	
2Q15	6.77	19.34	2.204	0.00	0.06	-165	
3Q15	6.87	19.64	2.232	11.48	0.00	-125	
T-12							
4Q12	6.68	16.69	*	1.47	0.00	-2	
1Q13	6.93	15.73	1.075	2.11	0.00	-117	
2Q13	6.81	18.64	1.177	10.67	0.00	-122	
3Q13	7.06	20.34	1.200	5.39	0.01	-164	
4Q13	6.65	19.39	1.324	6.84	0.00	-97	
1Q14	6.91	16.38	1.183	1.47	0.03	-111	
2Q14	6.94	17.65	1.176	6.70	0.00	-128	
3Q14	6.85	21.13	0.170	3.45	0.01	-128	
4Q14	6.82	20.43	1.123	4.23	0.00	-125	
1Q15	6.78	19.19	1.126	4.19	0.03	-103	
2Q15	6.76	20.42	1.079	1.51	0.00	-107	
3Q15	6.75	22.31	0.943	1.77	0.04	-120	

NOTES:
1) Field parameters were collected using the Troll 9500.
2) NM = Not Measured
3) * = Equipment malfunction. Results are suspect.
4) Negative parameter readings for Turbidity and DO are recorded as zero.

TABLE 2b
SUMMARY OF PERCHED GROUNDWATER MONITORING WELL FIELD PARAMETERS

Well ID	pH	Temp (C)	Specific Cond (mS/cm)	Turbidity (NTUs)	DO (mg/L)	ORP (mV)	General Notes
P-60-12S							
4Q12	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
1Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
2Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
3Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
4Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
2Q14	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
4Q14	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
1Q15	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
2Q15	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
3Q15	NM	NM	NM	NM	NM	NM	Well is dry.
P-60-13S							
4Q12	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
1Q13	NM	NM	NM	NM	NM	NM	Well is dry.
2Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
3Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
4Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
2Q14	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
4Q14	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
1Q15	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
2Q15	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
3Q15	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
ROST-5-PZ							
4Q12	NM	NM	NM	NM	NM	NM	Well is dry.
1Q13	NM	NM	NM	NM	NM	NM	Well is dry.
2Q13	NM	NM	NM	NM	NM	NM	Well is dry.
3Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
4Q13	NM	NM	NM	NM	NM	NM	Well is dry.
1Q14	NM	NM	NM	NM	NM	NM	Well is dry.
2Q14	NM	NM	NM	NM	NM	NM	Well is dry.
3Q14	NM	NM	NM	NM	NM	NM	Well is dry.
4Q14	NM	NM	NM	NM	NM	NM	Well is dry.
1Q15	NM	NM	NM	NM	NM	NM	Well is dry.
2Q15	NM	NM	NM	NM	NM	NM	Well is dry.
3Q15	NM	NM	NM	NM	NM	NM	Well is dry.
ROST-7-PZ							
4Q12	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
1Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
2Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
3Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
4Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
1Q14	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
2Q14	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
3Q14	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
4Q14	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
1Q15	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
2Q15	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
3Q15	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
ROST-10-PZ							
4Q12	NM	NM	NM	NM	NM	NM	Well is dry.
1Q13	NM	NM	NM	NM	NM	NM	Well is dry.
2Q13	NM	NM	NM	NM	NM	NM	Well is dry.
3Q13	NM	NM	NM	NM	NM	NM	Well is dry.
4Q13	NM	NM	NM	NM	NM	NM	Well is dry.
1Q14	NM	NM	NM	NM	NM	NM	Well is dry.
2Q14	NM	NM	NM	NM	NM	NM	Well is dry.
3Q14	NM	NM	NM	NM	NM	NM	Well is dry.
4Q14	NM	NM	NM	NM	NM	NM	Well is dry.
1Q15	NM	NM	NM	NM	NM	NM	Well is dry.
2Q15	NM	NM	NM	NM	NM	NM	Well is dry.
3Q15	NM	NM	NM	NM	NM	NM	Well is dry.
ROST-21-PZ							
4Q12	NM	NM	NM	NM	NM	NM	Well is dry.
1Q13	NM	NM	NM	NM	NM	NM	Well is dry.
2Q13	NM	NM	NM	NM	NM	NM	Well is dry.
3Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
4Q13	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
1Q14	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
2Q14	NM	NM	NM	NM	NM	NM	Well is dry.
3Q14	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
4Q14	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
1Q15	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
2Q15	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP
3Q15	NM	NM	NM	NM	NM	NM	Slow recharge prevented sampling per the SOP

NOTES:
1) NM = Not Measured

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
				Screening Values (mg/L)		6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
MW-01	MW1-ROX-102612	10/26/2012	48.80 - 58.80	41.22	NE																							
	MW1-ROX-121712	12/17/2012		41.22	NE	<0.005 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW1-ROX-011013	1/10/2013		41.89	NE	<0.005	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW1-ROX-040913	4/9/2013		42.55	NE	<0.005	0.0004 J	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW1-ROX-070813	7/8/2013		39.56	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.00097 U	<0.002	<0.0005	<0.025
	MW1-ROX-100313	10/3/2013		40.28	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW1-ROX-011414	1/14/2014		42.77	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW1-ROX-040714	4/7/2014		43.28	NE	<0.01	0.00066	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW1-ROX-070914	7/9/2014		42.09	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW1-ROX-100614	10/6/2014		41.1	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW1-ROX-011215	1/12/2015		42.73	NE	0.035	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW1-ROX-040615	4/6/2015		44.11	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW1-ROX-070815	7/8/2015	48.80 - 58.80	43.35	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
MW-02	MW2-ROX-102612	10/26/2012	49.87 - 59.87	42.35	NE	<0.025 UJ	0.0142	<0.025	<0.025	<0.025	<0.025	<0.025	<0.025	<0.005	<0.005	<0.01	<0.005	<0.01	0.0172 J	<0.025	<0.005	<0.005	<0.005	<0.005	<0.01	<0.01	<0.0025	<0.13
	MW2-ROX-011113	1/11/2013		42.94	NE	<0.01	0.0192	<0.01	<0.01	0.0176 J	0.0077 J	0.002 J	<0.01	<0.002	<0.002	0.0083	<0.002	<0.004	<0.01	0.0094 J	<0.002	<0.002	<0.002	<0.002	<0.004	<0.004	<0.001	<0.05
	MW2-ROX-040913	4/9/2013		43.70	NE	<0.05	0.0174	<0.025	<0.025	0.0191 J	0.0085 J	<0.025	<0.025	<0.005	<0.005	<0.01	<0.005	<0.01	<0.025	0.0101 J	<0.005	<0.005	<0.005	<0.005	<0.01	<0.01	<0.0025	<0.13
	MW2-ROX-071113	7/11/2013		40.82	NE	<0.01 UJ	0.006	<0.005	<0.005 UJ	<0.005	0.0073	0.0029 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0075	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	MW2-ROX-100813	10/8/2013		41.73	NE	<0.01	0.0139	<0.005	0.0133	<0.005	0.0082	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0104	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW2-ROX-012014	1/20/2014		44.00	NE	<0.01	0.0238	<0.005	<0.005	0.0254	0.0096	0.0015 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0106	<0.001	<0.001	<0.001	0.0043	<0.002	<0.002	<0.0005	<0.025
	MW2-ROX-041014	4/10/2014		44.66	NE	<0.01	0.0214	<0.005	0.0136	0.0208	0.0077	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.009	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW2-ROX-071414	7/14/2014		43.13	NE	<0.01	0.0102 J	<0.005	<0.005	0.0194 J	0.0073 J	0.0013 J J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.008 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW2-ROX-101014	10/10/2014		42.49	NE	<0.02 UJ	0.0132	<0.01	<0.01	0.0145	0.0057 J	0.0011 J	<0.01	<0.002	<0.002	<0.004	<0.002	<0.004	<0.01	0.0063 J	<0.002	<0.002	<0.002	<0.002	<0.004	<0.004	<0.001	<0.05
	MW2-ROX-011615	1/16/2015		44.1	NE	<0.01	0.0278	0.00045 J	<0.005	0.0185	0.0091	0.0016 J	<0.005	<0.001	<0.001	<0.002	<0.001	0.0052	<0.005	0.0109	0.0008 J	0.00084 J	0.00099 J	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW2-ROX-041315	4/13/2015		45.56	NE	<0.01	0.0283	<0.005	<0.005	<0.005	0.0052	0.00084 J	0.00028 J	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0064	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW2-ROX-071315	7/13/2015	49.87 - 59.87	44.53	NE	<0.01	0.0204	<0.005	<0.005	<0.005	0.006	0.0012 J	<0.0023 U	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.006	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
MW-03	MW3-ROX-102512	10/25/2012	34.67 - 44.67	28.39	NE	<0.005 UJ	0.0017	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW3-ROX-010913	1/9/2013		29.35	NE	<0.005	0.0014	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW3-ROX-040813	4/8/2013		29.74	NE	<0.005 UJ	0.008	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW3-ROX-071113	7/11/2013		26.32	NE	<0.01 UJ	0.0059	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	MW3-ROX-100813	10/8/2013		27.38	NE	<0.01	0.00057	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW3-ROX-011614	1/16/2014		29.91	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW3-ROX-040914	4/9/2014		30.50	NE	<0.01	0.0015	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW3-ROX-071114	7/10/2014		29.05	NE	<0.01	0.00062	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW3-ROX-100914	10/9/2014		28.18	NE	<0.01 UJ	0.0005	<0.005	<0.005	<0.005	<0.005	0.00083 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW3-ROX-011515	1/15/2015		29.65	NE	<0.01	0.00037 J	<0.005	<0.005	<0.005	0.00049 J	0.0009 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW3-ROX-041015	4/10/2015		31.16	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW3-ROX-071015	7/10/2015	34.67 - 44.67	30.01	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
					Screening Values (mg/L)	6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
MW-04	MW4-ROX-102912	10/29/2012	46.06 - 56.06	39.45	NE	<0.01 UJ	0.354	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.002	<0.002	<0.004	<0.002	<0.004 UJ	<0.01	<0.01	<0.002	<0.002	<0.002	<0.002	<0.004	<0.004	<0.001	<0.05
	MW4-ROX-011113	1/11/2013		40.20	NE	<0.005	9.04 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW4-ROX-011113-DUP	1/11/2013		40.20	NE	<0.005	8.96 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW4-ROX-030413	3/4/2013		40.20	NE	<0.5	21.4	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.1	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
	MW4-ROX-040913	4/9/2013		40.90	NE	<0.02	64.2	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	<0.002	<0.002	<0.004	<0.002	<0.004	<0.01	<0.01	<0.002	<0.002	<0.002	<0.002	<0.004	<0.004	<0.001	<0.05
	MW4-ROX-040913-DUP	4/9/2013		40.90	NE	<0.01	72.9	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW4-ROX-071713	7/17/2013		37.61	NE	<0.01	12.2	<0.005	<0.005	<0.005	0.0016 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.001	<0.05
	MW4-ROX-101613	10/16/2013		38.80	NE	<0.1	1.7	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.01	<0.01	<0.02	<0.01	<0.02	<0.05	<0.05	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.005	<0.25
	MW4-ROX-013014	1/30/2014		41.09	NE	<0.01	2.01	<0.005	<0.005	0.00058 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW4-ROX-041614	4/16/2014		41.91	NE	<0.01	0.553	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW4-ROX-071614	7/16/2014		40.18	NE	<0.01	1.88	<0.005	<0.005	<0.005	<0.05	<0.05	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW4-ROX-101614	10/16/2014		39.49	NE	<0.05	0.815	<0.025	<0.025	<0.025	<0.025	<0.025	<0.025	<0.005	<0.005	<0.01	<0.005	<0.01	<0.025	<0.025	<0.005	<0.005	<0.005	<0.005	<0.01	<0.01	<0.0025	<0.13
	MW4-ROX-012115	1/21/2015		41.27	NE	<0.01	0.0902	<0.005	<0.005	<0.005	<0.005	0.00065 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW4-ROX-042115	4/21/2015	45.06 - 55.06	42.58	NE	<0.01	0.0702	<0.005	<0.005	<0.005	<0.005	0.00066 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW4-ROX-071415	7/14/2015	45.06 - 55.06	41.30	NE	<0.01	0.063	<0.005	<0.005	0.00066 J	0.00051 J	0.00074 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
MW-05	MW5-ROX-102912	10/29/2012	33.97 - 43.97	28.16	NE	<0.005 UJ	0.0628	<0.005	<0.005	<0.005	<0.005	0.0059	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW5-ROX-011113	1/11/2013		28.75	NE	<0.005	0.0072	<0.005	<0.005	<0.005	0.0016 J	0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW5-ROX-040913	4/9/2013		29.41	NE	<0.005	0.0018	<0.005	<0.01	<0.005	0.0018 J	0.0063	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW5-ROX-070913	7/9/2013		26.04	NE	<0.01	0.0075	<0.005	<0.005	<0.005	<0.005	0.0085	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	MW5-ROX-100813	10/8/2013		26.97	NE	<0.01	0.0016	<0.005	<0.005	<0.005	<0.005	0.0064	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW5-ROX-011714	1/17/2014		29.59	NE	<0.01	0.002	<0.005	<0.005	<0.005	0.002 J	0.0064	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW5-ROX-041014	4/10/2014		30.09	NE	0.021 J	0.0037	<0.005	<0.005	<0.005	0.0017 J	0.0062	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW5-ROX-071414	7/14/2014		28.59	NE	<0.01	0.001	<0.005	<0.005	<0.005	0.0011 J	0.0046 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW-5-ROX-100914	10/9/2014		27.75	NE	<0.01 UJ	0.028	<0.005	<0.005	<0.005	0.00083 J	0.0049 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW5-ROX-011515	1/15/2015		29.34	NE	<0.01	0.003	<0.005	<0.005	<0.005	0.0014 J	0.0059	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW5-ROX-041315	4/13/2015		30.97	NE	<0.01	0.0391	<0.005	<0.005	<0.005	0.0014 J	0.0051	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW5-ROX-071315	7/13/2015	33.97 - 43.97	29.45	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	0.0031 J	<0.00032 U	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
MW-06A	MW6A-ROX-102412	10/24/2012	34.83 - 44.83	30.06	NE	<0.12 UJ	0.00073	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6A-ROX-011413	1/14/2013		31.00	NE	<0.005	0.0276	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6A-ROX-040313	4/3/2013		31.62	NE	<0.005 UJ	0.0017	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6A-ROX-070913	7/9/2013		28.25	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	MW6A-ROX-070913-DUP	7/9/2013		28.25	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	MW6A-ROX-100713	10/7/2013		28.87	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6A-ROX-100713-DUP	10/7/2013		28.87	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6A-ROX-011614	1/16/2014		31.62	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6A-ROX-011614-DUP	1/16/2014		31.62	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6A-ROX-040814	4/8/2014		32.16	NE	0.11	0.0011	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6A-ROX-040814-DUP	4/8/2014		32.16	NE	0.116	0.001	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6A-ROX-071014	7/10/2014		30.75	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002 UJ	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	MW6A-ROX-100814	10/8/2014		29.84	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6A-ROX-011415	1/14/2015		31.54	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6A-ROX-040715	4/7/2015		33.08	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6A-ROX-071515	7/15/2015	34.83 - 44.83	31.52	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
				Screening Values (mg/L)		6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
MW-06B	MW6B-ROX-102412	10/24/2012	64.05 - 69.05	30.11	NE	<0.005 UJ	0.0015	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6B-ROX-011713	1/17/2013		31.11	NE	<0.005	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6B-ROX-040313	4/3/2013		31.68	NE	<0.005 UJ	0.00043 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6B-ROX-070913	7/9/2013		28.25	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	MW6B-ROX-100713	10/7/2013		28.93	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6B-ROX-011614	1/16/2014		31.67	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6B-ROX-040814	4/8/2014		32.21	NE	<0.01	0.0009	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6B-ROX-071014	7/10/2014		30.81	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002 UJ	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	MW6B-ROX-100814	10/8/2014		29.87	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6B-ROX-011415	1/14/2015		31.59	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6B-ROX-040715	4/7/2015		33.10	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6B-ROX-040715-DUP	4/7/2015		33.10	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6B-ROX-071415	7/14/2015	64.05 - 69.05	31.56	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
MW-06C	MW6C-ROX-102412	10/24/2012	84.95 - 89.95	27.85	NE	<0.005 UJ	0.00035 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6C-ROX-011713	1/17/2013		30.88	NE	<0.005 UJ	<0.0005 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.002 UJ	<0.001 UJ	<0.002 UJ	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.002 UJ	<0.002 UJ	<0.0005 UJ	<0.025 UJ
	MW6C-ROX-040313	4/3/2013		31.41	NE	<0.005 UJ	0.00062	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6C-ROX-070913	7/9/2013		28.03	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	MW6C-ROX-100713	10/7/2013		28.72	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6C-ROX-011614	1/16/2014		31.48	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6C-ROX-040814	4/8/2014		32.01	NE	<0.01	0.0021	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6C-ROX-071014	7/10/2014		30.60	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002 UJ	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	MW6C-ROX-100814	10/8/2014		29.67	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6C-ROX-011415	1/14/2015		31.41	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6C-ROX-040915	4/9/2015		32.80	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6C-ROX-071415	7/14/2015	84.95 - 89.95	31.38	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
MW-06D	MW6D-ROX-102412	10/24/2012	104.72 - 109.72	29.71	NE	<0.005 UJ	0.00055	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6D-ROX-011713	1/17/2013		30.75	NE	<0.005 UJ	0.00053 J	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.002 UJ	<0.001 UJ	<0.002 UJ	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.002 UJ	<0.002 UJ	<0.0005 UJ	<0.025 UJ
	MW6D-ROX-040313	4/3/2013		31.27	NE	<0.005 UJ	0.00055	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6D-ROX-070913	7/9/2013		27.91	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	MW6D-ROX-100713	10/7/2013		28.58	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6D-ROX-011614	1/16/2014		31.33	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6D-ROX-040814	4/8/2014		31.85	NE	<0.01	0.0064	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6D-ROX-071014	7/10/2014		31.47	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002 UJ	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	MW6D-ROX-071014-DUP	7/10/2014		31.47	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002 UJ	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	MW6D-ROX-100814	10/8/2014		29.53	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6D-ROX-100814-DUP	10/8/2014		29.53	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6D-ROX-011415	1/14/2015		31.26	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6D-ROX-011415-DUP	1/14/2015		31.26	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6D-ROX-040715	4/7/2015		32.74	NE	<0.01	0.00032 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW6D-ROX-071415	7/14/2015	104.72 - 109.72	31.19	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
					Screening Values (mg/L)	6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
MW-07	MW7-ROX-103012	10/30/2012	42.92 - 52.92	41.23	NE	<10 UJ	833	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4 UJ	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	MW7-ROX-103012-DUP	10/30/2012		41.23	NE	<10 UJ	863	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4 UJ	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	MW7-ROX-011513	1/15/2013		42.21	NE	<20	1230	<20	<20	<20	<20	<20	<20	<4	<4	<8	<4	<8	<20	<20	<4	<4	<4	<4	<8	<8	<2	<100
	MW7-ROX-011513-DUP	1/15/2013		42.21	NE	<20	1320	<20	<20	<20	<20	<20	<20	<4	<4	<8	<4	<8	<20	<20	<4	<4	<4	<4	<8	<8	<2	<100
	MW7-ROX-041013	4/10/2013		42.70	NE	<20	475	<10	<20	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	MW7-ROX-041013-DUP	4/10/2013		42.70	NE	<20	499	<10	<20	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	MW7-ROX-071713	7/17/2013		39.60	NE	<0.01	1000 J	<0.005	<0.005	<0.005	0.0023 J J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0016 J J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.001	<0.05
	MW7-ROX-101613	10/16/2013		40.64	NE	<20	553	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	MW7-ROX-013014	1/30/2014		42.94	NE	<25	1490	<13	<13	<13	<13	<13	<13	<2.5	<2.5	<5	<2.5	<5	<13	<13	<2.5	<2.5	<2.5	<2.5	<5	<5	<1.3	<63
	MW7-ROX-041614	4/16/2014		43.79	NE	<50	1390	<25	<25	<25	<25	<25	<25	<5	<5	<10	<5	<10	<25	<25	<5	<5	<5	<5	<10	<10	<2.5	<130
	MW7-ROX-071614	7/16/2014		42.05	NE	<0.01	1290	<0.005	<0.005	0.0036 J J	0.0022 J J	0.0022 J J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0015 J J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW7-ROX-071614-DUP	7/16/2014		42.05	NE	<0.01	1390	<0.005	<0.005	0.0034 J J	0.0023 J J	0.0022 J J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0015 J J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW7-ROX-101614	10/16/2014		41.31	NE	<50	1130	<25	<25	<25	<25	<25	<25	<5	<5	<10	<5	<10	<25	<25	<5	<5	<5	<5	<10	<10	<2.5	<130
	MW7-ROX-101614-DUP	10/16/2014		41.31	NE	<50	984	<25	<25	<25	<25	<25	<25	<5	<5	<10	<5	<10	<25	<25	<5	<5	<5	<5	<10	<10	<2.5	<130
	MW7-ROX-012215	1/22/2015		43.45	NE	<10	821	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	MW7-ROX-012215-DUP	1/22/2015		43.45	NE	<10	799	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	MW7-ROX-042115	4/21/2015		44.63	NE	<0.5	1110	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.05	<0.05	<0.1	<0.05	<0.1	<0.25	<0.25	<0.05	<0.05	<0.05	<0.05	<0.1	<0.1	<0.025	<1.3
	MW7-ROX-042115-DUP	4/21/2015		44.63	NE	<0.5	1160	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.05	<0.05	<0.1	<0.05	<0.1	<0.25	<0.25	<0.05	<0.05	<0.05	<0.05	<0.1	<0.1	<0.025	<1.3
	MW7-ROX-071515	7/15/2015	42.92 - 52.92	43.54	NE	<50	1300	<25	<25	<25	<25	<25	<25	<5	<5	<10	<5	<10	<25	<25	<5	<5	<5	<5	<10	<10	<2.5	<130
	MW7-ROX-071515-DUP	7/15/2015		43.54	NE	<50	1370	<25	<25	<25	<25	<25	<25	<5	<5	<10	<5	<10	<25	<25	<5	<5	<5	<5	<10	<10	<2.5	<130
MW-08	MW8-ROX-103012	10/30/2012	33.60 - 43.60	32.32	NE	<5 UJ	523	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2 UJ	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	MW8-ROX-011513	1/15/2013		33.30	NE	<10	1120 J	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	MW8-ROX-041013	4/10/2013		33.77	NE	<50	969	<25	<50	<25	<25	<25	<25	<5	<5	<10	<5	<10	<25	<25	<5	<5	<5	<5	<10	<10	<2.5	<130
	MW8-ROX-071713	7/17/2013		30.43	NE	<0.008 U	532	<0.005	<0.005	<0.005	0.0033 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0023 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.001	<0.05
	MW8-ROX-071713-DUP	7/17/2013		30.43	NE	<0.01	494	<0.005	<0.005	<0.005	0.0031 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0024 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.001	<0.05
	MW8-ROX-101613	10/16/2013		31.59	NE	<20	360	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	MW8-ROX-101613-DUP	10/16/2013		31.59	NE	<20	351	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	MW8-ROX-013014	1/30/2014		34.02	NE	<25	721	<13	<13	<13	<13	<13	<13	<2.5	<2.5	<5	<2.5	<5	<13	<13	<2.5	<2.5	<2.5	<2.5	<5	<5	<1.3	<63
	MW8-ROX-013014-DUP	1/30/2014		34.02	NE	<25	748	<13	<13	<13	<13	<13	<13	<2.5	<2.5	<5	<2.5	<5	<13	<13	<2.5	<2.5	<2.5	<2.5	<5	<5	<1.3	<63
	MW8-ROX-041614	4/16/2014		34.73	NE	<20	862	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	MW8-ROX-041614-DUP	4/16/2014		34.73	NE	<20	1060	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	MW8-ROX-071614	7/16/2014		33.01	NE	<0.01 UJ	280	<0.005 UJ	<0.005 UJ	0.0069 J	0.0042 J J	0.0028 J J	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.002 UJ	<0.001 UJ	<0.002 UJ	<0.005 UJ	0.0032 J J	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.002 UJ	<0.002 UJ	<0.0005 UJ	<0.025 UJ
	MW8-ROX-101614	10/16/2014		32.23	NE	<10	486	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	MW8-ROX-012215	1/22/2015		34.22	NE	<10	764	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	MW8-ROX-042115	4/21/2015		35.41	NE	<0.5	1100	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.05	<0.05	<0.1	<0.05	<0.1	<0.25	<0.25	<0.05	<0.05	<0.05	<0.05	<0.1	<0.1	<0.025	<1.3
	MW8-ROX-071515	7/15/2015	33.60 - 43.60	34.07	NE	<50	879	<25	<25	<25	<25	<25	<25	<5	<5	<10	<5	<10	<25	<25	<5	<5	<5	<5	<10	<10	<2.5	<130

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
				Screening Values (mg/L)		6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
MW-09	MW9-ROX-102912	10/29/2012	46.45 - 56.45	43.17	NE	<0.005 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW9-ROX-011113	1/11/2013		43.90	NE	<0.123 U	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW9-ROX-040913	4/9/2013		44.67	NE	<0.005	<0.0005	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW9-ROX-070813	7/8/2013		42.35	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.0015 U	<0.002	<0.0005	<0.025
	MW9-ROX-100313	10/3/2013		42.27	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW9-ROX-011414	1/14/2014		44.47	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW9-ROX-040714	4/7/2014		44.99	NE	<0.01	0.0044	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW9-ROX-070914	7/9/2014		44.35	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW9-ROX-100714	10/7/2014		43.52	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW9-ROX-011315	1/13/2015		44.21	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW9-ROX-040915	4/9/2015		45.38	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW9-ROX-070915	7/9/2015	46.45 - 56.45	44.81	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
MW-10	MW10-ROX-102612	10/26/2012	44.43 - 54.43	43.08	NE																							
	MW10-ROX-121712	12/17/2012		43.08	NE	<0.005 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	0.00095 J	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW10-ROX-011013	1/10/2013		44.10	NE	<0.101 U	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	0.0074	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW10-ROX-012113	1/21/2013		44.10	NE	<0.025	0.003	<0.005	<0.0051 U	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.01	<0.001	<0.01	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	
	MW10-ROX-040913	4/9/2013		44.60	NE	<0.005	0.00067	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW10-ROX-070813	7/8/2013		42.27	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.0016 U	<0.002	<0.0005	<0.025
	MW10-ROX-100313	10/3/2013		42.38	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW10-ROX-011514	1/15/2014		44.42	NE	0.0174	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW10-ROX-040714	4/7/2014		45.00	NE	0.0684	0.0018	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	0.0032	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW10-ROX-070914	7/9/2014		44.35	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW10-ROX-100714	10/7/2014		43.58	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW10-ROX-011315	1/13/2015		44.27	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW10-ROX-040815	4/8/2015		45.30	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW10-ROX-070915	7/9/2015	44.43 - 54.43	44.93	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.00048 U	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
MW-11	MW11-ROX-102512	10/25/2012	41.66 - 51.66	40.59	NE	<0.005 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW11-ROX-011013	1/10/2013		41.43	NE	<0.005	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW11-ROX-040813	4/8/2013		42.02	NE	<0.005 UJ	<0.00065 U	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW11-ROX-070813	7/8/2013		39.24	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.001 U	<0.002	<0.0005	<0.025
	MW11-ROX-100713	10/7/2013		39.95	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW11-ROX-011514	1/15/2014		42.16	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW11-ROX-040714	4/7/2014		42.70	NE	<0.01	0.0014	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW11-ROX-070914	7/9/2014		41.75	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW11-ROX-100714	10/7/2014		40.89	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW11-ROX-011315	1/13/2015		41.93	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW11-ROX-040815	4/8/2015		43.19	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW11-ROX-070915	7/9/2015	41.66 - 51.66	42.45	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.00021 U	<0.001	<0.001	<0.002	<0.001	0.00058 J	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ

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SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
			Screening Values (mg/L)			6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
MW-12	MW12-ROX-102512	10/25/2012	41.92 - 51.92	40.95	NE	<0.005 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW12-ROX-011013	1/10/2013		41.83	NE	<0.35 U	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW12-ROX-040813	4/8/2013		42.46	NE	<0.005 UJ	<0.00088 U	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW12-ROX-070913	7/9/2013		39.28	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	MW12-ROX-100713	10/7/2013		40.22	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW12-ROX-011514	1/15/2014		42.54	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW12-ROX-040814	4/8/2014		43.15	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW12-ROX-070914	7/9/2014		41.97	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW12-ROX-100614	10/6/2014		40.98	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW12-ROX-011215	1/12/2015		42.33	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW12-ROX-040615	4/6/2015		43.75	NE	0.0265	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW12-ROX-070815	7/8/2015	41.92 - 51.92	42.86	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
MW-13	MW13-ROX-110812	11/8/2012	25.57 - 35.57	25.30	NE	<0.005	0.0048	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW13-ROX-012313	1/23/2013		29.26	NE	<0.005	0.0067 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	MW13-ROX-041213	4/12/2013		29.44	NE	<0.0319 UJ	0.0102 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW13-ROX-071213	7/12/2013		25.67	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001 UJ	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW13-ROX-100913	10/9/2013		26.94	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW13-ROX-012914	1/29/2014		29.63	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW13-ROX-041114	4/11/2014		30.15	NE	<0.01	0.00058	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW13-ROX-070714	7/7/2014		28.49	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW13-ROX-101014	10/10/2014		27.48	NE	<0.01 UJ	0.00037 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW13-ROX-011615	1/16/2015		29.09	NE	<0.01	0.00046 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW13-ROX-041415	4/14/2015		30.71	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW13-ROX-070815	7/8/2015	25.57 - 35.57	29.16	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	0.0016 J	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
MW-14	MW14-ROX-103112	10/31/2012	33.42 - 43.42	32.02	NE	<0.005 UJ	0.00093	<0.005	<0.005	<0.005	0.0028 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW14-ROX-011813	1/18/2013		33.05	NE	<0.005	0.0017	<0.005	<0.005	0.0014 J	0.0032 J	0.0011 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW14-ROX-041113	4/11/2013		33.31	NE	<0.01	0.0125 J	<0.005	<0.01	0.0021 J	0.0048 J	0.0016 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW14-ROX-071213	7/12/2013		30.36	NE	<0.01	0.00064	<0.005	<0.005	0.00066 J	0.002 J	0.0013 J	<0.005	<0.001 UJ	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW14-ROX-101013	10/10/2013		30.80	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	0.0013 J	0.0012 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0011 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW14-ROX-012914	1/29/2014		33.67	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	0.0013 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW14-ROX-041114	4/11/2014		34.30	NE	<0.01	0.0017	<0.005	<0.005	<0.005	<0.005	0.00046 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW14-ROX-070714	7/7/2014		32.82	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	0.00042 J	0.00047 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW14-ROX-101414	10/14/2014		31.65	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	0.00063 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW14-ROX-011615	1/16/2015		33.58	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	0.00053 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW14-ROX-041415	4/14/2015		35.16	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW14-ROX-070915	7/9/2015	33.42 - 43.42	34.06	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.00081 U	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
				Screening Values (mg/L)		6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
MW-16	MW16-ROX-012313	1/23/2013	37.06 - 47.06	43.05	NE	<0.005	0.00057 J	<0.005	0.0029 J	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	MW16-ROX-040813	4/8/2013		43.39	NE	<0.005 UJ	<0.00058 U	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW16-ROX-070813	7/8/2013		40.62	NE	<0.01	<0.00062 U	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW16-ROX-100813	10/8/2013		41.62	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW16-ROX-011514	1/15/2014		43.76	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW16-ROX-040914	4/9/2014		44.63	NE	<0.01	0.00034 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW16-ROX-071014	7/10/2014		43.15	NE	<0.01 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002 UJ	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	MW16-ROX-100714	10/7/2014		42.27	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW16-ROX-011315	1/13/2015		43.59	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW16-ROX-040915	4/9/2015		44.87	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW16-ROX-070915	7/9/2015	37.06 - 47.06	44.26	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.0003 U	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	MW16-ROX-070915-DUP	7/9/2015		44.26	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
MW-22	MW22-ROX-012313	1/23/2013	37.88 - 47.88	41.80	NE	<0.25	2.12	<0.25	<0.295 U	<0.25	<0.25	<0.25	<0.25	<0.05	<0.05	<0.1	<0.05	<0.1	<0.25	<0.25	<0.05	<0.05	<0.05	<0.05	<0.1	<0.1	<0.025	<1.3 UJ
	MW22-ROX-012313-DUP	1/23/2013		41.80	NE	<0.25	2.09	<0.25	<0.31 U	<0.25	<0.25	<0.25	<0.25	<0.05	<0.05	<0.1	<0.05	<0.1	<0.25	<0.25	<0.05	<0.05	<0.05	<0.05	<0.1	<0.1	<0.025	<1.3 UJ
	MW22-ROX-040513	4/5/2013		42.23	NE	<0.005 UJ	1.5	<0.005	<0.005	0.0413 J	0.0142 J	0.0171 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0122 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW22-ROX-071113	7/11/2013		39.35	NE	<0.01 UJ	1.19	<0.005	<0.005 UJ	<0.005	0.0116	0.0142	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0087	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	MW22-ROX-071113-DUP	7/11/2013		39.35	NE	<0.01 UJ	1.11	<0.005	<0.005 UJ	<0.005	0.0116	0.0148	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0087	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	MW22-ROX-100913	10/9/2013		40.39	NE	<0.01	1.33	<0.005	<0.005	0.0286	0.012	0.0167	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.01	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW22-ROX-100913-DUP	10/9/2013		40.39	NE	<0.01	1.39	<0.005	<0.005	0.0276	0.0118	0.0163	<0.005	<0.001	<0.001	0.0018 J	<0.001	<0.002	<0.005	0.0095	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW22-ROX-012014	1/20/2014		42.49	NE	<0.01	1.47	<0.005	0.0804	0.0357	0.0128	0.0147	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0094	<0.001	<0.001	<0.001	0.0028	<0.002	<0.002	<0.0005	<0.025
	MW22-ROX-012014-DUP	1/20/2014		42.49	NE	<0.01	1.58	<0.005	0.0815	0.0355	0.0127	0.0146	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0094	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW22-ROX-041014	4/10/2014		43.15	NE	0.0911 J	1.7	<0.005	0.0334	0.0331	0.0128	0.0152	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0094	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW22-ROX-041014-DUP	4/10/2014		43.15	NE	<0.01 UJ	1.56	<0.005	0.0287	0.0319	0.0123	0.0144	<0.005	<0.001	0.00046 J	<0.002	<0.001	<0.002	<0.005	0.0089	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW22-ROX-071414	7/14/2014		41.85	NE	<0.01	1.76	<0.005	0.0185 J	0.0349 J	0.013 J	0.0137 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0085 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW22-ROX-101014	10/10/2014		41.43	NE	<0.1 UJ	1.62	<0.05	<0.05	0.0165 J	0.0066 J	0.0096 J	<0.05	<0.01	<0.01	<0.02	<0.01	<0.02	<0.05	0.0045 J	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.005	<0.25
	MW22-ROX-011615	1/16/2015		42.19	NE	<0.1	1.51	<0.05	<0.05	0.0373 J	0.0133 J	0.0152 J	<0.05	<0.01	<0.01	<0.02	<0.01	<0.02	<0.05	0.0117 J	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.005	<0.25
	MW22-ROX-041415	4/14/2015		43.71	NE	<0.01	1.62	<0.005	<0.005	0.0112	0.0105	0.0123	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0078	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW22-ROX-071515	7/15/2015	37.88 - 47.88	42.64	NE	<0.2	2.92	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.02	<0.02	<0.04	<0.02	<0.04	<0.1	<0.1	<0.02	<0.02	<0.02	<0.02	<0.04	<0.04	<0.01	<0.5
MW-23	MW23-ROX-012615	1/26/2015	29.02 - 39.02	30.90	NE	<0.025	<0.001	<0.001	<0.005	<0.001	<0.001	<0.001	<0.002	<0.001	<0.001	<0.002	<0.001	<0.002	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.005	<0.001	<0.001	<0.2
	MW23-ROX-040815	4/8/2015		32.24	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW23-ROX-071015	7/10/2015	29.02 - 39.02	30.54	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.00029 U	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
MW-24	MW24-ROX-040513	4/5/2013	38.89 - 48.89	43.39	NE	<0.005	0.0029	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW24-ROX-071113	7/11/2013		40.35	NE	<0.0157 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	MW24-ROX-100913	10/9/2013		41.27	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW24-ROX-011514	1/15/2014		43.47	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW24-ROX-040914	4/9/2014		44.13	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW24-ROX-071114	7/10/2014		42.97	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW24-ROX-100814	10/8/2014		42.16	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW24-ROX-011315	1/13/2015		43.17	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW24-ROX-040915	4/9/2015		44.45	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW24-ROX-070915	7/9/2015	38.89 - 48.89	44.65	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.00019 U	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
			Screening Values (mg/L)			6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
MW-25	MW25-ROX-102114	10/21/2014	35.59 - 45.59	36.44	NE	<20	501	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	MW25-ROX-012215	1/22/2015		38.45	NE	<2.5	62.8	<1.3	<1.3	<1.3	<1.3	<1.3	<1.3	<0.25	<0.25	<0.5	<0.25	<0.5	<1.3	<1.3	<0.25	<0.25	<0.25	<0.25	<0.5	<0.5	<0.13	<6.3
	MW25-ROX-042115	4/21/2015		39.71	NE	<0.5	78.7	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.05	<0.05	<0.1	<0.05	<0.1	<0.25	<0.25	<0.05	<0.05	<0.05	<0.05	<0.1	<0.1	<0.025	<1.3
	MW25-ROX-071515	7/15/2015		38.40	NE	<2	71.9	<1	<1	<1	<1	<1	<1	<0.2	<0.2	<0.4	<0.2	<0.4	<1	<1	<0.2	<0.2	<0.2	<0.2	<0.4	<0.4	<0.1	<5
MW-26	MW26-ROX-102114	10/21/2014	38.15 - 48.15	39.43	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW26-ROX-011215	1/12/2015		41.09	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW26-ROX-040815	4/8/2015		42.52	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW26-ROX-070815	7/8/2015	38.15 - 48.15	41.76	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
MW-27	MW27-ROX-102114	10/21/2014	39.79 - 49.79	41.57	NE	<0.01	0.00033 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW27-ROX-011515	1/15/2015		42.06	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW27-ROX-041015	4/10/2015		43.22	NE	0.0027 J	0.00035 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW27-ROX-071015	7/10/2015	39.79 - 49.79	43.00	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
MW-28	MW28-ROX-102114	10/21/2014	33.61 - 43.61	36.44	NE	<0.01	0.0081	<0.005	<0.005	<0.005	0.00083 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.00049 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW28-ROX-011515	1/15/2015		41.14	NE	<0.01	0.0541	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW28-ROX-041415	4/14/2015		42.34	NE	<0.01	0.0189	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	MW28-ROX-071515	7/15/2015	33.61 - 43.61	42.19	NE	<0.01	0.0668	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
P-114	P114-ROX-110912	11/9/2012	32.67 - 52.67	30.90	NE	<0.0144 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P114-ROX-012313	1/23/2013		30.22	NE	<0.005	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	P114-ROX-041513	4/15/2013		31.80	NE	<0.0059 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P114-ROX-071813	7/18/2013		27.22	NE	<0.251 U	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P114-ROX-071813-DUP	7/18/2013		27.22	NE	<0.245 U	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P114-ROX-101713	10/17/2013		29.43	NE	0.0047 J	0.00074	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P114-ROX-012814	1/28/2014		32.11	NE	0.142	0.0013	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P114-ROX-042114	4/21/2014		32.22	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P114-ROX-071814	7/18/2014		30.87	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	P114-ROX-101714	10/17/2014		29.43	NE	<0.01	<0.0005	<0.005	<0.005	0.0052 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	0.0006 J J	<0.002	<0.0005	<0.025
	P114-ROX-012115	1/21/2015		31.53	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P114-ROX-041715	4/17/2015		NM	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P114-ROX-070815	7/8/2015	32.67 - 52.67	29.16	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	0.0015 J	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
P-54	P54-ROX-103012	10/30/2012	38.00 - 63.00	40.70	NE	<0.005 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P54-ROX-011113	1/11/2013		41.56	NE	<0.005	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P54-ROX-041013	4/10/2013		41.80	NE	<0.01	0.172	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P54-ROX-050313	5/3/2013		41.80	NE	<0.01 UJ	0.0028	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P54-ROX-071113	7/11/2013		39.07	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	P54-ROX-100813	10/8/2013		39.94	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P54-ROX-011514	1/15/2014		42.20	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P54-ROX-040914	4/9/2014		42.80	NE	<0.01	0.00081	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P54-ROX-071114	7/10/2014		41.71	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P54-ROX-100814	10/8/2014		40.88	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P54-ROX-011415	1/14/2015		41.79	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P54-ROX-041015	4/10/2015		43.20	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P54-ROX-070915	7/9/2015	38.00 - 63.00	42.25	NE	<0.01 UJ	<0.0005	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
					Screening Values (mg/L)	6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
P-55	P55-ROX-012113	1/21/2013	39.82 - 64.82	45.24	NE	<0.25	0.571	<0.05	<0.25	0.0533	0.011 J	<0.05	<0.05	<0.05	<0.05	<0.1	<0.01	<0.1	<0.05	<0.05	<0.01	<0.01	<0.01	<0.05	<0.05	<0.05	<0.01	
	P55-ROX-012113	1/21/2013		45.24	NE	<0.005	0.538	<0.005	<0.253 U	0.0203	0.0143	0.0013 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0055	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
P-55R	P55-ROX-041513	4/15/2013	40.43 - 50.43	43.63	NE	<0.02 UJ	0.434	<0.01	<0.01	0.0052 J	0.0196	<0.01	<0.01	<0.002	<0.002	<0.004	<0.002	<0.004	<0.01	<0.01	<0.002	<0.002	<0.002	<0.002	<0.004	<0.004	<0.001	<0.05
	P55-ROX-071613	7/16/2013		40.06	NE	<0.01	0.573	<0.005	<0.005	0.0256	0.0155	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0065	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P55-ROX-101013	10/10/2013		41.67	NE	<0.01	0.757	<0.005	<0.005	0.0239	0.0147	0.0013 J	<0.005	<0.001	<0.001	0.005	<0.001	0.0017 J	<0.005	0.0066	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
P-56	P56-ROX-103112	10/31/2012	40.82 - 65.82	44.80	NE	<0.005 UJ	0.176	<0.005	<0.005	<0.005	0.005	0.0021 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0041 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P56-ROX-011713	1/17/2013		45.65	NE	<0.025	0.191	<0.025	<0.025	0.0031 J	<0.025	<0.025	<0.025	<0.005	<0.005	<0.01	<0.005	<0.01	<0.025	<0.025	<0.005	<0.005	<0.005	<0.005	<0.01	<0.01	<0.0025	<0.13
	P56-ROX-041213	4/12/2013		46.12	NE	<0.02 U	0.131	<0.01	<0.01	<0.01	0.0142	<0.01	<0.01	<0.002	<0.002	<0.004	<0.002	<0.004	<0.01	<0.01	<0.002	<0.002	<0.002	<0.002	<0.004	<0.004	<0.001	<0.05
	P56-ROX-071513	7/15/2013		43.25	NE	<0.156 U	0.131	<0.005	<0.005	0.0141	0.0072	0.0038 J	<0.005	<0.001	<0.001	0.0047	<0.001	<0.002	<0.005	0.0061	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P56-ROX-101013	10/10/2013		44.48	NE	<0.01	0.14	<0.005	<0.005	0.0088	0.005	0.0018 J	<0.005	<0.001	<0.001	0.0038	<0.001	<0.002	<0.005	0.0046 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	0.001	<0.025
	P56-ROX-012214	1/22/2014		46.35	NE	<0.01	0.0895	<0.005	<0.005	0.0033 J	0.0023 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0018 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P56-ROX-041414	4/14/2014		47.32	NE	<0.01	0.128	<0.005	<0.005	0.0069	0.0046 J	0.0014 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0034 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P56-ROX-070814	7/8/2014		45.97	NE	0.0626 J	0.127 J	<0.005	0.0132 J	0.0159 J	0.0073 J	0.0034 J J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0058 J	<0.001	<0.001	<0.001	0.0018 J	<0.002	<0.002	<0.0005	<0.025 UJ
	P56-ROX-101314	10/13/2014		45.05	NE	<0.01 UJ	0.107	<0.005	<0.005	0.0062	0.004 J	0.0012 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0035 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P56-ROX-011915	1/19/2015		46.58	NE	<0.01	0.0991	<0.005	<0.005	0.004 J	0.0037 J	0.00077 J	0.004 J	<0.001	<0.001	<0.002	<0.001	0.0045	<0.005	0.003 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P56-ROX-041515	4/15/2015		48.05	NE	<0.01	0.0965	<0.005	<0.005	0.0028 J	0.0042 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0033 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P56-ROX-071015	7/10/2015	40.82 - 65.82	47.34	NE	<0.01	0.0683	<0.005	<0.005	<0.005	0.0034 J	0.00068 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0027 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
P-57	P57-ROX-110512	11/5/2012	40.46 - 65.46	44.98	NE	<2.5	142	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P57-ROX-012913	1/29/2013		45.92	NE	<2.5	114	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	1.43	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P57-ROX-041113	4/11/2013		46.29	NE	<5	141	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P57-ROX-071613	7/16/2013		43.38	NE	<0.01	254	<0.005	<0.005	0.0143 J	0.0131 J	0.0103 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0119 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P57-ROX-101413	10/14/2013		44.38	NE	<0.01	288	<0.005	<0.005	0.0129	0.0116	0.0163	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0113	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P57-ROX-020314	2/3/2014		46.57	NE	<10	261	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	P57-ROX-041514	4/15/2014		46.70	NE	<0.01 UJ	384	<0.005	0.0055	0.0151	0.0131	0.0147	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0114	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P57-ROX-070814	7/8/2014		45.95	NE	0.0497 J	384	<0.005 UJ	<0.005 UJ	0.011 J	0.0091 J	0.0066 J	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.002 UJ	<0.001 UJ	<0.002 UJ	<0.005 UJ	0.0081 J	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.002 UJ	<0.002 UJ	<0.0005 UJ	<0.025 UJ
	P57-ROX-070814-DUP	7/8/2014		45.95	NE	0.0441 J	377	<0.005 UJ	0.0086 J	0.0114 J	0.0097 J	0.007 J	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.002 UJ	<0.001 UJ	<0.002 UJ	<0.005 UJ	0.0085 J	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.002 UJ	<0.002 UJ	<0.0005 UJ	<0.025 UJ
	P57-ROX-101414-DUP	10/14/2014		45.00	NE	<20 UJ	220	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	P57-ROX-101414	10/14/2014		45.00	NE	<20 UJ	255	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	P57-ROX-012315	1/23/2015	44.19 - 54.19	47.52	NE	<5	107	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P57-ROX-042015	4/20/2015		48.73	NE	<0.5	134	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.05	<0.05	<0.1	<0.05	<0.1	<0.25	<0.25	<0.05	<0.05	<0.05	<0.05	<0.1	<0.1	<0.025	<1.3
	P57-ROX-071315	7/13/2015	44.19 - 54.19	47.81	NE	<10	138	<5	<5	<5	<5	<5	0.852 J	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
P-58	P58-ROX-110612	11/6/2012	40.21 - 65.21	43.09	NE	<0.5 UJ	415	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.1 UJ	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
	P58-ROX-121012	12/10/2012		43.09	NE																							
	P58-ROX-012213	1/22/2013		44.21	NE	<5	552	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	P58-ROX-041113	4/11/2013		44.40	NE	<20	532	<10	<20	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	P58-ROX-071613	7/16/2013		41.49	NE	<0.01	398	<0.005	<0.005	0.0239	0.0215	0.0532	<0.005	<0.001	0.0017	<0.002	<0.001	<0.002	<0.005	0.0152	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P58-ROX-101413	10/14/2013		42.19	NE	<0.01	647	<0.005	<0.005	0.023	0.0235	0.0483	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0143	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P58-ROX-020314	2/3/2014		44.66	NE	<10	496	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	P58-ROX-041514	4/15/2014		45.66	NE	<0.01 UJ	782	<0.005	0.0056 J	0.0216 J	0.0185 J	0.0396 J	<0.005	<0.001	0.0013 J	<0.002	<0.001	<0.002	<0.005	0.0116 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P58-ROX-071814	7/18/2014		43.80	NE	<20	406	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<25 UJ
	P58-ROX-101514	10/15/2014		43.14	NE	<5	493	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P58-ROX-012315	1/23/2015		45.32	NE	<10	304	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	P58-ROX-042015	4/20/2015		46.67	NE	<0.1	325	<0.05	<0.05	0.0087 J	0.0094 J	0.0242 J	<0.05	<0.01	<0.01	<0.02	<0.01	<0.02	<0.05	0.0051 J	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.005	<0.25
	P58-ROX-071415	7/14/2015	40.21 - 65.21	45.54	NE	<10	266	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25

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						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
				Screening Values (mg/L)		6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
P-59	P59-ROX-110212	11/2/2012	47.91 - 72.91	45.98	NE	<0.5 UJ	10.3	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.1	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
	P59-ROX-110212-DUP	11/2/2012		45.98	NE	<0.5 UJ	10.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.1	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
	P59-ROX-013013	1/30/2013		46.60	NE	<0.25	12.1	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.05	<0.05	<0.1	<0.05	<0.1	<0.25	<0.25	<0.05	<0.05	<0.05	<0.05	<0.1	<0.1	<0.025	<1.3
	P59-ROX-041213	4/12/2013		46.95	NE	<0.5 UJ	15	<0.25	<0.25	<0.25	0.289	<0.25	<0.25	<0.05	<0.05	<0.1	<0.05	<0.1	<0.25	<0.25	<0.05	<0.05	<0.05	<0.05	<0.1	<0.1	<0.025	<1.3
	P59-ROX-041213-DUP	4/12/2013		46.95	NE	<0.5 UJ	13.4	<0.25	<0.25	<0.25	0.288	<0.25	<0.25	<0.05	<0.05	<0.1	<0.05	<0.1	<0.25	<0.25	<0.05	<0.05	<0.05	<0.05	<0.1	<0.1	<0.025	<1.3
	P59-ROX-071613	7/16/2013		44.13	NE	<0.01	10.2	<0.005	<0.005	0.0213 J	0.0068 J	0.0027 J J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0046 J J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P59-ROX-101013	10/10/2013		45.50	NE	<0.01	14.7	<0.005	<0.005	0.0224	<0.005	0.0024 J	<0.005	<0.001	<0.001	0.0034	<0.001	<0.002	<0.005	0.0051	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P59-ROX-020314	2/3/2014		47.35	NE	<0.2	15.9	<0.1	<0.1	0.0165 J	<0.1	<0.1	<0.1	<0.02	<0.02	<0.04	<0.02	<0.04	<0.1	<0.1	<0.02	<0.02	<0.02	<0.02	<0.04	<0.04	<0.01	<0.5
	P59-ROX-041514	4/15/2014		48.60	NE	<0.01 UJ	14.8	<0.005	0.0253	0.0181	0.0035 J	0.0014 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0029 J	<0.001	<0.001	<0.001	0.0023	<0.002	<0.002	<0.0005	<0.025
	P59-ROX-070814	7/8/2014		47.69	NE	0.057 J	12.4	<0.005	0.0169 J	0.0251 J	0.0073 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0046 J J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	P59-ROX-101414	10/14/2014		46.18	NE	<0.01 UJ	12	<0.005	<0.005	0.0278 J	0.0097 J	0.0024 J J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0043 J J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P59-ROX-011915	1/19/2015		47.42	NE	<1	13.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.1	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
	P59-ROX-041615	4/16/2015		48.83	NE	<0.1	9.43	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.01	<0.01	<0.02	<0.01	<0.02	<0.05	<0.05	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.005	<0.25
	P59-ROX-071315	7/13/2015	47.91 - 72.91	47.85	NE	<0.25	3.08	<0.13	<0.13	<0.13	<0.13	<0.13	<0.13	<0.025	<0.025	<0.05	<0.025	<0.05	<0.13	<0.13	<0.025	<0.025	<0.025	<0.025	<0.05	<0.05	<0.013	<0.63
P-66	P66-ROX-103112	10/31/2012	34.72 - 59.72	34.75	NE	<0.005	0.223	<0.005	<0.005	0.0145	0.02	0.0054	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-011813	1/18/2013		35.70	NE	<0.005	0.0896	<0.005	<0.005	0.0129	0.0227	0.0087	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-041113	4/11/2013		36.03	NE	<0.01	0.0444	<0.005	<0.01	0.0199	0.0249	0.0104	<0.005	<0.001	<0.001	0.00065 J	<0.001	<0.002	<0.005	0.0093	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-071213	7/12/2013		33.20	NE	<0.01	0.187	<0.005	<0.005	0.0146	0.0221	0.006	<0.005	<0.001 UJ	0.00059 J	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-101013	10/10/2013		33.66	NE	0.0095 J	0.0646	<0.005	<0.005	0.0141	0.0186	0.0067	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-110713	11/7/2013		33.66	NE	<0.01	0.03	<0.005	<0.005	0.0088	0.0102	0.0071	<0.005	<0.001	0.0007 J	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-012914	1/29/2014		36.39	NE	<0.01	0.008	<0.005	<0.005	0.016	0.0205	0.0053	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-041114	4/11/2014		37.10	NE	<0.01	0.0052	<0.005	<0.005	0.0129	0.0168	0.0041 J	<0.005	<0.001	0.00052 J	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-070714	7/7/2014		35.60	NE	<0.01 UJ	0.0429	<0.005	<0.005	0.0112	0.0147	0.0023 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-101414	10/14/2014		34.48	NE	<0.01 UJ	0.0212	<0.005	<0.005	0.0135	0.0173	0.0036 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-011615	1/16/2015		36.62	NE	<0.01	0.0083	<0.005	<0.005	0.0162	0.021	0.0048 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-011615-DUP	1/16/2015		36.62	NE	<0.01	0.0076	<0.005	<0.005	0.0147	0.0198	0.0045 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-041415	4/14/2015		38.27	NE	<0.01	0.0223	<0.005	<0.005	0.0127	0.0181	0.0039 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-041415-DUP	4/14/2015		38.27	NE	<0.01	0.0214	<0.005	<0.005	0.0124	0.0177	0.004 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P66-ROX-070815	7/8/2015	34.72 - 59.72	37.24	NE	<0.01 UJ	0.0404	<0.005	<0.005 UJ	0.0124	0.0164	0.0027 J	<0.005	<0.001	0.00035 J	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	P66-ROX-070815-DUP	7/8/2015		37.24	NE	<0.01 UJ	0.0424	<0.005	<0.005 UJ	0.0126	0.0167	0.0027 J	<0.005	<0.001	0.00038 J	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
P-74	P74-ROX-110112	11/1/2012	44.43 - 69.43	41.72	NE	<0.1	3.5	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.02	<0.02	<0.04	<0.02	<0.04	<0.1	<0.1	<0.02	<0.02	<0.02	<0.02	<0.04	<0.04	<0.01	<0.5
	P74-ROX-011713	1/17/2013		42.65	NE	<0.1	4.99	<0.1	<0.1	0.0143 J	<0.1	<0.1	<0.1	<0.02	<0.02	<0.04	<0.02	<0.04	<0.1	<0.1	<0.02	<0.02	<0.02	<0.02	<0.04	<0.04	<0.01	<0.5
	P74-ROX-041113	4/11/2013		42.83	NE	<0.01	0.144	<0.005	<0.01	0.0026 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P74-ROX-071513	7/15/2013		40.11	NE	<0.0046 U	0.117	<0.005	<0.005	0.0088	0.002 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0017 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P74-ROX-101413	10/14/2013		41.72	NE	<0.01	1.55	<0.005	<0.005	0.0158	0.003 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0031 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P74-ROX-012414	1/24/2014		43.35	NE	<0.01	4.45	<0.005	<0.005	0.0252	0.0031 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0031 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P74-ROX-041514	4/15/2014		44.74	NE	0.0398 J	0.0349	<0.005	<0.005	0.0013 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P74-ROX-070814	7/8/2014		43.02	NE	<0.01 UJ	0.309	<0.005	<0.005	0.0138	0.0014 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0018 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	P74-ROX-101414	10/14/2014		41.48	NE	<0.01 UJ	0.00068	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P74-ROX-011915	1/19/2015		43.47	NE	<0.01	3.13	<0.005	<0.005	0.0163	0.0022 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0029 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P74-ROX-041515	4/15/2015		44.61	NE	<0.01	0.032	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.00033 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P74-ROX-071015	7/10/2015	44.43 - 69.43	43.28	NE	0.011	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
					Screening Values (mg/L)	6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
P-93A	P93A-ROX-110712	11/7/2012	48.17 - 63.17	45.00	NE	<0.5 UJ	148	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.1	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
	P93A-ROX-110712-DUP	11/7/2012		45.00	NE	<0.5 UJ	156	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.1	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
	P93A-ROX-012313	1/23/2013		45.89	NE	<2.5	101	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13 UJ
	P93A-ROX-012313-DUP	1/23/2013		45.89	NE	<2.5	98.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13 UJ
	P93A-ROX-041113	4/11/2013		46.29	NE	<5	120	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P93A-ROX-041113-DUP	4/11/2013		46.29	NE	<5	120	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P93A-ROX-071813	7/18/2013		43.25	NE	<0.0053 U	89.1	<0.005	<0.005	<0.005	0.0056	0.0916	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0024 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.001	<0.05
	P93A-ROX-101113	10/11/2013		44.18	NE	<0.01 UJ	197	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0025 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93A-ROX-012914	1/29/2014		46.53	NE	<5	136	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P93A-ROX-041714	4/17/2014		47.41	NE	<5	132	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P93A-ROX-071814	7/18/2014		45.70	NE	<10	170	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<13 UJ
	P93A-ROX-071814-DUP	7/18/2014		45.70	NE	<10	174	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<13 UJ
	P93A-ROX-101514	10/15/2014		45.06	NE	<5	293	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P93A-ROX-101514-DUP	10/15/2014		45.06	NE	<5	277	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P93A-ROX-012715	1/27/2015	43.07 - 53.07	46.05	NE	<0.025 UJ	168	<0.001 UJ	<0.005 UJ	0.0023 J	0.0069 J	0.0186 J	<0.002 UJ	<0.001 UJ	<0.001 UJ	0.00078 J J	<0.001 UJ	<0.002 UJ	<0.001 UJ	0.0064 J	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.2 UJ
	P93A-ROX-041715	4/17/2015		47.02	NE	<0.01	139	<0.005	<0.005	0.00077 J	0.0048 J	0.014	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0036 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93A-ROX-071315	7/13/2015	43.07 - 53.07	45.93	NE	<1	315	<0.5	<0.5	<0.5	<0.5	<0.5	0.0476 J	<0.1	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
P-93B	P93B-ROX-110712	11/7/2012	74.60 - 76.60	45.05	NE	<0.5 UJ	162 J	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.1	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
	P93B-ROX-110712-DUP	11/7/2012		45.05	NE	<0.5 UJ	413 J	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.1	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
	P93B-ROX-012313	1/23/2013		45.89	NE	<5	415	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25 UJ
	P93B-ROX-041113	4/11/2013		46.32	NE	<5	618	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P93B-ROX-071813	7/18/2013		43.30	NE	<0.01	296	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.001	<0.05
	P93B-ROX-101613	10/16/2013		44.43	NE	<20	187	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	P93B-ROX-101613-DUP	10/16/2013		44.43	NE	<20	180	<10	<10	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50
	P93B-ROX-012814	1/28/2014		46.58	NE	<10	242	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	P93B-ROX-012814-DUP	1/28/2014		46.58	NE	<10	293	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	P93B-ROX-041714	4/17/2014		47.46	NE	<5	134	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P93B-ROX-041714-DUP	4/17/2014		47.46	NE	<5	126	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P93B-ROX-071714	7/17/2014		45.75	NE	<0.01 UJ	175	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ	0.00042 J J	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.002 UJ	<0.001 UJ	<0.002 UJ	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.002 UJ	<0.002 UJ	<0.0005 UJ	<0.025 UJ
	P93B-ROX-101514	10/15/2014		45.15	NE	<5 UJ	241	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13
	P93B-ROX-012315	1/23/2015		47.24	NE	<10	564	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	P93B-ROX-012315-DUP	1/23/2015		47.24	NE	<10	623	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	P93B-ROX-021915	2/19/2015		47.24	NE	<250	625	<0.5	<2.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<1	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<100
	P93B-ROX-041615	4/16/2015		48.42	NE	<0.01	400	<0.005	<0.005	<0.005	<0.005	0.001 J	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93B-ROX-041615-DUP	4/16/2015		48.42	NE	<10	388	<5	<5	<5	<5	<5	<5	<1	<1	<2	<1	<2	<5	<5	<1	<1	<1	<1	<2	<2	<0.5	<25
	P93B-ROX-070915	7/9/2015	74.60 - 76.60	47.74	NE	<50 UJ	497 J	<25	<25 UJ	<25	<25	<25	<25	<5	<5	<10	<5	<10	<25	<25	<5	<5	<5	<5	<10	<10	<2.5	<130 UJ
	P93B-ROX-070915-DUP	7/9/2015		47.74	NE	<20 UJ	371 J	<10	<10 UJ	<10	<10	<10	<10	<2	<2	<4	<2	<4	<10	<10	<2	<2	<2	<2	<4	<4	<1	<50 UJ

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
					Screening Values (mg/L)	6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
P-93C	P93C-ROX-110812	11/8/2012	94.26 - 96.26	45.12	NE	<0.005	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93C-ROX-012313	1/23/2013		45.78	NE	<0.005	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	P93C-ROX-041213	4/12/2013		46.21	NE	<0.0056 UJ	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93C-ROX-071813	7/18/2013		43.31	NE	<0.01	101	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.001	<0.05
	P93C-ROX-080813	8/8/2013		43.31	NE	<0.5	19.1	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.05	<0.05	<0.1	<0.05	<0.1	<0.25	<0.25	<0.05	<0.05	<0.05	<0.05	<0.1	<0.1	<0.025	<1.3
	P93C-ROX-101613	10/16/2013		44.31	NE	<0.01	1.4	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93C-ROX-012414	1/24/2014		46.44	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93C-ROX-041714	4/17/2014		47.34	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93C-ROX-071714	7/17/2014		45.61	NE	<0.01	1.55	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93C-ROX-101514	10/15/2014		44.99	NE	<0.01	0.00075	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93C-ROX-011915	1/19/2015	92.47 - 97.47	46.77	NE	<1	102	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.1	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
	P93C-ROX-021915	2/19/2015		46.77	NE	<25	75.4	<1	<5	<1	<1	<1	<2	<1	<1	<2	<1	<2	<1	<1	<1	<1	<1	<1	<5	<1	<1	<200
	P93C-ROX-041615	4/16/2015		48.22	NE	<1	55.3	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.1	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
	P93C-ROX-071315	7/13/2015	92.47 - 97.47	47.09	NE	<0.01	0.0365	<0.005	<0.005	<0.005	<0.005	<0.005	<0.00025 U	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
P-93D	P93D-ROX-110812	11/8/2012	125.75 - 127.75	NM	NE	<0.005	0.049	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93D-ROX-012213	1/22/2013		44.21	NE	<0.005	0.106	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93D-ROX-041113	4/11/2013		46.37	NE	<0.01	<0.0005	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93D-ROX-071213	7/12/2013		43.51	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001 UJ	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93D-ROX-101113	10/11/2013		44.24	NE	<0.01	0.0014	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93D-ROX-013114	1/31/2014		46.62	NE	<0.01	0.0012	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	0.00062 J	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	0.0044	<0.0005	<0.025
	P93D-ROX-041414	4/14/2014		47.54	NE	<0.01	0.0022	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	0.00069 J	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	0.0164	<0.0005	<0.025
	P93D-ROX-071714	7/17/2014		45.78	NE	<0.01	0.00064	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	P93D-ROX-101514	10/15/2014		45.14	NE	<0.1	36.4	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.01	<0.01	<0.02	<0.01	<0.02	<0.05	<0.05	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.005	<0.25
	P93D-ROX-110414	11/4/2014		45.14	NE	<0.01	19.9	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	0.0079	<0.0005	<0.025
	P93D-ROX-012315	1/23/2015		42.28	NE	<2.5	62.6	<1.3	<1.3	<1.3	<1.3	<1.3	<1.3	<0.25	<0.25	<0.5	<0.25	<0.5	<1.3	<1.3	<0.25	<0.25	<0.25	<0.25	<0.5	<0.5	<0.13	<6.3
	P93D-ROX-021915	2/19/2015		42.28	NE	<130	240	<2.5	<13	<2.5	<2.5	<2.5	<5	<2.5	<2.5	<5	<2.5	<5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<13	<2.5	<2.5	<500
	P93D-ROX-042015	4/20/2015		48.52	NE	<1	131	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.1	<0.1	<0.2	<0.1	<0.2	<0.5	<0.5	<0.1	<0.1	<0.1	<0.1	<0.2	<0.2	<0.05	<2.5
	P93D-ROX-070915	7/9/2015	125.75 - 127.75	47.96	NE	<5 UJ	21.2	<2.5	<2.5 UJ	<2.5	<2.5	<2.5	<2.5	<0.5	<0.5	<1	<0.5	<1	<2.5	<2.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.25	<13 UJ
ROST-3-PZ	ROST3PZ-ROX-110112	11/1/2012	40.00 - 50.00	40.82	NE	<0.005	0.0052	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
ROST-3-MW	ROST3MW-ROX-012313	1/23/2013	37.81 - 47.81	41.50	NE	<0.005	0.0051 J	<0.005	<0.005	0.0028 J	0.0013 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0011 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025 UJ
	ROST3MW-ROX-040513	4/5/2013				<0.005 UJ	0.0605	<0.005	<0.005	<0.005	0.0011 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0012 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST3MW-ROX-071113	7/11/2013		39.50	NE	<0.01 UJ	0.0125	<0.005	<0.005 UJ	<0.005	0.0014 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0014 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	ROST3-MW-ROX-100913	10/9/2013		40.16	NE	<0.01	0.0033	<0.005	<0.0164	0.00073 J	<0.005	<0.005	<0.005	<0.001	<0.001	0.0034	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST3MW-ROX-011714	1/17/2014		42.20	NE	<0.01	0.004	<0.005	<0.005	0.0012 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST3MW-ROX-041014	4/10/2014		42.80	NE	<0.01	0.0075	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST3MW-ROX-071414	7/14/2014		41.88	NE	<0.01	0.0058	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST3MW-ROX-100914	10/9/2014		41.31	NE	<0.01 UJ	0.003	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST3MW-ROX-011515	1/15/2015		41.83	NE	<0.01	0.0022	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST3MW-ROX-041315	4/13/2015		43.43	NE	0.0251	0.0057	<0.005	<0.005	<0.005	<0.005	<0.005	0.00037 J	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST3MW-ROX-071315	7/13/2015	37.81 - 47.81	42.36	NE	<0.01	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.00066 U	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025

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TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Acetone	Benzene	Bromobenzene	2-Butanone	n-Butylbenzene	sec-Butylbenzene	tert-Butylbenzene	Carbon disulfide	Carbon tetrachloride	Chlorobenzene	Chloroethane	Chloroform	Chloromethane	4-Chlorotoluene	Cymene (p-Isopropyltoluene)	1,2-Dichlorobenzene	1,3-Dichlorobenzene	1,4-Dichlorobenzene	1,1-Dichloroethane	Dichloromethane (Methylene chloride)	1,2-Dichloropropane	trans-1,3-Dichloropropene	1,4-Dioxane
			Screening Values (mg/L)			6.3 [1]	0.005 [1]	0.056 [3]	4.2 [1]	0.35 [3]			0.7 [1]	0.005 [1]	0.100 [1]		0.07 [1]				0.6 [2]		0.075 [2]	1.4 [1]	0.005 [2]	0.005 [2]	0.001 [2]	0.0077 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																						
ROST-4-PZ(C)	ROST4PZC-ROX-102912	10/29/2012	34.95 - 44.95	40.75	NE	<0.005 UJ	0.0033	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002 UJ	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST4PZ(C)-ROX-011113	1/11/2013		41.42	NE	<0.005	<0.0005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST4PZC-ROX-041013	4/10/2013		42.27	NE	<0.01	0.0153 J	<0.005	<0.01	<0.005	<0.005	<0.005	<0.005	<0.001 UJ	<0.001 UJ	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.001	<0.002	<0.002 UJ	<0.0005 UJ	<0.025
	ROST4PZC-ROX-071113	7/11/2013		40.18	NE	<0.01 UJ	0.0497	<0.005	<0.005 UJ	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	
	ROST4PZC-ROX-100913	10/9/2013		39.91	NE	<0.01	0.00066	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST4PZC-ROX-011714	1/17/2014		41.92	NE	<0.01	0.0015	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST4PZC-ROX-041014	4/10/2014		42.05	NE	<0.01	0.0019	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST4C-ROX-071114	7/10/2014		42.22	NE	<0.01	0.0751	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST4PZC-ROX-100914	10/9/2014		41.30	NE	<0.01 UJ	0.039	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST4PZC-ROX-011515	1/15/2015		41.65	NE	0.016	0.0013	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST4PZC-ROX-041315	4/13/2015		43.00	NE	<0.01	0.0694	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	ROST4PZ-ROX-071315	7/13/2015	34.93 - 44.93	41.86	NE	<0.01	0.0683	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0011 U	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
T-12	T12-ROX-110512	11/5/2012	46.46 - 72.46	43.91	NE	<0.05	1.71	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.01	<0.01	<0.02	<0.01	<0.02	<0.05	<0.05	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.005	<0.25
	T12-ROX-011813	1/18/2013		44.50	NE	<0.025	2.03	<0.025	<0.0795 U	0.0056 J	0.0036 J	<0.025	<0.025	<0.005	<0.005	<0.01	<0.005	<0.01	<0.025	<0.025	<0.005	<0.005	<0.005	<0.005	<0.01	<0.01	<0.0025	<0.13 UJ
	T12-ROX-041513	4/15/2013		44.99	NE	<0.1 UJ	1.61	<0.05	<0.05	<0.05	0.0595	<0.05	<0.05	<0.01	<0.01	<0.02	<0.01	<0.02	<0.05	<0.05	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.005	<0.25
	T12-ROX-071613	7/16/2013		42.33	NE	<0.01	1.65	<0.005	<0.005	0.0069 J	0.003 J J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0025 J J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	T12-ROX-101513	10/15/2013		43.73	NE	0.0803	2.02	<0.025	0.0246 J	0.0098 J	0.0038 J	<0.025	<0.025	<0.005	<0.005	<0.01	<0.005	<0.01	<0.025	<0.025	<0.005	<0.005	<0.005	<0.005	<0.01	<0.01	<0.0025	<0.13
	T12-ROX-012414	1/24/2014		45.26	NE	<0.01	2.48	<0.005	<0.005	0.0083	0.0029 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	<0.005	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	T12-ROX-041514	4/15/2014		46.72	NE	<0.01 UJ	2.07	<0.005	0.017	0.0062	0.0024 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0018 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	T12-ROX-070814	7/8/2014		45.13	NE	0.0658 J	2.14	<0.005	0.0094	0.0096	0.0039 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0024 J	<0.001	<0.001	<0.001	0.0022	<0.002	<0.002	<0.0005	<0.025 UJ
	T12-ROX-101714	10/17/2014		44.40	NE	<0.1	1.83	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.01	<0.01	<0.02	<0.01	<0.02	<0.05	<0.05	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.005	<0.25
	T12-ROX-011915	1/19/2015		45.27	NE	<0.1	2.02	<0.05	<0.05	0.0115 J	<0.05	<0.05	<0.05	<0.01	<0.01	<0.02	<0.01	<0.02	<0.05	<0.05	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.005	<0.25
	T12-ROX-041515	4/15/2015		46.73	NE	<0.01	1.69	<0.005	<0.005	0.0094	0.0045 J	<0.005	<0.005	<0.001	<0.001	<0.002	<0.001	<0.002	<0.005	0.0025 J	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.0005	<0.025
	T12-ROX-071015	7/10/2015	46.46 - 72.46	46.09	NE	<0.1	2.3	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.01	<0.01	<0.02	<0.01	<0.02	<0.05	<0.05	<0.01	<0.01	<0.01	<0.01	<0.02	<0.02	<0.005	<0.25

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						VOCs																				
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
			Screening Values (mg/L)			0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-01	MW1-ROX-102612	10/26/2012	48.80 - 58.80	41.22	NE																						
	MW1-ROX-121712	12/17/2012		41.22	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0022	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW1-ROX-011013	1/10/2013		41.89	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0015	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW1-ROX-040913	4/9/2013		42.55	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0012	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW1-ROX-070813	7/8/2013		39.56	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0049	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW1-ROX-100313	10/3/2013		40.28	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0013	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW1-ROX-011414	1/14/2014		42.77	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0018	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW1-ROX-040714	4/7/2014		43.28	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW1-ROX-070914	7/9/2014		42.09	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0035	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW1-ROX-100614	10/6/2014		41.1	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.00082 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW1-ROX-011215	1/12/2015		42.73	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.00084 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW1-ROX-040615	4/6/2015		44.11	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.00059 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW1-ROX-070815	7/8/2015	48.80 - 58.80	43.35	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
MW-02	MW2-ROX-102612	10/26/2012	49.87 - 59.87	42.35	NE	0.763	<0.025	<0.025	<0.025		0.0764	<0.025	0.0115	0.0821	0.104	<0.025	<0.005	0.0216	<0.025	<0.025	<0.005	<0.005	0.299	0.129	<0.025	0.878	0.052	0.93
	MW2-ROX-011113	1/11/2013		42.94	NE	0.676	<0.01	<0.01	<0.01		0.0879	<0.01	<0.002	0.0768	0.121	<0.01	<0.002	0.0093	<0.01	<0.01	<0.002	<0.002	0.219	0.105	<0.01	0.685	0.0287	0.713
	MW2-ROX-040913	4/9/2013		43.70	NE	0.91	<0.025	<0.025	<0.025		0.085	<0.025	<0.005	0.0578	0.11	<0.025	<0.005	0.0073	<0.025	<0.025	<0.005	<0.005	0.338	0.155	<0.025	1.01	0.0454	1.05
	MW2-ROX-071113	7/11/2013		40.82	NE	1.57	<0.005	<0.005	<0.005 UJ		0.0931	<0.005	0.0062	0.114	0.127	<0.005	<0.001	0.11	<0.005	<0.005	<0.001	<0.001	0.522	0.175	<0.005 UJ	1.88	0.174	1.88
	MW2-ROX-100813	10/8/2013		41.73	NE	0.942	<0.005	<0.005	0.0079		0.0983	<0.005	0.0032	0.0939	0.132	<0.005	<0.001	0.0164	<0.005	<0.005	<0.001	<0.001	0.368	0.174	0.0768	0.912	0.0519	0.912
	MW2-ROX-012014	1/20/2014		44.00	NE	0.426	<0.005	<0.005	<0.005		0.102	<0.005	<0.001	0.0663	0.133	<0.005	<0.001	0.0099	<0.005	<0.005	<0.001	<0.001	0.264	0.156	<0.005	0.486	0.0304	0.516
	MW2-ROX-041014	4/10/2014		44.66	NE	0.478	<0.005	<0.005	<0.005		0.0816	<0.005	<0.001	0.0474	0.106	<0.005	<0.001	0.0072	<0.005	<0.005	<0.001	<0.001	0.181	0.121	<0.005	0.444	0.0275	0.472
	MW2-ROX-071414	7/14/2014		43.13	NE	0.955	<0.005	<0.005	<0.005		0.0966 J	<0.005	<0.001	0.0792 J	0.112 J	<0.005	<0.001	0.0113 J	<0.005	<0.005	<0.001	<0.001	0.341 J	0.15 J	<0.005	0.764	0.0845	0.804
	MW2-ROX-101014	10/10/2014		42.49	NE	0.386	<0.01	<0.01	<0.01 UJ		0.0675	<0.01	<0.002	0.0512	0.0867	<0.01	<0.002	0.006	<0.01	<0.01	<0.002	<0.002	0.135	0.0901	<0.01	0.26	0.0183	0.278
	MW2-ROX-011615	1/16/2015		44.1	NE	0.358	<0.005	0.0031 J	0.0039 J		0.0823	0.0061	<0.001	0.0626	0.107	0.00052 J	<0.001	0.0121	0.0051	0.0044 J	<0.001	0.0015	0.0895	0.102	<0.005	0.207	0.0206	0.228
	MW2-ROX-041315	4/13/2015		45.56	NE	0.547	<0.005	<0.005	<0.005		0.0613	<0.005	0.0013	0.068	0.0802	<0.005	<0.001	0.0103	<0.005	<0.005	<0.001	<0.001	0.185	0.0882	<0.005	0.549	0.0495	0.598
	MW2-ROX-071315	7/13/2015	49.87 - 59.87	44.53	NE	0.984	<0.005	<0.005	<0.005		0.0683	<0.005	<0.001	0.0878	0.0983	<0.005	<0.001	0.0103	<0.0015 U	<0.005	<0.001	<0.001	0.206	0.109	<0.005	0.719	0.0689	0.78
MW-03	MW3-ROX-102512	10/25/2012	34.67 - 44.67	28.39	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0027	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW3-ROX-010913	1/9/2013		29.35	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0008 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	0.007	<0.001	<0.001	<0.001
	MW3-ROX-040813	4/8/2013		29.74	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW3-ROX-071113	7/11/2013		26.32	NE	<0.001	<0.005	<0.005	<0.005 UJ		0.0049 J	<0.005	0.0035	<0.005	0.0055	<0.005	<0.001	0.0013	<0.005	<0.005	<0.001	<0.001	0.0013 J	<0.005	<0.005 UJ	0.0028	<0.001	0.0028
	MW3-ROX-100813	10/8/2013		27.38	NE	0.0025	<0.005	<0.005	<0.005		<0.005	<0.005	0.00075 J	<0.005	0.0021 J	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	0.0197	0.0011	<0.001	0.0011
	MW3-ROX-011614	1/16/2014		29.91	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW3-ROX-040914	4/9/2014		30.50	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW3-ROX-071114	7/10/2014		29.05	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW3-ROX-100914	10/9/2014		28.18	NE	<0.001	<0.005	<0.005	<0.005		0.0004 J	<0.005	0.0031	<0.005	0.00053 J	<0.005	<0.001	0.00046 J	<0.005	<0.005	<0.001	<0.001	0.0012 J	<0.005	<0.005 UJ	0.00095 J	<0.001	<0.00095 U
	MW3-ROX-011515	1/15/2015		29.65	NE	0.00039 J	<0.005	<0.005	<0.005		0.00065 J	<0.005	0.0101	<0.005	0.0018 J	<0.005	<0.001	0.00062 J	<0.005	<0.005	<0.001	<0.001	0.00071 J	0.00031 J	<0.005	0.0014	<0.001	0.0015
	MW3-ROX-041015	4/10/2015		31.16	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0012	<0.005	0.00042 J	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	0.00046 J
	MW3-ROX-071015	7/10/2015	34.67 - 44.67	30.01	NE	0.00039 J	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	0.00062 J	<0.005	<0.001	0.0014	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.00087 J	<0.001	0.00087 J

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
			Screening Values (mg/L)			0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-04	MW4-ROX-102912	10/29/2012	46.06 - 56.06	39.45	NE	<0.002	<0.01	<0.01	<0.01		0.0029 J	<0.01	0.0324	<0.01	0.0033 J	<0.01	<0.002	0.0175	<0.01	<0.01	<0.002	<0.002	<0.01	<0.01	<0.01	0.0114	<0.002	0.0114
	MW4-ROX-011113	1/11/2013		40.20	NE	0.00052 J	<0.005	<0.005	<0.005		0.0012 J	<0.005	0.0654	<0.005	0.0026 J	<0.005	<0.001	0.0075	<0.005	<0.005	<0.001	<0.001	0.0019 J	0.0024 J	<0.005	0.0056	<0.001	0.0056
	MW4-ROX-011113-DUP	1/11/2013		40.20	NE	0.00056 J	<0.005	<0.005	<0.005		0.0014 J	<0.005	0.0681	<0.005	0.003 J	<0.005	<0.001	0.0083	<0.005	<0.005	<0.001	<0.001	0.0019 J	0.0026 J	<0.005	0.006	<0.001	0.006
	MW4-ROX-030413	3/4/2013		40.20	NE	<0.1	<0.5	<0.5	<0.5		<0.5	<0.5	0.112	<0.5	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.5	<0.1	<0.1	<0.1
	MW4-ROX-040913	4/9/2013		40.90	NE	<0.002	<0.01	<0.01	<0.01		<0.01	<0.01	0.112	<0.01	<0.01	<0.01	<0.002	0.0057	<0.01	<0.01	<0.002	<0.002	<0.01	<0.01	<0.01	0.0052	<0.002	0.0062
	MW4-ROX-040913-DUP	4/9/2013		40.90	NE	0.00081 J	<0.005	<0.005	<0.005		<0.005	<0.005	0.125	<0.005	0.004 J	<0.005	<0.001	0.0076	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0073	0.0011	0.0084
	MW4-ROX-071713	7/17/2013		37.61	NE	0.0015	<0.005	<0.005	0.0041 J		0.0067	<0.005	0.0559	<0.005	0.008	<0.005	<0.001	0.0381	<0.005	<0.005	0.00085 J	<0.001	0.0012 J	<0.005	0.0392 J	0.0302	0.0052	0.0353
	MW4-ROX-101613	10/16/2013		38.80	NE	<0.01	<0.05 UJ	<0.05	<0.05		<0.05	<0.05	0.0333 J	<0.05	<0.05	<0.05	<0.01	<0.01	<0.05	<0.05	<0.01	<0.01	<0.05	<0.05	<0.05 UJ	<0.01	<0.01	0.0058 J
	MW4-ROX-013014	1/30/2014		41.09	NE	0.00048 J	<0.005	<0.005	<0.005		0.0021 J	<0.005	<0.001	<0.005	0.0026 J	<0.005	<0.001	0.0037	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0132	0.0049	0.0181
	MW4-ROX-041614	4/16/2014		41.91	NE	<0.001	<0.005	<0.005	<0.005		0.00059 J	<0.005	<0.001	<0.005	0.00081 J	<0.005	<0.001	0.00099 J	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0027	0.00039 J	0.0031
	MW4-ROX-071614	7/16/2014		40.18	NE	<0.01	<0.005	<0.005	<0.005		<0.05	<0.005	<0.001	<0.05	<0.05	<0.005	<0.001	0.006 J	<0.005	<0.005	<0.001	<0.001	<0.05	<0.05	<0.005	<0.01	<0.01	0.0055 J
	MW4-ROX-101614	10/16/2014		39.49	NE	<0.005	<0.025	<0.025	<0.025		0.0026 J	<0.025	0.0379	<0.025	<0.025	<0.025	<0.005	<0.005	<0.025 UJ	<0.025	<0.005	<0.005	0.0037 J	<0.025	<0.025 UJ	0.0086	0.0022 J	0.0108
	MW4-ROX-012115	1/21/2015		41.27	NE	<0.001	<0.005	<0.005	<0.005		0.0012 J	<0.005	0.0536	<0.005	0.00093 J	<0.005	<0.001	0.0024	<0.005	<0.005	<0.001	<0.001	0.00045 J	<0.005	<0.005	0.006	0.0013	0.0074
	MW4-ROX-042115	4/21/2015	45.06 - 55.06	42.58	NE	0.00051 J	<0.005	<0.005	<0.005		0.0012 J	<0.005	<0.001	<0.005	0.0013 J	<0.005	<0.001	0.0024	<0.005	<0.005	<0.001	<0.001	0.00045 J	<0.005	<0.005	0.0042	0.0011	0.0053
	MW4-ROX-071415	7/14/2015	45.06 - 55.06	41.30	NE	0.00057 J	<0.005	<0.005	<0.005		0.0026 J	<0.005	<0.001	<0.005	0.0029 J	<0.005	<0.001	0.0033	<0.005	<0.005	<0.001	<0.001	0.00058 J	0.00024 J	<0.005	0.0082	0.0016	0.0098
MW-05	MW5-ROX-102912	10/29/2012	33.97 - 43.97	28.16	NE	<0.001	<0.005	<0.005	<0.005		0.002 J	<0.005	0.0219	<0.005	<0.005	<0.005	<0.001	0.0018	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0018	<0.001	0.0018
	MW5-ROX-011113	1/11/2013		28.75	NE	<0.001	<0.005	<0.005	<0.005		0.00086 J	<0.005	0.0295	<0.005	<0.005	<0.005	<0.001	0.0008 J	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW5-ROX-040913	4/9/2013		29.41	NE	<0.001	<0.005	<0.005	<0.005		0.00085 J	<0.005	0.0427	<0.005	<0.005	<0.005	<0.001	0.002	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.001	<0.001	0.0014
	MW5-ROX-070913	7/9/2013		26.04	NE	<0.001	<0.005	<0.005	<0.005		0.0268	<0.005	0.0121	<0.005	0.0132	<0.005	<0.001	0.0029	<0.005	<0.005	0.0018	<0.001	<0.005	<0.005	<0.005 UJ	0.0079	0.0018	0.0097
	MW5-ROX-100813	10/8/2013		26.97	NE	<0.001	<0.005	<0.005	<0.005		0.0045 J	<0.005	0.0221	<0.005	<0.005	<0.005	<0.001	0.002	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	0.0129	0.0044	0.00097 J	0.0054
	MW5-ROX-011714	1/17/2014		29.59	NE	<0.001	<0.005	<0.005	<0.005		0.00097 J	<0.005	0.0282	<0.005	<0.005	<0.005	<0.001	0.0014	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0081	0.0045	0.0127
	MW5-ROX-041014	4/10/2014		30.09	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0344	0.001 J	<0.005	<0.005	<0.001	0.0013	<0.005	<0.005	<0.001	<0.001	0.00052 J	<0.005	<0.005	0.0013	0.00095 J	0.0023
	MW5-ROX-071414	7/14/2014		28.59	NE	<0.001	<0.005	<0.005	<0.005		0.00049 J	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	0.0016	<0.005	<0.005	<0.001	<0.001	0.00033 J	<0.005	<0.005	0.002	0.00073 J	0.0027
	MW-5-ROX-100914	10/9/2014		27.75	NE	<0.001	<0.005	<0.005	<0.005 UJ		0.0012 J	<0.005	0.019	<0.005	<0.005	<0.005	<0.001	0.0015	<0.005	<0.005	<0.001	<0.001	0.00058 J	<0.005	<0.005	0.0027	0.0012 J	0.0039
	MW5-ROX-011515	1/15/2015		29.34	NE	<0.001	<0.005	<0.005	<0.005		0.0057	<0.005	0.0215	<0.005	0.0018 J	<0.005	<0.001	0.0014	<0.005	<0.005	<0.001	<0.001	0.00037 J	0.00031 J	<0.005	0.0076	0.0015	0.009
	MW5-ROX-041315	4/13/2015		30.97	NE	0.0005 J	<0.005	<0.005	<0.005		0.0076	<0.005	0.0349	<0.005	0.0056	<0.005	<0.001	0.00057 J	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0088	0.00051 J	0.0093
	MW5-ROX-071315	7/13/2015	33.97 - 43.97	29.45	NE	<0.001	<0.005	<0.005	<0.005		0.00097 J	<0.005	0.0413	<0.005	<0.005	<0.005	<0.001	0.00032 J	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0019	0.00032 J	0.0022
MW-06A	MW6A-ROX-102412	10/24/2012	34.83 - 44.83	30.06	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-011413	1/14/2013		31.00	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-040313	4/3/2013		31.62	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-070913	7/9/2013		28.25	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0027	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW6A-ROX-070913-DUP	7/9/2013		28.25	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0025	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW6A-ROX-100713	10/7/2013		28.87	NE	<0.001	<0.005	<0.005	<0.005 UJ		<0.005	<0.005	0.0131	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-100713-DUP	10/7/2013		28.87	NE	<0.001	<0.005	<0.005	<0.005 UJ		<0.005	<0.005	0.0132	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-011614	1/16/2014		31.62	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0108	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-011614-DUP	1/16/2014		31.62	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0103	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-040814	4/8/2014		32.16	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.00086 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-040814-DUP	4/8/2014		32.16	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-071014	7/10/2014		30.75	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0148	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-100814	10/8/2014		29.84	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0082	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-011415	1/14/2015		31.54	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-040715	4/7/2015		33.08	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0077	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6A-ROX-071515	7/15/2015	34.83 - 44.83	31.52	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0045	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
			Screening Values (mg/L)			0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-06B	MW6B-ROX-102412	10/24/2012	64.05 - 69.05	30.11	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0091	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6B-ROX-011713	1/17/2013		31.11	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0166	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6B-ROX-040313	4/3/2013		31.68	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0132	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6B-ROX-070913	7/9/2013		28.25	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0069	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW6B-ROX-100713	10/7/2013		28.93	NE	<0.001	<0.005	<0.005	<0.005 UJ		<0.005	<0.005	0.0113	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6B-ROX-011614	1/16/2014		31.67	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0069	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6B-ROX-040814	4/8/2014		32.21	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0047	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6B-ROX-071014	7/10/2014		30.81	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0054	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6B-ROX-100814	10/8/2014		29.87	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0031	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6B-ROX-011415	1/14/2015		31.59	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6B-ROX-040715	4/7/2015		33.10	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0052	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6B-ROX-040715-DUP	4/7/2015		33.10	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0054	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6B-ROX-071415	7/14/2015	64.05 - 69.05	31.56	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0048	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
MW-06C	MW6C-ROX-102412	10/24/2012	84.95 - 89.95	27.85	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6C-ROX-011713	1/17/2013		30.88	NE	<0.001 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ		<0.005 UJ	<0.005 UJ	0.0012 J	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ
	MW6C-ROX-040313	4/3/2013		31.41	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0022	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6C-ROX-070913	7/9/2013		28.03	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW6C-ROX-100713	10/7/2013		28.72	NE	<0.001	<0.005	<0.005	<0.005 UJ		<0.005	<0.005	0.00075 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6C-ROX-011614	1/16/2014		31.48	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.00068 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6C-ROX-040814	4/8/2014		32.01	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6C-ROX-071014	7/10/2014		30.60	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6C-ROX-100814	10/8/2014		29.67	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.00057 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6C-ROX-011415	1/14/2015		31.41	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0037	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6C-ROX-040915	4/9/2015		32.80	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6C-ROX-071415	7/14/2015	84.95 - 89.95	31.38	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
MW-06D	MW6D-ROX-102412	10/24/2012	104.72 - 109.72	29.71	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6D-ROX-011713	1/17/2013		30.75	NE	<0.001 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ		<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ
	MW6D-ROX-040313	4/3/2013		31.27	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6D-ROX-070913	7/9/2013		27.91	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW6D-ROX-100713	10/7/2013		28.58	NE	<0.001	<0.005	<0.005	<0.005 UJ		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6D-ROX-011614	1/16/2014		31.33	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.00061 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6D-ROX-040814	4/8/2014		31.85	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.00094 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6D-ROX-071014	7/10/2014		31.47	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6D-ROX-071014-DUP	7/10/2014		31.47	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6D-ROX-100814	10/8/2014		29.53	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.00054 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6D-ROX-100814-DUP	10/8/2014		29.53	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.00062 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6D-ROX-011415	1/14/2015		31.26	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6D-ROX-011415-DUP	1/14/2015		31.26	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6D-ROX-040715	4/7/2015		32.74	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW6D-ROX-071415	7/14/2015	104.72 - 109.72	31.19	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001

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						VOCs																				
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
			Screening Values (mg/L)			0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-07	MW7-ROX-103012	10/30/2012	42.92 - 52.92	41.23	NE	<2	<10	<10	<10		<10	<10	<2	<10	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10	<2	<2	<2
	MW7-ROX-103012-DUP	10/30/2012		41.23	NE	<2	<10	<10	<10		<10	<10	<2	<10	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10	<2	<2	<2
	MW7-ROX-011513	1/15/2013		42.21	NE	<4	<20	<20	<20		<20	<20	<4	<20	<20	<20	<4	<4	<20	<20	<4	<4	<20	<20	<20	<4	<4	<4
	MW7-ROX-011513-DUP	1/15/2013		42.21	NE	<4	<20	<20	<20		<20	<20	<4	<20	<20	<20	<4	<4	<20	<20	<4	<4	<20	<20	<20	<4	<4	<4
	MW7-ROX-041013	4/10/2013		42.70	NE	<2	<10	<10	<10		<10	<10	<2	<10	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10	<2	<2	<2
	MW7-ROX-041013-DUP	4/10/2013		42.70	NE	<2	<10	<10	<10		<10	<10	<2	<10	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10	<2	<2	<2
	MW7-ROX-071713	7/17/2013		39.60	NE	0.2 J	<0.005	<0.005	<0.005		0.0096 J	<0.005	0.0031 J	0.0185 J	0.0173 J	<0.005	<0.001	0.289 J	<0.005	<0.005	<0.001	<0.001	0.117 J	0.0264 J	0.0094 J	0.455 J	0.183 J	0.639 J
	MW7-ROX-101613	10/16/2013		40.64	NE	<2	<10 UJ	<10	<10		<10	<10	<2 UJ	<10	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10 UJ	<2	<2	<2
	MW7-ROX-013014	1/30/2014		42.94	NE	<2.5	<13	<13	<13		<13	<13	<2.5	<13	<13	<13	<2.5	<2.5	<13	<13	<2.5	<2.5	<13	<13	<13	<2.5	<2.5	<2.5
	MW7-ROX-041614	4/16/2014		43.79	NE	<5	<25	<25	<25		<25	<25	<5	<25	<25	<25	<5	<5	<25	<25	<5	<5	<25	<25	<25	<5	<5	<5
	MW7-ROX-071614	7/16/2014		42.05	NE	0.208 J	<0.005	<0.005	<0.005		0.0127 J	<0.005	<0.001	0.0165 J	0.0197 J	<0.005	<0.001	0.224 J	<0.005	<0.005	<0.001	<0.001	0.143 J	0.0324 J	<0.005	0.48 J	0.187 J	0.667 J
	MW7-ROX-071614-DUP	7/16/2014		42.05	NE	0.206 J	<0.005	<0.005	<0.005		0.0131 J	<0.005	<0.001	0.0141 J	0.0194 J	<0.005	<0.001	0.222 J	<0.005	<0.005	<0.001	<0.001	0.142 J	0.0318 J	<0.005	0.465 J	0.181 J	0.647 J
	MW7-ROX-101614	10/16/2014		41.31	NE	<5	<25	<25	<25		<25	<25	<5	<25	<25	<25	<5	<5	<25 UJ	<25	<5	<5	<25	<25	<25 UJ	<5	<5	<5
	MW7-ROX-101614-DUP	10/16/2014		41.31	NE	<5	<25	<25	<25		<25	<25	<5	<25	<25	<25	<5	<5	<25 UJ	<25	<5	<5	<25	<25	<25 UJ	<5	<5	<5
	MW7-ROX-012215	1/22/2015		43.45	NE	<1	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	<1
	MW7-ROX-012215-DUP	1/22/2015		43.45	NE	<1	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	<1
	MW7-ROX-042115	4/21/2015		44.63	NE	0.0822	<0.25	<0.25	<0.25		<0.25	<0.25	<0.05	<0.25	<0.25	<0.25	<0.05	0.295	<0.25	<0.25	<0.05	<0.05	0.0791 J	0.0174 J	<0.25	0.116	0.0357 J	0.152
	MW7-ROX-042115-DUP	4/21/2015		44.63	NE	0.081	<0.25	<0.25	<0.25		<0.25	<0.25	<0.05	<0.25	<0.25	<0.25	<0.05	0.285	<0.25	<0.25	<0.05	<0.05	0.0784 J	0.0173 J	<0.25	0.116	0.0369 J	0.153
	MW7-ROX-071515	7/15/2015	42.92 - 52.92	43.54	NE	<5	<25	<25	<25		<25	<25	<5	<25	<25	<25	<5	<5	<25	<25	<5	<5	<25	<25	<25	<5	<5	<5
	MW7-ROX-071515-DUP	7/15/2015		43.54	NE	<5	<25	<25	<25		<25	<25	<5	<25	<25	<25	<5	<5	<25	<25	<5	<5	<25	<25	<25	<5	<5	<5
MW-08	MW8-ROX-103012	10/30/2012	33.60 - 43.60	32.32	NE	<1	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	<1
	MW8-ROX-011513	1/15/2013		33.30	NE	<2	<10	<10	<10		<10	<10	<2	<10	<10	<10	<2	2.09	<10	<10	<2	<2	<10	<10	<10	<2	<2	<2
	MW8-ROX-041013	4/10/2013		33.77	NE	<5	<25	<25	<25		<25	<25	<5	<25	<25	<25	<5	<5	<25	<25	<5	<5	<25	<25	<25	<5	<5	<5
	MW8-ROX-071713	7/17/2013		30.43	NE	0.508	<0.005	<0.005	<0.005		0.0173	<0.005	0.197	0.0335	0.0374	<0.005	<0.001	0.348	<0.005	<0.005	<0.001	<0.001	0.199	0.0598	<0.005 UJ	1.01	0.361	1.3
	MW8-ROX-071713-DUP	7/17/2013		30.43	NE	0.442 J	<0.005	<0.005	<0.005		0.0174	<0.005	0.187	0.0347	0.0383	<0.005	<0.001	0.341	<0.005	<0.005	<0.001	<0.001	0.203	0.0613	<0.005 UJ	0.818 J	0.364	1.05
	MW8-ROX-101613	10/16/2013		31.59	NE	<2	<10 UJ	<10	<10		<10	<10	<2 UJ	<10	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10 UJ	<2	<2	<2
	MW8-ROX-101613-DUP	10/16/2013		31.59	NE	<2	<10 UJ	<10	<10		<10	<10	<2 UJ	<10	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10 UJ	<2	<2	<2
	MW8-ROX-013014	1/30/2014		34.02	NE	<2.5	<13	<13	<13		<13	<13	1.92 J	<13	<13	<13	<2.5	<2.5	<13	<13	<2.5	<2.5	<13	<13	<13	<2.5	<2.5	<2.5
	MW8-ROX-013014-DUP	1/30/2014		34.02	NE	<2.5	<13	<13	<13		<13	<13	1.99 J	<13	<13	<13	<2.5	<2.5	<13	<13	<2.5	<2.5	<13	<13	<13	<2.5	<2.5	<2.5
	MW8-ROX-041614	4/16/2014		34.73	NE	<2	<10	<10	<10		<10	<10	<2	<10	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10	<2	<2	<2
	MW8-ROX-041614-DUP	4/16/2014		34.73	NE	<2	<10	<10	<10		<10	<10	<2	<10	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10	<2	<2	<2
	MW8-ROX-071614	7/16/2014		33.01	NE	0.266	<0.005 UJ	<0.005 UJ	<0.005 UJ		0.0266 J	<0.005 UJ	0.392 J	0.0598 J	0.0606 J	<0.005 UJ	<0.001 UJ	0.108 J	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	0.226 J	0.0904 J	<0.005 UJ	0.377 J	0.141 J	0.518 J
	MW8-ROX-101614	10/16/2014		32.23	NE	0.305 J	<5	<5	<5		<5	<5	1.19	<5	<5	<5	<1	<1	<5 UJ	<5	<1	<1	<5	<5	<5 UJ	<1	<1	<1
	MW8-ROX-012215	1/22/2015		34.22	NE	0.359 J	<5	<5	<5		<5	<5	0.906 J	<5	<5	<5	<1	0.259 J	<5	<5	<1	<1	<5	<5	<5	<1	<1	0.318 J
	MW8-ROX-042115	4/21/2015		35.41	NE	0.203	<0.25	<0.25	<0.25		<0.25	<0.25	0.506	<0.25	0.0251 J	<0.25	<0.05	0.325	<0.25	<0.25	<0.05	<0.05	0.0473 J	0.0241 J	<0.25	0.164	0.0552	0.22
	MW8-ROX-071515	7/15/2015	33.60 - 43.60	34.07	NE	<5	<25	<25	<25		<25	<25	<5	<25	<25	<25	<5	<5	<25	<25	<5	<5	<25	<25	<25	<5	<5	<5

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
			Screening Values (mg/L)			0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-09	MW9-ROX-102912	10/29/2012	46.45 - 56.45	43.17	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW9-ROX-011113	1/11/2013		43.90	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW9-ROX-040913	4/9/2013		44.67	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW9-ROX-070813	7/8/2013		42.35	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW9-ROX-100313	10/3/2013		42.27	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW9-ROX-011414	1/14/2014		44.47	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW9-ROX-040714	4/7/2014		44.99	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW9-ROX-070914	7/9/2014		44.35	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW9-ROX-100714	10/7/2014		43.52	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW9-ROX-011315	1/13/2015		44.21	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW9-ROX-040915	4/9/2015		45.38	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW9-ROX-070915	7/9/2015	46.45 - 56.45	44.81	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
MW-10	MW10-ROX-102612	10/26/2012	44.43 - 54.43	43.08	NE																							
	MW10-ROX-121712	12/17/2012		43.08	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	0.00058 J
	MW10-ROX-011013	1/10/2013		44.10	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	0.016	<0.001	<0.001	<0.001
	MW10-ROX-012113	1/21/2013		44.10	NE	<0.005	<0.005	<0.005	<0.025		<0.005	<0.025	<0.002	<0.0001	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.01	<0.005	<0.005	
	MW10-ROX-040913	4/9/2013		44.60	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW10-ROX-070813	7/8/2013		42.27	NE	<0.001	<0.005	<0.005	<0.005	1.9	<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW10-ROX-100313	10/3/2013		42.38	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW10-ROX-011514	1/15/2014		44.42	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW10-ROX-040714	4/7/2014		45.00	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW10-ROX-070914	7/9/2014		44.35	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW10-ROX-100714	10/7/2014		43.58	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW10-ROX-011315	1/13/2015		44.27	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW10-ROX-040815	4/8/2015		45.30	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW10-ROX-070915	7/9/2015	44.43 - 54.43	44.93	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
MW-11	MW11-ROX-102512	10/25/2012	41.66 - 51.66	40.59	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW11-ROX-011013	1/10/2013		41.43	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW11-ROX-040813	4/8/2013		42.02	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW11-ROX-070813	7/8/2013		39.24	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW11-ROX-100713	10/7/2013		39.95	NE	<0.001	<0.005	<0.005	<0.005 UJ		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW11-ROX-011514	1/15/2014		42.16	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW11-ROX-040714	4/7/2014		42.70	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW11-ROX-070914	7/9/2014		41.75	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW11-ROX-100714	10/7/2014		40.89	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW11-ROX-011315	1/13/2015		41.93	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW11-ROX-040815	4/8/2015		43.19	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW11-ROX-070915	7/9/2015	41.66 - 51.66	42.45	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001

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TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
			Screening Values (mg/L)			0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-12	MW12-ROX-102512	10/25/2012	41.92 - 51.92	40.95	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW12-ROX-011013	1/10/2013		41.83	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	0.00089 J	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW12-ROX-040813	4/8/2013		42.46	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW12-ROX-070913	7/9/2013		39.28	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW12-ROX-100713	10/7/2013		40.22	NE	<0.001	<0.005	<0.005	<0.005 UJ		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW12-ROX-011514	1/15/2014		42.54	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW12-ROX-040814	4/8/2014		43.15	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW12-ROX-070914	7/9/2014		41.97	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW12-ROX-100614	10/6/2014		40.98	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW12-ROX-011215	1/12/2015		42.33	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW12-ROX-040615	4/6/2015		43.75	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW12-ROX-070815	7/8/2015	41.92 - 51.92	42.86	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
MW-13	MW13-ROX-110812	11/8/2012	25.57 - 35.57	25.30	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0093	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW13-ROX-012313	1/23/2013		29.26	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0082	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW13-ROX-041213	4/12/2013		29.44	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0093	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW13-ROX-071213	7/12/2013		25.67	NE	<0.001	<0.005	<0.005 UJ	<0.005		<0.005	<0.005	0.0094	<0.005	0.00064 J	<0.005	<0.001 UJ	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW13-ROX-100913	10/9/2013		26.94	NE	<0.001	<0.005	<0.005 UJ	<0.005		<0.005	<0.005	0.0072	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW13-ROX-012914	1/29/2014		29.63	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.008	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW13-ROX-041114	4/11/2014		30.15	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0062	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW13-ROX-070714	7/7/2014		28.49	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0091	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW13-ROX-101014	10/10/2014		27.48	NE	<0.001	<0.005	<0.005	<0.005 UJ		<0.005	<0.005	0.0045	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	0.0011
	MW13-ROX-011615	1/16/2015		29.09	NE	0.00097 J	<0.005	<0.005	<0.005		<0.005	<0.005	0.006	<0.005	<0.005	<0.005	<0.001	0.00076 J	<0.005	<0.005	<0.001	<0.001	0.00064 J	<0.005	<0.005	0.0022	0.00072 J	0.003
	MW13-ROX-041415	4/14/2015		30.71	NE	0.00033 J	<0.005	<0.005	<0.005		<0.005	<0.005	0.0075	<0.005	<0.005	<0.005	<0.001	0.00035 J	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.00057 J	0.00024 J	0.00082 J
	MW13-ROX-070815	7/8/2015	25.57 - 35.57	29.16	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0054	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
MW-14	MW14-ROX-103112	10/31/2012	33.42 - 43.42	32.02	NE	<0.001	<0.005	<0.005	<0.005		0.0161	<0.005	<0.001	<0.005	0.0121	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0024	<0.001	0.0024
	MW14-ROX-011813	1/18/2013		33.05	NE	<0.001	<0.005	<0.005	<0.005		0.021	<0.005	<0.001	<0.005	0.0162	<0.005	<0.001	0.00097 J	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0026	<0.001	0.003
	MW14-ROX-041113	4/11/2013		33.31	NE	<0.001	<0.005	<0.005	<0.005		0.0346	<0.005	<0.001	<0.005	0.0206	<0.005	<0.001	0.0014	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0038	<0.001	0.0043
	MW14-ROX-071213	7/12/2013		30.36	NE	<0.001	<0.005	<0.005 UJ	<0.005		0.0168	<0.005	<0.001	<0.005	0.0109	<0.005	<0.001 UJ	0.00059 J	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	0.0026	<0.001	0.0029
	MW14-ROX-101013	10/10/2013		30.80	NE	<0.001	<0.005	<0.005	<0.005		0.0011 J	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	0.00088 J	0.0011 J	<0.005	<0.001	<0.001	<0.001
	MW14-ROX-012914	1/29/2014		33.67	NE	<0.001	<0.005	<0.005	<0.005		0.0036 J	<0.005	<0.001	<0.005	0.002 J	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW14-ROX-041114	4/11/2014		34.30	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW14-ROX-070714	7/7/2014		32.82	NE	<0.001	<0.005	<0.005	<0.005		0.00073 J	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW14-ROX-101414	10/14/2014		31.65	NE	<0.001	<0.005	<0.005	<0.005 UJ		0.00043 J	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	0.00041 J
	MW14-ROX-011615	1/16/2015		33.58	NE	0.00036 J	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	0.00042 J	<0.005	<0.005	<0.001	<0.001	0.00032 J	<0.005	<0.005	0.00072 J	<0.001	0.001
	MW14-ROX-041415	4/14/2015		35.16	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW14-ROX-070915	7/9/2015	33.42 - 43.42	34.06	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.0011 U	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001

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						VOCs																			
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
			Screening Values (mg/L)			0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-16	MW16-ROX-012313	1/23/2013	37.06 - 47.06	43.05	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW16-ROX-040813	4/8/2013		43.39	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW16-ROX-070813	7/8/2013		40.62	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW16-ROX-100813	10/8/2013		41.62	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW16-ROX-011514	1/15/2014		43.76	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW16-ROX-040914	4/9/2014		44.63	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW16-ROX-071014	7/10/2014		43.15	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW16-ROX-100714	10/7/2014		42.27	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW16-ROX-011315	1/13/2015		43.59	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW16-ROX-040915	4/9/2015		44.87	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW16-ROX-070915	7/9/2015	37.06 - 47.06	44.26	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	0.00038 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW16-ROX-070915-DUP	7/9/2015		44.26	NE	0.0004 J	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.0048 U	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.00097 J	<0.001	0.00097 J
MW-22	MW22-ROX-012313	1/23/2013	37.88 - 47.88	41.80	NE	3.45	<0.25	<0.25	<0.25		0.126 J	<0.25	<0.05	0.396	0.22 J	<0.25	<0.05	10.5	<0.25	<0.25	<0.05	<0.05	1.23	0.288	<0.25 UJ	7.56	3.73	11.3
	MW22-ROX-012313-DUP	1/23/2013		41.80	NE	3.19	<0.25	<0.25	<0.25		0.124 J	<0.25	<0.05	0.377	0.234 J	<0.25	<0.05	9.06	<0.25	<0.25	<0.05	<0.05	1.26	0.291	<0.25 UJ	6.96	3.52	10.5
	MW22-ROX-040513	4/5/2013		42.23	NE	2.44	<0.005	<0.005	<0.005		0.159 J	0.0124 J	<0.001	0.286 J	0.29 J	<0.005	<0.001	6.14	<0.005	<0.005	<0.001	<0.001	0.931	0.379 J	<0.005	5.15	2.64	7.79
	MW22-ROX-071113	7/11/2013		39.35	NE	2.07	<0.005	<0.005	<0.005 UJ		0.131	0.0102	<0.001	0.345	0.242	<0.005	<0.001	3.92	<0.005	<0.005	<0.001	<0.001	0.864	0.309	<0.005 UJ	4.13	2.26	6.39
	MW22-ROX-071113-DUP	7/11/2013		39.35	NE	1.79	<0.005	<0.005	<0.005 UJ		0.133	0.0103	<0.001	0.362	0.245	<0.005	<0.001	3.57	<0.005	<0.005	<0.001	<0.001	0.754	0.311	<0.005 UJ	3.83	2.05	5.88
	MW22-ROX-100913	10/9/2013		40.39	NE	3.79	<0.005	<0.005 UJ	<0.005		0.137	0.0101	<0.001	0.47	0.244	<0.005	<0.001	6.02	<0.005	<0.005	<0.001	<0.001	1.37	0.357	<0.005	7.46	3.48	10.9
	MW22-ROX-100913-DUP	10/9/2013		40.39	NE	3.97	<0.005	<0.005 UJ	<0.005		0.136	0.0084	<0.001	0.445	0.243	<0.005	<0.001	6.32	<0.005	<0.005	<0.001	<0.001	1.43	0.343	<0.005	7.75	3.65	11.4
	MW22-ROX-012014	1/20/2014		42.49	NE	3.17	<0.005	<0.005	0.0082		0.169	0.007	<0.001	0.287	0.287	<0.005	<0.001	5.33	<0.005	<0.005	<0.001	<0.001	1.3	0.298	<0.005	5.65	2.65	8.29
	MW22-ROX-012014-DUP	1/20/2014		42.49	NE	3.4	<0.005	<0.005	0.0088		0.169	0.007	<0.001	0.262	0.286	<0.005	<0.001	5.71	<0.005	<0.005	<0.001	<0.001	1.37	0.398	<0.005	6.01	2.81	8.83
	MW22-ROX-041014	4/10/2014		43.15	NE	3.32	<0.005	<0.005	<0.005		0.157	<0.005	<0.001	0.334	0.254	<0.005	<0.001	5.95	<0.005	<0.005	<0.001	<0.001	1.1	0.384	<0.005	6.85	3.38	10.2
	MW22-ROX-041014-DUP	4/10/2014		43.15	NE	3.02	<0.005	<0.005	<0.005		0.138	0.0082	<0.001	0.28	0.235	<0.005	<0.001	5.52	<0.005	<0.005	<0.001	<0.001	1	0.35	<0.005	6.23	3.12	9.35
	MW22-ROX-071414	7/14/2014		41.85	NE	1.93	<0.005	<0.005	<0.005		0.153 J	<0.005	<0.001	0.282 J	0.205 J	<0.005	<0.001	3.14	<0.005	<0.005	<0.001	<0.001	0.353 J	0.262 J	<0.005	3.78	1.85	5.64
	MW22-ROX-101014	10/10/2014		41.43	NE	1.88	<0.05	<0.05	<0.05 UJ		0.0661	<0.05	<0.01	0.202	0.112	<0.05	<0.01	2.3	<0.05	<0.05	<0.01	<0.01	0.688	0.207	<0.05	3.08	1.74	4.82
	MW22-ROX-011615	1/16/2015		42.19	NE	2.84	<0.05	<0.05	<0.05		0.11	0.0111 J	<0.01	0.339	0.2	<0.05	<0.01	3.24	0.0129 J	0.0106 J	<0.01	<0.01	1.05	0.373	<0.05	5.19	2.74	7.93
	MW22-ROX-041415	4/14/2015		43.71	NE	3.05	<0.005	<0.005	<0.005		0.124	<0.005	<0.001	0.315	0.219	<0.005	<0.001	4.3	<0.005	<0.005	<0.001	<0.001	1.04	0.321	<0.005	6.26	3.09	9.35
	MW22-ROX-071515	7/15/2015	37.88 - 47.88	42.64	NE	3.21	<0.1	<0.1	<0.1		0.0926 J	<0.1	<0.02	0.219	0.185	<0.1	<0.02	5.05	<0.1	<0.1	<0.02	<0.02	1.31	0.296	<0.1	6.7	3.48	10.2
MW-23	MW23-ROX-012615	1/26/2015	29.02 - 39.02	30.90	NE	<0.001	<0.005	<0.002	<0.01		<0.001	<0.005	0.0037	<0.005	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.001	<0.002	<0.002	<0.01	<0.002	<0.001	<0.003
	MW23-ROX-040815	4/8/2015		32.24	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0039	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW23-ROX-071015	7/10/2015	29.02 - 39.02	30.54	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	0.004 J	<0.005	<0.005	<0.001	<0.001	<0.0011 U	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.00062 J	<0.001	0.00062 J
MW-24	MW24-ROX-040513	4/5/2013	38.89 - 48.89	43.39	NE	0.0012	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	0.0014	<0.005	<0.005	<0.001	<0.001	0.00051 J	<0.005	<0.005	0.0021	0.0009 J	0.003
	MW24-ROX-071113	7/11/2013		40.35	NE	<0.001	<0.005	<0.005	<0.005 UJ		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	MW24-ROX-100913	10/9/2013		41.27	NE	<0.001	<0.005	<0.005 UJ	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW24-ROX-011514	1/15/2014		43.47	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW24-ROX-040914	4/9/2014		44.13	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW24-ROX-071114	7/10/2014		42.97	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW24-ROX-100814	10/8/2014		42.16	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW24-ROX-011315	1/13/2015		43.17	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW24-ROX-040915	4/9/2015		44.45	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW24-ROX-070915	7/9/2015	38.89 - 48.89	44.65	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
			Screening Values (mg/L)			0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-25	MW25-ROX-102114	10/21/2014	35.59 - 45.59	36.44	NE	<2	<10	<10	<10		<10	<10	<2	<10	<10	<10	<2	2.65	<10	<10	<2	<2	<10	<10	<10	<2	<2	0.753 J
	MW25-ROX-012215	1/22/2015		38.45	NE	<0.25	<1.3	<1.3	<1.3		<1.3	<1.3	0.282	<1.3	<1.3	<1.3	<0.25	<0.25	<1.3	<1.3	<0.25	<0.25	<1.3	<1.3	<1.3	<0.25	<0.25	0.0821 J
	MW25-ROX-042115	4/21/2015		39.71	NE	<0.05	<0.25	<0.25	<0.25		<0.25	<0.25	0.125	<0.25	<0.25	<0.25	<0.05	<0.05	<0.25	<0.25	<0.05	<0.05	<0.25	<0.25	<0.25	<0.05	<0.05	<0.05
	MW25-ROX-071515	7/15/2015		38.40	NE	<0.2	<1	<1	<1		<1	<1	<0.2	<1	<1	<1	0.0577 J	<0.2	<1	<1	<0.2	<0.2	<1	<1	<1	<0.2	<0.2	<0.2
MW-26	MW26-ROX-102114	10/21/2014	38.15 - 48.15	39.43	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.002	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW26-ROX-011215	1/12/2015		41.09	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW26-ROX-040815	4/8/2015		42.52	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW26-ROX-070815	7/8/2015		41.76	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
MW-27	MW27-ROX-102114	10/21/2014	39.79 - 49.79	41.57	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW27-ROX-011515	1/15/2015		42.06	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW27-ROX-041015	4/10/2015		43.22	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	MW27-ROX-071015	7/10/2015		43.00	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
MW-28	MW28-ROX-102114	10/21/2014	33.61 - 43.61	36.44	NE	<0.001	<0.005	<0.005	<0.005		0.00075 J	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	0.0011	<0.005	<0.005	<0.001	<0.001	0.0036 J	0.00059 J	<0.005	0.0036	0.0051	0.0087
	MW28-ROX-011515	1/15/2015		41.14	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	0.00026 J	<0.005	<0.005	<0.001	<0.001	0.00059 J	<0.005	<0.005	0.0012	0.00092 J	0.0021
	MW28-ROX-041415	4/14/2015		42.34	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	0.00042 J	0.00042 J
	MW28-ROX-071515	7/15/2015		42.19	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	0.00031 J	<0.005	<0.005	<0.001	<0.001	<0.001
P-114	P114-ROX-110912	11/9/2012	32.67 - 52.67	30.90	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0076 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	0.0013 J	<0.001	0.0013 J
	P114-ROX-012313	1/23/2013		30.22	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.003 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	P114-ROX-041513	4/15/2013		31.80	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0051	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P114-ROX-071813	7/18/2013		27.22	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0023 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	P114-ROX-071813-DUP	7/18/2013		27.22	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0022 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	P114-ROX-101713	10/17/2013		29.43	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0036	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P114-ROX-012814	1/28/2014		32.11	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0153	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P114-ROX-042114	4/21/2014		32.22	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0093	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P114-ROX-071814	7/18/2014		30.87	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0037	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P114-ROX-101714	10/17/2014		29.43	NE	0.00045 J J	<0.005	<0.005	<0.005		<0.005	<0.005	0.0098 J	<0.005	0.00087 J J	<0.005	<0.001	<0.001	<0.005 UJ	<0.005	<0.001	<0.001	<0.005	0.00043 J J	<0.005 UJ	0.00059 J J	<0.001	0.00059 J J
	P114-ROX-012115	1/21/2015		31.53	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0268 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	0.00046 J J	<0.005	<0.005	0.00068 J J	<0.001	0.00093 J J
	P114-ROX-041715	4/17/2015		NM	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0237	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P114-ROX-070815	7/8/2015	32.67 - 52.67	29.16	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0265	0.002 J	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
P-54	P54-ROX-103012	10/30/2012	38.00 - 63.00	40.70	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P54-ROX-011113	1/11/2013		41.56	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P54-ROX-041013	4/10/2013		41.80	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P54-ROX-050313	5/3/2013		41.80	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P54-ROX-071113	7/11/2013		39.07	NE	<0.001	<0.005	<0.005	<0.005 UJ		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	P54-ROX-100813	10/8/2013		39.94	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P54-ROX-011514	1/15/2014		42.20	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P54-ROX-040914	4/9/2014		42.80	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P54-ROX-071114	7/10/2014		41.71	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P54-ROX-100814	10/8/2014		40.88	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P54-ROX-011415	1/14/2015		41.79	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P54-ROX-041015	4/10/2015		43.20	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P54-ROX-070915	7/9/2015		42.25	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.0037 U	<0.005	<0.005	<0.001	<0.001	<0.005	<0.00092 U	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	0.00028 J

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																			
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
			Screening Values (mg/L)			0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
P-55	P55-ROX-012113	1/21/2013	39.82 - 64.82	45.24	NE	0.316	<0.05	<0.01	<0.25		0.0678	<0.25	<0.02	0.079 J	0.14	<0.05	<0.05	0.189	<0.05	<0.01	<0.05	<0.05	0.039 J	0.026 J	<0.1	0.279	0.347	
	P55-ROX-012113	1/21/2013		45.24	NE	0.366	<0.005	<0.005	<0.005		0.0937	<0.005	0.002	0.12	0.206	<0.005	<0.001	0.262	<0.005	<0.005	<0.001	<0.001	0.046	0.0312	<0.005	0.356	0.382	0.738
P-55R	P55-ROX-041513	4/15/2013	40.43 - 50.43	43.63	NE	0.35	<0.01	<0.01	<0.01		0.068	<0.01	<0.002	0.0974 J	0.148	<0.01	<0.002	0.143	<0.01	<0.01	<0.002	<0.002	0.0241	0.0229	<0.01	0.235	0.362	0.597
	P55-ROX-071613	7/16/2013		40.06	NE	0.495	<0.005	<0.005 UJ	<0.005	0.72	0.0884	<0.005	<0.001	0.0841	0.175	<0.005	<0.001	0.343	<0.005	<0.005	<0.001	<0.001	0.073	0.0559	<0.005 UJ	0.535	0.558	1.11
	P55-ROX-101013	10/10/2013		41.67	NE	0.602	<0.005	<0.005	<0.005		0.0851	<0.005	0.001	0.121	0.167	<0.005	<0.001	0.601	<0.005	<0.005	<0.001	<0.001	0.151	0.062	<0.005	0.739	0.639	1.38
P-56	P56-ROX-103112	10/31/2012	40.82 - 65.82	44.80	NE	1.29	<0.005	<0.005	<0.005		0.0752	<0.005	<0.001	0.167	0.105	<0.005	<0.001	0.187	<0.005	<0.005	<0.001	<0.001	0.387	0.0901	<0.005	1.62	0.144	1.73
	P56-ROX-011713	1/17/2013		45.65	NE	0.0088	<0.025	<0.025	<0.025		0.0398	<0.025	<0.005	0.0322	0.0456	<0.025	<0.005	0.0119	<0.025	<0.025	<0.005	<0.005	0.0172 J	0.0092 J	<0.025	0.0745	<0.005	0.0745
	P56-ROX-041213	4/12/2013		46.12	NE	0.691	<0.01	<0.01	<0.01		0.0581	<0.01	<0.002	0.0964 J	0.0805	<0.01	<0.002	0.0799	<0.01	<0.01	<0.002	<0.002	0.27	0.0486	<0.01	1	0.0243	1.03
	P56-ROX-071513	7/15/2013		43.25	NE	2	<0.005	<0.005	<0.005		0.0968	<0.005	<0.001	0.316	0.145	<0.005	<0.001	0.311	<0.005	<0.005	<0.001	<0.001	0.551	0.134	<0.005	2.67	0.21	2.85
	P56-ROX-101013	10/10/2013		44.48	NE	1.58	<0.005	<0.005	<0.005		0.0822	<0.005	0.00058 J	0.156	0.105	<0.005	<0.001	0.157	<0.005	<0.005	<0.001	<0.001	0.33	0.0714	<0.005	1.7	0.0617	1.76
	P56-ROX-012214	1/22/2014		46.35	NE	0.305	<0.005	<0.005	<0.005		0.0399	<0.005	<0.001	0.0566	0.0426	<0.005	<0.001	0.0263	<0.005	<0.005	<0.001	<0.001	0.074	0.0172	<0.005	0.224	0.0093	0.233
	P56-ROX-041414	4/14/2014		47.32	NE	0.608	<0.005	<0.005	<0.005		0.0781	<0.005	<0.001	0.0836	0.0951	<0.005	<0.001	0.0669	<0.005	<0.005	<0.001	<0.001	0.205	0.0472	<0.005	0.742	0.0156	0.758
	P56-ROX-070814	7/8/2014		45.97	NE	1.71 J	<0.005	<0.005	<0.005		0.106 J	<0.005	<0.001	0.156 J	0.133 J	<0.005	<0.001	0.288 J	<0.005	<0.005	<0.001	<0.001	0.487 J	0.166 J	<0.005	2.04 J	0.122 J	2.09 J
	P56-ROX-101314	10/13/2014		45.05	NE	0.164	<0.005	<0.005	<0.005 UJ		0.0645	<0.005	<0.001	0.0679	0.0709	<0.005	<0.001	0.0183	<0.005	<0.005	<0.001	<0.001	0.0657	0.0194	<0.005	0.17	0.0066	0.176
	P56-ROX-011915	1/19/2015		46.58	NE	0.104	<0.005	<0.005	<0.005		0.0532	<0.005	<0.001	0.0261	0.0574	<0.005	<0.001	0.0114	<0.005	<0.005	<0.001	<0.001	0.0466	0.0135	<0.005	0.143	0.0043	0.148
	P56-ROX-041515	4/15/2015		48.05	NE	0.624	<0.005	<0.005	<0.005		0.0768	<0.005	<0.001	0.0754	0.0918	<0.005	<0.001	0.068	<0.005	<0.005	<0.001	<0.001	0.189	0.0454	<0.005	0.737	0.0124	0.749
	P56-ROX-071015	7/10/2015	40.82 - 65.82	47.34	NE	0.0297	<0.005	<0.005	<0.005		0.057	<0.005	<0.001	0.0158	0.0594	<0.005	<0.001	0.005	<0.005	<0.005	<0.001	<0.001	0.0063	0.0041 J	<0.005	0.0702	0.0035	0.0737
P-57	P57-ROX-110512	11/5/2012	40.46 - 65.46	44.98	NE	1.09	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	1.53 J	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	0.577 J	<2.5	<2.5	1.03	<0.5	1.03
	P57-ROX-012913	1/29/2013		45.92	NE	1.1	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	0.331 J	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<0.5
	P57-ROX-041113	4/11/2013		46.29	NE	1.19	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	0.494 J	<2.5	<2.5	<0.5	<0.5	<0.5
	P57-ROX-071613	7/16/2013		43.38	NE	1.59	<0.005	<0.005 UJ	<0.005		0.0698 J	<0.005	0.112 J	0.203 J	0.0802 J	<0.005	<0.001	0.202 J	<0.005	<0.005	<0.001	<0.001	<5	0.129 J	<0.005 UJ	1.81	0.256 J	2.01
	P57-ROX-101413	10/14/2013		44.38	NE	1.1	<0.005	<0.005	<0.005		0.0539	<0.005	0.107	0.206	0.0586	<0.005	<0.001	0.0421	<0.005	<0.005	<0.001	<0.001	0.763 J	0.12	<0.005	0.468	0.0206	0.489
	P57-ROX-020314	2/3/2014		46.57	NE	0.697 J	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	<1
	P57-ROX-041514	4/15/2014		46.70	NE	1.08	<0.005	<0.005	0.0062		0.0492	<0.005	0.0563	0.272	0.0585	<0.005	<0.001	0.0248	0.0015 J	<0.005	<0.001	<0.001	0.503 E J	0.114	<0.005	0.296	0.0143	0.311
	P57-ROX-070814	7/8/2014		45.95	NE	1.12	<0.005 UJ	<0.005 UJ	<0.005 UJ		0.0656 J	<0.005 UJ	<0.001 UJ	0.128 J	0.0605 J	<0.005 UJ	<0.001 UJ	0.154 J	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	0.375 J	0.0913 J	<0.005 UJ	1.46	0.237	1.7
	P57-ROX-070814-DUP	7/8/2014		45.95	NE	1.21	<0.005 UJ	<0.005 UJ	<0.005 UJ		0.0689 J	<0.005 UJ	<0.001 UJ	0.139 J	0.0633 J	<0.005 UJ	<0.001 UJ	0.16 J	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	0.392 J	0.0954 J	<0.005 UJ	1.56	0.234	1.79
	P57-ROX-101414-DUP	10/14/2014		45.00	NE	1.77 J	<10	<10	<10 UJ		<10	<10	<2	<10	<10	<10	<2	0.849 J	<10	<10	<2	<2	1.18 J	<10	<10	2.37	0.949 J	3.32 J
	P57-ROX-101414	10/14/2014		45.00	NE	3.86	<10	<10	<10 UJ		<10	<10	<2	2.05 J	<10	<10	<2	2.65	<10	<10	<2	<2	2.37 J	<10	<10	5.79	2.1	7.89 J
	P57-ROX-012315	1/23/2015	44.19 - 54.19	47.52	NE	0.773	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	0.652 J	<2.5	<2.5	0.342 J	<0.5	0.342 J
	P57-ROX-042015	4/20/2015		48.73	NE	0.487	<0.25	<0.25	<0.25		0.0246 J	<0.25	<0.05	<0.25	0.0468 J	<0.25	<0.05	0.0376 J	<0.25	<0.25	<0.05	<0.05	0.305	0.0323 J	<0.25	0.14	0.0141 J	0.154
	P57-ROX-071315	7/13/2015	44.19 - 54.19	47.81	NE	0.44 J	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	0.44 J	<5	<5	<5	<1	<1	0.237 J
P-58	P58-ROX-110612	11/6/2012	40.21 - 65.21	43.09	NE	0.844	<0.5	<0.5	<0.5		<0.5	<0.5	<0.1	<0.5	<0.5	<0.5	<0.1	0.124	<0.5	<0.5	<0.1	<0.1	0.658	0.108 J	<0.5	0.544	0.0807 J	0.624
	P58-ROX-121012	12/10/2012		43.09	NE																							
	P58-ROX-012213	1/22/2013		44.21	NE	1.27	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	0.728 J
	P58-ROX-041113	4/11/2013		44.40	NE	1.28 J	<10	<10	<10		<10	<10	<2	<10	<10	<10	<2	<2	<10	<10	<2	<2	0.926 J	<10	<10	<2	<2	<2
	P58-ROX-071613	7/16/2013		41.49	NE	1.07	<0.005	<0.005 UJ	<0.005		0.101	<0.005	<0.001	0.234	0.131	<0.005	<0.001	0.147	<0.005	<0.005	<0.001	<0.001	0.634 J	0.13	<0.005 UJ	0.723	0.12	0.843
	P58-ROX-101413	10/14/2013		42.19	NE	1.53	<0.005	<0.005	<0.005		0.0999	0.0055	0.0015	0.234	0.135	<0.005	<0.001	0.2	<0.005	<0.005	<0.001	<0.001	1.17 J	0.131	<0.005	0.74	0.112	0.852
	P58-ROX-020314	2/3/2014		44.66	NE	0.767 J	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	<1
	P58-ROX-041514	4/15/2014		45.66	NE	0.891 J	<0.005	<0.005	<0.005		0.0777 J	<0.005	<0.001	0.277 J	0.104 J	<0.005	<0.001	0.127 J	<0.005	<0.005	<0.001	<0.001	0.53 E J	0.0992 J	<0.005	0.552 J	0.0908 J	0.643 J
	P58-ROX-071814	7/18/2014		43.80	NE	<2	<10	<10	<10		<10	<10	<2	<10	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10	<2	<2	<2
	P58-ROX-101514	10/15/2014		43.14	NE	0.793	<2.5	<2.5	<2.5		1.43 J	<2.5	<0.5	<2.5	0.781 J	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	0.72 J	0.453 J	<2.5	<0.5	0.253 J	0.718
	P58-ROX-012315	1/23/2015		45.32	NE	1.13	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	0.714 J	<5	<5	0.686 J	<1	0.686 J
	P58-ROX-042015	4/20/2015		46.67	NE	0.81	<0.05	<0.05	<0.05		0.0575	<0.05	<0.01	0.12	0.0762	<0.05	<0.01	0.101	<0.05	<0.05	<0.01	<0.01	0.549	0.0691	<0.05	0.433	0.0525	0.486
	P58-ROX-071415	7/14/2015	40.21 - 65.21	45.54	NE	0.457 J	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	0.285 J

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																			
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
					Screening Values (mg/L)	0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
P-59	P59-ROX-110212	11/2/2012	47.91 - 72.91	45.98	NE	1.87	<0.5	<0.5	<0.5		<0.5	<0.5	<0.1	<0.5	0.105 J	<0.5	<0.1	1.09	<0.5	<0.5	<0.1	<0.1	0.558	0.154 J	<0.5	4.49	0.686	5.17
	P59-ROX-110212-DUP	11/2/2012		45.98	NE	1.94	<0.5	<0.5	<0.5		<0.5	<0.5	<0.1	<0.5	0.111 J	<0.5	<0.1	1.1	<0.5	<0.5	<0.1	<0.1	0.592	0.167 J	<0.5	4.68	0.721	5.4
	P59-ROX-013013	1/30/2013		46.60	NE	1.9	<0.25	<0.25	<0.25		0.0455 J	<0.25 UJ	<0.05 UJ	0.376	0.085 J	<0.25	<0.05	0.296	<0.25	<0.25	<0.05	<0.05	0.563	0.0491 J	<0.25	4.19	0.264	4.45
	P59-ROX-041213	4/12/2013		46.95	NE	2.85	<0.25	<0.25	<0.25		0.062 J	<0.25	<0.05	0.664	0.136 J	<0.25	<0.05	0.523	<0.25	<0.25	<0.05	<0.05	0.946	<0.25	<0.25	6.52	0.646	7.16
	P59-ROX-041213-DUP	4/12/2013		46.95	NE	2.57	<0.25	<0.25	<0.25		0.0543 J	<0.25	<0.05	0.547	0.117 J	<0.25	<0.05	0.463	<0.25	<0.25	<0.05	<0.05	0.843	<0.25	<0.25	5.89	0.591	6.48
	P59-ROX-071613	7/16/2013		44.13	NE	2.4	<0.005	<0.005 UJ	<0.005		0.074 J	<0.005	<0.001	0.215 J	0.149 J	<0.005	<0.001	1.03	<0.005	<0.005	<0.001	<0.001	0.784	0.219	<0.005 UJ	5.76	0.431	6.19
	P59-ROX-101013	10/10/2013		45.50	NE	3.19	<0.005	<0.005	<0.005		0.086	<0.005	0.0012	0.285	0.176	<0.005	<0.001	2.89	<0.005	<0.005	<0.001	<0.001	1.14	0.273	<0.005	7.47	1.28	8.75
	P59-ROX-020314	2/3/2014		47.35	NE	1.86	<0.1	<0.1	<0.1		0.0409 J	<0.1	<0.02	0.0321 J	0.0824 J	<0.1	<0.02	0.66	<0.1	<0.1	<0.02	<0.02	0.621	0.193	<0.1	3.79	0.438	4.23
	P59-ROX-041514	4/15/2014		48.60	NE	1.69	<0.005	<0.005	0.054		0.0495	<0.005	<0.001	0.196	0.0798	<0.005	<0.001	0.746	0.0027 J	<0.005	<0.001	<0.001	0.385	0.214	<0.005	4.83	0.902	5.73
	P59-ROX-070814	7/8/2014		47.69	NE	1.92	<0.005	<0.005	<0.005		0.0948 J	<0.005	<0.001	0.228 J	0.16 J	<0.005	<0.001	1.55	<0.005	<0.005	<0.001	<0.001	0.607	0.285 J	<0.005	4.48	0.929	5.41
	P59-ROX-101414	10/14/2014		46.18	NE	2.33	<0.005	<0.005	<0.005 UJ		0.0932 J	<0.005	0.0041 J	0.38 J	0.188 J	<0.005	<0.001	1.13	<0.005	<0.005	<0.001	<0.001	0.901	0.26 J	<0.005	5.14	1.03	6.17
	P59-ROX-011915	1/19/2015		47.42	NE	2.2	<0.5	<0.5	<0.5		0.0619 J	<0.5	<0.1	0.572	0.108 J	<0.5	<0.1	0.375	<0.5	<0.5	<0.1	<0.1	0.609	0.21 J	<0.5	4.95	0.245	5.2
	P59-ROX-041615	4/16/2015		48.83	NE	2.13	<0.05	<0.05	<0.05		0.0432 J	<0.05	<0.01	0.161	0.0763	<0.05	0.0032 J	0.69	<0.05	<0.05	<0.01	<0.01	0.576	0.177	<0.05	4.78	0.534	5.32
	P59-ROX-071315	7/13/2015	47.91 - 72.91	47.85	NE	0.664	<0.13	<0.13	<0.13		0.0111 J	<0.13	<0.025	0.162	0.0211 J	<0.13	<0.025	0.103	0.0283 J	<0.13	<0.025	<0.025	0.15	0.0541 J	<0.13	1.6	0.0368	1.63
P-66	P66-ROX-103112	10/31/2012	34.72 - 59.72	34.75	NE	0.0012	<0.005	<0.005	<0.005		0.122	<0.005	0.0733	<0.005	0.156	<0.005	<0.001	0.0014	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P66-ROX-011813	1/18/2013		35.70	NE	0.0014	<0.005	<0.005	<0.005		0.146	<0.005	0.104	<0.005	0.193	<0.005	<0.001	0.0015	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	0.00093 J	0.00093 J
	P66-ROX-041113	4/11/2013		36.03	NE	0.0036	<0.005	<0.005	<0.005		0.287	<0.005	0.086	<0.005	0.384	<0.005	<0.001	0.0012	<0.005	<0.005	<0.001	<0.001	0.0041 J	<0.005	<0.005	<0.001	<0.001	<0.001
	P66-ROX-071213	7/12/2013		33.20	NE	0.0022	<0.005	<0.005 UJ	<0.005		0.191	<0.005	<0.001	<0.005	0.229	<0.005	<0.001 UJ	0.0018	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	0.001	0.0015
	P66-ROX-101013	10/10/2013		33.66	NE	0.0045	<0.005	<0.005	<0.005		0.151	<0.005	0.085	0.0104	0.204	<0.005	<0.001	0.0013	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	0.00096 J	0.00096 J
	P66-ROX-110713	11/7/2013		33.66	NE	0.0016	<0.005	<0.005	<0.005		0.0958	<0.005	0.0528	0.0057	0.0658	<0.005	<0.001	0.00086 J	<0.005	<0.005	0.0015	<0.001	<0.005	<0.005	<0.005	<0.001	0.00057 J	0.00057 J
	P66-ROX-012914	1/29/2014		36.39	NE	0.0013	<0.005	<0.005	<0.005		0.131	<0.005	<0.001	<0.005	0.157	<0.005	<0.001	0.0017	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	0.0045	0.0045
	P66-ROX-041114	4/11/2014		37.10	NE	0.0014	<0.005	<0.005	<0.005		0.115	<0.005	<0.001	0.0014 J	0.136	<0.005	<0.001	0.0017	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	0.00072 J	0.0013
	P66-ROX-070714	7/7/2014		35.60	NE	0.0016	<0.005	<0.005	<0.005		0.144	<0.005	<0.001	<0.005	0.102	<0.005	<0.001	0.0022	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.001	0.00099 J	0.002
	P66-ROX-101414	10/14/2014		34.48	NE	0.0013	<0.005	<0.005	<0.005 UJ		0.129	<0.005	0.0111	<0.005	0.137	<0.005	<0.001	0.0016	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	0.0009 J	0.0018
	P66-ROX-011615	1/16/2015		36.62	NE	0.0016	<0.005	<0.005	<0.005		0.121	<0.005	0.0171	0.006	0.136	<0.005	<0.001	0.0018	<0.005	<0.005	<0.001	<0.001	0.00073 J	0.00029 J	<0.005	0.00093 J	0.0012	0.0021
	P66-ROX-011615-DUP	1/16/2015		36.62	NE	0.0014	<0.005	<0.005	<0.005		0.116	<0.005	0.0172	0.0053	0.127	<0.005	<0.001	0.0016	<0.005	<0.005	<0.001	<0.001	0.00041 J	0.00019 J	<0.005	0.001	0.0013	0.0022
	P66-ROX-041415	4/14/2015		38.27	NE	0.003	<0.005	<0.005	<0.005		0.133	<0.005	<0.001	<0.005	0.134	<0.005	<0.001	0.0024	<0.005	<0.005	<0.001	<0.001	0.00064 J	<0.005	<0.005	0.0028	0.0015	0.0044
	P66-ROX-041415-DUP	4/14/2015		38.27	NE	0.0027	<0.005	<0.005	<0.005		0.13	<0.005	<0.001	<0.005	0.132	<0.005	<0.001	0.0022	<0.005	<0.005	<0.001	<0.001	0.00053 J	<0.005	<0.005	0.0024	0.0013	0.0037
	P66-ROX-070815	7/8/2015	34.72 - 59.72	37.24	NE	0.0024	<0.005	<0.005	<0.005		0.133	<0.005	<0.001	<0.005	0.117	<0.005	<0.001	0.0017	<0.005	<0.005	<0.001	<0.001	0.0003 J	<0.005	<0.005	0.0016	0.0011	0.0027
	P66-ROX-070815-DUP	7/8/2015		37.24	NE	0.0022	<0.005	<0.005	<0.005		0.132	<0.005	<0.001	<0.005	0.119	<0.005	<0.001	0.0018	<0.005	<0.005	<0.001	<0.001	0.00032 J	<0.005	<0.005	0.0016	0.0011	0.0027
P-74	P74-ROX-110112	11/1/2012	44.43 - 69.43	41.72	NE	0.0493	<0.1	<0.1	<0.1		<0.1	<0.1	<0.02	0.0834 J	<0.1	<0.1	<0.02	0.232	<0.1	<0.1	<0.02	<0.02	0.125	0.0414 J	<0.1	0.246	0.0811	0.328
	P74-ROX-011713	1/17/2013		42.65	NE	0.0997	<0.1	<0.1	<0.1		<0.1	<0.1	<0.02	0.141	<0.1	<0.1	<0.02	0.278	<0.1	<0.1	<0.02	<0.02	0.249	0.0973 J	<0.1	0.547	<0.02	0.555
	P74-ROX-041113	4/11/2013		42.83	NE	0.0086	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	0.0016 J	<0.005	<0.005	<0.001	0.003	<0.005	<0.005	<0.001	<0.001	0.0184	0.0138	<0.005	0.0456	0.0146	0.0601
	P74-ROX-071513	7/15/2013		40.11	NE	0.0306	<0.005	<0.005	<0.005		0.0031 J	<0.005	<0.001	0.024	0.0054	<0.005	<0.001	0.0064	<0.005	<0.005	<0.001	<0.001	0.101	0.0365	<0.005	0.109	0.027	0.136
	P74-ROX-101413	10/14/2013		41.72	NE	0.0653	<0.005	<0.005	<0.005		0.0052	0.0074	0.0011	0.0257	0.0094	<0.005	<0.001	0.0344	<0.005	<0.005	<0.001	<0.001	0.192	0.0739	<0.005	0.237	0.0483	0.285
	P74-ROX-012414	1/24/2014		43.35	NE	0.115	<0.005	<0.005	<0.005		0.0058	<0.005	<0.001	0.0322	0.0112	<0.005	<0.001	0.153	<0.005	<0.005	<0.001	<0.001	0.292	0.11	<0.005	0.316	0.0579	0.374
	P74-ROX-041514	4/15/2014		44.74	NE	0.0043	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	0.00074 J	<0.005	<0.005	<0.001	0.00078 J	<0.005	<0.005	<0.001	<0.001	0.0083	0.0039 J	<0.005	0.0193	0.0015	0.0208
	P74-ROX-070814	7/8/2014		43.02	NE	0.0374	<0.005	<0.005	<0.005		0.0018 J J	<0.005	<0.001	0.0128	0.0036 J	<0.005	<0.001	0.0087	<0.005	<0.005	<0.001	<0.001	0.117	0.0518	<0.005	0.121	0.0122	0.133
	P74-ROX-101414	10/14/2014		41.48	NE	<0.001	<0.005	<0.005	<0.005 UJ		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	0.00043 J
	P74-ROX-011915	1/19/2015		43.47	NE	0.082	<0.005	<0.005	<0.005		0.0029 J	<0.005	0.0056	0.0193	0.0053	<0.005	<0.001	0.102	<0.005	<0.005	<0.001	<0.001	0.135	0.0589	<0.005	0.197	0.019	0.216
	P74-ROX-041515	4/15/2015		44.61	NE	0.0058	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	0.00042 J	<0.005	<0.001	0.0013	<0.005	<0.005	<0.001	<0.001	0.0086	0.0044 J	<0.005	0.0202	0.0012	0.0214
	P74-ROX-071015	7/10/2015	44.43 - 69.43	43.28	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001

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SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
			Screening Values (mg/L)			0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
P-93A	P93A-ROX-110712	11/7/2012	48.17 - 63.17	45.00	NE	0.265	<0.5	<0.5	<0.5		<0.5	<0.5	<0.1	<0.5	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.5	0.43	0.076 J	0.506
	P93A-ROX-110712-DUP	11/7/2012		45.00	NE	0.262	<0.5	<0.5	<0.5		<0.5	<0.5	<0.1	<0.5	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.5	0.404	0.073 J	0.477
	P93A-ROX-012313	1/23/2013		45.89	NE	<0.5	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5 UJ	<0.5	<0.5	<0.5
	P93A-ROX-012313-DUP	1/23/2013		45.89	NE	<0.5	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5 UJ	<0.5	<0.5	<0.5
	P93A-ROX-041113	4/11/2013		46.29	NE	0.255 J	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<0.5
	P93A-ROX-041113-DUP	4/11/2013		46.29	NE	<0.5	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<0.5
	P93A-ROX-071813	7/18/2013		43.25	NE	0.162	<0.005	<0.005	<0.005		0.0101	<0.005	0.0054	0.0303	0.0113	<0.005	<0.001	0.0072	<0.005	<0.005	<0.001	<0.001	0.0915	0.0116	<0.005 UJ	0.273	0.0426	0.316
	P93A-ROX-101113	10/11/2013		44.18	NE	0.264	<0.005	<0.005	<0.005		0.0142	<0.005	0.0034	0.0621	0.015	<0.005	<0.001	0.0133	<0.005	<0.005	<0.001	<0.001	0.146	0.0163	<0.005 UJ	0.451	0.0789	0.53
	P93A-ROX-012914	1/29/2014		46.53	NE	<0.5	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<0.5
	P93A-ROX-041714	4/17/2014		47.41	NE	<0.5	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<0.5
	P93A-ROX-071814	7/18/2014		45.70	NE	<1	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	<1
	P93A-ROX-071814-DUP	7/18/2014		45.70	NE	<1	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	<1
	P93A-ROX-101514	10/15/2014		45.06	NE	0.229 J	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	0.442 J	<2.5	<2.5	<0.5	0.263 J	0.65
	P93A-ROX-101514-DUP	10/15/2014		45.06	NE	0.226 J	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5	<0.5	0.258 J	0.635
	P93A-ROX-012715	1/27/2015	43.07 - 53.07	46.05	NE	0.0856 J	<0.005 UJ	<0.002 UJ	<0.01 UJ		0.0073 J	0.0011 J J	0.0013 J	0.0243 J	0.008 J	<0.001 UJ	<0.001 UJ	0.0039 J	<0.001 UJ	<0.001 UJ	<0.001 UJ	<0.001 UJ	0.127 E J	0.0282 J	<0.01 UJ	0.138 J	0.0347 J	0.173 J
	P93A-ROX-041715	4/17/2015		47.02	NE	0.0559	<0.005	<0.005	<0.005		0.0049 J	<0.005	<0.001	0.011	0.0059	<0.005	<0.001	0.003	<0.005	<0.005	<0.001	<0.001	0.0886	0.03	<0.005	0.0477	0.0199	0.0677
	P93A-ROX-071315	7/13/2015	43.07 - 53.07	45.93	NE	0.0361 J	<0.5	<0.5	<0.5		<0.5	<0.5	<0.1	<0.5	<0.5	<0.5	<0.1	0.0342 J	<0.5	<0.5	<0.1	<0.1	0.0313 J	<0.5	<0.5	<0.1	<0.1	0.0502 J
P-93B	P93B-ROX-110712	11/7/2012	74.60 - 76.60	45.05	NE	<0.1	<0.5	<0.5	<0.5		<0.5	<0.5	<0.1	<0.5	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.5	0.0986 J	<0.1	0.0986 J
	P93B-ROX-110712-DUP	11/7/2012		45.05	NE	0.0695 J	<0.5	<0.5	<0.5		<0.5	<0.5	<0.1	<0.5	<0.5	<0.5	<0.1	0.0719 J	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.5	0.237	<0.1	0.237
	P93B-ROX-012313	1/23/2013		45.89	NE	<1	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5 UJ	<1	<1	<1
	P93B-ROX-041113	4/11/2013		46.32	NE	<0.5	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<0.5
	P93B-ROX-071813	7/18/2013		43.30	NE	0.0652	<0.005	<0.005	<0.005		0.0247	<0.005	0.0035	0.0093	0.0357	<0.005	<0.001	0.0646	<0.005	<0.005	<0.001	<0.001	0.025	0.0069	0.0176 J	0.195	0.0418	0.236
	P93B-ROX-101613	10/16/2013		44.43	NE	<2	<10 UJ	<10	<10		<10	<10	<2 UJ	<10	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10 UJ	<2	<2	<2
	P93B-ROX-101613-DUP	10/16/2013		44.43	NE	<2	<10 UJ	<10	<10		<10	<10	<2 UJ	<10	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10 UJ	<2	<2	<2
	P93B-ROX-012814	1/28/2014		46.58	NE	<1	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	<1
	P93B-ROX-012814-DUP	1/28/2014		46.58	NE	<1	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	<1
	P93B-ROX-041714	4/17/2014		47.46	NE	<0.5	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<0.5
	P93B-ROX-041714-DUP	4/17/2014		47.46	NE	<0.5	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<0.5
	P93B-ROX-071714	7/17/2014		45.75	NE	0.0236 J	<0.005 UJ	<0.005 UJ	<0.005 UJ		0.0227 J	<0.005 UJ	<0.001 UJ	0.0053 J	0.0297 J	<0.005 UJ	<0.001 UJ	0.0129 J	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	0.008 J	0.0037 J J	<0.005 UJ	0.0662 J	0.0047 J	0.0708
	P93B-ROX-101514	10/15/2014		45.15	NE	<0.5	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<0.5
	P93B-ROX-012315	1/23/2015		47.24	NE	<1	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	<1
	P93B-ROX-012315-DUP	1/23/2015		47.24	NE	<1	<5	<5	<5		<5	<5	<1	<5	<5	<5	<1	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	<1
	P93B-ROX-021915	2/19/2015		47.24	NE	<0.5	<2.5	<1	<5		<0.5	<2.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<5	<1	<0.5	<1.5
	P93B-ROX-041615	4/16/2015		48.42	NE	0.0947	<0.005	<0.005	<0.005		0.0226	<0.005	<0.001	0.0033 J	0.0286	<0.005	0.00073 J	0.111	<0.005	<0.005	<0.001	<0.001	0.0124	0.0043 J	<0.005	0.0993	0.0378	0.137
	P93B-ROX-041615-DUP	4/16/2015		48.42	NE	0.249 J	<5	<5	<5		<5	<5	<1	<5	<5	<5	0.216 J	<1	<5	<5	<1	<1	<5	<5	<5	<1	<1	0.338 J
	P93B-ROX-070915	7/9/2015	74.60 - 76.60	47.74	NE	<5	<25	<25	<25		<25	<25	<5	<25	<25	<25	<5	<5	<25	<25	<5	<5	<25	<25	<25	<5	<5	<5
	P93B-ROX-070915-DUP	7/9/2015		47.74	NE	<2	<10	<10	<10		<10	<10	<2	7.01 J	<10	<10	<2	<2	<10	<10	<2	<2	<10	<10	<10	<2	<2	<2

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
			Screening Values (mg/L)			0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
P-93C	P93C-ROX-110812	11/8/2012	94.26 - 96.26	45.12	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0056	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P93C-ROX-012313	1/23/2013		45.78	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0044	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	P93C-ROX-041213	4/12/2013		46.21	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0045	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P93C-ROX-071813	7/18/2013		43.31	NE	0.0041	<0.005	<0.005	<0.005		0.002 J	<0.005	0.0049	<0.005	0.002 J	<0.005	<0.001	0.007	<0.005	<0.005	<0.001	<0.001	0.0016 J	<0.005	<0.005 UJ	0.0076	0.0015	0.0091
	P93C-ROX-080813	8/8/2013		43.31	NE	<0.05	<0.25	<0.25	<0.25		<0.25	<0.25	<0.05	<0.25	<0.25	<0.25	<0.05	<0.05	<0.25	<0.25	<0.05	<0.05	<0.25	<0.25	<0.25	<0.05	<0.05	<0.05
	P93C-ROX-101613	10/16/2013		44.31	NE	<0.001	<0.005 UJ	<0.005	<0.005		<0.005	<0.005	0.0035 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	P93C-ROX-012414	1/24/2014		46.44	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0047	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P93C-ROX-041714	4/17/2014		47.34	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0043	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P93C-ROX-071714	7/17/2014		45.61	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0061 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P93C-ROX-101514	10/15/2014		44.99	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0046	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P93C-ROX-011915	1/19/2015	92.47 - 97.47	46.77	NE	<0.1	<0.5	<0.5	<0.5		<0.5	<0.5	<0.1	<0.5	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.5	<0.1	<0.1	<0.1
	P93C-ROX-021915	2/19/2015		46.77	NE	<1	<5	<2	<10		<1	<5	<1	<5	<1	<1	<1	<1	<1	<1	<1	<1	<2	<2	<10	<2	<1	<3
	P93C-ROX-041615	4/16/2015		48.22	NE	<0.1	<0.5	<0.5	<0.5		<0.5	<0.5	<0.1	<0.5	<0.5	<0.5	<0.1	0.0295 J	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.5	<0.1	<0.1	<0.1
	P93C-ROX-071315	7/13/2015	92.47 - 97.47	47.09	NE	0.00047 J	<0.005	<0.005	<0.005		<0.005	<0.005	0.0016	<0.0037 U	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	0.00059 J	<0.005	<0.005	0.00095 J	<0.001	0.0011
P-93D	P93D-ROX-110812	11/8/2012	125.75 - 127.75	NM	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0023	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P93D-ROX-012213	1/22/2013		44.21	NE	0.00069 J	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	0.0015 J	<0.005	<0.005	<0.001	<0.001	<0.001
	P93D-ROX-041113	4/11/2013		46.37	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P93D-ROX-071213	7/12/2013		43.51	NE	<0.001	<0.005	<0.005 UJ	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001 UJ	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	P93D-ROX-101113	10/11/2013		44.24	NE	<0.001	<0.005 UJ	<0.005	<0.005		<0.005	<0.005	0.00066 J J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005 UJ	<0.001	<0.001	<0.001
	P93D-ROX-013114	1/31/2014		46.62	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0011	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P93D-ROX-041414	4/14/2014		47.54	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	0.0017 J	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P93D-ROX-071714	7/17/2014		45.78	NE	<0.001	<0.005	<0.005	<0.005		<0.005	<0.005	0.0011 J	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.001
	P93D-ROX-101514	10/15/2014		45.14	NE	<0.01	<0.05	<0.05	<0.05		<0.05	<0.05	<0.01	<0.05	<0.05	<0.05	<0.01	<0.01	<0.05	<0.05	<0.01	<0.01	0.0083 J	<0.05	<0.05	<0.01	<0.01	<0.01
	P93D-ROX-110414	11/4/2014		45.14	NE	0.0013	<0.005	<0.005	<0.005		<0.005	<0.005	0.002	<0.005	0.00067 J	<0.005	<0.001	0.0018	<0.005	<0.005	<0.001	<0.001	0.00057 J	<0.005	<0.005	<0.001	<0.001	<0.001
	P93D-ROX-012315	1/23/2015		42.28	NE	<0.25	<1.3	<1.3	<1.3		<1.3	<1.3	<0.25	<1.3	<1.3	<1.3	<0.25	<0.25	<1.3	<1.3	<0.25	<0.25	<1.3	<1.3	<1.3	<0.25	<0.25	<0.25
	P93D-ROX-021915	2/19/2015		42.28	NE	<2.5	<13	<5	<25		<2.5	<13	<2.5	<13	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	<5	<5	<25	<5	<2.5	<7.5
	P93D-ROX-042015	4/20/2015		48.52	NE	<0.1	<0.5	<0.5	<0.5		<0.5	<0.5	<0.1	<0.5	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.1	<0.1	<0.5	<0.5	<0.5	<0.1	<0.1	<0.1
	P93D-ROX-070915	7/9/2015	125.75 - 127.75	47.96	NE	<0.5	<2.5	<2.5	<2.5		<2.5	<2.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<0.5	<0.5	<2.5	<2.5	<2.5	<0.5	<0.5	<0.5
ROST-3-PZ	ROST3PZ-ROX-110112	11/1/2012	40.00 - 50.00	40.82	NE	0.0018	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	0.0026 J	<0.005	<0.005	0.0122	0.0037	0.0159
ROST-3-MW	ROST3MW-ROX-012313	1/23/2013	37.81 - 47.81	41.50	NE	0.0296	<0.005	<0.005	<0.005		0.0066	<0.005	<0.001	0.0076	0.0156	<0.005	<0.001	0.0016	<0.005	<0.005	<0.001	<0.001	0.0786	0.022	<0.005 UJ	0.114	0.0159	0.13
	ROST3MW-ROX-040513	4/5/2013				0.0136	<0.005	<0.005	<0.005		0.0032 J	<0.005	<0.001	0.132 J	0.0082	<0.005	<0.001	0.0076	<0.005	<0.005	<0.001	<0.001	0.0531	0.0145	<0.005	0.0603	0.0126	0.0729
	ROST3MW-ROX-071113	7/11/2013		39.50	NE	0.218	<0.005	<0.005	<0.005 UJ		0.0146	<0.005	<0.001	0.0411	0.0279	<0.005	<0.001	0.014	<0.005	<0.005	<0.001	<0.001	0.164	0.0373	<0.005 UJ	0.644	0.124	0.768
	ROST3-MW-ROX-100913	10/9/2013		40.16	NE	0.0182	<0.005	<0.005 UJ	<0.005		0.0017 J	<0.005	<0.001	0.0045 J	0.0029 J	<0.005	<0.001	0.0018	<0.005	<0.005	<0.001	<0.001	0.0168	0.0035 J	<0.005	0.0422	0.0123	0.0546
	ROST3MW-ROX-011714	1/17/2014		42.20	NE	0.008	<0.005	<0.005	<0.005		0.00099 J	<0.005	<0.001	<0.005	0.002 J	<0.005	<0.001	0.0012	<0.005	<0.005	<0.001	<0.001	0.0207	0.0057	<0.005	0.0377	0.0063	0.044
	ROST3MW-ROX-041014	4/10/2014		42.80	NE	0.0055	<0.005	<0.005	<0.005		0.00043 J	<0.005	<0.001	0.00084 J	0.00082 J	<0.005	<0.001	0.0015	<0.005	<0.005	<0.001	<0.001	0.0121	0.003 J	<0.005	0.0287	0.0028	0.0315
	ROST3MW-ROX-071414	7/14/2014		41.88	NE	0.008	<0.005	<0.005	<0.005		0.00053 J	<0.005	<0.001	0.0045 J	0.00098 J	<0.005	<0.001	0.0024	<0.005	<0.005	<0.001	<0.001	0.0132	0.0032 J	<0.005	0.0371	0.0041	0.0412
	ROST3MW-ROX-100914	10/9/2014		41.31	NE	0.0398	<0.005	<0.005	<0.005		0.0021 J	<0.005	<0.001	0.0061	0.0028 J	<0.005	<0.001	0.0032	<0.005	<0.005	<0.001	<0.001	0.018	0.005	<0.005 UJ	0.0651	0.0205	0.0856
	ROST3MW-ROX-011515	1/15/2015		41.83	NE	0.0144	<0.005	<0.005	<0.005		0.0016 J	<0.005	<0.001	0.0061	0.0021 J	<0.005	<0.001	0.0011	<0.005	<0.005	<0.001	<0.001	0.0126	0.0036 J	<0.005	0.0166	0.0042	0.0209
	ROST3MW-ROX-041315	4/13/2015		43.43	NE	0.0085	<0.005	<0.005	<0.005		0.0014 J	<0.005	<0.001	<0.005	0.0015 J	<0.005	<0.001	0.0008 J	<0.005	<0.005	<0.001	<0.001	0.0055	0.00068 J	<0.005	0.0015	0.0029	0.0044
	ROST3MW-ROX-071315	7/13/2015	37.81 - 47.81	42.36	NE	0.02	<0.005	<0.00071 U	<0.005		0.00093 J	<0.005	<0.001	0.0052 J	0.0012 J	<0.005	<0.001	0.0027	<0.0015 U	<0.0013 U	<0.001	<0.001	0.0059	0.00061 J	0.0583	0.0263	0.0065	0.0328

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TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						VOCs																				
						Ethylbenzene	Ethyl methacrylate	Hexachlorobutadiene	2-Hexanone (Methyl N-Butyl Ketone)	Isopentane	Isopropylbenzene (Cumene)	4-Methyl-2-pentanone (Methyl Isobutyl Ketone)	Methyl tert-Butyl Ether (MTBE)	Naphthalene	n-Propylbenzene	Styrene	Tetrachloroethene	Toluene	1,2,3-Trichlorobenzene	1,2,4-Trichlorobenzene	1,1,2-Trichloroethane	Trichloroethene	1,2,4-Trimethylbenzene	1,3,5-Trimethylbenzene	Vinyl acetate	m,p-Xylenes	o-Xylenes	Xylenes (total)
			Screening Values (mg/L)			0.7 [1]		0.007 [3]	0.035 [3]		0.7 [1]	0.56 [3]	0.07 [1]	0.14 [1]	0.7 [3]	0.1 [1]	0.005 [1]	1.0 [1]	0.0056 [3]	0.07 [1]	0.005 [1]	0.005 [1]		0.07 [3]	7.0 [2]	10 [1]		10 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
ROST-4-PZ(C)	ROST4PZC-ROX-102912	10/29/2012	34.95 - 44.95	40.75	NE	0.0014	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0021	<0.001	0.0021
	ROST4PZ(C)-ROX-011113	1/11/2013		41.42	NE	0.0013	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.001	<0.001	0.002 J	0.0014 J	<0.005	0.0018	<0.001	0.0018
	ROST4PZC-ROX-041013	4/10/2013		42.27	NE	0.0028 J	<0.005	<0.005	<0.005 UJ		0.00061 J J	<0.005 UJ	<0.001	<0.005	0.0011 J	<0.005 UJ	<0.001 UJ	0.0006 J J	<0.005 UJ	<0.005 UJ	<0.001 UJ	<0.001 UJ	0.0016 J	<0.005	<0.005	<0.001 UJ	<0.001 UJ	<0.001 UJ
	ROST4PZC-ROX-071113	7/11/2013		40.18	NE	0.0651	<0.005	<0.005	<0.005 UJ		0.0025 J	<0.005	<0.001	0.0189	0.0041 J	<0.005	<0.001	0.041	<0.005	<0.005	<0.001	<0.001	0.0194	0.0044 J	<0.005 UJ	0.126	0.0649	0.191
	ROST4PZC-ROX-100913	10/9/2013		39.91	NE	0.0064	<0.005	<0.005 UJ	<0.005		0.00066 J	<0.005	<0.001	0.0054	0.0012 J	<0.005	<0.001	0.0013	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0101	0.0054	0.0155
	ROST4PZC-ROX-011714	1/17/2014		41.92	NE	0.0039	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	0.00073 J	<0.005	<0.001	0.0014	<0.005	<0.005	<0.001	<0.001	0.0017 J	<0.005	<0.005	0.0124	0.0057	0.018
	ROST4PZC-ROX-041014	4/10/2014		42.05	NE	0.00059 J	<0.005	<0.005	<0.005		<0.005	<0.005	<0.001	<0.005	<0.005	<0.005	<0.001	0.00057 J	<0.005	<0.005	<0.001	<0.001	<0.005	<0.005	<0.005	0.0015	0.0015	0.003
	ROST4C-ROX-071114	7/10/2014		42.22	NE	0.0594	<0.005	<0.005	<0.005		0.00037 J	<0.005	<0.001	0.0104	<0.005	<0.005	<0.001	0.0421	<0.005	<0.005	<0.001	<0.001	0.00082 J	<0.005	<0.005	0.0574	0.0815	0.139
	ROST4PZC-ROX-100914	10/9/2014		41.30	NE	0.0688	<0.005	<0.005	<0.005		0.0011 J	<0.005	<0.001	0.0169	0.0011 J	<0.005	<0.001	0.0196	<0.005	<0.005	<0.001	<0.001	0.0046 J	0.00047 J	<0.005 UJ	0.112	0.0634	0.176
	ROST4PZC-ROX-011515	1/15/2015		41.65	NE	0.0035	<0.005	<0.005	<0.005		0.00036 J	<0.005	<0.001	<0.005	0.00056 J	<0.005	<0.001	0.0005 J	<0.005	<0.005	<0.001	<0.001	0.0011 J	<0.005	<0.005	0.0026	0.0031	0.0057
	ROST4PZC-ROX-041315	4/13/2015		43.00	NE	0.0806	<0.005	<0.005	<0.005		0.0013 J	<0.005	<0.001	0.0146	0.0013 J	<0.005	<0.001	0.0313	<0.005	<0.005	<0.001	<0.001	0.0052	0.00075 J	<0.005	0.148	0.0203	0.168
	ROST4PZ-ROX-071315	7/13/2015	34.93 - 44.93	41.86	NE	0.159	<0.005	<0.005	<0.005		0.0037 J	<0.005	<0.001	0.0806	0.0053	<0.005	<0.001	0.0456	<0.005	<0.005	<0.001	<0.001	0.0334	0.0052	<0.005	0.4	0.0302	0.43
T-12	T12-ROX-110512	11/5/2012	46.46 - 72.46	43.91	NE	1.73	<0.05	<0.05	<0.05		0.0468 J	<0.05	<0.01	0.125	0.0831	<0.05	<0.01	0.322	<0.05	<0.05	<0.01	<0.01	0.385	0.0543	<0.05	2.55	0.176	2.73
	T12-ROX-011813	1/18/2013		44.50	NE	0.426	<0.025	<0.025	<0.025		0.031	<0.025	<0.005	0.129	0.0466	<0.025	<0.005	0.184	<0.025	<0.025	<0.005	<0.005	0.42	0.0407	<0.025	1.11	0.0252	1.13
	T12-ROX-041513	4/15/2013		44.99	NE	1.03	<0.05	<0.05	<0.05		0.0405 J	<0.05	<0.01	0.266 J	0.076	<0.05	<0.01	0.592	<0.05	<0.05	<0.01	<0.01	0.309	<0.05	<0.05	1.2	0.104	1.3
	T12-ROX-071613	7/16/2013		42.33	NE	0.45	<0.005	<0.005 UJ	<0.005		0.0363 J	<0.005	<0.001	0.122 J	0.0627 J	<0.005	<0.001	0.186 J	<0.005	<0.005	<0.001	<0.001	0.361 J	0.0238 J	<0.005 UJ	0.794 J	0.0145 J	0.808 J
	T12-ROX-101513	10/15/2013		43.73	NE	1.82	<0.025	<0.025	<0.025		0.0618	<0.025	<0.005	0.215 J	0.114	<0.025	<0.005	0.697	<0.025	<0.025	<0.005	<0.005	0.575	0.0607	<0.025	2.43	0.139	2.57
	T12-ROX-012414	1/24/2014		45.26	NE	0.518	<0.005	<0.005	<0.005		0.0362	<0.005	<0.001	0.171	0.0676	<0.005	<0.001	0.421	<0.005	<0.005	<0.001	<0.001	0.526	0.0507	<0.005	1.12	0.0469	1.23
	T12-ROX-041514	4/15/2014		46.72	NE	0.376	<0.005	<0.005	<0.005		0.0306	<0.005	<0.001	0.12	0.0534	<0.005	<0.001	0.406	<0.005	<0.005	<0.001	<0.001	0.22 J	0.0339	<0.005	0.841	0.0401	0.864
	T12-ROX-070814	7/8/2014		45.13	NE	0.614	<0.005	<0.005	<0.005		0.0577 J	<0.005	<0.001	0.146	0.0912	<0.005	<0.001	0.686	<0.005	<0.005	<0.001	<0.001	0.425	0.0589	<0.005	1.25	0.0909	1.3
	T12-ROX-101714	10/17/2014		44.40	NE	1.75	<0.05	<0.05	<0.05		0.0459 J	<0.05	<0.01	0.184 J	0.0707	<0.05	<0.01	0.722	<0.05 UJ	<0.05	<0.01	<0.01	0.244	0.0391 J	<0.05 UJ	2.25	0.114	2.36
	T12-ROX-011915	1/19/2015		45.27	NE	0.596	<0.05	<0.05	<0.05		0.0432 J	<0.05	0.0033 J	0.196	0.0745	<0.05	<0.01	0.337	<0.05	<0.05	<0.01	<0.01	0.391	0.0521	<0.05	1.3	0.0747	1.38
	T12-ROX-041515	4/15/2015		46.73	NE	1.34	<0.005	<0.005	<0.005		0.0662	<0.005	<0.001	0.131	0.117	<0.005	<0.001	0.658	<0.005	<0.005	<0.001	<0.001	0.331	0.0543	<0.005	1.62	0.177	1.62
	T12-ROX-071015	7/10/2015	46.46 - 72.46	46.09	NE	0.197	<0.05	<0.05	<0.05		0.0222 J	<0.05	<0.01	0.0798	0.0455 J	<0.05	<0.01	0.0782	<0.05	<0.05	<0.01	<0.01	0.185	0.0173 J	<0.05	0.594	0.0097 J	0.603

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TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																		
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
					Screening Values (mg/L)	0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-01	MW1-ROX-102612	10/26/2012	48.80 - 58.80	41.22	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0057	0.00099 J	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	MW1-ROX-121712	12/17/2012		41.22	NE																						
	MW1-ROX-011013	1/10/2013		41.89	NE	<0.000024 U	<0.0001	<0.01 UJ	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW1-ROX-040913	4/9/2013		42.55	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0011 U	<0.011
	MW1-ROX-070813	7/8/2013		39.56	NE	<0.000026 U	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	0.000027 J	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.0024 U	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW1-ROX-100313	10/3/2013		40.28	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.00065 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW1-ROX-011414	1/14/2014		42.77	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011 UJ	<0.0053 UJ	<0.00011	<0.00011	<0.0021	<0.011 UJ	<0.0053	<0.011 UJ
	MW1-ROX-040714	4/7/2014		43.28	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	0.003 J J	<0.011	<0.0054	<0.0022	<0.0054	<0.011 UJ	<0.0057 UJ	<0.00011	<0.00011	<0.0022	<0.011 UJ	<0.0054	<0.011 UJ
	MW1-ROX-070914	7/9/2014		42.09	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW1-ROX-100614	10/6/2014		41.1	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW1-ROX-011215	1/12/2015		42.73	NE	0.00003 J	0.000027 J	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW1-ROX-040615	4/6/2015		44.11	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	0.00046 J	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW1-ROX-070815	7/8/2015	48.80 - 58.80	43.35	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
MW-02	MW2-ROX-102612	10/26/2012	49.87 - 59.87	42.35	NE	0.000093 J	<0.00011	<0.011	<0.00011	0.00016	<0.00011	<0.000054	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	0.0034 J
	MW2-ROX-011113	1/11/2013		42.94	NE	0.00016	0.000019 J	<0.011 UJ	<0.00011	<0.000056	0.000027 J	0.000039 J	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW2-ROX-040913	4/9/2013		43.70	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	0.005 J
	MW2-ROX-071113	7/11/2013		40.82	NE	0.000035 J	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0055	0.00063 J	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	0.005 J
	MW2-ROX-100813	10/8/2013		41.73	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW2-ROX-012014	1/20/2014		44.00	NE	<0.00011	0.00018	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW2-ROX-041014	4/10/2014		44.66	NE	<0.00012	<0.00012	<0.012	<0.00012	<0.00006	<0.00012	<0.00006	<0.00012	<0.00012	<0.012 UJ	<0.012	<0.006	<0.0024	<0.006	<0.012	<0.006	<0.00012	<0.00012	<0.0024	<0.012	<0.006	<0.012
	MW2-ROX-071414	7/14/2014		43.13	NE	0.000084 J	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.00037 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW2-ROX-101014	10/10/2014		42.49	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW2-ROX-011615	1/16/2015		44.1	NE	0.00018	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW2-ROX-041315	4/13/2015		45.56	NE	0.000041 J	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	0.001 J	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW2-ROX-071315	7/13/2015	49.87 - 59.87	44.53	NE	0.000042 J	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	0.0028 J
MW-03	MW3-ROX-102512	10/25/2012	34.67 - 44.67	28.39	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.00059 U	<0.01
	MW3-ROX-010913	1/9/2013		29.35	NE	<0.0001	0.000023 J	<0.01 UJ	0.000037 J	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	MW3-ROX-040813	4/8/2013		29.74	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	MW3-ROX-071113	7/11/2013		26.32	NE	0.000028 J	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0054	0.0038	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW3-ROX-100813	10/8/2013		27.38	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW3-ROX-011614	1/16/2014		29.91	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011 UJ	<0.0053 UJ	<0.00011	<0.00011	<0.0021	<0.011 UJ	<0.0053	<0.011 UJ
	MW3-ROX-040914	4/9/2014		30.50	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	0.00038 J	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW3-ROX-071114	7/10/2014		29.05	NE	<0.0001	<0.0001	<0.011	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.011	<0.011	<0.0054	0.0013 J	<0.0054	<0.011	<0.0054	0.000028 J	<0.0001	<0.0022	<0.011	<0.0054	<0.011
	MW3-ROX-100914	10/9/2014		28.18	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW3-ROX-011515	1/15/2015		29.65	NE	0.000027 J	<0.00011	<0.011	0.000021 J J	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW3-ROX-041015	4/10/2015		31.16	NE	0.000018 J	<0.0001	<0.011	0.000019 J	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.011	<0.011	<0.0053	<0.00073 U	<0.0053	<0.011	<0.0053	<0.0001	<0.0001	<0.0021	<0.011	<0.0053	<0.011
	MW3-ROX-071015	7/10/2015	34.67 - 44.67	30.01	NE	<0.00011	<0.00011	<0.011	0.00002 J	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																		
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
			Screening Values (mg/L)			0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-04	MW4-ROX-102912	10/29/2012	46.06 - 56.06	39.45	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW4-ROX-011113	1/11/2013		40.20	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW4-ROX-011113-DUP	1/11/2013		40.20	NE	<0.00012	<0.00012	<0.012 UJ	<0.00012	<0.00006	<0.00012	<0.00006	<0.00012	<0.00012	<0.012	<0.012	<0.006	<0.0024	<0.006	<0.012	<0.006	<0.00012	<0.00012	<0.0024	<0.012	<0.006	<0.012
	MW4-ROX-030413	3/4/2013		40.20	NE																						
	MW4-ROX-040913	4/9/2013		40.90	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW4-ROX-040913-DUP	4/9/2013		40.90	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053 UJ	<0.011
	MW4-ROX-071713	7/17/2013		37.61	NE	<0.000036 U	<0.00011	<0.011	<0.00011	<0.000055	0.00004 J	0.000034 J	0.000061 J	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW4-ROX-101613	10/16/2013		38.80	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0054	<0.0022	<0.0054	<0.011 UJ	<0.0055 UJ	<0.00011	<0.00011	<0.0022	<0.011 UJ	<0.0054	<0.011 UJ
	MW4-ROX-013014	1/30/2014		41.09	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0054	<0.0022	<0.0054	<0.011 UJ	<0.0054 UJ	<0.00011	<0.00011	<0.0022	<0.011 UJ	<0.0054	<0.011 UJ
	MW4-ROX-041614	4/16/2014		41.91	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW4-ROX-071614	7/16/2014		40.18	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.00038 J	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW4-ROX-101614	10/16/2014		39.49	NE	<0.00012	<0.00012	<0.012	<0.00012	<0.000059	<0.00012	<0.000059	<0.00012	<0.00012	<0.012	<0.012	<0.0059	<0.0024	<0.0059	<0.012	<0.0059	<0.00012	<0.00012	<0.0024	<0.012	<0.0059	<0.012
	MW4-ROX-012115	1/21/2015		41.27	NE	0.000019 J	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW4-ROX-042115	4/21/2015	45.06 - 55.06	42.58	NE	0.000027 J	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW4-ROX-071415	7/14/2015	45.06 - 55.06	41.30	NE	0.000023 J	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
MW-05	MW5-ROX-102912	10/29/2012	33.97 - 43.97	28.16	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW5-ROX-011113	1/11/2013		28.75	NE	0.000071 J	0.000066 J	<0.011 UJ	0.000028 J	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW5-ROX-040913	4/9/2013		29.41	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW5-ROX-070913	7/9/2013		26.04	NE	<0.0001	<0.0001	<0.01	<0.0001	0.0001 J	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	MW5-ROX-100813	10/8/2013		26.97	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW5-ROX-011714	1/17/2014		29.59	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW5-ROX-041014	4/10/2014		30.09	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW5-ROX-071414	7/14/2014		28.59	NE	0.000075 J	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW-5-ROX-100914	10/9/2014		27.75	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW5-ROX-011515	1/15/2015		29.34	NE	0.00012	<0.00011	<0.011	0.00007 J J	0.000035 J J	<0.00011	<0.000053	0.00002 J J	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	0.000025 J J	0.000017 J J	<0.0021	<0.011	<0.0053	<0.011
	MW5-ROX-041315	4/13/2015		30.97	NE	0.000073 J	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW5-ROX-071315	7/13/2015	33.97 - 43.97	29.45	NE	0.000062 J	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
MW-06A	MW6A-ROX-102412	10/24/2012	34.83 - 44.83	30.06	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW6A-ROX-011413	1/14/2013		31.00	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.000051	<0.0001	<0.000051	0.000073 J	<0.0001	<0.01 UJ	<0.01	<0.0051	0.00054 J	<0.0051	<0.01	<0.0051	<0.0001	0.000066 J	<0.002	<0.01	<0.0051	<0.01
	MW6A-ROX-040313	4/3/2013		31.62	NE	<0.00011	<0.00011 UJ	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0053	0.00052 J	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW6A-ROX-070913	7/9/2013		28.25	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW6A-ROX-070913-DUP	7/9/2013		28.25	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW6A-ROX-100713	10/7/2013		28.87	NE	0.0001 J	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.00082 U	<0.011
	MW6A-ROX-100713-DUP	10/7/2013		28.87	NE	0.000093 J	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	0.00078 J	<0.011
	MW6A-ROX-011614	1/16/2014		31.62	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW6A-ROX-011614-DUP	1/16/2014		31.62	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW6A-ROX-040814	4/8/2014		32.16	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0056	<0.00057 U	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW6A-ROX-040814-DUP	4/8/2014		32.16	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0054	<0.00066 U	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW6A-ROX-071014	7/10/2014		30.75	NE	<0.00011	0.000075 J	<0.011 UJ	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW6A-ROX-100814	10/8/2014		29.84	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW6A-ROX-011415	1/14/2015		31.54	NE	0.000089 J	0.00004 J	<0.011	0.00006 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW6A-ROX-040715	4/7/2015		33.08	NE	0.000061 J	0.000085 J	<0.01	0.000027 J	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW6A-ROX-071515	7/15/2015	34.83 - 44.83	31.52	NE	0.00011	<0.00011	<0.011	0.000047 J	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																		
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
			Screening Values (mg/L)			0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-06B	MW6B-ROX-102412	10/24/2012	64.05 - 69.05	30.11	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	0.00057 J	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW6B-ROX-011713	1/17/2013		31.11	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	MW6B-ROX-040313	4/3/2013		31.68	NE	<0.00011	<0.00011 UJ	<0.011 UJ	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW6B-ROX-070913	7/9/2013		28.25	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW6B-ROX-100713	10/7/2013		28.93	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.00057 U	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.00084 U	<0.011
	MW6B-ROX-011614	1/16/2014		31.67	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	0.000051 J	<0.00011	<0.011 UJ	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	0.000042 J	<0.0022	<0.011	<0.0054	<0.011
	MW6B-ROX-040814	4/8/2014		32.21	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW6B-ROX-071014	7/10/2014		30.81	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW6B-ROX-100814	10/8/2014		29.87	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW6B-ROX-011415	1/14/2015		31.59	NE	<0.00011	0.000016 J	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW6B-ROX-040715	4/7/2015		33.10	NE	<0.0001	0.000016 J	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW6B-ROX-040715-DUP	4/7/2015		33.10	NE	<0.0001	0.000016 J	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW6B-ROX-071415	7/14/2015	64.05 - 69.05	31.56	NE	0.00012	0.000017 J	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
MW-06C	MW6C-ROX-102412	10/24/2012	84.95 - 89.95	27.85	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW6C-ROX-011713	1/17/2013		30.88	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	MW6C-ROX-040313	4/3/2013		31.41	NE	<0.0001	<0.0001 UJ	<0.01 UJ	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01 UJ	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW6C-ROX-070913	7/9/2013		28.03	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW6C-ROX-100713	10/7/2013		28.72	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.00056 U	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0013 U	<0.011
	MW6C-ROX-011614	1/16/2014		31.48	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	0.000041 J	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW6C-ROX-040814	4/8/2014		32.01	NE	<0.00012	<0.00012	<0.012	<0.00012	<0.000059	<0.00012	<0.000059	<0.00012	<0.00012	<0.012	<0.012	<0.0059	<0.0024	<0.0059	<0.012	<0.0059	<0.00012	<0.00012	<0.0024	<0.012	<0.0059	<0.012
	MW6C-ROX-071014	7/10/2014		30.60	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	0.000034 J	<0.00011	<0.000056	0.000035 J	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	0.000037 J	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW6C-ROX-100814	10/8/2014		29.67	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW6C-ROX-011415	1/14/2015		31.41	NE	0.000017 J	<0.00011	<0.011	0.000024 J	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW6C-ROX-040915	4/9/2015		32.80	NE	<0.00011	<0.00011	<0.011	0.000016 J	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW6C-ROX-071415	7/14/2015	84.95 - 89.95	31.38	NE	0.000027 J	0.00002 J	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
MW-06D	MW6D-ROX-102412	10/24/2012	104.72 - 109.72	29.71	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW6D-ROX-011713	1/17/2013		30.75	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	MW6D-ROX-040313	4/3/2013		31.27	NE	<0.00011	<0.00011 UJ	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW6D-ROX-070913	7/9/2013		27.91	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW6D-ROX-100713	10/7/2013		28.58	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.001 U	<0.011
	MW6D-ROX-011614	1/16/2014		31.33	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW6D-ROX-040814	4/8/2014		31.85	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW6D-ROX-071014	7/10/2014		31.47	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW6D-ROX-071014-DUP	7/10/2014		31.47	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW6D-ROX-100814	10/8/2014		29.53	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	0.016	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW6D-ROX-100814-DUP	10/8/2014		29.53	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW6D-ROX-011415	1/14/2015		31.26	NE	<0.00011	<0.00011	<0.011	0.000026 J	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW6D-ROX-011415-DUP	1/14/2015		31.26	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW6D-ROX-040715	4/7/2015		32.74	NE	0.000016 J	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW6D-ROX-071415	7/14/2015	104.72 - 109.72	31.19	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																		
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
					Screening Values (mg/L)	0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-07	MW7-ROX-103012	10/30/2012	42.92 - 52.92	41.23	NE	0.00031	<0.00012	<0.012 UJ	<0.00012	<0.000058	<0.00012	<0.000058	<0.00012	<0.00012	<0.012	<0.012	<0.0058	0.0015 J	<0.0058	<0.012	<0.0058	<0.00012	<0.00012	<0.0023	<0.012	<0.0058	<0.012
	MW7-ROX-103012-DUP	10/30/2012		41.23	NE	0.00034	<0.00011	<0.011 UJ	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	0.0007 J	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW7-ROX-011513	1/15/2013		42.21	NE	0.00073	0.00011	<0.011 UJ	0.000059 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	0.00061 J	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW7-ROX-011513-DUP	1/15/2013		42.21	NE	0.00066	0.000093 J	<0.01 UJ	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0052	0.00055 J	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW7-ROX-041013	4/10/2013		42.70	NE	0.0012	0.00015	<0.011	0.000089 J	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	0.00083 J	<0.011	<0.0054	<0.011
	MW7-ROX-041013-DUP	4/10/2013		42.70	NE	0.0012	0.00016	<0.011	0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	0.00088 J	<0.011	<0.0053	<0.011
	MW7-ROX-071713	7/17/2013		39.60	NE	0.00019	0.000031 J	<0.011	0.000028 J	0.00004 J	0.000044 J	0.000045 J	0.00008 J	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	0.000077 J	<0.0022	<0.011	<0.0054	<0.011
	MW7-ROX-101613	10/16/2013		40.64	NE	0.00035	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW7-ROX-013014	1/30/2014		42.94	NE	0.00028	<0.0001	<0.01	0.00029	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	MW7-ROX-041614	4/16/2014		43.79	NE	0.00034	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW7-ROX-071614	7/16/2014		42.05	NE	0.00024	<0.0001	<0.01	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW7-ROX-071614-DUP	7/16/2014		42.05	NE	0.00022	<0.0001	<0.01	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW7-ROX-101614	10/16/2014		41.31	NE	0.00024	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW7-ROX-101614-DUP	10/16/2014		41.31	NE	0.00022	<0.00011	<0.011	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	MW7-ROX-012215	1/22/2015		43.45	NE	0.00026	0.000051 J	<0.011	0.000056 J J	<0.00005 U	0.000028 J	0.00013 J	0.000034 J	0.000026 J	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.000046 U	0.000025 J	<0.0021	<0.011	<0.0053	0.00072 J
	MW7-ROX-012215-DUP	1/22/2015		43.45	NE	0.00025	0.000044 J	<0.01	0.00046 J	<0.000052	<0.0001	<0.000052 UJ	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.00039 J	<0.0052	<0.01	<0.0052	<0.000021 U	<0.0001	<0.0021	<0.01	<0.0052	0.00071 J
	MW7-ROX-042115	4/21/2015		44.63	NE	0.00038	0.000059 J	<0.01	0.000055 J	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	0.000022 J	<0.0001	0.00028 J	<0.01	<0.0051	0.0014 J
	MW7-ROX-042115-DUP	4/21/2015		44.63	NE	0.00036	0.000053 J	<0.01	0.00005 J	<0.000051	0.000024 J	<0.000051	0.000018 J	<0.0001	<0.01	<0.01	<0.0051	0.00033 J	<0.0051	<0.01	<0.0051	0.000028 J	0.000016 J	<0.002	<0.01	<0.0051	0.0012 J
	MW7-ROX-071515	7/15/2015	42.92 - 52.92	43.54	NE	0.00027	0.000038 J	<0.01	0.000038 J	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	0.00037 J	<0.0051	<0.01	<0.0051	0.000033 J	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW7-ROX-071515-DUP	7/15/2015		43.54	NE	0.00025	0.000043 J	<0.01	0.000039 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	0.000034 J	<0.0001	<0.0021	<0.01	<0.0052	<0.01
MW-08	MW8-ROX-103012	10/30/2012	33.60 - 43.60	32.32	NE	0.00026	0.00011	<0.011 UJ	0.00044	<0.00087 U	0.00053 B	0.00057 B	0.00058 B	0.00064 B	<0.011	<0.011	<0.0053	0.0012 J	0.00086 J	<0.011	<0.0053	0.00066 B	0.00059 B	<0.0021	<0.011	<0.0053	0.0085 J
	MW8-ROX-011513	1/15/2013		33.30	NE	0.00017	0.000085 J	<0.011 UJ	0.000029 J	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0056	0.00089 J	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	0.019
	MW8-ROX-041013	4/10/2013		33.77	NE	0.00018	0.000059 J	<0.011	0.000072 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	0.0023	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	0.0358
	MW8-ROX-071713	7/17/2013		30.43	NE	0.0002	<0.0001	<0.01	0.000049 J	<0.000052	0.000021 J	<0.000052	0.00004 J	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	0.009 J
	MW8-ROX-071713-DUP	7/17/2013		30.43	NE	0.00019	0.000056 J	<0.011	0.000061 J	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	0.0004 J	<0.011	<0.0054	0.0089 J
	MW8-ROX-101613	10/16/2013		31.59	NE	0.00021	0.000089 J	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	0.0005 J	<0.011	<0.0054	0.0066 J
	MW8-ROX-101613-DUP	10/16/2013		31.59	NE	0.0002	0.000058 J	<0.012	<0.00012	<0.000059	<0.00012	<0.000059	<0.00012	<0.00012	<0.012	<0.012	<0.0059	<0.0024	<0.0059	<0.012	<0.0059	<0.00012	<0.00012	0.0004 J	<0.012	<0.0059	0.0062 J
	MW8-ROX-013014	1/30/2014		34.02	NE	0.0002	0.000089 J	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	0.00053 J	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	0.0005 J	<0.01	<0.0051	0.0124
	MW8-ROX-013014-DUP	1/30/2014		34.02	NE	0.00021	0.000083 J	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.00072 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	0.00053 J	<0.011	<0.0054	0.0121
	MW8-ROX-041614	4/16/2014		34.73	NE	0.00018	0.000074 J	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	0.0005 J	<0.011	<0.0056	<0.011
	MW8-ROX-041614-DUP	4/16/2014		34.73	NE	0.00016	0.000063 J	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	0.00045 J	<0.01	<0.0051	<0.01
	MW8-ROX-071614	7/16/2014		33.01	NE	0.00018	0.000068 J	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.00038 J	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	0.00041 J	<0.01	0.00057 J	<0.01
	MW8-ROX-101614	10/16/2014		32.23	NE	0.00021	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	0.0099 J
	MW8-ROX-012215	1/22/2015		34.22	NE	0.00027	0.000073 J	<0.01	0.000035 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	0.0172
	MW8-ROX-042115	4/21/2015		35.41	NE	0.00018	0.000052 J	<0.011	0.000034 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	0.00045 J	<0.011	<0.0053	0.0201
	MW8-ROX-071515	7/15/2015	33.60 - 43.60	34.07	NE	0.00018	<0.00011	<0.011	0.000037 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	0.0171	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011

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TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																		
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
				Screening Values (mg/L)		0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-09	MW9-ROX-102912	10/29/2012	46.45 - 56.45	43.17	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW9-ROX-011113	1/11/2013		43.90	NE	0.000068 J	0.000064 J	<0.011 UJ	0.00006 J	<0.000054	<0.00011	0.000026 J	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW9-ROX-040913	4/9/2013		44.67	NE	<0.0001 UJ	<0.0001 UJ	<0.01 UJ	<0.0001 UJ	<0.000052 UJ	<0.0001 UJ	<0.000052 UJ	<0.0001 UJ	<0.0001 UJ	<0.01 UJ	<0.01 UJ	<0.0052 UJ	<0.0021 UJ	<0.0052 UJ	<0.01 UJ	<0.0052 UJ	<0.0001 UJ	<0.0001 UJ	<0.0021 UJ	<0.01 UJ	<0.0016 UJ	<0.01 UJ
	MW9-ROX-070813	7/8/2013		42.35	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	0.000035 J	<0.00011	<0.00011		<0.011	<0.0056	<0.0022	<0.0056			<0.00011	<0.00011	<0.0022		<0.0056	
	MW9-ROX-100313	10/3/2013		42.27	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	MW9-ROX-011414	1/14/2014		44.47	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011 UJ	<0.0053 UJ	<0.00011	<0.00011	<0.0021	<0.011 UJ	<0.0053	<0.011 UJ
	MW9-ROX-040714	4/7/2014		44.99	NE	<0.00011	<0.00011	<0.011	<0.00011	0.000024 J	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0056	<0.00054 U	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW9-ROX-070914	7/9/2014		44.35	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.00036 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW9-ROX-100714	10/7/2014		43.52	NE	<0.00012	<0.00012	<0.012	<0.00012	<0.000059	<0.00012	<0.000059	<0.00012	<0.00012	<0.012	<0.012	<0.0059	<0.0024	<0.0059	<0.012	<0.0059	<0.00012	<0.00012	<0.0024	<0.012	<0.0059	<0.012
	MW9-ROX-011315	1/13/2015		44.21	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01 UJ	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW9-ROX-040915	4/9/2015		45.38	NE	0.00002 J	<0.0001	<0.01	0.00002 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.00026 U	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW9-ROX-070915	7/9/2015	46.45 - 56.45	44.81	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
MW-10	MW10-ROX-102612	10/26/2012	44.43 - 54.43	43.08	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW10-ROX-121712	12/17/2012		43.08	NE																						
	MW10-ROX-011013	1/10/2013		44.10	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	MW10-ROX-012113	1/21/2013		44.10	NE	<0.0001	<0.0001	<0.02	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.05	<0.02	<0.01	<0.006	<0.01	<0.02	<0.01	<0.0001	<0.0001	<0.01	<0.01	<0.01	<0.01
	MW10-ROX-040913	4/9/2013		44.60	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0018 U	<0.011
	MW10-ROX-070813	7/8/2013		42.27	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0027 U	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW10-ROX-100313	10/3/2013		42.38	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW10-ROX-011514	1/15/2014		44.42	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	0.000096 J	<0.00011	<0.011 UJ	<0.011	<0.0053	0.00054 J	<0.0053	<0.011 UJ	<0.0054 UJ	<0.00011	0.000074 J	<0.0021	<0.011 UJ	<0.0053	<0.011 UJ
	MW10-ROX-040714	4/7/2014		45.00	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0053	<0.00068 U	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW10-ROX-070914	7/9/2014		44.35	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.00052 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW10-ROX-100714	10/7/2014		43.58	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	MW10-ROX-011315	1/13/2015		44.27	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0056	0.00042 J	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW10-ROX-040815	4/8/2015		45.30	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW10-ROX-070915	7/9/2015	44.43 - 54.43	44.93	NE	0.000023 J	<0.00011	<0.011	0.000039 J	0.000035 J	0.000022 J	0.000028 J	0.000027 J	0.000041 J J	<0.011	<0.011	<0.0054	0.00045 J	0.00028 J	<0.011	<0.0054	0.000045 J	0.00002 J	<0.0022	<0.011	<0.0054	<0.011
MW-11	MW11-ROX-102512	10/25/2012	41.66 - 51.66	40.59	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.00042 U	<0.011
	MW11-ROX-011013	1/10/2013		41.43	NE	<0.0001 UJ	<0.0001 UJ	<0.01 UJ	<0.0001 UJ	<0.00005 UJ	<0.0001 UJ	<0.00005 UJ	<0.0001 UJ	<0.0001 UJ	<0.01 UJ	<0.01 UJ	<0.005 UJ	<0.002 UJ	<0.005 UJ	<0.01 UJ	<0.005 UJ	<0.0001 UJ	<0.0001 UJ	<0.002 UJ	<0.01 UJ	<0.005 UJ	<0.01 UJ
	MW11-ROX-040813	4/8/2013		42.02	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW11-ROX-070813	7/8/2013		39.24	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0052 U	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW11-ROX-100713	10/7/2013		39.95	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0011 U	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0011 U	<0.011
	MW11-ROX-011514	1/15/2014		42.16	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW11-ROX-040714	4/7/2014		42.70	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0056	<0.0056 U	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW11-ROX-070914	7/9/2014		41.75	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	MW11-ROX-100714	10/7/2014		40.89	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW11-ROX-011315	1/13/2015		41.93	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW11-ROX-040815	4/8/2015		43.19	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW11-ROX-070915	7/9/2015	41.66 - 51.66	42.45	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																		
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
					Screening Values (mg/L)	0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
MW-12	MW12-ROX-102512	10/25/2012	41.92 - 51.92	40.95	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.00077 U	<0.011
	MW12-ROX-011013	1/10/2013		41.83	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.000051	<0.0001	0.000026 J	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW12-ROX-040813	4/8/2013		42.46	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW12-ROX-070913	7/9/2013		39.28	NE	<0.00011	<0.00011	<0.011	<0.00011	0.00012 J	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW12-ROX-100713	10/7/2013		40.22	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0055	<0.0022	<0.0055	<0.011 UJ	<0.0053 UJ	<0.00011	<0.00011	<0.0022	<0.011 UJ	<0.00062 U	<0.011 UJ
	MW12-ROX-011514	1/15/2014		42.54	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0052	<0.0021	<0.0052	<0.01 UJ	<0.0052 UJ	<0.0001	<0.0001	<0.0021	<0.01 UJ	<0.0052	<0.01 UJ
	MW12-ROX-040814	4/8/2014		43.15	NE	<0.00011	<0.00011	<0.01	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.01	<0.01 UJ	<0.0051	<0.00039 U	<0.0051	<0.01	<0.0051	<0.00011	<0.00011	<0.002	<0.01	<0.0051	<0.01
	MW12-ROX-070914	7/9/2014		41.97	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW12-ROX-100614	10/6/2014		40.98	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW12-ROX-011215	1/12/2015		42.33	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW12-ROX-040615	4/6/2015		43.75	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW12-ROX-070815	7/8/2015	41.92 - 51.92	42.86	NE	0.000018 J	<0.00011	<0.011	<0.00011	0.000046 J	0.000067 J	0.000083	0.000081 J	0.00011 J	<0.011 UJ	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	0.00008 J	<0.00011	<0.0022	<0.011	<0.0056	<0.011
MW-13	MW13-ROX-110812	11/8/2012	25.57 - 35.57	25.30	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	MW13-ROX-012313	1/23/2013		29.26	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055 UJ	<0.011
	MW13-ROX-041213	4/12/2013		29.44	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW13-ROX-071213	7/12/2013		25.67	NE	<0.00011	<0.000063 U	<0.011	<0.000058 U	<0.00014 U	<0.00011	<0.000054	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0054	0.00079 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW13-ROX-100913	10/9/2013		26.94	NE	0.000098 J	0.000071 J	<0.01	<0.0001	0.000022 J	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.00068 J	<0.0052	<0.01	<0.0052	0.000034 J	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW13-ROX-012914	1/29/2014		29.63	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW13-ROX-041114	4/11/2014		30.15	NE	0.00013	0.000066 J	<0.012	<0.00012	<0.00006	<0.00012	<0.00006	<0.00012	<0.00012	<0.012	<0.012	<0.006	<0.00069 U	<0.006	<0.012	<0.006	<0.00012	<0.00012	<0.0024	<0.012	<0.006	<0.012
	MW13-ROX-070714	7/7/2014		28.49	NE	<0.00011	0.000061 J	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW13-ROX-101014	10/10/2014		27.48	NE	<0.00012	0.00019	<0.012	<0.00012	<0.00006	<0.00012	<0.00006	<0.00012	<0.00012	<0.012	<0.012	<0.006	<0.0024	<0.006	<0.012	<0.006	<0.00012	<0.00012	<0.0024	<0.012	<0.006	<0.012
	MW13-ROX-011615	1/16/2015		29.09	NE	0.00014	0.00009 J	<0.011	0.000053 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	0.00003 J	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW13-ROX-041415	4/14/2015		30.71	NE	<0.00011	0.000075 J	<0.011	0.000051 J	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	0.0013 J
	MW13-ROX-070815	7/8/2015	25.57 - 35.57	29.16	NE	0.000089 J	0.000057 J	<0.011	0.000028 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
MW-14	MW14-ROX-103112	10/31/2012	33.42 - 43.42	32.02	NE	0.00074	0.00008 J	<0.01 UJ	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	0.0003 J	<0.01	<0.005	<0.01 UJ
	MW14-ROX-011813	1/18/2013		33.05	NE	0.00092	0.00013	<0.01 UJ	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	MW14-ROX-041113	4/11/2013		33.31	NE	0.00068	0.000098 J	<0.011	<0.00011	0.00013	<0.00011	0.000054	0.000053 J	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW14-ROX-071213	7/12/2013		30.36	NE	0.00046 B	<0.000062 U	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	0.00066 J	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW14-ROX-101013	10/10/2013		30.80	NE	0.00065	0.00011	<0.011	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	0.00019 J	<0.011	<0.0057	<0.011
	MW14-ROX-012914	1/29/2014		33.67	NE	0.00062	0.00012	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.00056 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW14-ROX-041114	4/11/2014		34.30	NE	0.00037	0.000089 J	<0.012	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.012	<0.012	<0.006	<0.00069 U	<0.006	<0.012	<0.006	<0.00011	<0.00011	<0.0024	<0.012	<0.006	<0.012
	MW14-ROX-070714	7/7/2014		32.82	NE	0.00033	0.000063 J	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.00048 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW14-ROX-101414	10/14/2014		31.65	NE	0.00054	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW14-ROX-011615	1/16/2015		33.58	NE	0.00027	0.00006 J	<0.011	0.000015 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW14-ROX-041415	4/14/2015		35.16	NE	0.00026	0.000057 J	<0.01	0.00003 J	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.00011	<0.00011	<0.0021	<0.01	<0.0052	<0.01
	MW14-ROX-070915	7/9/2015	33.42 - 43.42	34.06	NE	0.0002	0.000051 J	<0.01	0.000027 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0052	0.00051 J	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																		
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
				Screening Values (mg/L)		0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
MW-16	MW16-ROX-012313	1/23/2013	37.06 - 47.06	43.05	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053 UJ	<0.011
	MW16-ROX-040813	4/8/2013		43.39	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW16-ROX-070813	7/8/2013		40.62	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW16-ROX-100813	10/8/2013		41.62	NE	<0.0001 UJ	<0.0001 UJ	<0.01 UJ	<0.0001 UJ	<0.000052 UJ	<0.0001 UJ	<0.000052 UJ	<0.0001 UJ	<0.0001 UJ	<0.01 UJ	<0.01 UJ	<0.0052 UJ	<0.0021 UJ	<0.0052 UJ	<0.01 UJ	<0.0052 UJ	<0.0001 UJ	<0.0001 UJ	<0.0021 UJ	<0.01 UJ	<0.0052 UJ	<0.01 UJ
	MW16-ROX-011514	1/15/2014		43.76	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.00061 J	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW16-ROX-040914	4/9/2014		44.63	NE	<0.00012	<0.00012	<0.012	<0.00012	<0.000059	<0.00012	<0.000059	<0.00012	<0.00012	<0.012	<0.012	<0.0059	<0.0024	<0.0059	<0.012	<0.0059	<0.00012	<0.00012	<0.0024	<0.012	<0.0059	<0.012
	MW16-ROX-071014	7/10/2014		43.15	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW16-ROX-100714	10/7/2014		42.27	NE	<0.00012	<0.00012	<0.012	<0.00012	<0.00006	<0.00012	<0.00006	<0.00012	<0.00012	<0.012	<0.012	<0.006	<0.0024	<0.006	<0.012	<0.006	<0.00012	<0.00012	<0.0024	<0.012	<0.006	<0.012
	MW16-ROX-011315	1/13/2015		43.59	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW16-ROX-040915	4/9/2015		44.87	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW16-ROX-070915	7/9/2015	37.06 - 47.06	44.26	NE	0.000026 J	0.00002 J	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	MW16-ROX-070915-DUP	7/9/2015		44.26	NE	<0.00011	<0.00011	<0.011	0.000025 J	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
MW-22	MW22-ROX-012313	1/23/2013	37.88 - 47.88	41.80	NE	0.00018	<0.0001	<0.01 UJ	0.00002 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	0.0031 J	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052 UJ	0.0146
	MW22-ROX-012313-DUP	1/23/2013		41.80	NE	0.00018	<0.00011	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	0.0033 J	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053 UJ	0.0149
	MW22-ROX-040513	4/5/2013		42.23	NE	0.00018	0.000049 J J	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	0.0269
	MW22-ROX-071113	7/11/2013		39.35	NE	0.00026	0.00048	<0.011	0.000035 J	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0054	0.0017 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	0.104
	MW22-ROX-071113-DUP	7/11/2013		39.35	NE	0.00018	0.00047	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0056	0.0021 J	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	0.0978
	MW22-ROX-100913	10/9/2013		40.39	NE	0.00019	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	0.0863
	MW22-ROX-100913-DUP	10/9/2013		40.39	NE	0.00018	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	0.0826
	MW22-ROX-012014	1/20/2014		42.49	NE	0.00015	<0.00011	<0.053	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.053	<0.053	<0.027	<0.011	<0.027	<0.053	<0.027	<0.00011	<0.00011	<0.011	<0.053	<0.027	0.0399 J
	MW22-ROX-012014-DUP	1/20/2014		42.49	NE	0.00014	<0.00011	<0.054	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.054	<0.054	<0.027	<0.011	<0.027	<0.054	<0.027	<0.00011	<0.00011	<0.011	<0.054	<0.027	0.0364 J
	MW22-ROX-041014	4/10/2014		43.15	NE	0.0001 J	<0.00011	<0.056	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.056 UJ	<0.056	<0.028	<0.011	<0.028	<0.056	<0.028	<0.00011	<0.00011	<0.011	<0.056	<0.028	0.0316 J
	MW22-ROX-041014-DUP	4/10/2014		43.15	NE	0.00012	<0.00011	<0.056	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.056 UJ	<0.056	<0.028	<0.011	<0.028	<0.056	<0.028	<0.00011	<0.00011	<0.011	<0.056	<0.028	0.032 J
	MW22-ROX-071414	7/14/2014		41.85	NE	0.00013	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.00045 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	0.0281
	MW22-ROX-101014	10/10/2014		41.43	NE	0.00029	0.00019	<0.013	0.00019	<0.000063	<0.00013	<0.000063	<0.00013	<0.00013	<0.013	<0.013	<0.0063	<0.0025	<0.0063	<0.013	<0.0063	<0.00013	<0.00013	<0.0025	<0.013	<0.0063	<0.013
	MW22-ROX-011615	1/16/2015		42.19	NE	0.00015	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	0.0329
	MW22-ROX-041415	4/14/2015		43.71	NE	0.00014	<0.0001	<0.01	0.000027 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	0.0143
	MW22-ROX-071515	7/15/2015	37.88 - 47.88	42.64	NE	0.00013	0.000028 J	<0.057	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.057	<0.057	<0.029	<0.011	<0.029	<0.057	<0.029	<0.00011	<0.00011	<0.011	<0.057	<0.029	<0.057
MW-23	MW23-ROX-012615	1/26/2015	29.02 - 39.02	30.90	NE	<0.001	<0.001	<0.005	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.05	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0002	<0.0002	<0.005	<0.005	<0.005	<0.005
	MW23-ROX-040815	4/8/2015		32.24	NE	0.000076 J	<0.0001	<0.01	0.000058 J	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	0.000028 J	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW23-ROX-071015	7/10/2015	29.02 - 39.02	30.54	NE	0.000036 J	<0.00011	<0.011	0.000033 J	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	0.000018 J	<0.00011	<0.0022	<0.011	<0.0056	<0.011
MW-24	MW24-ROX-040513	4/5/2013	38.89 - 48.89	43.39	NE	<0.0001	<0.0001 UJ	<0.01 UJ	<0.0001	<0.000052	<0.0001	0.000057	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW24-ROX-071113	7/11/2013		40.35	NE	0.000024 J	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0054	<0.0022	<0.0054	<0.011 UJ	<0.0053 UJ	<0.00011	<0.00011	<0.0022	<0.011 UJ	<0.0054	<0.011 UJ
	MW24-ROX-100913	10/9/2013		41.27	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW24-ROX-011514	1/15/2014		43.47	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW24-ROX-040914	4/9/2014		44.13	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	MW24-ROX-071114	7/10/2014		42.97	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW24-ROX-100814	10/8/2014		42.16	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW24-ROX-011315	1/13/2015		43.17	NE	0.000074 J	0.000077 J	<0.011	0.000022 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011 UJ	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW24-ROX-040915	4/9/2015		44.45	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0003 U	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW24-ROX-070915	7/9/2015	38.89 - 48.89	44.65	NE	<0.0001	<0.0001	<0.01	0.000044 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																		
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
			Screening Values (mg/L)			0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
MW-25	MW25-ROX-102114	10/21/2014	35.59 - 45.59	36.44	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	0.0025 J
	MW25-ROX-012215	1/22/2015		38.45	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.00059 J	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW25-ROX-042115	4/21/2015		39.71	NE	0.000032 J	<0.0001	<0.01	0.000016 J	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	MW25-ROX-071515	7/15/2015		38.40	NE	0.000036 J	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
MW-26	MW26-ROX-102114	10/21/2014	38.15 - 48.15	39.43	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW26-ROX-011215	1/12/2015		41.09	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01 UJ	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW26-ROX-040815	4/8/2015		42.52	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	MW26-ROX-070815	7/8/2015		41.76	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
MW-27	MW27-ROX-102114	10/21/2014	39.79 - 49.79	41.57	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW27-ROX-011515	1/15/2015		42.06	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	0.0001 J J	0.00013 J	0.000029 J J	0.000078 J J	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	0.000051 J J	<0.0021	<0.011	<0.00029 U	<0.011
	MW27-ROX-041015	4/10/2015		43.22	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.00041 U	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	MW27-ROX-071015	7/10/2015		43.00	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
MW-28	MW28-ROX-102114	10/21/2014	33.61 - 43.61	36.44	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	MW28-ROX-011515	1/15/2015		41.14	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	0.0007 J	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	0.0012 J
	MW28-ROX-041415	4/14/2015		42.34	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000057	0.000027 J	0.00006	0.00004 J	0.00002 J	<0.011	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	MW28-ROX-071515	7/15/2015		42.19	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
P-114	P114-ROX-110912	11/9/2012	32.67 - 52.67	30.90	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	P114-ROX-012313	1/23/2013		30.22	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	0.0059	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053 UJ	<0.011
	P114-ROX-041513	4/15/2013		31.80	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001 UJ	<0.0001 UJ	<0.01	<0.01	<0.0052	0.0023	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	P114-ROX-071813	7/18/2013		27.22	NE	0.00013 B	<0.00011	<0.011	0.00011	0.000045 J	0.000034 J	0.000064	0.000067 J	<0.00011	<0.011 UJ	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	0.000073 J	<0.0022	<0.011	<0.0055	<0.011
	P114-ROX-071813-DUP	7/18/2013		27.22	NE	<0.00011	<0.00011	<0.011	0.00013	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	P114-ROX-101713	10/17/2013		29.43	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	P114-ROX-012814	1/28/2014		32.11	NE	<0.00011	<0.00011	<0.011	0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.00066 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	P114-ROX-042114	4/21/2014		32.22	NE	0.00011	<0.0001	<0.01	0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	P114-ROX-071814	7/18/2014		30.87	NE	0.000082 J	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	P114-ROX-101714	10/17/2014		29.43	NE	0.000078 J	<0.00011	<0.011	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	P114-ROX-012115	1/21/2015		31.53	NE	0.00019	<0.00011	<0.011	0.000096 J	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	P114-ROX-041715	4/17/2015		NM	NE	0.00021	0.000044 J	<0.011	0.000054 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	0.00038 J	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	P114-ROX-070815	7/8/2015	32.67 - 52.67	29.16	NE	0.0002	<0.0001	<0.01	0.000035 J	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
P-54	P54-ROX-103012	10/30/2012	38.00 - 63.00	40.70	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	P54-ROX-011113	1/11/2013		41.56	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	P54-ROX-041013	4/10/2013		41.80	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	P54-ROX-050313	5/3/2013		41.80	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	P54-ROX-071113	7/11/2013		39.07	NE	0.000032 J	0.000016 J	<0.01	0.000018 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0052	0.00052 J	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	P54-ROX-100813	10/8/2013		39.94	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	P54-ROX-011514	1/15/2014		42.20	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.00058 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	P54-ROX-040914	4/9/2014		42.80	NE	<0.00012	<0.00012	<0.012	<0.00012	<0.00006	<0.00012	<0.00006	<0.00012	<0.00012	<0.012	<0.012	<0.006	<0.0024	<0.006	<0.012	<0.006	<0.00012	<0.00012	<0.0024	<0.012	<0.006	<0.012
	P54-ROX-071114	7/10/2014		41.71	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	P54-ROX-100814	10/8/2014		40.88	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	P54-ROX-011415	1/14/2015		41.79	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	P54-ROX-041015	4/10/2015		43.20	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	P54-ROX-070915	7/9/2015	38.00 - 63.00	42.25	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																		
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
			Screening Values (mg/L)			0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
P-55	P55-ROX-012113	1/21/2013	39.82 - 64.82	45.24	NE	0.00069	0.00019	<0.02	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.05	<0.02	<0.01	<0.006	<0.01	<0.02	<0.01	<0.0001	<0.0001	0.001 J	<0.01	<0.01	0.004 J
	P55-ROX-012113	1/21/2013		45.24	NE	0.00054	0.00014	<0.01 UJ	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	0.001 J	<0.01	0.00073 J	0.0024 J
P-55R	P55-ROX-041513	4/15/2013	40.43 - 50.43	43.63	NE	0.00073	0.00021	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001 UJ	<0.0001 UJ	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	0.0017 J	<0.01	<0.0052	<0.01
	P55-ROX-071613	7/16/2013		40.06	NE	0.00066	0.0002	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056 UJ	<0.00066 U	<0.0056	<0.011	<0.0056 UJ	<0.00011	<0.00011	0.0016 J	<0.011	<0.0056	0.0024 J
	P55-ROX-101013	10/10/2013		41.67	NE	0.00071	0.00019	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0055	0.0006 J	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	0.0016 J	<0.011	<0.0055	0.0014 J
P-56	P56-ROX-103112	10/31/2012	40.82 - 65.82	44.80	NE	0.0011	<0.0001	<0.01 UJ	0.00012	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	0.00066 J	<0.01	<0.0051	<0.01 UJ
	P56-ROX-011713	1/17/2013		45.65	NE	0.00039	0.000083 J	<0.01 UJ	0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	0.0044	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	P56-ROX-041213	4/12/2013		46.12	NE	0.00053	0.000088 J	<0.011	0.0001 J	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	P56-ROX-071513	7/15/2013		43.25	NE	0.00065	0.00013	<0.011	0.00014	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055 UJ	<0.0022	<0.0055	<0.011	<0.0055 UJ	<0.00011	<0.00011	0.00075 J	<0.011	<0.0055	0.0086 J
	P56-ROX-101013	10/10/2013		44.48	NE	0.0006	0.000092 J	<0.011	0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	0.00059 J	<0.011	<0.0055	0.0042 J
	P56-ROX-012214	1/22/2014		46.35	NE	0.00055	<0.0001	<0.01	0.00013	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	0.00047 J	<0.01	<0.0052	<0.01
	P56-ROX-041414	4/14/2014		47.32	NE	0.00051	0.000081 J	<0.012	<0.00012	<0.000059	<0.00012	<0.000059	<0.00012	<0.00012	<0.012	<0.012	<0.0059	<0.0024	<0.0059	<0.012	<0.0059	<0.00012	<0.00012	0.00067 J	<0.012	<0.0059	<0.012
	P56-ROX-070814	7/8/2014		45.97	NE	0.00035	0.000081 J	<0.011 UJ	0.0001 J	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	0.00049 J	<0.011	<0.0056	<0.011
	P56-ROX-101314	10/13/2014		45.05	NE	0.00057	0.00011	<0.011	0.00012	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.001 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	0.00055 J	<0.011	<0.0054	<0.011
	P56-ROX-011915	1/19/2015		46.58	NE	0.00068	0.000079 J	<0.011	0.000097 J	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	P56-ROX-041515	4/15/2015		48.05	NE	0.00061	0.0001 J	<0.011	0.00013	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.00038 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	0.00055 J	<0.011	<0.0054	0.0026 J
	P56-ROX-071015	7/10/2015	40.82 - 65.82	47.34	NE	0.00065	0.000095 J	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
P-57	P57-ROX-110512	11/5/2012	40.46 - 65.46	44.98	NE	0.00053	<0.0001	<0.01	0.000061 J	<0.00005	<0.0001	<0.00005	0.00005 J	<0.0001	<0.01 UJ	<0.01	<0.005	0.00052 J	<0.005	<0.01	<0.005	<0.0001	0.000049 J	0.0006 J	<0.01	<0.005	<0.01 UJ
	P57-ROX-012913	1/29/2013		45.92	NE	0.00061	0.00013	<0.012 UJ	0.000076 J	<0.000059	<0.00012	<0.000059	<0.00012	<0.00012	<0.012	<0.012	<0.0059	<0.0024	<0.0059	<0.012	<0.0059	<0.00012	<0.00012	<0.0024	<0.012	<0.0059	0.0023 J J
	P57-ROX-041113	4/11/2013		46.29	NE	0.00063	0.00012	<0.01	0.000073 J	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	P57-ROX-071613	7/16/2013		43.38	NE	0.00047	0.0001 J	<0.011	0.000077 J	0.00012	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056 UJ	<0.0022	<0.0056	<0.011	<0.0056 UJ	<0.00011	<0.00011	0.00088 J	<0.011	<0.0056	0.002 J
	P57-ROX-101413	10/14/2013		44.38	NE	0.00045	0.000071 J	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.0012 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	0.00082 J	<0.011	<0.0054	0.0029 J
	P57-ROX-020314	2/3/2014		46.57	NE	0.00041	0.000075 J	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	0.00067 J	<0.011	<0.0053	<0.011
	P57-ROX-041514	4/15/2014		46.70	NE	0.00036	0.000074 J	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	0.0007 J	<0.011	<0.0056	<0.011 UJ
	P57-ROX-070814	7/8/2014		45.95	NE	0.00029	0.000069 J	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	0.0007 J	<0.011	<0.0053	<0.011
	P57-ROX-070814-DUP	7/8/2014		45.95	NE	0.00029	0.000075 J	<0.011 UJ	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	0.00071 J	<0.011	<0.0054	<0.011
	P57-ROX-101414-DUP	10/14/2014		45.00	NE	0.0003	<0.00012	<0.012	<0.00012	<0.000058	<0.00012	<0.000058	<0.00012	<0.00012	<0.012	<0.012	<0.0058	<0.0023	<0.0058	<0.012	<0.0058	<0.00012	<0.00012	<0.0023	<0.012	<0.0058	<0.012
	P57-ROX-101414	10/14/2014		45.00	NE	0.00036	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	P57-ROX-012315	1/23/2015	44.19 - 54.19	47.52	NE	0.00059	0.00014	<0.011	0.000073 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	0.0013 J	<0.011	<0.0053	<0.011
	P57-ROX-042015	4/20/2015		48.73	NE	0.00054	0.00012	<0.01	0.00009 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	0.0011 J	<0.01	<0.0052	<0.01
	P57-ROX-071315	7/13/2015	44.19 - 54.19	47.81	NE	0.00049	0.0001 J	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
P-58	P58-ROX-110612	11/6/2012	40.21 - 65.21	43.09	NE																						
	P58-ROX-121012	12/10/2012		43.09	NE	0.00093	0.00024	<0.011	0.00083	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.0103	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	0.002 J	<0.011	<0.0054	<0.011
	P58-ROX-012213	1/22/2013		44.21	NE	0.0011	0.0006	<0.011 UJ	<0.00011	0.00038	0.00022	0.00012	0.00012	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	0.00039	0.000068 J	0.0038	<0.011	<0.0054	<0.011
	P58-ROX-041113	4/11/2013		44.40	NE	0.0015	0.0005	<0.011	<0.00011	0.0003	0.00019	0.000095	0.000074 J	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	0.00032	<0.00011	0.0044	<0.011	<0.0054	<0.011
	P58-ROX-071613	7/16/2013		41.49	NE	0.00076	0.00027	<0.011	0.000096 J	0.00018	0.000073 J	0.000045 J	<0.00011	<0.00011	<0.011	<0.011	<0.0055 UJ	<0.0022	<0.0055	<0.011	<0.0055 UJ	0.00012	<0.00011	0.0025	<0.011	<0.0055	<0.011
	P58-ROX-101413	10/14/2013		42.19	NE	0.00084	<0.00011	<0.011	<0.00011	<0.000054	0.000067 J	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.0099	<0.0054	<0.011	<0.0054	0.000099 J	<0.00011	0.0024	<0.011	<0.0054	0.0016 J
	P58-ROX-020314	2/3/2014		44.66	NE	0.00061	0.00018	<0.01	<0.0001	0.000035 J	0.000047 J	<0.000052	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	0.000079 J	<0.0001	0.0016 J	<0.01	<0.0052	<0.01
	P58-ROX-041514	4/15/2014		45.66	NE	0.0011	0.00072	0.0028 J	0.00071	0.00082	0.00063	0.00072	0.00071	0.00071	<0.011 UJ	0.0051 J	0.0015 J	<0.00099 U	0.00091 J	0.0044 J	0.0043 J	0.00073	0.00075	0.0023	<0.011 UJ	0.00077 J	<0.011 UJ
	P58-ROX-071814	7/18/2014		43.80	NE	0.00067	0.00021	<0.011	<0.00011	0.000083	0.000086 J	0.000045 J	0.000035 J	<0.00011	<0.011 UJ	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	0.00015	<0.00011	0.0018 J	<0.011	<0.0055	<0.011
	P58-ROX-101514	10/15/2014		43.14	NE	0.00058	0.00023	<0.011	<0.00011	0.00013	0.00011	0.000074	0.000065 J	<0.00011	<0.011	<0.011	0.014	<0.00042 U	<0.0054	<0.011	<0.0054	0.00018	<0.00011	0.0022	<0.011	<0.0054	<0.011
	P58-ROX-012315	1/23/2015		45.32	NE	0.0006	0.00018	<0.011	0.000053 J	0.000026 J	0.00002 J	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	0.000032 J	<0.00011	0.0019 J	<0.011	<0.0053	<0.011
	P58-ROX-042015	4/20/2015		46.67	NE	0.00064	0.00017	<0.01	0.000077 J	0.000052	0.000063 J	0.000059	0.000028 J	0.000016 J	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	0.000095 J	<0.0001	0.002 J	<0.01	<0.0052	<0.01
	P58-ROX-071415	7/14/2015	40.21 - 65.21	45.54	NE	0.00059	0.00018	<0.011	<0.00011	0.000087	0.000074 J	<0.000055	0.000042 J	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	0.00015	<0.00011	0.002 J	<0.011	<0.0055	<0.011

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																		
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
					Screening Values (mg/L)	0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
P-59	P59-ROX-110212	11/2/2012	47.91 - 72.91	45.98	NE	0.00043	<0.00011	<0.011	0.000086 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	0.00031 J	<0.011	<0.0053	0.0102 J J
	P59-ROX-110212-DUP	11/2/2012		45.98	NE	0.00042	<0.0001	<0.01	0.000084 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	0.00029 J	<0.01	<0.0052	0.0092 J J
	P59-ROX-013013	1/30/2013		46.60	NE	0.00047	<0.0001	<0.01 UJ	0.00012	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.0041	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	0.0581
	P59-ROX-041213	4/12/2013		46.95	NE	0.00057	0.00013	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	0.0831 J	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	0.0919
	P59-ROX-041213-DUP	4/12/2013		46.95	NE	0.00058	0.00012	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	0.0518 J	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	0.0914
	P59-ROX-071613	7/16/2013		44.13	NE	0.00035	0.000071 J	<0.011	0.000092 J	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054 UJ	<0.0022	<0.0054	<0.011	<0.0054 UJ	<0.00011	<0.00011	0.00041 J	<0.011	<0.0054	0.0583
	P59-ROX-101013	10/10/2013		45.50	NE	0.00055	0.000084 J	<0.011	0.00021	0.000068	<0.00011	0.000039 J	<0.00011	<0.00011	<0.011 UJ	0.0009 J	<0.0054	0.00069 J	<0.0054	<0.011	<0.0054	0.000088 J	<0.00011	<0.0022	<0.011	<0.0054	0.078
	P59-ROX-020314	2/3/2014		47.35	NE	0.00046	<0.0001	<0.01	0.00018	0.000035 J	<0.0001	<0.000052	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	0.000046 J	<0.0001	<0.0021	<0.01	<0.0052	0.147 J
	P59-ROX-041514	4/15/2014		48.60	NE	0.0013	<0.00011	<0.011	0.00018	0.00006	0.000042 J	0.000044 J	0.000035 J	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	0.0001 J	<0.00011	<0.0021	<0.011	<0.0053	<0.011 UJ
	P59-ROX-070814	7/8/2014		47.69	NE	0.0015	0.000091 J	<0.011 UJ	0.00012	0.000029 J	<0.00011	<0.000057	<0.00011	<0.00011	<0.011	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	0.000027 J	<0.00011	<0.0023	<0.011	<0.0057	0.17
	P59-ROX-101414	10/14/2014		46.18	NE	0.00045 J	<0.00054	<0.011	<0.00054	<0.00027	<0.00054	<0.00027	<0.00054	<0.00054	<0.011	<0.011	0.0035 J	<0.0022	<0.0054	<0.011	<0.0054	<0.00054	<0.00054	<0.0022	<0.011	<0.0054	0.0492
	P59-ROX-011915	1/19/2015		47.42	NE	0.00075	0.00013	<0.011	0.00021	0.000038 J	0.000021 J	<0.000054	0.00002 J	<0.00011	<0.011	<0.011	<0.0054	0.00042 J	<0.0054	<0.011	<0.0054	0.000047 J	<0.00011	<0.0022	<0.011	<0.0054	0.153
	P59-ROX-041615	4/16/2015		48.83	NE	0.00031	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	0.165
	P59-ROX-071315	7/13/2015	47.91 - 72.91	47.85	NE	0.00058	<0.00011	<0.011	0.00037	0.000068	0.000035 J	0.000056	0.000037 J	0.000033 J	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	0.00013	<0.00011	<0.0022	<0.011	<0.0054	0.113
P-66	P66-ROX-103112	10/31/2012	34.72 - 59.72	34.75	NE	0.00078	0.00022	<0.01 UJ	0.0006	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	0.0019 J	<0.01	<0.005	<0.01 UJ
	P66-ROX-011813	1/18/2013		35.70	NE	0.00074	0.00034	<0.011 UJ	<0.000055 U	<0.000053	<0.00011	<0.000028 U	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	0.0018 J	<0.011	<0.0053	<0.011
	P66-ROX-041113	4/11/2013		36.03	NE	0.0011	0.00028	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	0.0025	<0.011	<0.0053	<0.011
	P66-ROX-071213	7/12/2013		33.20	NE	0.00087	<0.00011	<0.011	<0.0002 U	0.00018 B	<0.00015 U	0.00017 B	<0.00019 U	0.00015	<0.011 UJ	<0.011	<0.0056	0.0124	<0.0056	<0.011	<0.0056	0.00017	0.00017	0.0016 J	<0.011	<0.0056	<0.011
	P66-ROX-101013	10/10/2013		33.66	NE	0.00066	0.0002	<0.011	<0.00011	0.000028 J	<0.00011	<0.000056	0.000036 J	<0.00011	<0.011 UJ	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	0.0016 J	<0.011	<0.0056	<0.011
	P66-ROX-110713	11/7/2013		33.66	NE																					
	P66-ROX-012914	1/29/2014		36.39	NE	0.00099	0.00032	<0.011	<0.00011	0.000039 J	0.000044 J	0.000048 J	0.000052 J	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	0.000047 J	0.000035 J	0.0019 J	<0.011	<0.0053	<0.011
	P66-ROX-041114	4/11/2014		37.10	NE	0.00058	0.00017	<0.012	<0.00012	<0.000058	<0.00012	<0.000058	<0.00012	<0.00012	<0.012	<0.012	<0.0058	<0.00068 U	<0.0058	<0.012	<0.0058	<0.00012	<0.00012	<0.0023	<0.012	<0.0058	<0.012
	P66-ROX-070714	7/7/2014		35.60	NE	0.00033	0.00016	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	P66-ROX-101414	10/14/2014		34.48	NE	0.00045	0.00018	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	0.0012 J	<0.011	<0.0055	<0.011
	P66-ROX-011615	1/16/2015		36.62	NE	0.00067	0.00026	<0.011	0.000065 J J	0.00003 J J	<0.00011 UJ	<0.000053 UJ	<0.00011	<0.00011 UJ	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	0.000029 J J	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	P66-ROX-011615-DUP	1/16/2015		36.62	NE	0.00068	0.00027	<0.011	0.00031 J	0.00043 J	0.0003 J	0.00032 J	0.00015	0.00023 J	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	0.00032 J	0.000062 J	<0.0022	<0.011	<0.0054	<0.011
	P66-ROX-041415	4/14/2015		38.27	NE	0.0006	0.00022	<0.011	<0.00011	<0.000054	0.000019 J	0.000055	0.000022 J	0.000021 J	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	0.000024 J	<0.00011	0.0016 J	<0.011	<0.0054	<0.011
	P66-ROX-041415-DUP	4/14/2015		38.27	NE	0.00066	0.00021	<0.011	0.000044 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	0.0016 J	<0.011	<0.0053	<0.011
	P66-ROX-070815	7/8/2015	34.72 - 59.72	37.24	NE	0.00054	0.00017	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	0.001 J	<0.011	<0.0053	<0.011
	P66-ROX-070815-DUP	7/8/2015		37.24	NE	0.00051	0.00021	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	0.000017 J	<0.00011	0.0011 J	<0.011	<0.0053	<0.011
P-74	P74-ROX-110112	11/1/2012	44.43 - 69.43	41.72	NE	0.00023	<0.0001	<0.01 UJ	0.000044 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0052	0.00044 J	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	0.00031 J	0.001 J	<0.0052	0.008 J J
	P74-ROX-011713	1/17/2013		42.65	NE	0.00019	0.0001	<0.01 UJ	0.000063 J	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	0.0028 J	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	0.0021 J
	P74-ROX-041113	4/11/2013		42.83	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	P74-ROX-071513	7/15/2013		40.11	NE	<0.000063 U	<0.00011	<0.011	0.000032 J	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	0.0013 J	<0.0054	<0.011
	P74-ROX-101413	10/14/2013		41.72	NE	0.0002	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	0.00097 J	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	0.00033 J	0.0012 J	<0.0054	0.0019 J
	P74-ROX-012414	1/24/2014		43.35	NE	0.00023	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	0.00063 J	0.00097 J	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	P74-ROX-041514	4/15/2014		44.74	NE	<0.00012	<0.00012	<0.012	<0.00012	<0.000059	<0.00012	<0.000059	<0.00012	<0.00012	<0.012	<0.012	<0.0059	<0.0024	<0.0059	<0.012	<0.0059	<0.00012	<0.00012	<0.0024	<0.012	<0.0059	<0.012 UJ
	P74-ROX-070814	7/8/2014		43.02	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	P74-ROX-101414	10/14/2014		41.48	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	0.00096 J	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	P74-ROX-011915	1/19/2015		43.47	NE	0.00018	0.000061 J	<0.011	0.000046 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	0.02
	P74-ROX-041515	4/15/2015		44.61	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	P74-ROX-071015	7/10/2015	44.43 - 69.43	43.28	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																		
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
					Screening Values (mg/L)	0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
P-93A	P93A-ROX-110712	11/7/2012	48.17 - 63.17	45.00	NE	<0.00022 U	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.0026	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	0.00027 J	<0.01	<0.0052	<0.01
	P93A-ROX-110712-DUP	11/7/2012		45.00	NE	0.00029 B	<0.0001	<0.01	0.000061 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.0023	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	P93A-ROX-012313	1/23/2013		45.89	NE	0.00016	<0.0001	<0.01 UJ	0.000028 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.0099	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052 UJ	<0.01
	P93A-ROX-012313-DUP	1/23/2013		45.89	NE	0.00014	<0.0001	<0.01 UJ	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.011	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052 UJ	<0.01
	P93A-ROX-041113	4/11/2013		46.29	NE	0.00023	<0.0001	<0.01	0.000074 J	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	P93A-ROX-041113-DUP	4/11/2013		46.29	NE	0.00021	<0.0001	<0.01	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	P93A-ROX-071813	7/18/2013		43.25	NE	<0.00011	0.000032 J	<0.011	0.00003 J	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	0.00024 J	<0.011	<0.0056	<0.011
	P93A-ROX-101113	10/11/2013		44.18	NE	0.00017	<0.0001	<0.01	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	P93A-ROX-012914	1/29/2014		46.53	NE	0.00022	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	P93A-ROX-041714	4/17/2014		47.41	NE	0.00013	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	P93A-ROX-071814	7/18/2014		45.70	NE	0.00017	<0.00011	<0.011	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0057	0.0041	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.00037 U	<0.011
	P93A-ROX-071814-DUP	7/18/2014		45.70	NE	0.00016	<0.00011	<0.011	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	P93A-ROX-101514	10/15/2014		45.06	NE	0.0002	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0004 U	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	0.0003 J	<0.01	<0.0052	<0.01
	P93A-ROX-101514-DUP	10/15/2014		45.06	NE	0.00022 J	<0.00011 UJ	<0.011 UJ	<0.00011 UJ	<0.000054 UJ	<0.00011 UJ	<0.000054 UJ	<0.00011 UJ	<0.00011 UJ	<0.011 UJ	<0.011 UJ	0.0044 J J	<0.0041 UJ	<0.0054 UJ	<0.011 UJ	<0.0054 UJ	<0.00011 UJ	<0.00011 UJ	0.00033 J J	<0.011 UJ	<0.0054 UJ	<0.011 UJ
	P93A-ROX-012715	1/27/2015	43.07 - 53.07	46.05	NE	<0.001	<0.001	<0.005	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.05	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0002	<0.0002	<0.005	<0.005	<0.005	<0.005
	P93A-ROX-041715	4/17/2015		47.02	NE	0.00011	<0.00011	<0.011	0.000031 J	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	0.00046 J	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	0.00029 J	<0.011	<0.0053	<0.011
	P93A-ROX-071315	7/13/2015	43.07 - 53.07	45.93	NE	0.00011	0.000029 J	<0.01	0.00003 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.00048 J	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
P-93B	P93B-ROX-110712	11/7/2012	74.60 - 76.60	45.05	NE	<0.0001	0.000073 JB	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	0.0017 J	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	P93B-ROX-110712-DUP	11/7/2012		45.05	NE	<0.000047 U	0.000058 J	<0.01	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	0.00057 J	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	P93B-ROX-012313	1/23/2013		45.89	NE	0.00014	0.000072 J	<0.011 UJ	0.00013	0.00022	0.00011	0.00013	0.00012	0.00012	<0.011	<0.011	<0.0053	0.0055	0.0032 J	0.0013 J	<0.0053	0.00012	0.00012	<0.0021	<0.011	<0.0053 UJ	0.0021 J
	P93B-ROX-041113	4/11/2013		46.32	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	P93B-ROX-071813	7/18/2013		43.30	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	P93B-ROX-101613	10/16/2013		44.43	NE	<0.0001	0.000065 J	<0.01	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	P93B-ROX-101613-DUP	10/16/2013		44.43	NE	<0.0001	0.000091 J	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	P93B-ROX-012814	1/28/2014		46.58	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	0.00072 J	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	P93B-ROX-012814-DUP	1/28/2014		46.58	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	0.0012 J	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	P93B-ROX-041714	4/17/2014		47.46	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0051	0.0015 J	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	P93B-ROX-041714-DUP	4/17/2014		47.46	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	0.00045 J	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	P93B-ROX-071714	7/17/2014		45.75	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	P93B-ROX-101514	10/15/2014		45.15	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	P93B-ROX-012315	1/23/2015		47.24	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	0.00063 J	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	P93B-ROX-012315-DUP	1/23/2015		47.24	NE	0.000019 J	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	P93B-ROX-021915	2/19/2015		47.24	NE																					
	P93B-ROX-041615	4/16/2015		48.42	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	0.00099 J
	P93B-ROX-041615-DUP	4/16/2015		48.42	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	0.00084 J
	P93B-ROX-070915	7/9/2015	74.60 - 76.60	47.74	NE	<0.0001	<0.0001	<0.01	0.000029 J	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	0.0153	<0.002	<0.0051	<0.01	<0.0051	0.000017 J	<0.0001	<0.002	<0.01	<0.0051	0.0009 J
	P93B-ROX-070915-DUP	7/9/2015		47.74	NE	0.000062 J	0.00004 J	<0.01	0.000041 J	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	0.0142	<0.002	<0.0051	<0.01	<0.0051	0.000016 J	<0.0001	<0.002	<0.01	<0.0051	0.00082 J

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																		
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(a)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
			Screening Values (mg/L)			0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																					
P-93C	P93C-ROX-110812	11/8/2012	94.26 - 96.26	45.12	NE	<0.0001	<0.0001	<0.01 UJ	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	0.00081 J	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	P93C-ROX-012313	1/23/2013		45.78	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	0.0049	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055 UJ	<0.011
	P93C-ROX-041213	4/12/2013		46.21	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005	<0.01
	P93C-ROX-071813	7/18/2013		43.31	NE	<0.000045 U	<0.00011	<0.011	0.000021 J	<0.000056	0.00015	<0.000056	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	P93C-ROX-080813	8/8/2013		43.31	NE																						
	P93C-ROX-101613	10/16/2013		44.31	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	P93C-ROX-012414	1/24/2014		46.44	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	<0.01
	P93C-ROX-041714	4/17/2014		47.34	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	P93C-ROX-071714	7/17/2014		45.61	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	P93C-ROX-101514	10/15/2014		44.99	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	P93C-ROX-011915	1/19/2015	92.47 - 97.47	46.77	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	P93C-ROX-021915	2/19/2015		46.77	NE																						
	P93C-ROX-041615	4/16/2015		48.22	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	P93C-ROX-071315	7/13/2015	92.47 - 97.47	47.09	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
P-93D	P93D-ROX-110812	11/8/2012	125.75 - 127.75	NM	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	P93D-ROX-012213	1/22/2013		44.21	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	P93D-ROX-041113	4/11/2013		46.37	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	P93D-ROX-071213	7/12/2013		43.51	NE	<0.000026 U	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0056	0.00057 J	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	P93D-ROX-101113	10/11/2013		44.24	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.005	<0.002	<0.005	<0.01 UJ	<0.005 UJ	<0.0001	<0.0001	<0.002	<0.01 UJ	<0.005	<0.01 UJ
	P93D-ROX-013114	1/31/2014		46.62	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	0.0045	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	P93D-ROX-041414	4/14/2014		47.54	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0005 U	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	P93D-ROX-071714	7/17/2014		45.78	NE	<0.0001	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	P93D-ROX-101514	10/15/2014		45.14	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	P93D-ROX-110414	11/4/2014		45.14	NE																						
	P93D-ROX-012315	1/23/2015		42.28	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	P93D-ROX-021915	2/19/2015		42.28	NE																						
	P93D-ROX-042015	4/20/2015		48.52	NE	<0.0001	<0.0001	<0.01	0.000017 J	<0.000052	<0.0001	0.000061	0.00002 J	0.000023 J	<0.01	<0.01	<0.0052	<0.00035 U	<0.0052	<0.01	<0.0052	0.000021 J	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	P93D-ROX-070915	7/9/2015	125.75 - 127.75	47.96	NE	<0.0001	<0.0001	<0.01	0.000018 J	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	0.0043 J	<0.002	<0.0051	<0.01	<0.0051	0.000016 J	<0.0001	<0.002	<0.01	<0.0051	<0.01
ROST-3-PZ	ROST3PZ-ROX-110112	11/1/2012	40.00 - 50.00	40.82	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011 UJ
ROST-3-MW	ROST3MW-ROX-012313	1/23/2013	37.81 - 47.81	41.50	NE	0.00025	0.000059 J	<0.01 UJ	0.000074 J	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01	<0.01	<0.005	<0.002	<0.005	<0.01	<0.005	<0.0001	<0.0001	<0.002	<0.01	<0.005 UJ	<0.01
	ROST3MW-ROX-040513	4/5/2013				0.00016	<0.00011 UJ	<0.011 UJ	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	ROST3MW-ROX-071113	7/11/2013		39.50	NE	0.00029	<0.00011	<0.011	0.000091 J	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0054	0.00061 J	<0.0054	<0.011 UJ	<0.0054 UJ	<0.00011	<0.00011	0.00025 J	<0.011 UJ	<0.0054	0.0016 J J
	ROST3-MW-ROX-100913	10/9/2013		40.16	NE	0.0001 J	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0054	<0.0022	<0.0054	<0.011 UJ	<0.0054 UJ	<0.00011	<0.00011	<0.0022	<0.011 UJ	<0.0054	<0.011 UJ
	ROST3MW-ROX-011714	1/17/2014		42.20	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0053	<0.0021	<0.0053	<0.011 UJ	<0.0053 UJ	<0.00011	<0.00011	<0.0021	<0.011 UJ	<0.0053	<0.011 UJ
	ROST3MW-ROX-041014	4/10/2014		42.80	NE	<0.00012	<0.00012	<0.012	<0.00012	<0.00006	<0.00012	<0.00006	<0.00012	<0.00012	<0.012 UJ	<0.012	<0.006	<0.0024	<0.006	<0.012	<0.006	<0.00012	<0.00012	<0.0024	<0.012	<0.006	<0.012
	ROST3MW-ROX-071414	7/14/2014		41.88	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	ROST3MW-ROX-100914	10/9/2014		41.31	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	0.00046 J	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	ROST3MW-ROX-011515	1/15/2015		41.83	NE	0.000027 J	<0.00011	<0.011	0.000019 J J	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011	<0.011	<0.0057	<0.0023	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	ROST3MW-ROX-041315	4/13/2015		43.43	NE	0.000028 J	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	ROST3MW-ROX-071315	7/13/2015	37.81 - 47.81	42.36	NE	0.000037 J	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																			
						Acenaphthene	Acenaphthylene	Aniline	Anthracene	Benzo(a)anthracene	Benzo(e)pyrene	Benzo(b)fluoranthene	Benzo(g,h,i)perylene	Benzo(k)fluoranthene	Benzoic Acid	Benzyl alcohol	bis(2-Chloroethyl)ether	bis(2-Ethylhexyl)phthalate	Butyl benzyl phthalate	4-Chloro-3-m ethylphenol (p-Chloro-m-cresol)	2-Chlorophenol	Chrysene (1,2-Benzphenanthracene)	Dibenzo(a,h)anthracene	Dibenzofuran	2,4-Dichlorophenol	Diethyl phthalate	2,4-Dimethylphenol
						0.42 [1]	0.21 [3]	0.023 [3]	2.1 [1]	0.00013 [1]	0.0002 [1]	0.00018 [1]	0.21 [3]	0.00017 [1]	28 [1]	0.7 [3]	0.01 [2]	0.006 [2]	1.4 [2]		0.035 [2]	0.012 [1]	0.0003 [1]	0.007 [3]	0.021 [2]	5.6 [1]	0.14 [2]
Location	**Sample ID**	**Sample Date**	**Screened Interval (ft btoc)**	**Depth to Water (ft btoc)**	**Product Thickness (ft)**	**Analytical Results (mg/L)**																					
ROST-4-PZ(C)	ROST4PZC-ROX-102912	10/29/2012	34.95 - 44.95	40.75	NE	0.000054 J	<0.0001	<0.01 UJ	0.00005 J	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	0.0045	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	<0.01
	ROST4PZ(C)-ROX-011113	1/11/2013		41.42	NE	<0.00011	<0.00011	<0.011 UJ	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	ROST4PZC-ROX-041013	4/10/2013		42.27	NE	0.000066 J	0.000018 J	<0.011	0.000033 J	<0.000055	<0.00011	<0.000055	<0.00011	<0.00011	<0.011	<0.011	<0.0055	<0.0022	<0.0055	<0.011	<0.0055	<0.00011	<0.00011	<0.0022	<0.011	<0.0055	<0.011
	ROST4PZC-ROX-071113	7/11/2013		40.18	NE	0.00019	0.000073 J	<0.011	0.00012	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011 UJ	<0.011	<0.0054	0.0032	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	ROST4PZC-ROX-100913	10/9/2013		39.91	NE	0.00012	<0.00011	<0.011	<0.00011	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	<0.011
	ROST4PZC-ROX-011714	1/17/2014		41.92	NE	<0.00012	<0.00012	<0.012	<0.00012	<0.000059	<0.00012	<0.000059	<0.00012	<0.00012	<0.01 UJ	<0.012	<0.0059	<0.0024	<0.0059	<0.01 UJ	<0.005 UJ	<0.00012	<0.00012	<0.0024	<0.01 UJ	<0.0059	<0.01 UJ
	ROST4PZC-ROX-041014	4/10/2014		42.05	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	ROST4C-ROX-071114	7/10/2014		42.22	NE	<0.0001	<0.0001	<0.011	<0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.011	<0.011	<0.0053	0.0007 J	<0.0053	<0.011	<0.0053	<0.0001	<0.0001	<0.0021	<0.011	<0.0053	<0.011
	ROST4PZC-ROX-100914	10/9/2014		41.30	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	ROST4PZC-ROX-011515	1/15/2015		41.65	NE	<0.00011	<0.00011	<0.011	<0.00011	<0.000057	<0.00011	<0.000057	<0.00011	<0.00011	<0.011	<0.011	<0.0057	0.0042	<0.0057	<0.011	<0.0057	<0.00011	<0.00011	<0.0023	<0.011	<0.0057	<0.011
	ROST4PZC-ROX-041315	4/13/2015		43.00	NE	<0.0001	<0.0001	<0.01	0.000018 J	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	0.0013 J
	ROST4PZ-ROX-071315	7/13/2015	34.93 - 44.93	41.86	NE	0.000093 J	<0.0001	<0.01	<0.0001	<0.000052	<0.0001	<0.000052	<0.0001	<0.0001	<0.01	<0.01	<0.0052	<0.0021	<0.0052	<0.01	<0.0052	<0.0001	<0.0001	<0.0021	<0.01	<0.0052	0.0028 J
T-12	T12-ROX-110512	11/5/2012	46.46 - 72.46	43.91	NE	0.00044	<0.0001	<0.01	0.0001	<0.00005	<0.0001	<0.00005	<0.0001	<0.0001	<0.01 UJ	<0.01	<0.005	0.00054 J	<0.005	<0.01	<0.005	<0.0001	<0.0001	0.00029 J	<0.01	<0.005	0.0028 J J
	T12-ROX-011813	1/18/2013		44.50	NE	0.0005	0.000093 J	<0.011 UJ	<0.00013 U	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	0.0065 J
	T12-ROX-041513	4/15/2013		44.99	NE	0.00063	0.00009 J	<0.01	<0.0001	<0.000051	<0.0001	<0.000051	<0.0001 UJ	<0.0001 UJ	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	0.00048 J	<0.01	<0.0051	<0.01
	T12-ROX-071613	7/16/2013		42.33	NE	0.00055	0.0001 J	<0.011	0.00015	0.00013	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	0.001 J	<0.0054 UJ	<0.0044 U	<0.0054	<0.011	<0.0054 UJ	<0.00011	<0.00011	0.00042 J	<0.011	<0.0054	0.0096 J
	T12-ROX-101513	10/15/2013		43.73	NE	0.00036	<0.00011	<0.011	0.00012	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	0.000028 J	<0.00011	0.00029 J	<0.011	<0.0054	0.0047 J
	T12-ROX-012414	1/24/2014		45.26	NE	0.0005	<0.0001	<0.01	0.00014	<0.000051	<0.0001	<0.000051	<0.0001	<0.0001	<0.01	<0.01	<0.0051	<0.002	<0.0051	<0.01	<0.0051	<0.0001	<0.0001	<0.002	<0.01	<0.0051	0.0073 J
	T12-ROX-041514	4/15/2014		46.72	NE	0.00037	<0.00011	<0.011	0.00012	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	0.00031 J	<0.011	<0.0056	<0.011 UJ
	T12-ROX-070814	7/8/2014		45.13	NE	0.00024	<0.00011	<0.011 UJ	<0.00011	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	<0.011
	T12-ROX-101714	10/17/2014		44.40	NE	0.00036	0.000072 J	<0.011	<0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	<0.0022	<0.011	<0.0056	<0.011
	T12-ROX-011915	1/19/2015		45.27	NE	0.00039	0.000064 J	<0.011	0.00013	<0.000053	<0.00011	<0.000053	<0.00011	<0.00011	<0.011	<0.011	<0.0053	<0.0021	<0.0053	<0.011	<0.0053	<0.00011	<0.00011	<0.0021	<0.011	<0.0053	0.0069 J
	T12-ROX-041515	4/15/2015		46.73	NE	0.00036	0.000065 J	<0.011	0.00011	<0.000056	<0.00011	<0.000056	<0.00011	<0.00011	<0.011	<0.011	<0.0056	<0.0022	<0.0056	<0.011	<0.0056	<0.00011	<0.00011	0.00033 J	<0.011	0.00036 J J	0.0044 J
	T12-ROX-071015	7/10/2015	46.46 - 72.46	46.09	NE	0.00034	<0.00011	<0.011	0.00015	<0.000054	<0.00011	<0.000054	<0.00011	<0.00011	<0.011	<0.011	<0.0054	<0.0022	<0.0054	<0.011	<0.0054	<0.00011	<0.00011	<0.0022	<0.011	<0.0054	0.0041 J

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						SVOCs																			
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
MW-01	MW1-ROX-102612	10/26/2012	48.80 - 58.80	41.22	NE	<0.0057	<0.0057	<0.0057	<0.011	<0.00011	<0.00011	<0.0057		<0.00011	<0.0057	<0.00023	<0.00023	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	<0.000057	<0.0057	<0.00011
	MW1-ROX-121712	12/17/2012		41.22	NE																						
	MW1-ROX-011013	1/10/2013		41.89	NE	<0.0052 UJ	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000021 U	<0.0052	<0.0001
	MW1-ROX-040913	4/9/2013		42.55	NE	<0.0053 UJ	<0.0012 U	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW1-ROX-070813	7/8/2013		39.56	NE	<0.0051	<0.0051	<0.0051	<0.01	0.000033 J	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000043 U	<0.0051	<0.0001
	MW1-ROX-100313	10/3/2013		40.28	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW1-ROX-011414	1/14/2014		42.77	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011 UJ	<0.011 UJ	<0.011	<0.0053	<0.0053	<0.0053	<0.011 UJ	0.000031 J	<0.0053 UJ	<0.00011
	MW1-ROX-040714	4/7/2014		43.28	NE	<0.0054	<0.00029 U	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011 UJ	<0.011 UJ	<0.011	<0.0054	<0.0054	<0.0054	<0.011 UJ	<0.000023 U	<0.0057 UJ	<0.00011
	MW1-ROX-070914	7/9/2014		42.09	NE	<0.0054	0.0016 JB	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.000085 J	0.00012 JB J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW1-ROX-100614	10/6/2014		41.1	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.0021	<0.0021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053 UJ	<0.00011
	MW1-ROX-011215	1/12/2015		42.73	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000017 J	0.000027 J	<0.0053		<0.00011	<0.0053	<0.00003 U	<0.000036 U	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00003 J	<0.0053	<0.00011
	MW1-ROX-040615	4/6/2015		44.11	NE	<0.0053	0.00044 J	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.000018 J	0.000035 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW1-ROX-070815	7/8/2015	48.80 - 58.80	43.35	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.000038 J	0.000066 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000022 J	<0.0053	<0.00011
MW-02	MW2-ROX-102612	10/26/2012	49.87 - 59.87	42.35	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000061 J	0.00011	<0.0054		<0.00011	<0.0054	0.0091	0.0182	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00011	<0.0054	0.000046 J
	MW2-ROX-011113	1/11/2013		42.94	NE	<0.0056 UJ	<0.0056	<0.0056	<0.011	0.00004 J	<0.00011	<0.0056		<0.00011	<0.0056	0.008	0.0162	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000044 J	<0.0056	0.000039 J
	MW2-ROX-040913	4/9/2013		43.70	NE	<0.0054 UJ	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.012	0.0256	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW2-ROX-071113	7/11/2013		40.82	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	0.0123 J	0.0249	<0.011	<0.011	<0.011 UJ	<0.0055	<0.0055	<0.0055	<0.011	<0.000051 U	<0.0055 UJ	<0.00011
	MW2-ROX-100813	10/8/2013		41.73	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.009	0.0201	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW2-ROX-012014	1/20/2014		44.00	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.0094	0.0208	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000043 U	<0.0053	<0.00011
	MW2-ROX-041014	4/10/2014		44.66	NE	<0.006	<0.00046 U	<0.006	<0.012	<0.00012	<0.00012	<0.006		<0.00012	<0.006	0.0083	0.0193	<0.012	<0.012	<0.012	<0.006	<0.006	<0.006	<0.012	<0.00006	<0.006	<0.00012
	MW2-ROX-071414	7/14/2014		43.13	NE	<0.0054	<0.00045 U	<0.0054	<0.011	0.00012	0.00014	<0.0054		<0.00011	<0.0054	0.01	0.0215	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.00017 U	<0.0054	0.000096 J
	MW2-ROX-101014	10/10/2014		42.49	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	0.01	0.0214	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	<0.0051	<0.0001
	MW2-ROX-011615	1/16/2015		44.1	NE	<0.0053	<0.00034 U	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.0108	0.0236	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000025 J	<0.0053	<0.00011
	MW2-ROX-041315	4/13/2015		45.56	NE	<0.0054	<0.00045 U	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.0124	0.0253	<0.011	0.00066 J	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.000023 J	<0.0054	<0.00011
	MW2-ROX-071315	7/13/2015	49.87 - 59.87	44.53	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.000036 J	<0.0054		<0.00011	<0.0054	0.0129	0.0283	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.000027 JB J	<0.0054	<0.00011
MW-03	MW3-ROX-102512	10/25/2012	34.67 - 44.67	28.39	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	<0.0051 UJ	<0.0001
	MW3-ROX-010913	1/9/2013		29.35	NE	<0.005	0.0025 J	<0.005	<0.01	0.000047 J	0.000052 J	<0.005		<0.0001	<0.005	<0.0002	0.000081 J	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	0.000068	<0.005 UJ	0.000036 J
	MW3-ROX-040813	4/8/2013		29.74	NE	<0.0057	<0.0057	<0.0057	<0.011	<0.00011	<0.00011	<0.0057		<0.00011	<0.0057	<0.00023	<0.00023	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	<0.000057	<0.0057	<0.00011
	MW3-ROX-071113	7/11/2013		26.32	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.00044 J	0.00038	<0.011	<0.011	<0.011 UJ	<0.0054	<0.0054	<0.0054	<0.011	<0.000039 U	<0.0054 UJ	<0.000072 U
	MW3-ROX-100813	10/8/2013		27.38	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.00013 J	0.00014 J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW3-ROX-011614	1/16/2014		29.91	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011 UJ	<0.011 UJ	<0.011	<0.0053	<0.0053 UJ	<0.0053	<0.011 UJ	<0.000053	<0.0053 UJ	<0.00011
	MW3-ROX-040914	4/9/2014		30.50	NE	<0.0056	<0.00056 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000019 U	<0.0056	<0.00011
	MW3-ROX-071114	7/10/2014		29.05	NE	<0.0054	<0.00028 U	<0.0054	<0.011	<0.0001	<0.0001	<0.0054		<0.0001	<0.0054	0.000067 J	<0.0002	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.00003 U	<0.0054	<0.0001
	MW3-ROX-100914	10/9/2014		28.18	NE	<0.0056	<0.00023 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.0022	<0.0022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW3-ROX-011515	1/15/2015		29.65	NE	<0.0056	0.00028 J J	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	0.00033 J	0.0003 J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000018 J J	<0.0056	<0.00011
	MW3-ROX-041015	4/10/2015		31.16	NE	<0.0053	0.00054 J	<0.0053	<0.011	0.000024 J J	<0.0001	<0.0053		<0.0001	<0.0053	0.00013 J	0.000097 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000026 JB J	<0.0053	0.000018 J
	MW3-ROX-071015	7/10/2015	34.67 - 44.67	30.01	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	0.00028 JB	0.00026 JB	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																				
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
MW-04	MW4-ROX-102912	10/29/2012	46.06 - 56.06	39.45	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	0.00025	0.00016 J	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052	<0.0001
	MW4-ROX-011113	1/11/2013		40.20	NE	<0.0056 UJ	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	0.00014 J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	0.0608	<0.00011
	MW4-ROX-011113-DUP	1/11/2013		40.20	NE	<0.006 UJ	<0.006	<0.006	<0.012	<0.00012	<0.00012	<0.006		<0.00012	<0.006	<0.00024	0.000099 J	<0.012	<0.012	<0.012	<0.006	<0.006	<0.006	<0.012	<0.00006	0.0665	<0.00012
	MW4-ROX-030413	3/4/2013		40.20	NE																						
	MW4-ROX-040913	4/9/2013		40.90	NE	<0.0053 UJ	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00022	0.000082 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000054	0.11	<0.00011
	MW4-ROX-040913-DUP	4/9/2013		40.90	NE	<0.0053 UJ	<0.00062 U	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	0.000076 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	0.103	<0.00011
	MW4-ROX-071713	7/17/2013		37.61	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		0.000052 J	<0.0055	0.00037	0.00023	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.00003 U	0.0661	<0.00011
	MW4-ROX-101613	10/16/2013		38.80	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.00016 J	0.00015 J	<0.011 UJ	<0.011 UJ	<0.011	<0.0054	<0.0054	<0.0054	<0.011 UJ	<0.000054	0.0168 J	<0.00011
	MW4-ROX-013014	1/30/2014		41.09	NE	<0.0054	<0.0013 U	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.00027	0.00022	<0.011 UJ	<0.011 UJ	<0.011	<0.0054	<0.0054	<0.0054	<0.011 UJ	<0.000022 U	0.0164 J	<0.00011
	MW4-ROX-041614	4/16/2014		41.91	NE	<0.0056	<0.00076 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	0.000072 J	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW4-ROX-071614	7/16/2014		40.18	NE	<0.0052	<0.00043 U	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	0.00024	0.00022	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000041 U	<0.0052	<0.0001
	MW4-ROX-101614	10/16/2014		39.49	NE	<0.0059	<0.0059	<0.0059	<0.012	<0.00012	<0.00012	<0.0059		<0.00012	<0.0059	<0.0024	<0.0024	<0.012	<0.012	<0.012	<0.0059	<0.0059	<0.0059	<0.012	0.000029 J	0.0115	<0.00012
	MW4-ROX-012115	1/21/2015		41.27	NE	<0.0053	0.0011 J	<0.0053	<0.011	<0.000018 U	<0.00011	<0.0053		<0.00011	<0.0053	0.00012 JB	<0.00011 U	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000019 U	<0.0053	<0.000022 U
	MW4-ROX-042115	4/21/2015	45.06 - 55.06	42.58	NE	<0.0052	<0.0052	<0.0052	<0.01	0.000018 J	<0.0001	<0.0052		<0.0001	<0.0052	0.00024 J	0.00021 J	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00002 J	<0.0052	0.000018 J
	MW4-ROX-071415	7/14/2015	45.06 - 55.06	41.30	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	0.000018 J	<0.0056		<0.00011	<0.0056	0.00032 J	0.00035 JB J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000018 JB	<0.0056	<0.00011
MW-05	MW5-ROX-102912	10/29/2012	33.97 - 43.97	28.16	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	0.0091	0.000084 J	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	<0.0051	<0.0001
	MW5-ROX-011113	1/11/2013		28.75	NE	<0.0055 UJ	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	0.0043	0.000084 J	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.000048 J	<0.0055	<0.00011
	MW5-ROX-040913	4/9/2013		29.41	NE	<0.0054 UJ	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.004	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW5-ROX-070913	7/9/2013		26.04	NE	<0.005	<0.005	<0.005	<0.01	<0.0001	<0.00099 U	<0.005		<0.0001	<0.005	0.0015	<0.0002 UJ	<0.01	<0.01	<0.01 UJ	<0.005	<0.005	<0.005	<0.01	<0.000074 U	<0.005	<0.0001
	MW5-ROX-100813	10/8/2013		26.97	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	0.0038	0.00009 J	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	MW5-ROX-011714	1/17/2014		29.59	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.0035	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW5-ROX-041014	4/10/2014		30.09	NE	<0.0056	<0.00087 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	0.0038	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW5-ROX-071414	7/14/2014		28.59	NE	<0.0053	<0.00037 U	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.00052 B	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000088 U	<0.0053	<0.00011
	MW-5-ROX-100914	10/9/2014		27.75	NE	<0.0054	<0.00023 U	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.00099 J	<0.0022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.00003 U	0.00072 J	<0.00011
	MW5-ROX-011515	1/15/2015		29.34	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000037 J J	<0.00011	<0.0053		0.000023 J J	<0.0053	0.00071 J	<0.0021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000039 J J	<0.0053	0.000038 J J
	MW5-ROX-041315	4/13/2015		30.97	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.000099 JB J	0.000031 JB J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW5-ROX-071315	7/13/2015	33.97 - 43.97	29.45	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.000026 J	<0.0054		<0.00011	<0.0054	0.000087 JB J	0.00018 JB J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.000024 JB J	<0.0054	<0.00011
MW-06A	MW6A-ROX-102412	10/24/2012	34.83 - 44.83	30.06	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW6A-ROX-011413	1/14/2013		31.00	NE	<0.0051 UJ	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		0.000072 J	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051 UJ	<0.0051	<0.01	<0.000051	<0.0051 UJ	<0.0001
	MW6A-ROX-040313	4/3/2013		31.62	NE	<0.0053	0.0018 J	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053 UJ	<0.0053	<0.011	0.000084	<0.0053 UJ	0.000053 J
	MW6A-ROX-070913	7/9/2013		28.25	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011 UJ	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	MW6A-ROX-070913-DUP	7/9/2013		28.25	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011 UJ	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	MW6A-ROX-100713	10/7/2013		28.87	NE	<0.0056 UJ	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW6A-ROX-100713-DUP	10/7/2013		28.87	NE	<0.0054 UJ	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW6A-ROX-011614	1/16/2014		31.62	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052 UJ	<0.0052	<0.01	<0.000052	<0.0052 UJ	<0.0001
	MW6A-ROX-011614-DUP	1/16/2014		31.62	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053 UJ	<0.0053	<0.011	<0.000053	<0.0053 UJ	<0.00011
	MW6A-ROX-040814	4/8/2014		32.16	NE	<0.0056	<0.00075 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000054	<0.0056	<0.00011
	MW6A-ROX-040814-DUP	4/8/2014		32.16	NE	<0.0054	<0.00077 U	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000055	<0.0054	<0.00011
	MW6A-ROX-071014	7/10/2014		30.75	NE	<0.0054	<0.00026 U	<0.0054	<0.011	<0.00011	0.00013	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.000046 J	<0.0054	<0.00011
	MW6A-ROX-100814	10/8/2014		29.84	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.0021	<0.0021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW6A-ROX-011415	1/14/2015		31.54	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000037 J J	0.000076 J	<0.0053		<0.00011	<0.0053	<0.0021	<0.0021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000046 J	<0.0053	0.000027 J
	MW6A-ROX-040715	4/7/2015		33.08	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	0.000019 J	0.000023 J	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	<0.0051	<0.0001
	MW6A-ROX-071515	7/15/2015	34.83 - 44.83	31.52	NE	<0.0057	<0.0057	<0.0057	<0.011	<0.00011	0.000058 J	<0.0057		<0.00011	<0.0057	0.000056 J	0.000076 JB J	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	0.000026 J	<0.0057	<0.00011

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																				
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
MW-06B	MW6B-ROX-102412	10/24/2012	64.05 - 69.05	30.11	NE	<0.0051	0.00079 J	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	<0.0051	<0.0001
	MW6B-ROX-011713	1/17/2013		31.11	NE	<0.005	0.0026 J	<0.005	<0.01	<0.0001	<0.0001	<0.005		<0.0001	<0.005	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	<0.00005	<0.005	<0.0001
	MW6B-ROX-040313	4/3/2013		31.68	NE	<0.0054	0.0012 J	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	0.0002 J	<0.011	<0.011	<0.011	<0.0054	<0.0054 UJ	<0.0054	<0.011	<0.000054	<0.0054 UJ	<0.00011
	MW6B-ROX-070913	7/9/2013		28.25	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011 UJ	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW6B-ROX-100713	10/7/2013		28.93	NE	<0.0054 UJ	<0.0054	<0.0054	0.0224	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW6B-ROX-011614	1/16/2014		31.67	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		0.000043 J	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054 UJ	<0.0054	<0.011	<0.000054	<0.0054 UJ	<0.00011
	MW6B-ROX-040814	4/8/2014		32.21	NE	<0.0053	<0.00043 U	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000018 J	<0.0053	<0.00011
	MW6B-ROX-071014	7/10/2014		30.81	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW6B-ROX-100814	10/8/2014		29.87	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.0021	<0.0021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW6B-ROX-011415	1/14/2015		31.59	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.0022	0.000017 J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW6B-ROX-040715	4/7/2015		33.10	NE	<0.0051	0.00029 J	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.002	<0.002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	<0.0051	<0.0001
	MW6B-ROX-040715-DUP	4/7/2015		33.10	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.0021	<0.0021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052	<0.0001
	MW6B-ROX-071415	7/14/2015	64.05 - 69.05	31.56	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	0.00013	<0.0053		<0.00011	<0.0053	0.0036	0.0068	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000045 JB J	<0.0053	<0.00011
MW-06C	MW6C-ROX-102412	10/24/2012	84.95 - 89.95	27.85	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	<0.0051	<0.0001
	MW6C-ROX-011713	1/17/2013		30.88	NE	<0.005	0.0022 J	<0.005	<0.01	<0.0001	<0.0001	<0.005		<0.0001	<0.005	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	<0.00005	<0.005	<0.0001
	MW6C-ROX-040313	4/3/2013		31.41	NE	<0.0052	0.00077 J	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	0.00016 J	<0.01	<0.01	<0.01	<0.0052	<0.0052 UJ	<0.0052	<0.01	<0.000052	<0.0052 UJ	<0.0001
	MW6C-ROX-070913	7/9/2013		28.03	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011 UJ	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW6C-ROX-100713	10/7/2013		28.72	NE	<0.0055 UJ	0.00043 J	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	MW6C-ROX-011614	1/16/2014		31.48	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053 UJ	<0.0053	<0.011	<0.000053	<0.0053 UJ	<0.00011
	MW6C-ROX-040814	4/8/2014		32.01	NE	<0.0059	<0.0004 U	<0.0059	<0.012	<0.00012	<0.00012	<0.0059		<0.00012	<0.0059	<0.00024	<0.00024	<0.012	<0.012	<0.012	<0.0059	<0.0059	<0.0059	<0.012	<0.000059	<0.0059	<0.00012
	MW6C-ROX-071014	7/10/2014		30.60	NE	<0.0056	<0.00032 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		0.000035 J	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW6C-ROX-100814	10/8/2014		29.67	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.0022	<0.0022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW6C-ROX-011415	1/14/2015		31.41	NE	<0.0056	<0.0056	<0.0056	<0.011	0.000022 J J	<0.00011	<0.0056		<0.00011	<0.0056	<0.0022	0.000028 J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000025 J	<0.0056	0.000021 J
	MW6C-ROX-040915	4/9/2015		32.80	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.0022	0.000025 JB J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW6C-ROX-071415	7/14/2015	84.95 - 89.95	31.38	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.000064 JB J	0.00014 JB J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
MW-06D	MW6D-ROX-102412	10/24/2012	104.72 - 109.72	29.71	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052	<0.0001
	MW6D-ROX-011713	1/17/2013		30.75	NE	<0.005	<0.005	<0.005	<0.01	<0.0001	<0.0001	<0.005		<0.0001	<0.005	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	<0.00005	<0.005	<0.0001
	MW6D-ROX-040313	4/3/2013		31.27	NE	<0.0053	0.00069 J	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053 UJ	<0.0053	<0.011	<0.000053	<0.0053 UJ	<0.00011
	MW6D-ROX-070913	7/9/2013		27.91	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011 UJ	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	MW6D-ROX-100713	10/7/2013		28.58	NE	<0.0054 UJ	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW6D-ROX-011614	1/16/2014		31.33	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052 UJ	<0.0052	<0.01	<0.000052	<0.0052 UJ	<0.0001
	MW6D-ROX-040814	4/8/2014		31.85	NE	<0.0055	<0.00039 U	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	MW6D-ROX-071014	7/10/2014		31.47	NE	<0.0056	<0.00027 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW6D-ROX-071014-DUP	7/10/2014		31.47	NE	<0.0054	<0.00029 U	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW6D-ROX-100814	10/8/2014		29.53	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.0022	<0.0022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW6D-ROX-100814-DUP	10/8/2014		29.53	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.0022	<0.0022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW6D-ROX-011415	1/14/2015		31.26	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000031 J J	0.000018 J	<0.0054		<0.00011	<0.0054	0.000015 J	0.000033 J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.000033 J	<0.0054	0.000027 J
	MW6D-ROX-011415-DUP	1/14/2015		31.26	NE	<0.0056	0.00027 J J	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.0022	<0.0022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW6D-ROX-040715	4/7/2015		32.74	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.0021	0.000026 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW6D-ROX-071415	7/14/2015	104.72 - 109.72	31.19	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	0.00011 JB J	0.00023 JB J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011

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TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																				
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
MW-07	MW7-ROX-103012	10/30/2012	42.92 - 52.92	41.23	NE	<0.0058	<0.0058	<0.0058	<0.012	<0.00012	0.00023	<0.0058		<0.00012	<0.0058	0.0061 J	0.0077	<0.012	<0.012	<0.012	<0.0058	<0.0058 UJ	<0.0058	<0.012	0.00036	0.0615 J	<0.00005 U
	MW7-ROX-103012-DUP	10/30/2012		41.23	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	0.00026	<0.0056		<0.00011	<0.0056	0.008 J	0.0098	<0.011	<0.011	<0.011	<0.0056	<0.0056 UJ	<0.0056	<0.011	0.00037	0.0812 J	<0.00005 U
	MW7-ROX-011513	1/15/2013		42.21	NE	<0.0053 UJ	<0.0053	<0.0053	<0.011	0.00004 J	0.00061	<0.0053		<0.00011	<0.0053	0.0187	0.0224	<0.011	<0.011	<0.011	<0.0053	<0.0053 UJ	<0.0053	<0.011	0.00086	0.0865 J	0.000089 J
	MW7-ROX-011513-DUP	1/15/2013		42.21	NE	<0.0052 UJ	<0.0052	<0.0052	<0.01	<0.0001	0.00057	<0.0052		<0.0001	<0.0052	0.0173	0.0207	<0.01	<0.01	<0.01	<0.0052	<0.0052 UJ	<0.0052	<0.01	0.00078	0.0735 J	0.000078 J
	MW7-ROX-041013	4/10/2013		42.70	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000039 J	0.00081	<0.0054		<0.00011	<0.0054	0.0271	0.0351	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0014	0.147	0.00015
	MW7-ROX-041013-DUP	4/10/2013		42.70	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000068 J	0.00087	<0.0053		<0.00011	<0.0053	0.0274	0.0357	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.0015	0.148	0.00016
	MW7-ROX-071713	7/17/2013		39.60	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.00019	<0.0054		0.000078 J	<0.0054	0.0043	0.006	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00024	0.118	0.000039 J
	MW7-ROX-101613	10/16/2013		40.64	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	0.00022	<0.0055		<0.00011	<0.0055	0.0082	0.011	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.00019	0.0849	<0.00011
	MW7-ROX-013014	1/30/2014		42.94	NE	<0.005	<0.0007 U	<0.005	<0.01	<0.0001	0.00021	<0.005		<0.0001	<0.005	0.0059	0.0083	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	0.00029	0.0314	<0.0001
	MW7-ROX-041614	4/16/2014		43.79	NE	<0.0052	<0.00071 U	<0.0052	<0.01	<0.0001	0.00026	<0.0052		<0.0001	<0.0052	0.0074	0.0103	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00033 B	0.0988	<0.0001
	MW7-ROX-071614	7/16/2014		42.05	NE	<0.0052	<0.00027 U	<0.0052	<0.01	<0.0001	0.00021	<0.0052		<0.0001	<0.0052	0.0052	0.0079	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00028	0.0618	<0.0001
	MW7-ROX-071614-DUP	7/16/2014		42.05	NE	<0.0052	<0.00038 U	<0.0052	<0.01	<0.0001	0.00019	<0.0052		<0.0001	<0.0052	0.0052	0.0077	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00026	0.0638	<0.0001
	MW7-ROX-101614	10/16/2014		41.31	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	0.0002	<0.0056		<0.00011	<0.0056	0.0049	0.0074	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00028	0.155	<0.00011
	MW7-ROX-101614-DUP	10/16/2014		41.31	NE	<0.0057	<0.0057	<0.0057	<0.011	<0.00011	0.00019	<0.0057		<0.00011	<0.0057	0.0047	0.007	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	0.00027	0.133	<0.00011
	MW7-ROX-012215	1/22/2015		43.45	NE	<0.0053	0.00035 J	<0.0053	<0.011	<0.000063 U	0.00024	<0.0053		0.00003 J	<0.0053	0.0053	0.0068	<0.011	0.00059 J	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00049	0.145	<0.000099 U
	MW7-ROX-012215-DUP	1/22/2015		43.45	NE	<0.0052	0.00027 J	<0.0052	<0.01	<0.000021 U	0.00022	<0.0052		<0.0001	<0.0052	0.0052	0.0066	<0.01	0.00056 J	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00045	0.136	<0.000058 U
	MW7-ROX-042115	4/21/2015		44.63	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	0.00033	<0.0051		<0.0001	<0.0051	0.008	0.01	0.00037 J	0.0011 J	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.00066	0.0707	0.000057 J
	MW7-ROX-042115-DUP	4/21/2015		44.63	NE	<0.0051	<0.0051	<0.0051	<0.01	0.000026 J	0.0003	<0.0051		<0.0001	<0.0051	0.0074	0.0093	0.00032 J	0.0011 J	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.00063	0.0766	0.000066 J
	MW7-ROX-071515	7/15/2015	42.92 - 52.92	43.54	NE	<0.0051	0.00063 J	<0.0051	<0.01	0.000019 J	0.00021	<0.0051		<0.0001	<0.0051	0.0047	0.0065	<0.01	0.0031 J	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.00031	0.104	0.000052 J
	MW7-ROX-071515-DUP	7/15/2015		43.54	NE	<0.0052	0.00057 J	<0.0052	<0.01	0.000023 J	0.00018	<0.0052		<0.0001	<0.0052	0.0055	0.0082	<0.01	0.0032 J	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00034	0.117	0.000053 J
MW-08	MW8-ROX-103012	10/30/2012	33.60 - 43.60	32.32	NE	<0.0053	0.00082 J	0.00063 J	<0.011	0.00059 B	0.00053	<0.0053		0.00059 B	<0.0053	0.0097	0.0112	0.0058 J	0.0158	<0.011	<0.0053	<0.0053 UJ	0.00052 J	0.003 J	0.00057	0.165 J	0.00054 B
	MW8-ROX-011513	1/15/2013		33.30	NE	<0.0056 UJ	<0.0056	<0.0056	<0.011	<0.00011	0.00041	<0.0056		<0.00011	<0.0056	0.011	0.0129	0.0332	0.102	<0.011	<0.0056	<0.0056 UJ	<0.0056	<0.011	0.00016	0.0997 J	<0.00011
	MW8-ROX-041013	4/10/2013		33.77	NE	<0.0053	0.0013 J	<0.0053	<0.011	0.000056 J	0.00032	<0.0053		<0.00011	<0.0053	0.0091	0.0113	0.0388	0.084	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00019	0.253 J	0.000042 J
	MW8-ROX-071713	7/17/2013		30.43	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	0.00033	<0.0052		<0.0001	<0.0052	0.0097 J	0.0113	0.0046 J	0.0106	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00015	0.328	0.000062 J
	MW8-ROX-071713-DUP	7/17/2013		30.43	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.00036	<0.0054		<0.00011	<0.0054	0.0087 J	0.0098	0.0037 J	0.0091 J	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00016	0.303	<0.00011
	MW8-ROX-101613	10/16/2013		31.59	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.00041	<0.0054		<0.00011	<0.0054	0.0117	0.0136	0.0022 J	0.0052 J	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00011	0.0996	<0.00011
	MW8-ROX-101613-DUP	10/16/2013		31.59	NE	<0.0059	<0.0059	<0.0059	<0.012	<0.00012	0.00037	<0.0059		<0.00012	<0.0059	0.0108	0.0128	0.0019 J	0.0046 J	<0.012	<0.0059	<0.0059	<0.0059	<0.012	0.000097	0.108	<0.00012
	MW8-ROX-013014	1/30/2014		34.02	NE	<0.0051	<0.0011 U	<0.0051	<0.01	<0.0001	0.00054	<0.0051		<0.0001	<0.0051	0.0137	0.0123	0.0128	0.0198	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.00018	0.105	<0.0001
	MW8-ROX-013014-DUP	1/30/2014		34.02	NE	<0.0054	<0.00092 U	<0.0054	<0.011	<0.00011	0.00052	<0.0054		<0.00011	<0.0054	0.0136	0.0123	0.0129	0.019	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00019	0.135	<0.00011
	MW8-ROX-041614	4/16/2014		34.73	NE	<0.0056	<0.00073 U	<0.0056	<0.011	<0.00011	0.00046	<0.0056		<0.00011	<0.0056	0.0142	0.0097	<0.011	0.0062 J	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00015 B J	0.135	<0.00011
	MW8-ROX-041614-DUP	4/16/2014		34.73	NE	<0.0051	<0.0006 U	<0.0051	<0.01	<0.0001	0.00043	<0.0051		<0.0001	<0.0051	0.0129	0.0086	<0.01	0.0053 J	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.00016 B J	0.118	<0.0001
	MW8-ROX-071614	7/16/2014		33.01	NE	<0.0052	<0.00045 U	<0.0052	<0.01	<0.0001	0.00038	<0.0052		<0.0001	<0.0052	0.0125	0.0048	0.0037 J	0.0045 J	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.0002 B	0.111	<0.0001
	MW8-ROX-101614	10/16/2014		32.23	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	0.00054	<0.0056		<0.00011	<0.0056	0.0145	0.0045	0.019	0.0558	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00023	0.126	<0.00011
	MW8-ROX-012215	1/22/2015		34.22	NE	<0.0052	0.00027 J	<0.0052	<0.01	<0.0001	0.00037	<0.0052		<0.0001	<0.0052	0.011	0.0046	0.0102	0.0242	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00016 B	0.146	<0.0001
	MW8-ROX-042115	4/21/2015		35.41	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	0.00041	<0.0053		<0.00011	<0.0053	0.0126	0.0053	0.0049 J	0.0063 J	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00014	0.129	<0.00011
	MW8-ROX-071515	7/15/2015	33.60 - 43.60	34.07	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	0.0003	<0.0053		<0.00011	<0.0053	0.0113	0.0083	0.0018 J	0.0046 J	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00016	0.135	<0.00011

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SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																				
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
MW-09	MW9-ROX-102912	10/29/2012	46.45 - 56.45	43.17	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052	<0.0001
	MW9-ROX-011113	1/11/2013		43.90	NE	<0.0054 UJ	<0.0054	<0.0054	<0.011	0.000066 J	0.00011	<0.0054		<0.00011	<0.0054	<0.00022	0.00014 J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00012	<0.0054	0.000057 J
	MW9-ROX-040913	4/9/2013		44.67	NE	<0.0052 UJ	<0.0018 UJ	<0.0052 UJ	<0.01 UJ	<0.0001 UJ	<0.0001 UJ	<0.0052 UJ		<0.0001 UJ	<0.0052 UJ	<0.00021 UJ	<0.00021 UJ	<0.01 UJ	<0.01 UJ	<0.01 UJ	<0.0052 UJ	<0.0052 UJ	<0.0052 UJ	<0.01 UJ	<0.000052 UJ	<0.0052 UJ	<0.0001 UJ
	MW9-ROX-070813	7/8/2013		42.35	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022			<0.011	<0.0056	<0.0056	<0.0056		<0.000028 U		<0.00011
	MW9-ROX-100313	10/3/2013		42.27	NE	<0.005	<0.005	<0.005	<0.01	<0.0001	<0.0001	<0.005		<0.0001	<0.005	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	<0.00005	<0.005	<0.0001
	MW9-ROX-011414	1/14/2014		44.47	NE	<0.0053 UJ	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011 UJ	<0.011 UJ	<0.011	<0.0053	<0.0053	<0.0053	<0.011 UJ	<0.000053	<0.0053 UJ	<0.00011
	MW9-ROX-040714	4/7/2014		44.99	NE	<0.0056	<0.00062 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	0.0001 J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056 U	<0.0056	<0.00011
	MW9-ROX-070914	7/9/2014		44.35	NE	<0.0054	<0.0006 U	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW9-ROX-100714	10/7/2014		43.52	NE	<0.0059	<0.0059	<0.0059	<0.012	<0.00012	<0.00012	<0.0059		<0.00012	<0.0059	<0.0024	<0.0024	<0.012	<0.012	<0.012	<0.0059	<0.0059	<0.0059	<0.012	<0.000059	<0.0059	<0.00012
	MW9-ROX-011315	1/13/2015		44.21	NE	<0.0052	0.00023 J	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.0021	<0.0021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.000016 JB	<0.0052	<0.0001
	MW9-ROX-040915	4/9/2015		45.38	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	0.000027 J	<0.0052		<0.0001	<0.0052	<0.0021	0.000018 JB J	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.000026 J	<0.0052	<0.0001
	MW9-ROX-070915	7/9/2015	46.45 - 56.45	44.81	NE	<0.0055	0.00042 J	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	0.000073 J	0.00013 J	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.000044 J	<0.0055	<0.00011
MW-10	MW10-ROX-102612	10/26/2012	44.43 - 54.43	43.08	NE	<0.0056	<0.0056	<0.0056	<0.011	0.000052 J	0.000086 J	<0.0056		<0.00011	<0.0056	<0.00022	0.00009 J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000076	<0.0056	0.00004 J
	MW10-ROX-121712	12/17/2012		43.08	NE																						
	MW10-ROX-011013	1/10/2013		44.10	NE	<0.005 UJ	<0.005	<0.005	<0.01	<0.0001	<0.0001	<0.005		<0.0001	<0.005	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	<0.000021 U	<0.005	<0.0001
	MW10-ROX-012113	1/21/2013		44.10	NE	<0.01	<0.01	<0.01	<0.01	<0.001	<0.0001	<0.002		<0.0001	<0.01		<0.01	<0.01	<0.01	<0.002	<0.004	<0.02	<0.003	<0.004	<0.0001	<0.005	<0.0001
	MW10-ROX-040913	4/9/2013		44.60	NE	<0.0054 UJ	<0.0019 U	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW10-ROX-070813	7/8/2013		42.27	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000021 U	<0.0056	<0.00011
	MW10-ROX-100313	10/3/2013		42.38	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW10-ROX-011514	1/15/2014		44.42	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		0.000072 J	<0.0053	<0.00021	<0.00021	<0.011 UJ	<0.011 UJ	<0.011	<0.0053	<0.0053	<0.0053	<0.011 UJ	0.000037 JB	<0.0054 UJ	<0.00011
	MW10-ROX-040714	4/7/2014		45.00	NE	<0.0053	<0.00085 U	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000042 U	<0.0053	<0.00011
	MW10-ROX-070914	7/9/2014		44.35	NE	<0.0054	<0.00065 U	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW10-ROX-100714	10/7/2014		43.58	NE	<0.0057	<0.0057	<0.0057	<0.011	<0.00011	<0.00011	<0.0057		<0.00011	<0.0057	<0.0023	<0.0023	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	<0.000057	<0.0057	<0.00011
	MW10-ROX-011315	1/13/2015		44.27	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.0022	<0.000018 U	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW10-ROX-040815	4/8/2015		45.30	NE	<0.0051	<0.0051	<0.0051	<0.01	0.000016 J	<0.0001	<0.0051		<0.0001	<0.0051	<0.002	0.00002 JB	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.000019 J	<0.0051	<0.0001
	MW10-ROX-070915	7/9/2015	44.43 - 54.43	44.93	NE	<0.0054	0.00064 J	<0.0054	<0.011	0.000057 J	0.000037 J	<0.0054		0.000024 J	<0.0054	0.000035 J	0.000058 J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.000077	<0.0054	0.000059 J
MW-11	MW11-ROX-102512	10/25/2012	41.66 - 51.66	40.59	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054 UJ	<0.00011
	MW11-ROX-011013	1/10/2013		41.43	NE	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.01 UJ	<0.0001 UJ	<0.0001 UJ	<0.005 UJ		<0.0001 UJ	<0.005 UJ	<0.0002 UJ	<0.0002 UJ	<0.01 UJ	<0.01 UJ	<0.01 UJ	<0.005 UJ	<0.005 UJ	<0.005 UJ	<0.01 UJ	<0.000015 UJ	<0.005 UJ	<0.0001 UJ
	MW11-ROX-040813	4/8/2013		42.02	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW11-ROX-070813	7/8/2013		39.24	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW11-ROX-100713	10/7/2013		39.95	NE	<0.0055 UJ	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	MW11-ROX-011514	1/15/2014		42.16	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.000026 U	<0.0055	<0.00011
	MW11-ROX-040714	4/7/2014		42.70	NE	<0.0056	<0.0007 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000023 U	<0.0056	<0.00011
	MW11-ROX-070914	7/9/2014		41.75	NE	<0.0057	<0.00042 U	<0.0057	<0.011	<0.00011	<0.00011	<0.0057		<0.00011	<0.0057	<0.00023	<0.00023	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	0.00003 J	<0.0057	<0.00011
	MW11-ROX-100714	10/7/2014		40.89	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.0021	<0.0021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052	<0.0001
	MW11-ROX-011315	1/13/2015		41.93	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.0022	<0.00002 U	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW11-ROX-040815	4/8/2015		43.19	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.0022	0.000022 JB	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW11-ROX-070915	7/9/2015	41.66 - 51.66	42.45	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.000029 J	0.000045 J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.000029 J	<0.0054	<0.00011

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																				
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
MW-12	MW12-ROX-102512	10/25/2012	41.92 - 51.92	40.95	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053 UJ	<0.00011
	MW12-ROX-011013	1/10/2013		41.83	NE	<0.0051 UJ	<0.0051	<0.0051	<0.01	0.000045 J	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000032 U	<0.0051	<0.0001
	MW12-ROX-040813	4/8/2013		42.46	NE	<0.0052	<0.0052	<0.0052	<0.01	0.000044 J	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052	<0.0001
	MW12-ROX-070913	7/9/2013		39.28	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011 UJ	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	MW12-ROX-100713	10/7/2013		40.22	NE	<0.0055 UJ	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011 UJ	<0.011 UJ	<0.011	<0.0055	<0.0055	<0.0055	0.0018 J J	<0.000055	<0.0053 UJ	<0.00011
	MW12-ROX-011514	1/15/2014		42.54	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01 UJ	<0.01 UJ	<0.01	<0.0052	<0.0052	<0.0052	<0.01 UJ	<0.000022 U	<0.0052 UJ	<0.0001
	MW12-ROX-040814	4/8/2014		43.15	NE	<0.0051	<0.0006 U	<0.0051	<0.01	<0.00011	<0.00011	<0.0051		<0.00011	<0.0051	<0.00023	<0.00023	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.000021 J	<0.0051	<0.00011
	MW12-ROX-070914	7/9/2014		41.97	NE	<0.0056	<0.00098 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW12-ROX-100614	10/6/2014		40.98	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.0021	<0.0021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053 UJ	<0.00011
	MW12-ROX-011215	1/12/2015		42.33	NE	<0.0056	0.00023 J	<0.0056	<0.011	0.00002 J	<0.00011	<0.0056		<0.00011	<0.0056	<0.0022	<0.0022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000018 J	<0.0056	<0.00011
	MW12-ROX-040615	4/6/2015		43.75	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000019 J	<0.00011	<0.0053		<0.00011	<0.0053	0.000018 J	0.000031 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.00002 U	<0.0053	0.000016 J
	MW12-ROX-070815	7/8/2015	41.92 - 51.92	42.86	NE	<0.0056	<0.0056	<0.0056	<0.011	0.00012	0.00003 J	<0.0056		0.000059 J	<0.0056	0.000035 J	0.000079 J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000067 J	<0.0056	0.000081 J
MW-13	MW13-ROX-110812	11/8/2012	25.57 - 35.57	25.30	NE	<0.005	0.00054 J	<0.005	<0.01	<0.0001	<0.0001	<0.005		<0.0001	<0.005	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	<0.00005	<0.005	<0.0001
	MW13-ROX-012313	1/23/2013		29.26	NE	<0.0055 UJ	0.0027 J	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	0.00011 J	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	MW13-ROX-041213	4/12/2013		29.44	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	0.00011 J	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	<0.0051	<0.0001
	MW13-ROX-071213	7/12/2013		25.67	NE	<0.0054 UJ	<0.0054	<0.0054	<0.011	<0.000042	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.000067 U	<0.011	<0.011	<0.011	<0.0054	<0.0054 UJ	<0.0054	<0.011	<0.000076	<0.0054 UJ	<0.00004
	MW13-ROX-100913	10/9/2013		26.94	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052	<0.0001
	MW13-ROX-012914	1/29/2014		29.63	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.000096 U	<0.00022	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	MW13-ROX-041114	4/11/2014		30.15	NE	<0.006	<0.00079 U	<0.006	<0.012	<0.00012	<0.00012	<0.006		<0.00012	<0.006	<0.00024	<0.00024	<0.012	<0.012	<0.012	<0.006	<0.006	<0.006	<0.012	0.000033 J	<0.006	<0.00012
	MW13-ROX-070714	7/7/2014		28.49	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	MW13-ROX-101014	10/10/2014		27.48	NE	<0.006	<0.006	<0.006	<0.012	<0.00012	<0.00012	<0.006		<0.00012	<0.006	<0.0024	<0.0024	<0.012	<0.012	<0.012	<0.006	<0.006	<0.006	<0.012	0.000032 J	<0.006	<0.00012
	MW13-ROX-011615	1/16/2015		29.09	NE	<0.0053	<0.00034 U	<0.0053	<0.011	0.000022 J	0.000035 J	<0.0053		<0.00011	<0.0053	0.00004 J	0.00008 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000025 J	<0.0053	0.000046 J
	MW13-ROX-041415	4/14/2015		30.71	NE	<0.0056	<0.0056	<0.0056	<0.011	0.000025 J	0.000066 J	<0.0056		<0.00011	<0.0056	0.000029 J	0.000055 J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00007	<0.0056	0.000023 J
	MW13-ROX-070815	7/8/2015	25.57 - 35.57	29.16	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.000031 J	0.000047 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	0.00032 J	0.000016 J
MW-14	MW14-ROX-103112	10/31/2012	33.42 - 43.42	32.02	NE	<0.005	0.00044 J	<0.005	<0.01	<0.0001	0.00029	<0.005		<0.0001	<0.005	0.0192	0.004	<0.01	<0.01	<0.01	<0.005	<0.005 UJ	<0.005	<0.01	<0.000051	<0.005 UJ	<0.0001
	MW14-ROX-011813	1/18/2013		33.05	NE	<0.005 UJ	<0.005	<0.005	<0.01	<0.0001	0.00064	<0.005		<0.0001	<0.005	0.0215	0.0084	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	<0.00005	<0.005	<0.0001
	MW14-ROX-041113	4/11/2013		33.31	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000068 J	0.00016	<0.0054		<0.00011	<0.0054	0.0124	0.0018	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0001	<0.0054	0.000053 J
	MW14-ROX-071213	7/12/2013		30.36	NE	<0.0053 UJ	0.00043 J	<0.0053	<0.011	<0.00011	<0.000093 U	<0.0053		<0.00011	<0.0053	0.0127	0.0027	<0.011	<0.011	<0.011	<0.0053	<0.0053 UJ	<0.0053	<0.011	<0.000032 U	<0.0053 UJ	<0.000067 U
	MW14-ROX-101013	10/10/2013		30.80	NE	<0.0057	<0.0057	<0.0057	<0.011	<0.00011	0.00034	<0.0057		<0.00011	<0.0057	0.0184	<0.00023	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	<0.000057	<0.0057	<0.00011
	MW14-ROX-012914	1/29/2014		33.67	NE	<0.0054	0.00045 J	<0.0054	<0.011	<0.00011	0.00041	<0.0054		<0.00011	<0.0054	0.0075	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW14-ROX-041114	4/11/2014		34.30	NE	<0.006	<0.00082 U	<0.006	<0.012	<0.00011	0.0003	<0.006		<0.00011	<0.006	0.0018	<0.00023	<0.012	<0.012	<0.012	<0.006	<0.006	<0.006	<0.012	<0.000057	<0.006	<0.00011
	MW14-ROX-070714	7/7/2014		32.82	NE	<0.0054	0.00031 J	<0.0054	<0.011	<0.00011	0.00024	<0.0054		<0.00011	<0.0054	0.0014	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00024 J	<0.0054	<0.00011
	MW14-ROX-101414	10/14/2014		31.65	NE	<0.0056	<0.00056 U	<0.0056	<0.011	<0.00011	0.00024	<0.0056		<0.00011	<0.0056	0.0014 J	<0.0022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000021 U	<0.0056	<0.00011
	MW14-ROX-011615	1/16/2015		33.58	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	0.00013	<0.0053		<0.00011	<0.0053	0.00012 J	0.000026 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000021 J	<0.0053	<0.00011
	MW14-ROX-041415	4/14/2015		35.16	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.00011	0.00017	<0.0052		<0.00011	<0.0052	0.00007 J	0.000018 J	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000054	<0.0052	<0.00011
	MW14-ROX-070915	7/9/2015	33.42 - 43.42	34.06	NE	<0.0052	0.00044 J	<0.0052	<0.01	0.000016 J	0.00017	<0.0052		<0.0001	<0.0052	0.00019 J	0.00012 J	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.000062	<0.0052	0.000017 J

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																				
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
MW-16	MW16-ROX-012313	1/23/2013	37.06 - 47.06	43.05	NE	<0.0053 UJ	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	0.000085 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000025 J J	<0.0053	<0.00011
	MW16-ROX-040813	4/8/2013		43.39	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	0.000058 J	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052	<0.0001
	MW16-ROX-070813	7/8/2013		40.62	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000018 U	<0.0056	<0.00011
	MW16-ROX-100813	10/8/2013		41.62	NE	<0.0052 UJ	<0.0052 UJ	<0.0052 UJ	<0.01 UJ	<0.0001 UJ	<0.0001 UJ	<0.0052 UJ		<0.0001 UJ	<0.0052 UJ	<0.00021 UJ	<0.00021 UJ	<0.01 UJ	<0.01 UJ	<0.01 UJ	<0.0052 UJ	<0.0052 UJ	<0.0052 UJ	<0.01 UJ	<0.000052 UJ	<0.0052 UJ	<0.0001 UJ
	MW16-ROX-011514	1/15/2014		43.76	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000031 U	<0.0052	<0.0001
	MW16-ROX-040914	4/9/2014		44.63	NE	<0.0059	<0.00067 U	<0.0059	<0.012	<0.00012	<0.00012	<0.0059		<0.00012	<0.0059	<0.00024	<0.00024	<0.012	<0.012	<0.012	<0.0059	<0.0059	<0.0059	<0.012	<0.000059	<0.0059	<0.00012
	MW16-ROX-071014	7/10/2014		43.15	NE	<0.0054	<0.00021 U	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW16-ROX-100714	10/7/2014		42.27	NE	<0.006	<0.006	<0.006	<0.012	<0.00012	<0.00012	<0.006		<0.00012	<0.006	<0.0024	<0.0024	<0.012	<0.012	<0.012	<0.006	<0.006	<0.006	<0.012	<0.00006	<0.006	<0.00012
	MW16-ROX-011315	1/13/2015		43.59	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.000016 U	<0.000022 U	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW16-ROX-040915	4/9/2015		44.87	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.000026 JB J	0.000039 JB J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW16-ROX-070915	7/9/2015	37.06 - 47.06	44.26	NE	<0.0055	0.00043 J	<0.0055	<0.011	<0.00011	0.000037 J	<0.0055		<0.00011	<0.0055	0.000067 J	0.00012 J	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.000043 J	<0.0055	<0.00011
	MW16-ROX-070915-DUP	7/9/2015		44.26	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	0.000047 J	0.000074 J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000023 J	<0.0056	<0.00011
MW-22	MW22-ROX-012313	1/23/2013	37.88 - 47.88	41.80	NE	<0.0052 UJ	0.0024 J	<0.0052	<0.01	<0.0001	0.00018	<0.0052		<0.0001	<0.0052	0.0276	0.05	0.018	0.0322	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00019	0.0111	<0.0001
	MW22-ROX-012313-DUP	1/23/2013		41.80	NE	<0.0053 UJ	0.0024 J	<0.0053	<0.011	<0.00011	0.00018	<0.0053		<0.00011	<0.0053	0.028	0.0501	0.0187	0.0349	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.0002	0.0122	<0.00011
	MW22-ROX-040513	4/5/2013		42.23	NE	<0.0053	0.00057 J	<0.0053	<0.011	<0.00011	0.00018	<0.0053		<0.00011	<0.0053	0.0241	0.0413	0.0236	0.0403	<0.011	<0.0053	<0.0053 UJ	<0.0053	<0.011	0.00019	0.0123 J	<0.00011
	MW22-ROX-071113	7/11/2013		39.35	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.00027	<0.0054		<0.00011	<0.0054	0.0232 J	0.0393	0.0159	0.029	<0.011 UJ	<0.0054	<0.0054	<0.0054	<0.011	0.0002 B	0.0094 J	<0.00011
	MW22-ROX-071113-DUP	7/11/2013		39.35	NE	<0.0056	0.00052 J	<0.0056	<0.011	<0.00011	0.00017	<0.0056		<0.00011	<0.0056	0.0216 J	0.037	0.0147	0.0269	<0.011 UJ	<0.0056	<0.0056	<0.0056	<0.011	0.0002 B	0.0088 J	<0.00011
	MW22-ROX-100913	10/9/2013		40.39	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.00019	<0.0054		<0.00011	<0.0054	0.0276	0.0468	0.0152	0.0319	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00019	<0.0054	<0.00011
	MW22-ROX-100913-DUP	10/9/2013		40.39	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.0002	<0.0054		<0.00011	<0.0054	0.0265	0.0451	0.0139	0.0296	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00016	<0.0054	<0.00011
	MW22-ROX-012014	1/20/2014		42.49	NE	<0.027	<0.027	<0.027	<0.053	<0.00011	0.00017	<0.027		<0.00011	<0.027	0.0258	0.0459	0.0124 J	0.0313 J	<0.053	<0.027	<0.027	<0.027	<0.053	0.0002 B	0.0071 J	<0.00011
	MW22-ROX-012014-DUP	1/20/2014		42.49	NE	<0.027	<0.027	<0.027	<0.054	<0.00011	0.00015	<0.027		<0.00011	<0.027	0.0232	0.0416	0.0118 J	0.0296 J	<0.054	<0.027	<0.027	<0.027	<0.054	0.0002 B	0.007 J	<0.00011
	MW22-ROX-041014	4/10/2014		43.15	NE	<0.028	<0.0016 U	<0.028	<0.056	<0.00011	<0.00011	<0.028		<0.00011	<0.028	0.0174	0.0287	0.0156 J	0.035 J	<0.056	<0.028	<0.028	<0.028	<0.056	0.0001	<0.028	<0.00011
	MW22-ROX-041014-DUP	4/10/2014		43.15	NE	<0.028	<0.0018 U	<0.028	<0.056	<0.00011	0.00012	<0.028		<0.00011	<0.028	0.0199	0.0322	0.0159 J	0.038 J	<0.056	<0.028	<0.028	<0.028	<0.056	0.0001	<0.028	<0.00011
	MW22-ROX-071414	7/14/2014		41.85	NE	<0.0054	<0.00057 U	<0.0054	<0.011	<0.00011	0.00015	<0.0054		<0.00011	<0.0054	0.0198	0.0355	0.0102 J	0.0204	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.00018 U	<0.0054	<0.00011
	MW22-ROX-101014	10/10/2014		41.43	NE	<0.0063	<0.0063	<0.0063	<0.013	<0.00013	0.00014	<0.0063		<0.00013	<0.0063	0.0193	0.0339	0.0064 J	0.011 J	<0.013	<0.0063	<0.0063	<0.0063	<0.013	0.00036	0.0079	<0.00013
	MW22-ROX-011615	1/16/2015		42.19	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	0.00051	<0.0053		<0.00011	<0.0053	0.0153	0.0184	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000064	0.0119	<0.00011
	MW22-ROX-041415	4/14/2015		43.71	NE	<0.0052	<0.0052	<0.0052	<0.01	0.000016 J	0.00021	<0.0052	0.047 JN	<0.0001	<0.0052	0.024	0.0397	<0.01	0.0201	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00013	0.0108	0.00002 J
	MW22-ROX-071515	7/15/2015	37.88 - 47.88	42.64	NE	<0.029	<0.029	<0.029	<0.057	<0.00011	0.00011	<0.029	0.033 JN	<0.00011	<0.029	0.0216	0.0374	0.0075 J	<0.057	<0.057	<0.029	<0.029	<0.029	<0.057	0.000099	<0.029	<0.00011
MW-23	MW23-ROX-012615	1/26/2015	29.02 - 39.02	30.90	NE	<0.005	<0.005	<0.005	<0.005	<0.001	0.00096 J	<0.005 UJ		<0.0002	<0.005	0.0019	0.00056 J	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.025	0.0037	<0.005	<0.001
	MW23-ROX-040815	4/8/2015		32.24	NE	<0.0051	<0.0051	<0.0051	<0.01	0.000029 J	0.000053 J	<0.0051		<0.0001	<0.0051	0.000036 JB J	0.000028 JB J	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.00057	<0.0051	0.00015
	MW23-ROX-071015	7/10/2015	29.02 - 39.02	30.54	NE	<0.0056	<0.0056	<0.0056	<0.011	0.00002 J	0.000025 J	<0.0056		<0.00011	<0.0056	0.000045 JB J	0.000079 JB J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000052 J	<0.0056	0.000068 J
MW-24	MW24-ROX-040513	4/5/2013	38.89 - 48.89	43.39	NE	<0.0052	0.00049 J	<0.0052	<0.01	0.000088 J	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	0.00015 J	<0.01	<0.01	<0.01	<0.0052	<0.0052 UJ	<0.0052	<0.01	<0.000052	<0.0052 UJ	0.000066 J
	MW24-ROX-071113	7/11/2013		40.35	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022 UJ	0.000062 J	<0.011 UJ	<0.011 UJ	<0.011 UJ	<0.0054	<0.0054	<0.0054	<0.011 UJ	<0.000038 U	<0.0053 UJ	<0.00011
	MW24-ROX-100913	10/9/2013		41.27	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW24-ROX-011514	1/15/2014		43.47	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW24-ROX-040914	4/9/2014		44.13	NE	<0.0056	<0.00092 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	MW24-ROX-071114	7/10/2014		42.97	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW24-ROX-100814	10/8/2014		42.16	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.0022	<0.0022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	MW24-ROX-011315	1/13/2015		43.17	NE	<0.0053	0.00023 J	<0.0053	<0.011	<0.00011	0.000059 J	<0.0053		<0.00011	<0.0053	0.00009 JB	<0.000099 U	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000037 J	<0.0053	<0.00011
	MW24-ROX-040915	4/9/2015		44.45	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.00002 JB J	0.000035 JB J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW24-ROX-070915	7/9/2015	38.89 - 48.89	44.65	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	0.000049 J	0.000081 J	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.000041 J	<0.0052	<0.0001

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																				
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
MW-25	MW25-ROX-102114	10/21/2014	35.59 - 45.59	36.44	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	0.00093 J	0.00057 J	0.0011 J	0.0028 J	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000033 J	0.173	<0.00011
	MW25-ROX-012215	1/22/2015		38.45	NE	<0.0052	0.00028 J J	<0.0052	<0.01	<0.000018 U	<0.0001	<0.0052		<0.0001	<0.0052	0.00036 J	0.00015 J	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	0.107	<0.000019 U
	MW25-ROX-042115	4/21/2015		39.71	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	0.00067 J	0.00035 J	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	0.0592	<0.0001
	MW25-ROX-071515	7/15/2015	35.59 - 45.59	38.40	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	0.000019 J	<0.0052		<0.0001	<0.0052	0.00088 J	0.00049 J	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.000017 J	0.112	<0.0001
MW-26	MW26-ROX-102114	10/21/2014	38.15 - 48.15	39.43	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.0021	<0.0021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW26-ROX-011215	1/12/2015		41.09	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.0021	<0.000017 U	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.000015 J	<0.0052	<0.0001
	MW26-ROX-040815	4/8/2015		42.52	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.0021	<0.0021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052	<0.0001
	MW26-ROX-070815	7/8/2015	38.15 - 48.15	41.76	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.000046 J	0.000065 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00003 J	<0.0053	<0.00011
MW-27	MW27-ROX-102114	10/21/2014	39.79 - 49.79	41.57	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.0021	<0.0021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	MW27-ROX-011515	1/15/2015		42.06	NE	<0.0053	0.00026 J J	<0.0053 UJ	<0.011	<0.00011	0.000023 J J	<0.0053		0.000047 J J	<0.0053	<0.0021	<0.0021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000028 J J	<0.0053	0.000019 J J
	MW27-ROX-041015	4/10/2015		43.22	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000024 J J	<0.00011	<0.0054		<0.00011	<0.0054	0.000036 J	0.00007 J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.000019 JB J	<0.0054	0.000018 J
	MW27-ROX-071015	7/10/2015	39.79 - 49.79	43.00	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	0.00005 JB J	0.000086 JB J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
MW-28	MW28-ROX-102114	10/21/2014	33.61 - 43.61	36.44	NE	<0.0053	0.00026 J	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.00075 J	<0.0021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000017 J	<0.0053	<0.00011
	MW28-ROX-011515	1/15/2015		41.14	NE	<0.0055	0.00033 J J	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	0.00047 J	<0.0022	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	MW28-ROX-041415	4/14/2015		42.34	NE	<0.0057	<0.0057	<0.0057	<0.011	<0.00011	<0.00011	<0.0057		0.000035 J	<0.0057	0.00024 J	0.000037 J	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	<0.000057	<0.0057	<0.00011
	MW28-ROX-071515	7/15/2015	33.61 - 43.61	42.19	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	0.00021 J J	0.0001 JB J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00002 J	<0.0056	<0.00011
P-114	P114-ROX-110912	11/9/2012	32.67 - 52.67	30.90	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052	<0.0001
	P114-ROX-012313	1/23/2013		30.22	NE	<0.0053 UJ	0.0024 J	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	<0.0053	<0.00011
	P114-ROX-041513	4/15/2013		31.80	NE	<0.0052	0.00047 J	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052	<0.0001
	P114-ROX-071813	7/18/2013		27.22	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		0.000071 J	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.000059	<0.0055	<0.00011
	P114-ROX-071813-DUP	7/18/2013		27.22	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000052 J	<0.0053	<0.00011
	P114-ROX-101713	10/17/2013		29.43	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	P114-ROX-012814	1/28/2014		32.11	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00015 B	<0.0054	<0.00011
	P114-ROX-042114	4/21/2014		32.22	NE	<0.0051	0.0026 JB	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01 UJ	<0.000051	<0.0051	<0.0001
	P114-ROX-071814	7/18/2014		30.87	NE	<0.0051	<0.00028 U	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.00012 U	<0.0051	<0.0001
	P114-ROX-101714	10/17/2014		29.43	NE	<0.0057	<0.0057	<0.0057	<0.011	<0.00011	<0.00011	<0.0057		<0.00011	<0.0057	<0.0023	<0.0023	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	<0.000057	<0.0057	<0.00011
	P114-ROX-012115	1/21/2015		31.53	NE	<0.0056	0.00091 J	<0.0056	<0.011	<0.00002 U	0.000048 J	<0.0056		<0.00011	<0.0056	<0.000092 U	<0.00012 U	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000046 U	<0.0056	<0.000042 U
	P114-ROX-041715	4/17/2015		NM	NE	<0.0053	0.00031 J	<0.0053	<0.011	0.000023 J	<0.00011	<0.0053		<0.00011	<0.0053	0.000025 JB J	0.000029 JB J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000039 J	<0.0053	0.000027 J
	P114-ROX-070815	7/8/2015	32.67 - 52.67	29.16	NE	<0.005	<0.005	<0.005	<0.01	<0.0001	0.000033 J	<0.005		<0.0001	<0.005	<0.002	<0.002	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	0.000023 J	<0.005	0.000032 J
P-54	P54-ROX-103012	10/30/2012	38.00 - 63.00	40.70	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051 UJ	<0.0051	<0.01	<0.000051	<0.0051 UJ	<0.0001
	P54-ROX-011113	1/11/2013		41.56	NE	<0.0053 UJ	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000032 J	<0.0053	<0.00011
	P54-ROX-041013	4/10/2013		41.80	NE	<0.0057 UJ	<0.0057	<0.0057	<0.011	<0.00011	<0.00011	<0.0057		<0.00011	<0.0057	<0.00023	<0.00023	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	<0.000057	<0.0057	<0.00011
	P54-ROX-050313	5/3/2013		41.80	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	P54-ROX-071113	7/11/2013		39.07	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021 UJ	0.000083 J	<0.01	<0.01	<0.01 UJ	<0.0052	<0.0052	<0.0052	<0.01	<0.000049 U	<0.0052 UJ	<0.0001
	P54-ROX-100813	10/8/2013		39.94	NE	<0.0057	<0.0057	<0.0057	<0.011	<0.00011	<0.00011	<0.0057		<0.00011	<0.0057	<0.00023	<0.00023	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	<0.000057	<0.0057	<0.00011
	P54-ROX-011514	1/15/2014		42.20	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
	P54-ROX-040914	4/9/2014		42.80	NE	<0.006	<0.00062 U	<0.006	<0.012	<0.00012	<0.00012	<0.006		<0.00012	<0.006	<0.00024	<0.00024	<0.012	<0.012	<0.012	<0.006	<0.006	<0.006	<0.012	<0.00006	<0.006	<0.00012
	P54-ROX-071114	7/10/2014		41.71	NE	<0.0054	<0.00028 U	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.00011 J	0.00013 J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000051 U	<0.0054	<0.00011
	P54-ROX-100814	10/8/2014		40.88	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.0022	<0.0022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	P54-ROX-011415	1/14/2015		41.79	NE	<0.0056	<0.0056	<0.0056	<0.011	0.000021 J J	<0.00011	<0.0056		<0.00011	<0.0056	<0.0022	<0.0022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00002 J	<0.0056	0.00003 J
	P54-ROX-041015	4/10/2015		43.20	NE	<0.0053	<0.0053	<0.0053	<0.011	0.00002 J J	<0.00011	<0.0053		<0.00011	<0.0053	0.000024 J	0.000046 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000025 JB J	<0.0053	0.000018 J
	P54-ROX-070915	7/9/2015	38.00 - 63.00	42.25	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	0.000019 J	<0.0052		<0.0001	<0.0052	0.000089 J	0.00015 J	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.000041 J	<0.0052	<0.0001

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																				
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
P-55	P55-ROX-012113	1/21/2013	39.82 - 64.82	45.24	NE	<0.01	<0.01	<0.01	<0.001	<0.0001	0.00133	<0.002		<0.0001	<0.01		0.042	<0.01	<0.01	<0.002	<0.004	<0.02	<0.003	<0.004	0.00211	0.004 J	<0.0001
	P55-ROX-012113	1/21/2013		45.24	NE	<0.0051	0.00069 J	<0.0051	<0.01	<0.0001	0.00093	<0.0051		<0.0001	<0.0051	0.0176	0.0254	<0.01	0.0018 J	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.0017	0.0034 J	<0.0001
P-55R	P55-ROX-041513	4/15/2013	40.43 - 50.43	43.63	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	0.0013	<0.0052		<0.0001	<0.0052	0.0268	0.0389	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.0021	<0.0052	<0.0001
	P55-ROX-071613	7/16/2013		40.06	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	0.0015	<0.0056		<0.00011	<0.0056	0.0244	0.0353	<0.011 UJ	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.0019	0.0048 J J	<0.00011
	P55-ROX-101013	10/10/2013		41.67	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	0.0014	<0.0055		<0.00011	<0.0055	0.0279	0.0415	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.0017	0.002 J	<0.00011
P-56	P56-ROX-103112	10/31/2012	40.82 - 65.82	44.80	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	0.00046	<0.0051		<0.0001	<0.0051	0.024	0.0307	<0.01	0.0011 J	<0.01	<0.0051	<0.0051 UJ	<0.0051	<0.01	0.0013	<0.0051 UJ	<0.0001
	P56-ROX-011713	1/17/2013		45.65	NE	<0.005	<0.005	<0.005	<0.01	<0.0001	0.00032	<0.005		<0.0001	<0.005	0.0147	0.0131	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	0.0012	0.0014 J	<0.0001
	P56-ROX-041213	4/12/2013		46.12	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	0.00032	<0.0055		<0.00011	<0.0055	0.0208	0.0239	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.0012	<0.0055	<0.00011
	P56-ROX-071513	7/15/2013		43.25	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	0.00059	<0.0055		<0.00011	<0.0055	0.0315	0.0431	<0.011 UJ	0.0064 J	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.0015	<0.0055 UJ	<0.00011
	P56-ROX-101013	10/10/2013		44.48	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	0.00044	<0.0055		<0.00011	<0.0055	0.0251	0.03	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.0013	<0.0055	<0.00011
	P56-ROX-012214	1/22/2014		46.35	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	0.00035	<0.0052		<0.0001	<0.0052	0.0193	0.0228	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.0012	<0.0052	<0.0001
	P56-ROX-041414	4/14/2014		47.32	NE	<0.0059	0.00051 J	<0.0059	<0.012	<0.00012	0.00038	<0.0059		<0.00012	<0.0059	0.0223	0.0269	<0.012	0.0008 J	<0.012	<0.0059	<0.0059	<0.0059	<0.012	0.0012	<0.0059	<0.00012
	P56-ROX-070814	7/8/2014		45.97	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	0.00036	<0.0056		<0.00011	<0.0056	0.0181	0.0243	<0.011	0.0165	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.001	<0.0056	<0.00011
	P56-ROX-101314	10/13/2014		45.05	NE	<0.0054	<0.00035 U	<0.0054	<0.011	<0.00011	0.00041	<0.0054		<0.00011	<0.0054	0.0235	0.0296	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0015	<0.0054	<0.00011
	P56-ROX-011915	1/19/2015		46.58	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.0003	<0.0054		<0.00011	<0.0054	0.0197	0.0223	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0011	<0.0054	0.00003 J
	P56-ROX-041515	4/15/2015		48.05	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.00041	<0.0054		<0.00011	<0.0054	0.026	0.0293	<0.011	0.0011 J	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0013	<0.0054	0.000027 J J
	P56-ROX-071015	7/10/2015		47.34	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	0.00033	<0.0053		<0.00011	<0.0053	0.0262	0.0119	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.0014	<0.0053	0.000029 J
P-57	P57-ROX-110512	11/5/2012	40.46 - 65.46	44.98	NE	<0.005	<0.005	<0.005	<0.01	<0.0001	0.00062	<0.005		0.00005 J	<0.005	0.0249	0.0305	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	0.00048	0.0547 J	<0.0001
	P57-ROX-012913	1/29/2013		45.92	NE	<0.0059	<0.0059	<0.0059	<0.012	<0.00012	0.00094	<0.0059		<0.00012	<0.0059	0.0369	0.0447	<0.012	<0.012	<0.012	<0.0059	<0.0059	<0.0059	<0.012	0.00074	<0.0059 UJ	<0.00012
	P57-ROX-041113	4/11/2013		46.29	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	0.00076	<0.0051		<0.0001	<0.0051	0.0348	0.0453	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.00074	0.146	<0.0001
	P57-ROX-071613	7/16/2013		43.38	NE	<0.0056	<0.0056	<0.0056	<0.011	0.000038 J	0.0008	<0.0056		<0.00011	<0.0056	0.0267	0.0365	<0.011 UJ	0.0086 J	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00073	0.164 J	<0.000052 U
	P57-ROX-101413	10/14/2013		44.38	NE	<0.0054	0.00049 J	<0.0054	<0.011	<0.00011	0.00067	<0.0054		<0.00011	<0.0054	0.0252	0.0324	<0.011	<0.011	<0.011	<0.0054	<0.0054 UJ	<0.0054	<0.011	0.00049	0.202	0.000047 J
	P57-ROX-020314	2/3/2014		46.57	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	0.00062	<0.0053		<0.00011	<0.0053	0.0234	0.0314	<0.011	0.0027 J	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00052	0.168 J	<0.00011
	P57-ROX-041514	4/15/2014		46.70	NE	<0.0056	<0.00058 U	<0.0056	<0.011	<0.00011	0.00061	<0.0056		<0.00011	<0.0056	0.0238	0.032	<0.011	<0.011	<0.011	<0.0056	<0.0056 UJ	<0.0056	<0.011	0.00045 J	0.106 J	<0.00011
	P57-ROX-070814	7/8/2014		45.95	NE	<0.0053	0.00026 J	<0.0053	<0.011	<0.00011 UJ	0.00055	<0.0053	0.024 JN	<0.00011	<0.0053	0.022	0.0306	<0.011	0.0303	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00047	0.141	<0.00011
	P57-ROX-070814-DUP	7/8/2014		45.95	NE	<0.0054	0.00027 J	<0.0054	<0.011	<0.00011 UJ	0.00054	<0.0054	0.023 JN	<0.00011	<0.0054	0.022	0.03	<0.011	0.0299	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00048	0.136	<0.00011
	P57-ROX-101414-DUP	10/14/2014		45.00	NE	<0.0058	<0.00082 U	<0.0058	<0.012	<0.00012	0.00065	<0.0058		<0.00012	<0.0058	0.0243	0.0338	<0.012	0.0138	<0.012	<0.0058	<0.0058	<0.0058	<0.012	0.00058	0.271 J	<0.00012
	P57-ROX-101414	10/14/2014		45.00	NE	<0.0056	<0.00086 U	<0.0056	<0.011	<0.00011	0.00068	<0.0056		<0.00011	<0.0056	0.026	0.0345	<0.011	0.0152	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00059	0.274 J	<0.00011
	P57-ROX-012315	1/23/2015	44.19 - 54.19	47.52	NE	<0.0053	0.00039 J	<0.0053	<0.011	<0.00002 U	0.00098	<0.0053		<0.00011	<0.0053	0.0385	0.0507	<0.011	0.0044 J	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00062	0.159	<0.000027 U
	P57-ROX-042015	4/20/2015		48.73	NE	<0.0052	0.00037 J	<0.0052	<0.01	<0.0001	0.00089	<0.0052		<0.0001	<0.0052	0.0312	0.045	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.0007	0.164	0.000021 J
	P57-ROX-071315	7/13/2015	44.19 - 54.19	47.81	NE	<0.0053	0.00044 J	<0.0053	<0.011	<0.00011	0.00082	<0.0053		<0.00011	<0.0053	0.0302	0.0464	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00064	0.189	0.00002 J
P-58	P58-ROX-110612	11/6/2012	40.21 - 65.21	43.09	NE																					
	P58-ROX-121012	12/10/2012		43.09	NE	<0.0054 UJ	<0.0054	<0.0054	<0.011	<0.00011	0.0014	<0.0054		<0.00011	<0.0054	0.0616	0.0807	<0.011	0.0124	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00085	0.178	0.00012
	P58-ROX-012213	1/22/2013		44.21	NE	<0.0054	<0.0054	<0.0054	<0.011	0.00024	0.003	<0.0054		0.000072 J	<0.0054	0.068	0.0846	<0.011	0.0198	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0023	0.208	0.00077
	P58-ROX-041113	4/11/2013		44.40	NE	<0.0054	<0.0054	<0.0054	<0.011	0.00019	0.0022	<0.0054		<0.00011	<0.0054	0.0692	0.0961	<0.011	0.014	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0021	0.0985	0.00055
	P58-ROX-071613	7/16/2013		41.49	NE	<0.0055	<0.0055	<0.0055	<0.011	0.000071 J	0.0013	<0.0055		<0.00011	<0.0055	0.0544	0.0708	<0.011 UJ	0.0359	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.00099	0.247	<0.0002 U
	P58-ROX-101413	10/14/2013		42.19	NE	<0.0054	0.00058 J	<0.0054	<0.011	0.000066 J	0.0014	<0.0054		<0.00011	<0.0054	0.0488	0.0628	<0.011	0.0481	<0.011	<0.0054	<0.0054 UJ	<0.0054	<0.011	0.00095	0.213	0.00021
	P58-ROX-020314	2/3/2014		44.66	NE	<0.0052	<0.0052	<0.0052	<0.01	0.000058 J	0.0011	<0.0052		<0.0001	<0.0052	0.0353	0.0474	<0.01	0.0073 J	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00069	0.123 J	0.00014
	P58-ROX-041514	4/15/2014		45.66	NE	<0.0053 UJ	<0.0013 U	0.00072 J	<0.011 UJ	0.00079	0.0017	0.00088 J		0.00072	<0.0053 UJ	0.0284	0.0381	<0.011 UJ	0.0136 J	<0.011 UJ	<0.0053	0.0021 J J	<0.0053 UJ	<0.011 UJ	0.0013	0.123 J	0.00085
	P58-ROX-071814	7/18/2014		43.80	NE	<0.0055	<0.00032 U	<0.0055	<0.011	0.000062 J	0.0012	<0.0055		0.0005	<0.0055	0.0412	0.0554	<0.011	0.012	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.00092	0.173	0.00022
	P58-ROX-101514	10/15/2014		43.14	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000064 J	0.0015	<0.0054		<0.00011	<0.0054	0.0504	0.0674	<0.011	0.0237	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.001	0.145	0.00024
	P58-ROX-012315	1/23/2015		45.32	NE	<0.0053	0.00038 J	<0.0053	<0.011	<0.000028 U	0.0011	<0.0053		<0.00011	<0.0053	0.0428	0.0565	<0.011	0.0025 J	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00064	0.162	0.000097 JB
	P58-ROX-042015	4/20/2015		46.67	NE	<0.0052	0.00028 J	<0.0052	<0.01	0.000048 J	0.0012	<0.0052		<0.0001	<0.0052	0.0444	0.0563	<0.01	0.0047 J	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00075	0.112	0.00019
	P58-ROX-071415	7/14/2015	40.21 - 65.21	45.54	NE	<0.0055	0.00081 J	<0.0055	<0.011	0.000054 J	0.0011	<0.0055		<0.00011	<0.0055	0.04	0.055	<0.011	0.0165	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.00083	0.153	0.00023

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TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																				
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
P-59	P59-ROX-110212	11/2/2012	47.91 - 72.91	45.98	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000063 J	0.0005	<0.0053		<0.00011	<0.0053	0.0187	0.0282	0.0065 J	0.0137	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00075	0.0766 J	0.00009 J
	P59-ROX-110212-DUP	11/2/2012		45.98	NE	<0.0052	<0.0052	<0.0052	<0.01	0.000066 J	0.00048	<0.0052		<0.0001	<0.0052	0.0179	0.0268	0.0056 J	0.0116	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00073	0.0656 J	0.000093 J
	P59-ROX-013013	1/30/2013		46.60	NE	<0.0052 UJ	0.0022 J	<0.0052	<0.01	<0.000079 U	0.00069	<0.0052		<0.0001	<0.0052	0.0222	0.0305	0.154	0.107	<0.01 UJ	<0.0052	<0.0052 UJ	<0.0052	<0.01	0.001	0.141 J	<0.00011 U
	P59-ROX-041213	4/12/2013		46.95	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000077 J	0.00064	<0.0054		<0.00011	<0.0054	0.0247	0.0369	0.174	0.0842	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0012	0.119	0.000098 J
	P59-ROX-041213-DUP	4/12/2013		46.95	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000078 J	0.00065	<0.0053		<0.00011	<0.0053	0.0265	0.0383	0.154	0.0794	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.0012	0.101	0.0001 J
	P59-ROX-071613	7/16/2013		44.13	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000061 J	0.00063	<0.0054		<0.00011	<0.0054	0.0189	0.0302	0.17	0.042	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00087	0.121 J	<0.000078 U
	P59-ROX-101013	10/10/2013		45.50	NE	<0.0054	<0.0054	0.00091 J	<0.011	0.00015	0.0007	<0.0054		<0.00011	<0.0054	0.0192	0.0305	0.201	0.0528	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0014	0.0524	0.00028
	P59-ROX-020314	2/3/2014		47.35	NE	<0.0052	<0.0052	<0.0052	<0.01	0.00012	0.00067	<0.0052		<0.0001	<0.0052	0.0141	0.0214	0.31 J	0.0142	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.0014	0.0444 J	0.00019
	P59-ROX-041514	4/15/2014		48.60	NE	<0.0053	<0.0053	<0.0053	<0.011	0.00015	0.00066	<0.0053		<0.00011	<0.0053	0.0233	0.0317	<0.011	0.0186 J	<0.011	<0.0053	<0.0053 UJ	<0.0053	<0.011	0.0016	0.13 J	0.0003
	P59-ROX-070814	7/8/2014		47.69	NE	<0.0057	0.00045 J	<0.0057	<0.011	0.000053 J J	0.00046	<0.0057		<0.00011	<0.0057	0.0181	0.0291	0.0793	0.0184	<0.011	<0.0057	<0.0057	<0.0057	<0.011	0.00088	<0.0057	0.0001 J
	P59-ROX-101414	10/14/2014		46.18	NE	<0.0054	<0.00042 U	<0.0054	<0.011	<0.00054	0.00087	<0.0054		<0.00054	<0.0054	0.0268	0.0425	0.0387	0.0092 J	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0015	0.0361	<0.00054
	P59-ROX-011915	1/19/2015		47.42	NE	<0.0054	<0.0054	<0.0054	<0.011	0.00014	0.00073	<0.0054		<0.00011	<0.0054	0.0145	0.0216	0.0789	0.0145	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0013	0.0169	0.00027
	P59-ROX-041615	4/16/2015		48.83	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000078 J	0.00028	<0.0054	0.057 JN	<0.00011	<0.0054	0.0136	0.0189	0.0661	0.168	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00081	0.0909	0.00014
	P59-ROX-071315	7/13/2015	47.91 - 72.91	47.85	NE	<0.0054	<0.0054	<0.0054	<0.011	0.0002	0.00045	<0.0054		<0.00011	<0.0054	0.0045	0.0049	0.044	0.0123	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00064	0.0062	0.00039
P-66	P66-ROX-103112	10/31/2012	34.72 - 59.72	34.75	NE	<0.005	<0.005	<0.005	<0.01	<0.000051 U	0.0017	<0.005		<0.0001	<0.005	0.0689	0.0268	<0.01	<0.01	<0.01	<0.005	<0.005 UJ	<0.005	<0.01	0.00054	<0.005 UJ	<0.00007 U
	P66-ROX-011813	1/18/2013		35.70	NE	<0.0053 UJ	<0.0053	<0.0053	<0.011	0.000076 J	0.0019	<0.0053		<0.00011	<0.0053	0.0655	0.0315	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00082	0.0019 J	0.00011
	P66-ROX-041113	4/11/2013		36.03	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000072 J	0.0017	<0.0053		<0.00011	<0.0053	0.0681	0.0131	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00091	<0.0053	0.000087 J
	P66-ROX-071213	7/12/2013		33.20	NE	<0.0056 UJ	<0.0056	<0.0056	<0.011	<0.00019 U	0.0018	<0.0056		0.00017	<0.0056	0.0688	0.0642	<0.011	<0.011	<0.011	<0.0056	<0.0056 UJ	<0.0056	<0.011	0.00088	0.0035 J J	<0.0002 U
	P66-ROX-101013	10/10/2013		33.66	NE	<0.0056	<0.0056	<0.0056	<0.011	0.000052 J	0.0013	<0.0056		<0.00011	<0.0056	0.0571	0.0218	<0.011	0.0034 J	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.0005	<0.0056	0.00009 J
	P66-ROX-110713	11/7/2013		33.66	NE																					
	P66-ROX-012914	1/29/2014		36.39	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000065 J	0.0016	<0.0053		0.000041 J	<0.0053	0.0701	0.0284	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00077	<0.0053	0.000099 J
	P66-ROX-041114	4/11/2014		37.10	NE	<0.0058	<0.00088 U	<0.0058	<0.012	<0.00012	0.0013	<0.0058		<0.00012	<0.0058	0.0649	0.023	<0.012	<0.012	<0.012	<0.0058	<0.0058	<0.0058	<0.012	0.00049	<0.0058	0.000049 J
	P66-ROX-070714	7/7/2014		35.60	NE	<0.0056	0.0003 J	<0.0056	<0.011	<0.00011	0.00078	<0.0056		<0.00011	<0.0056	0.0445	0.006	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00041 J	<0.0056	<0.00011
	P66-ROX-101414	10/14/2014		34.48	NE	<0.0055	<0.00066 U	<0.0055	<0.011	<0.00011	0.0011	<0.0055		<0.00011	<0.0055	0.0595	0.0075	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.00064	<0.0055	0.000043 J
	P66-ROX-011615	1/16/2015		36.62	NE	<0.0053	<0.00022 U	<0.0053	<0.011	0.000047 J J	0.0014	<0.0053		<0.00011	<0.0053	0.0739	0.0178	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00072 J	<0.0053	0.000077 J J
	P66-ROX-011615-DUP	1/16/2015		36.62	NE	<0.0054	<0.0054	<0.0054	<0.011	0.001 J	0.0015	<0.0054		0.00014	<0.0054	0.0682	0.0165	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0016 J	<0.0054	0.00086 J
	P66-ROX-041415	4/14/2015		38.27	NE	<0.0054	<0.0054	<0.0054	<0.011	0.00005 J	0.0013	<0.0054		<0.00011	<0.0054	0.0665	0.02	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00062	<0.0054	0.000053 J
	P66-ROX-041415-DUP	4/14/2015		38.27	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000038 J	0.0013	<0.0053		<0.00011	<0.0053	0.0627	0.0187	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00059	<0.0053	0.000041 J
	P66-ROX-070815	7/8/2015	34.72 - 59.72	37.24	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000027 J	0.0011	<0.0053		<0.00011	<0.0053	0.0546	0.0075	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00053	<0.0053	0.000028 J
	P66-ROX-070815-DUP	7/8/2015		37.24	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000024 J	0.0011	<0.0053		<0.00011	<0.0053	0.0574	0.0077	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00056	<0.0053	0.00004 J
P-74	P74-ROX-110112	11/1/2012	44.43 - 69.43	41.72	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	0.0003	<0.0052		<0.0001	<0.0052	0.0123	0.0136	0.0054 J	0.002 J	<0.01	<0.0052	<0.0052 UJ	<0.0052	<0.01	0.00013	0.0307 J	<0.0001
	P74-ROX-011713	1/17/2013		42.65	NE	<0.0051	<0.0051	<0.0051	<0.01	0.000038 J	0.00038	<0.0051		<0.0001	<0.0051	0.0156	0.0198	<0.01	0.001 J	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.00023	0.0298	0.000048 J
	P74-ROX-041113	4/11/2013		42.83	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0046 U	<0.0001
	P74-ROX-071513	7/15/2013		40.11	NE	<0.0054	<0.0054	<0.0054	<0.011	0.00014	0.00011	<0.0054		<0.00011	<0.0054	0.0019	0.00019 J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.00008 U	0.008	0.000074 J
	P74-ROX-101413	10/14/2013		41.72	NE	<0.0054	0.00047 J	<0.0054	<0.011	0.00015	0.00025	<0.0054		<0.00011	<0.0054	0.0073	0.0079	<0.011	<0.011	<0.011	<0.0054	<0.0054 UJ	<0.0054	<0.011	0.000079	0.0125	0.000057 J
	P74-ROX-012414	1/24/2014		43.35	NE	<0.0051	0.00048 J	<0.0051	<0.01	0.000088 J	0.00028	<0.0051		<0.0001	<0.0051	0.0088	0.0106	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.00014 U	0.0278	0.000049 J
	P74-ROX-041514	4/15/2014		44.74	NE	<0.0059	<0.0014 U	<0.0059	<0.012	<0.00012	<0.00012	<0.0059		<0.00012	<0.0059	0.0017 J	0.0022 J	<0.012	<0.012	<0.012	<0.0059	<0.0059 UJ	<0.0059	<0.012	0.000054 JB J	<0.0059 UJ	<0.00012
	P74-ROX-070814	7/8/2014		43.02	NE	<0.0057	0.00039 J	<0.0057	<0.011	<0.00011	0.00011	<0.0057		<0.00011	<0.0057	0.0034	0.003	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	0.000054 J	<0.0057	<0.00011
	P74-ROX-101414	10/14/2014		41.48	NE	<0.005	<0.0019 U	<0.005	<0.01	<0.0001	<0.0001	<0.005		<0.0001	<0.005	<0.002	<0.002	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	<0.00005	<0.005	<0.0001
	P74-ROX-011915	1/19/2015		43.47	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000053 J	0.00023	<0.0053		<0.00011	<0.0053	0.0077	0.0107	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00015 B	0.0169	0.000038 J
	P74-ROX-041515	4/15/2015		44.61	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.0021	<0.0021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052	<0.0001
	P74-ROX-071015	7/10/2015	44.43 - 69.43	43.28	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000019 J	<0.00011	<0.0054		<0.00011	<0.0054	0.00002 JB J	0.000029 JB J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																				
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
P-93A	P93A-ROX-110712	11/7/2012	48.17 - 63.17	45.00	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	0.00029	<0.0052		<0.0001	<0.0052	0.015	0.0194	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00028 B	0.19	<0.0001
	P93A-ROX-110712-DUP	11/7/2012		45.00	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	0.00037	<0.0052		<0.0001	<0.0052	0.016	0.0206	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00034 B	0.217	<0.0001
	P93A-ROX-012313	1/23/2013		45.89	NE	<0.0052 UJ	<0.0052	<0.0052	<0.01	<0.0001	0.00021	<0.0052		<0.0001	<0.0052	0.0096	0.0093	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00024	0.168	<0.0001
	P93A-ROX-012313-DUP	1/23/2013		45.89	NE	<0.0052 UJ	<0.0052	<0.0052	<0.01	<0.0001	0.00019	<0.0052		<0.0001	<0.0052	0.0094	0.009	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00023	0.165	<0.0001
	P93A-ROX-041113	4/11/2013		46.29	NE	<0.005	<0.005	<0.005	<0.01	0.000046 J	0.0003	<0.005		<0.0001	<0.005	0.0146 J	0.0098	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	0.00035	0.2	0.00004 J
	P93A-ROX-041113-DUP	4/11/2013		46.29	NE	<0.005	<0.005	<0.005	<0.01	<0.0001	0.00025	<0.005		<0.0001	<0.005	0.0146 J	0.0096	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	0.00024	0.179	<0.0001
	P93A-ROX-071813	7/18/2013		43.25	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	0.00023	<0.0056		<0.00011	<0.0056	0.0089	0.0062	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00021	0.107	<0.00011
	P93A-ROX-101113	10/11/2013		44.18	NE	<0.005	<0.005	<0.005	<0.01	<0.0001	0.00028	<0.005		<0.0001	<0.005	0.0128	0.0085	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	0.00013	0.0837 J	<0.0001
	P93A-ROX-012914	1/29/2014		46.53	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.00032	<0.0054		<0.00011	<0.0054	0.0133	0.0072	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00022 B	0.105	<0.00011
	P93A-ROX-041714	4/17/2014		47.41	NE	<0.0056	<0.0012 U	<0.0056	<0.011	<0.00011	0.00027	<0.0056		<0.00011	<0.0056	0.0086	0.0048	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00018 B J	0.0735	<0.00011
	P93A-ROX-071814	7/18/2014		45.70	NE	<0.0057	<0.00077 U	<0.0057	<0.011	<0.00011	0.00024	<0.0057		<0.00011	<0.0057	0.0084	0.0053	<0.011	<0.011	<0.011	0.0059	<0.0057	<0.0057	<0.011	0.00017 B	0.0355	<0.00011
	P93A-ROX-071814-DUP	7/18/2014		45.70	NE	<0.0057	<0.00041 U	<0.0057	<0.011	<0.00011	0.00025	<0.0057		<0.00011	<0.0057	0.0095	0.0062	<0.011	<0.011	<0.011	0.0052 J	<0.0057	<0.0057	<0.011	0.00017 B	0.0396	<0.00011
	P93A-ROX-101514	10/15/2014		45.06	NE	<0.0052	0.00024 J	<0.0052	<0.01	<0.0001	0.00037	<0.0052		<0.0001	<0.0052	0.0114	0.0095	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.0003	0.0471	<0.0001
	P93A-ROX-101514-DUP	10/15/2014		45.06	NE	<0.0054 UJ	0.00046 J J	<0.0054 UJ	<0.011 UJ	<0.00011 UJ	0.00039 J	<0.0054 UJ		<0.00011 UJ	<0.0054 UJ	0.0122 J	0.0101 J	<0.011 UJ	<0.011 UJ	<0.011 UJ	0.0011 J J	<0.0054 UJ	<0.0054 UJ	<0.011 UJ	0.0003 J	0.05 J	<0.00011 UJ
	P93A-ROX-012715	1/27/2015	43.07 - 53.07	46.05	NE	<0.005	<0.005	<0.005	<0.005	<0.001	<0.001	<0.005		<0.0002	<0.005	0.008	0.0038	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.025	0.00026 J	0.09	<0.001
	P93A-ROX-041715	4/17/2015		47.02	NE	<0.0053	<0.0053	<0.0053	<0.011	0.000017 J	0.00021	<0.0053		<0.00011	<0.0053	0.0061	0.0028	<0.011	0.00063 J	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00018	0.0251	0.000026 J
	P93A-ROX-071315	7/13/2015	43.07 - 53.07	45.93	NE	<0.0052	0.00064 J	<0.0052	<0.01	0.000025 J	0.00022	<0.0052		<0.0001	<0.0052	0.0056	0.0032	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00018	0.128	0.000032 J
P-93B	P93B-ROX-110712	11/7/2012	74.60 - 76.60	45.05	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	0.00026	0.00045 B	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	0.13	<0.0001
	P93B-ROX-110712-DUP	11/7/2012		45.05	NE	<0.005	<0.005	<0.005	<0.01	<0.0001	<0.0001	<0.005		<0.0001	<0.005	0.0003	0.0005 B	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	<0.00005	0.114	<0.0001
	P93B-ROX-012313	1/23/2013		45.89	NE	0.00024 J J	0.003 J	<0.0053	<0.011	0.00013	0.00012	0.00058 J		0.00012	<0.0053	<0.00021	0.00012 J	<0.011	0.0014 J	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00016	0.176	0.00013
	P93B-ROX-041113	4/11/2013		46.32	NE	<0.0051	0.0013 J	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	0.122	<0.0001
	P93B-ROX-071813	7/18/2013		43.30	NE	<0.0056	0.0005 J	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000034 J	0.151	<0.00011
	P93B-ROX-101613	10/16/2013		44.43	NE	<0.005	<0.005	<0.005	<0.01	<0.0001	<0.0001	<0.005		<0.0001	<0.005	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	<0.00005	0.069	<0.0001
	P93B-ROX-101613-DUP	10/16/2013		44.43	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	0.082	<0.0001
	P93B-ROX-012814	1/28/2014		46.58	NE	<0.0055	0.00045 J	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.000022 U	0.074	<0.00011
	P93B-ROX-012814-DUP	1/28/2014		46.58	NE	<0.0051	0.00048 J	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000024 U	0.0927	<0.0001
	P93B-ROX-041714	4/17/2014		47.46	NE	<0.0051	<0.0024 U	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	0.0719	<0.0001
	P93B-ROX-041714-DUP	4/17/2014		47.46	NE	<0.0053	<0.00098 U	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	0.0861	<0.00011
	P93B-ROX-071714	7/17/2014		45.75	NE	<0.0052	<0.00046 U	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000023 U	<0.0052 UJ	<0.0001
	P93B-ROX-101514	10/15/2014		45.15	NE	<0.0056	0.00024 J	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.0022	<0.0022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	0.128	<0.00011
	P93B-ROX-012315	1/23/2015		47.24	NE	<0.0053	0.00025 J	<0.0053	<0.011	<0.00011	<0.000017 U	<0.0053		<0.00011	<0.0053	0.00002 J	<0.0021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	0.0979	<0.00011
	P93B-ROX-012315-DUP	1/23/2015		47.24	NE	<0.0053	0.00031 J	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.000023 J	0.000041 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000024 U	0.123	<0.00011
	P93B-ROX-021915	2/19/2015		47.24	NE																						
	P93B-ROX-041615	4/16/2015		48.42	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.000034 JB J	0.00008 JB J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	0.104 J	<0.00011
	P93B-ROX-041615-DUP	4/16/2015		48.42	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	0.00002 J	<0.0053		<0.00011	<0.0053	0.000028 JB J	0.000048 JB J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	0.08 J	<0.00011
	P93B-ROX-070915	7/9/2015	74.60 - 76.60	47.74	NE	<0.0051	<0.0051	<0.0051	<0.01	0.000035 J	0.000031 J	<0.0051		<0.0001	<0.0051	0.000041 J	0.000059 J	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.000054 J	0.101	0.000025 J
	P93B-ROX-070915-DUP	7/9/2015		47.74	NE	<0.0051	<0.0051	<0.0051	<0.01	0.000029 J	0.000095 J	<0.0051		<0.0001	<0.0051	0.000058 J	0.000077 J	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.00031 J	0.0909	<0.0001

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																				
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
P-93C	P93C-ROX-110812	11/8/2012	94.26 - 96.26	45.12	NE	<0.005	<0.005	<0.005	<0.01	<0.0001	<0.0001	<0.005		<0.0001	<0.005	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	<0.00005	<0.005	<0.0001
	P93C-ROX-012313	1/23/2013		45.78	NE	<0.0055 UJ	0.0025 J	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	P93C-ROX-041213	4/12/2013		46.21	NE	<0.005 UJ	<0.005	<0.005	<0.01	<0.0001	<0.0001	<0.005		<0.0001	<0.005	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.005	<0.005 UJ	<0.005	<0.01	<0.00005	<0.005	<0.0001
	P93C-ROX-071813	7/18/2013		43.31	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000026 J	0.0352	<0.00011
	P93C-ROX-080813	8/8/2013		43.31	NE																						
	P93C-ROX-101613	10/16/2013		44.31	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	0.005 J	<0.0001
	P93C-ROX-012414	1/24/2014		46.44	NE	<0.0051	0.00051 J	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	<0.0002	<0.0002	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	<0.000051	<0.0051	<0.0001
	P93C-ROX-041714	4/17/2014		47.34	NE	<0.0052	<0.00048 U	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0052 UJ	<0.0001
	P93C-ROX-071714	7/17/2014		45.61	NE	<0.0052	<0.00035 U	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000024 U	<0.0087 UJ	<0.0001
	P93C-ROX-101514	10/15/2014		44.99	NE	<0.0056	<0.0056	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.0022	<0.0022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000056	<0.0056	<0.00011
	P93C-ROX-011915	1/19/2015	92.47 - 97.47	46.77	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.000033 U	<0.000042 U	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000033 U	0.0309	<0.00011
	P93C-ROX-021915	2/19/2015		46.77	NE																						
	P93C-ROX-041615	4/16/2015		48.22	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.00006 JB J	0.000084 JB J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.000024 J	0.0215	<0.00011
	P93C-ROX-071315	7/13/2015	92.47 - 97.47	47.09	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.000095 JB J	0.00016 JB J	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.000054	<0.0054	<0.00011
P-93D	P93D-ROX-110812	11/8/2012	125.75 - 127.75	NM	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	<0.00011	<0.0055		<0.00011	<0.0055	<0.00022	<0.00022	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	<0.000055	<0.0055	<0.00011
	P93D-ROX-012213	1/22/2013		44.21	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.00027	0.00036	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.000042 J	<0.0053	<0.00011
	P93D-ROX-041113	4/11/2013		46.37	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000052	<0.0087 U	<0.0001
	P93D-ROX-071213	7/12/2013		43.51	NE	<0.0056 UJ	0.00045 J	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.00022	<0.000059 U	<0.011	<0.011	<0.011	<0.0056	<0.0056 UJ	<0.0056	<0.011	<0.000056	<0.0056 UJ	<0.00011
	P93D-ROX-101113	10/11/2013		44.24	NE	<0.005	<0.005	<0.005	<0.01	0.000087 J	<0.0001	<0.005		<0.0001	<0.005	<0.0002	<0.0002	<0.01 UJ	<0.01 UJ	<0.01	<0.005	<0.005	<0.005	<0.01 UJ	<0.00005	<0.005 UJ	0.000084 J
	P93D-ROX-013114	1/31/2014		46.62	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000024 U	<0.0053	<0.00011
	P93D-ROX-041414	4/14/2014		47.54	NE	<0.0053	0.00036 J	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	<0.00021	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.00003 U	<0.0053	<0.00011
	P93D-ROX-071714	7/17/2014		45.78	NE	<0.0052	<0.00025 U	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	<0.00021	<0.00021	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	<0.000022 U	<0.0052 UJ	<0.0001
	P93D-ROX-101514	10/15/2014		45.14	NE	<0.0054	0.00031 J	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	<0.0022	<0.0022	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.000019 J	0.0458	<0.00011
	P93D-ROX-110414	11/4/2014		45.14	NE																						
	P93D-ROX-012315	1/23/2015		42.28	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.0021	0.000019 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.000053	0.044	<0.00011
	P93D-ROX-021915	2/19/2015		42.28	NE																						
	P93D-ROX-042015	4/20/2015		48.52	NE	<0.0052	<0.0052	<0.0052	<0.01	0.000024 J	0.00002 J	<0.0052		<0.0001	<0.0052	0.00012 J	0.00016 J	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.000017 J	0.0395	0.000021 J
	P93D-ROX-070915	7/9/2015	125.75 - 127.75	47.96	NE	<0.0051	<0.0051	<0.0051	<0.01	0.000025 J	0.000019 J	<0.0051		<0.0001	<0.0051	0.000026 J	0.000038 J	<0.01	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.000043 J	0.0278	0.000026 J
ROST-3-PZ	ROST3PZ-ROX-110112	11/1/2012	40.00 - 50.00	40.82	NE	<0.0053	0.0017 J	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.00028	0.00031	<0.011	0.0019 J	<0.011	<0.0053	<0.0053 UJ	<0.0053	<0.011	<0.000053	<0.0053 UJ	<0.00011
ROST-3-MW	ROST3MW-ROX-012313	1/23/2013	37.81 - 47.81	41.50	NE	<0.005 UJ	<0.005	<0.005	<0.01	<0.0001	0.00031	<0.005		<0.0001	<0.005	0.0061	0.0087	<0.01	<0.01	<0.01	<0.005	<0.005	<0.005	<0.01	0.00068	<0.005	<0.0001
	ROST3MW-ROX-040513	4/5/2013				<0.0054	0.00044 J	<0.0054	<0.011	<0.00011	0.00017	<0.0054		<0.00011	<0.0054	0.0029	0.0039	<0.011	<0.011	<0.011	<0.0054	<0.0054 UJ	<0.0054	<0.011	0.00055	<0.0054 UJ	<0.00011
	ROST3MW-ROX-071113	7/11/2013		39.50	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.00043	<0.0054		<0.00011	<0.0054	0.0105 J	0.0142	<0.011 UJ	<0.011 UJ	<0.011 UJ	<0.0054	<0.0054	<0.0054	<0.011 UJ	0.00073	<0.0054 UJ	<0.000044 U
	ROST3-MW-ROX-100913	10/9/2013		40.16	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.00012	<0.0054		<0.00011	<0.0054	0.0024	0.0026	<0.011 UJ	<0.011 UJ	<0.011	<0.0054	<0.0054	<0.0054	<0.011 UJ	0.00014	<0.0054 UJ	0.000044 J
	ROST3MW-ROX-011714	1/17/2014		42.20	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.0011	0.00099	<0.011 UJ	<0.011 UJ	<0.011	<0.0053	<0.0053	<0.0053	<0.011 UJ	0.0002	<0.0053 UJ	<0.00011
	ROST3MW-ROX-041014	4/10/2014		42.80	NE	<0.006	<0.00076 U	<0.006	<0.012	<0.00012	<0.00012	<0.006		<0.00012	<0.006	0.00075	0.0008	<0.012	<0.012	<0.012	<0.006	<0.006	<0.006	<0.012	0.0001	<0.006	<0.00012
	ROST3MW-ROX-071414	7/14/2014		41.88	NE	<0.0054	<0.0004 U	<0.0054	<0.011	<0.00011	<0.00011	<0.0054		<0.00011	<0.0054	0.00092	0.00097	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	<0.00016 U	<0.0054	<0.00011
	ROST3MW-ROX-100914	10/9/2014		41.31	NE	<0.0056	<0.00026 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	0.00075 J	0.00057 J	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00014 B	<0.0056	<0.00011
	ROST3MW-ROX-011515	1/15/2015		41.83	NE	<0.0057	0.00045 J J	<0.0057	<0.011	0.000022 J J	0.000035 J J	<0.0057		<0.00011	<0.0057	0.001 J	0.00024 J	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	0.0001 J	<0.0057	0.000033 J J
	ROST3MW-ROX-041315	4/13/2015		43.43	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	0.00003 J	<0.0052		<0.0001	<0.0052	0.001 J	0.0005 J	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00011	<0.0052	0.000019 J
	ROST3MW-ROX-071315	7/13/2015	37.81 - 47.81	42.36	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	0.000048 J	<0.0053		<0.00011	<0.0053	0.0014 J	0.00084 JB	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00011 B	<0.0053	0.000018 J

SEE LAST PAGE OF TABLE FOR NOTES

TABLE 3
SUMMARY OF GROUNDWATER MONITORING WELL ANALYTICAL DETECTIONS AND EXCEEDANCES

						SVOCs																				
						Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	2,6-Dinitrotoluene	Fluoranthene	Fluorene	Hexachlorobenzene	Indene	Indeno(1,2,3-cd)pyrene	Isophorone (3,5,5-trimethyl-2-cyclohexene-1-one)	1-Methylnaphthalene	2-Methylnaphthalene	2-Methylphenol (o-Cresol)	3 & 4-Methylphenol (m & p-Cresol)	3-Nitroaniline	Nitrobenzene	N-Nitrosodimethylamine	N-Nitrosodiphenylamine	Pentachlorophenol	Phenanthrene	Phenol	Pyrene
			Screening Values (mg/L)				0.7 [1]	0.14 [2]	0.00031 [2]	0.28 [1]	0.28 [1]	0.00006 [2]		0.00043 [1]	1.4 [2]	0.49 [3]	0.028 [1]	0.35 [1]	0.35 [3]		0.014 [1]	0.0006 [3]	0.0032 [2]	0.001 [1]	0.21 [3]	0.1 [1]	0.21 [1]
Location	Sample ID	Sample Date	Screened Interval (ft btoc)	Depth to Water (ft btoc)	Product Thickness (ft)	Analytical Results (mg/L)																				
ROST-4-PZ(C)	ROST4PZC-ROX-102912	10/29/2012	34.95 - 44.95	40.75	NE	<0.0052	0.0018 J	<0.0052	<0.01	<0.0001	<0.0001	<0.0052		<0.0001	<0.0052	0.0004	0.00041	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.0002	<0.0052	<0.0001
	ROST4PZ(C)-ROX-011113	1/11/2013		41.42	NE	<0.0053 UJ	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	<0.00021	0.000064 J	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00012	<0.0053	<0.00011
	ROST4PZC-ROX-041013	4/10/2013		42.27	NE	<0.0055	<0.0055	<0.0055	<0.011	<0.00011	0.000069 J	<0.0055		<0.00011	<0.0055	0.00062	0.000078 J	<0.011	<0.011	<0.011	<0.0055	<0.0055	<0.0055	<0.011	0.00018	<0.0055 U	<0.00011
	ROST4PZC-ROX-071113	7/11/2013		40.18	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000099 J	0.00027	<0.0054		<0.00011	<0.0054	0.0027 J	0.0021	<0.011	<0.011	<0.011 UJ	<0.0054	<0.0054	<0.0054	<0.011	0.00052	0.00057 J J	<0.00009 U
	ROST4PZC-ROX-100913	10/9/2013		39.91	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	<0.00011	<0.0053		<0.00011	<0.0053	0.002	0.00095	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.0002	<0.0053	<0.00011
	ROST4PZC-ROX-011714	1/17/2014		41.92	NE	<0.0059	<0.0059	<0.0059	<0.012	<0.00012	<0.00012	<0.0059		<0.00012	<0.0059	0.00019 J	<0.00024	<0.01 UJ	<0.01 UJ	<0.012	<0.0059	<0.0059	<0.0059	<0.01 UJ	0.000077	<0.005 UJ	<0.00012
	ROST4PZC-ROX-041014	4/10/2014		42.05	NE	<0.0056	<0.00038 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	0.000065 J	<0.00022	<0.011	<0.011	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.000051 J	<0.0056	<0.00011
	ROST4C-ROX-071114	7/10/2014		42.22	NE	<0.0053	<0.00031 U	<0.0053	<0.011	<0.0001	<0.0001	<0.0053		<0.0001	<0.0053	0.00021	<0.0002	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	<0.00012 U	<0.0053	<0.0001
	ROST4PZC-ROX-100914	10/9/2014		41.30	NE	<0.0056	<0.00032 U	<0.0056	<0.011	<0.00011	<0.00011	<0.0056		<0.00011	<0.0056	<0.0022	<0.0022	<0.011	0.00071 J	<0.011	<0.0056	<0.0056	<0.0056	<0.011	<0.000088 U	0.00088 J	<0.00011
	ROST4PZC-ROX-011515	1/15/2015		41.65	NE	<0.0057	0.0003 J J	<0.0057	<0.011	<0.00011	<0.00011	<0.0057		<0.00011	<0.0057	0.000038 J	0.000018 J J	<0.011	<0.011	<0.011	<0.0057	<0.0057	<0.0057	<0.011	0.00004 J J	<0.0057	0.000022 J J
	ROST4PZC-ROX-041315	4/13/2015		43.00	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	<0.0001	<0.0051		<0.0001	<0.0051	0.0012 J	0.00038 JB	<0.01	0.0011 J	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.000075	<0.0051	0.000022 J
	ROST4PZ-ROX-071315	7/13/2015	34.93 - 44.93	41.86	NE	<0.0052	<0.0052	<0.0052	<0.01	<0.0001	0.00005 J	<0.0052		<0.0001	<0.0052	0.0095	0.0077	<0.01	<0.01	<0.01	<0.0052	<0.0052	<0.0052	<0.01	0.00011 B	<0.0052	0.000025 J
T-12	T12-ROX-110512	11/5/2012	46.46 - 72.46	43.91	NE	<0.005	<0.005	<0.005	<0.01	<0.0001	0.00031	<0.005		<0.0001	<0.005	0.0232	0.0354	0.00096 J	0.0015 J	<0.01	<0.005	<0.005	<0.005	<0.01	0.00083	<0.005 UJ	0.000048 J
	T12-ROX-011813	1/18/2013		44.50	NE	<0.0053 UJ	<0.0053	<0.0053	<0.011	<0.00011	0.00046	<0.0053		<0.00011	<0.0053	0.0241	0.0322	<0.011	<0.011	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.0011	0.0265	0.000067 J
	T12-ROX-041513	4/15/2013		44.99	NE	<0.0051	<0.0051	<0.0051	<0.01	<0.0001	0.00037	<0.0051		<0.0001	<0.0051	0.0289	0.0444	0.0047 J	0.0042 J	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.0011	0.0149	0.000063 J
	T12-ROX-071613	7/16/2013		42.33	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000044 J	0.00034	<0.0054		<0.00011	<0.0054	0.0236	0.0331	0.0029 J J	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.0011	0.0514 J	<0.00009 U
	T12-ROX-101513	10/15/2013		43.73	NE	<0.0054	<0.0054	<0.0054	<0.011	<0.00011	0.00029	<0.0054		<0.00011	<0.0054	0.0199	0.0319	0.0018 J	0.0032 J	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00077	0.0083	0.00009 J
	T12-ROX-012414	1/24/2014		45.26	NE	<0.0051	0.00044 J	<0.0051	<0.01	<0.0001	0.00035	<0.0051		<0.0001	<0.0051	0.0215	0.0326	0.0022 J	<0.01	<0.01	<0.0051	<0.0051	<0.0051	<0.01	0.001	0.0498	0.00006 J
	T12-ROX-041514	4/15/2014		46.72	NE	<0.0056	<0.00034 U	<0.0056	<0.011	<0.00011	0.0003	<0.0056		<0.00011	<0.0056	0.0189	0.0283	<0.011	<0.011	<0.011	<0.0056	<0.0056 UJ	<0.0056	<0.011	0.00078	0.0672 J	0.00005 J
	T12-ROX-070814	7/8/2014		45.13	NE	<0.0054	0.00038 J	<0.0054	<0.011	<0.00011	0.00022	<0.0054		<0.00011	<0.0054	0.015	0.0245	0.0092 J	0.0033 J	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00051	<0.0054	<0.00011
	T12-ROX-101714	10/17/2014		44.40	NE	<0.0056	0.00061 J	<0.0056	<0.011	<0.00011	0.00031	<0.0056		<0.00011	<0.0056	0.022	0.0369	0.003 J	0.0059 J	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00079	0.0154	<0.00011
	T12-ROX-011915	1/19/2015		45.27	NE	<0.0053	<0.0053	<0.0053	<0.011	<0.00011	0.00032	<0.0053	0.0069 JN	<0.00011	<0.0053	0.021	0.0332	0.0055 J	0.0016 J	<0.011	<0.0053	<0.0053	<0.0053	<0.011	0.00082	0.0155	0.000055 J
	T12-ROX-041515	4/15/2015		46.73	NE	<0.0056	0.00033 J	<0.0056	<0.011	0.000024 J	0.00032	<0.0056		<0.00011	<0.0056	0.021	0.0335 J	0.0021 J	0.0042 J	<0.011	<0.0056	<0.0056	<0.0056	<0.011	0.00086	0.0099	0.000052 J J
	T12-ROX-071015	7/10/2015	46.46 - 72.46	46.09	NE	<0.0054	<0.0054	<0.0054	<0.011	0.000027 J	0.00029	<0.0054		<0.00011	<0.0054	0.0178	0.0301	<0.011	<0.011	<0.011	<0.0054	<0.0054	<0.0054	<0.011	0.00083	0.0221	0.000053 J

Notes:

1 Denotes screening critieria source from 35 I.A.C. 620, Subpart D.

2 Denotes screening critieria source from 35 I.A.C. 742 (TACO), Appendix B, Table E.

3 Denotes screening criteria source from IL EPA Toxicity Assessment Unit (Chemicals not in TACO, Tier 1 Tables).

4 Beginning in 4Q12, naphthalene was analyzed via 8260 VOC, and prior historical results were reported by PAH analysis.

5 Beginning in 4Q13, professional judgment criteria used to review common laboratory contaminants was reevaluated. Acetone, 2-butanone, and methylene chloride are only U-qualified when present in the method blank.

6 The laboratory has been requested to perform a library search in all samples for butane, hexane, isopentane, 1,2,3-trimethylbenzene, and indene, which are reported as Tentatively Identified Compounds (TICs), when identified.

	Indicates a historical exceedance of screening criteria.
	Indicates a current exceedance of screening criteria.
NA	Indicates current quarter analyte result was not analyzed.
	Empty cell without a value indicates previous quarter analyte result was rejected, the analyte was not analyzed, or the TIC was not identified.

LABORATORY QUALIFIERS
B = Target analyte or common lab contaminant was identified in the method blank indicating possible field or lab contamination.
D = The result is from a diluted sample.
J = The analyte was detected below the reporting limit. Result is estimated.
E = The value exceeds calibration range.
JN = Estimated value for tentatively identified compound (library search).

URS QUALIFIERS
J = The result is estimated.
UJ = Estimated non-detect.
U = Result is non-detect.

Figures

The following EVS Descriptions and Assumptions apply to **Figure 6.** C Tech Development Corporation's Environmental Visualization System PRO, Version 9.89 (EVS-PRO) was used to model the estimated distribution of benzene in the groundwater.

EVS Descriptions and Assumptions:

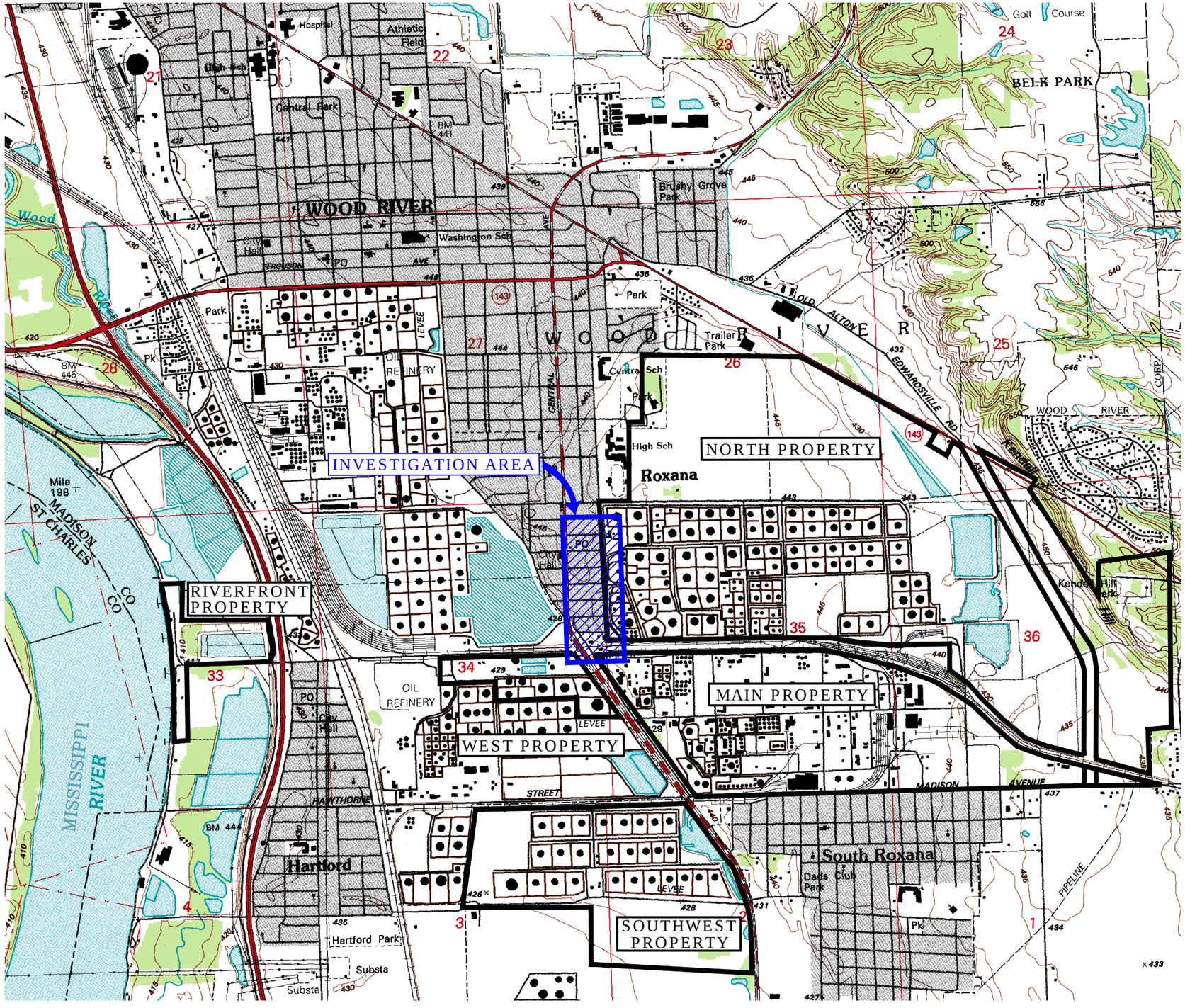
Plan View Model Output – The data input for the plan view model was not limited by depth and was modeled in two dimensions (2D). Regardless of sample depth, benzene concentrations were modeled on a flat horizontal plane.

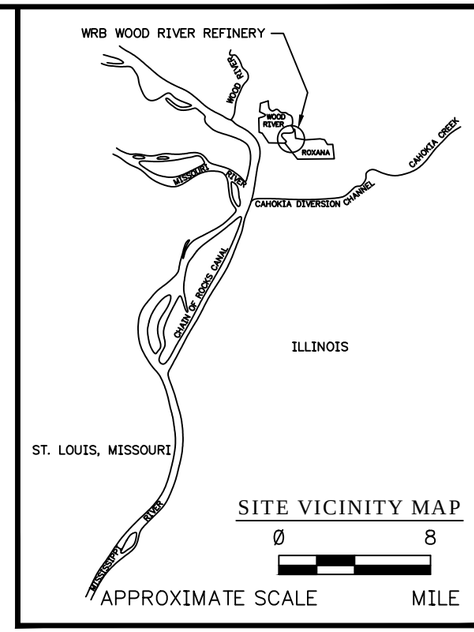
Inward Kriging / Boundary Cut-off – This method of Kriging limits the horizontal extent of data modeling to the extent of the data on the x/y plane in a convex hull.

More simplified, if each soil boring location were represented by a tack pushed into the model's surface and a rubber band stretched around them, the model would be represented by the space inside the rubber band.

Duplicate Samples – Analytical concentrations from duplicate samples collected at the same location and depth were averaged.

Detection Limits – In cases where the lab reported a non-detect, half the value of the lab reporting limit was used in the model. This conservative method is based on the assumption that the soil is likely not free of benzene but the quantity contained is lower than detectable at the analyzed dilution.





LEGEND

WOOD RIVER REFINERY PROPERTY BOUNDARY

INVESTIGATION AREA

SOURCE: ELECTRONIC USGS DIGITAL RASTER GRAPHIC 7.5 MINUTE TOPOGRAPHIC MAP OF WOOD RIVER, IL–MO REVISED 1994.

CONTOUR INTERVAL = 5 FT

Ø 2ØØØ

APPROXIMATE SCALE FEET

N

SHELL OIL PRODUCTS US INTERIM GROUNDWATER MONITORING PROGRAM ROXANA, ILLINOIS		PROJECT NO. 6Ø4ØØ249
AECOM		
DRN. BY:djd October 2Ø15 DSGN. BY:djd CHKD. BY:b3	3Q15 Investigation Area Location Map	FIG. NO. 1

File: \\URSSTLOUIS\STLOUIS\PROJECTS\ENVIRONMENTAL\SHELL\215437Ø ROX 2015\6.0_DELIVERABLES\GROUNDWATER_REPORTING\3Q15\DRAFT REPORT\FIGURES\FIG 1_INVESTIGATION AREA LOCATION MAP.DWG Last edited: 10/13/15 ● 10:41 a.m. ● WCC-ST.LOUIS

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LEGEND

- GROUNDWATER MONITORING WELL LOCATION SAMPLED
- GROUNDWATER MONITORING WELL LOCATION NOT SAMPLED
- GROUNDWATER PIEZOMETER LOCATION NOT SAMPLED

NOTES:
1. * INDICATES PERCHED GROUNDWATER MONITORING WELLS.

FIRST ST
SECOND ST
THIRD ST
FOURTH ST
FIFTH ST
SIXTH ST
SEVENTH ST
EIGHTH ST
HIGHWAY 111 (S. CENTRAL AVE)
CHAFFER ST
RAND AVENUE

VILLAGE OF ROXANA
WOOD RIVER REFINERY
BP
WEST PROPERTY
MAIN PROPERTY
1986 APPROXIMATE BENZENE RELEASE SITE

PZ-1(101)
PZ-1(85)
MW-9
MW-10
MW-28
MW-27
ROST-4-PZ(A)
ROST-4-PZ(B)
ROST-4-PZ(C)
ROST-4-PZ(D)
ROST-4-PZ(E)
ROST-4-PZ(F)
ROST-4-PZ(G)
ROST-3-MW
MW-11
* ROST-5-PZ
MW-17
MW-24
MW-22
* ROST-7-PZ
MW-18
MW-19
* ROST-21-PZ
MW-16
PZ-2(84)
PZ-2(70.5)
MW-12
* ROST-10-PZ
MW-20
MW-2
MW-1
MW-26
MW-21
MW-4
MW-3
MW-25
MW-23
MW-5
MW-7
MW-8
MW-13
MW-6A
MW-6B
MW-6C
MW-6D
MW-14
P-114
P-54
T-1
P-55R
ROST-4-PZ
P-60-11
P-60-S
P-60-12
*P-60-12S
P-60
P-68
P-60-13
*P-60-13S
T-12
P-69
A-27
P-70
P-74
P-59
P-61
GP-9-PZ
P-56
P-57
P-93A
P-93B
P-93C
P-93D
P-58
P-66
P-75
P-73
T-6
A-28
T-24
A-33

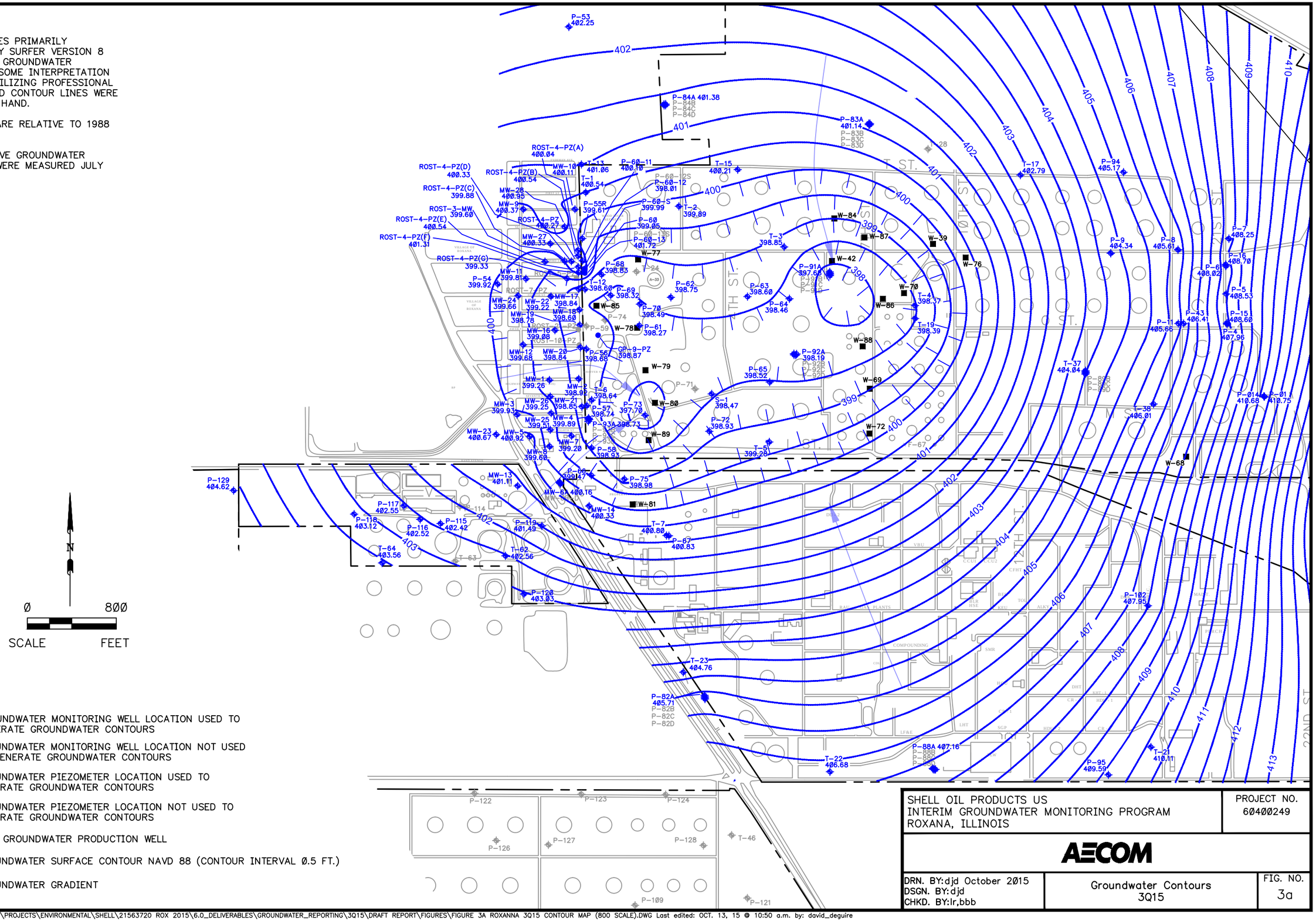
0 200
SCALE FEET
N

SHELL OIL PRODUCTS US INTERIM GROUNDWATER MONITORING PROGRAM ROXANA, ILLINOIS		PROJECT NO. 60400249
AECOM		
DRN. BY:djd October 2015 DSGN. BY:lr CHKD. BY:b3	3Q15 Groundwater Monitoring Well Sampling Locations	FIG. NO. 2

NOTES:
1. CONTOUR LINES PRIMARILY GENERATED BY SURFER VERSION 8 MODELING OF GROUNDWATER ELEVATIONS. SOME INTERPRETATION WAS DONE UTILIZING PROFESSIONAL JUDGMENT AND CONTOUR LINES WERE MODIFIED BY HAND.

2. ELEVATIONS ARE RELATIVE TO 1988 NGS DATUM.

3. COMPREHENSIVE GROUNDWATER ELEVATIONS WERE MEASURED JULY 6–9, 2Ø15.



SHELL OIL PRODUCTS US INTERIM GROUNDWATER MONITORING PROGRAM ROXANA, ILLINOIS	PROJECT NO. 6Ø4ØØ249
AECOM	
DRN. BY:djd October 2Ø15 DSGN. BY:djd CHKD. BY:lr,bbb	Groundwater Contours 3Q15 — FIG. NO. 3a

File: \\URSSTLOUIS\STLOUIS\PROJECTS\ENVIRONMENTAL\SHELL\21563720 ROX 2015\6.0_DELIVERABLES\GROUNDWATER_REPORTING\3Q15\DRAFT REPORT\FIGURES\FIGURE 3A ROXANNA 3Q15 CONTOUR MAP (800 SCALE).DWG Last edited: OCT. 13, 15 @ 10:50 a.m. by: david_deguire

File: \\URSSTLOUIS\STLOUIS\PROJECTS\ENVIRONMENTAL\SHELL\21563720 ROX 2015\6.0_DELIVERABLES\GROUNDWATER_REPORTING\3Q15\DRAFT REPORT\FIGURES\FIGURE 3B ROXANNA 3Q15 CONTOUR MAP.DWG Last edited: OCT. 13, 15 @ 10:55 a.m. by: david_deguire

LEGEND

- GROUNDWATER MONITORING WELL LOCATION USED TO GENERATE GROUNDWATER CONTOURS
- GROUNDWATER MONITORING WELL LOCATION NOT USED TO GENERATE GROUNDWATER CONTOURS
- GROUNDWATER PIEZOMETER LOCATION USED TO GENERATE GROUNDWATER CONTOURS
- GROUNDWATER PIEZOMETER LOCATION NOT USED TO GENERATE GROUNDWATER CONTOURS
- WRR GROUNDWATER PRODUCTION WELL
- 402 GROUNDWATER SURFACE CONTOUR NAVD 88 (CONTOUR INTERVAL Ø.5 FT)
- GROUNDWATER GRADIENT

NOTES:
1. CONTOUR LINES PRIMARILY GENERATED BY SURFER VERSION 8 MODELING OF GROUNDWATER ELEVATIONS. SOME INTERPRETATION WAS DONE UTILIZING PROFESSIONAL JUDGMENT AND CONTOUR LINES WERE MODIFIED BY HAND.
2. ELEVATIONS ARE RELATIVE TO 1988 NGS DATUM.
3. COMPREHENSIVE GROUNDWATER ELEVATIONS WERE MEASURED JULY 6–9, 2Ø15.

FIRST ST
SECOND ST
THIRD ST
FOURTH ST
FIFTH ST
SIXTH ST
SEVENTH ST
EIGHTH ST
CHAFFER ST
HIGHWAY 111 (S. CENTRAL AVE)
RAND AVENUE
NORTH PROPERTY
WOOD RIVER REFINERY
MAIN PROPERTY
WEST PROPERTY
VILLAGE OF ROXANA
PUBLIC WORKS YARD
BP
1986 APPROXIMATE BENZENE RELEASE SITE

T-1 400.54
PZ-1(101) PZ-1(85)
MW-10 400.11
MW-9 400.37
MW-28 400.95
P-55R 399.61
ROST-4-PZ(A) 400.04
ROST-4-PZ 400.27
MW-27 400.33
ROST-4-PZ(B) 400.54
P-60-11 400.10
ROST-4-PZ(C) 399.88
ROST-4-PZ(D) 400.33
P-60 399.05
ROST-3-MW 399.60
P-60-S 399.99
ROST-4-PZ(E) 400.54
P-60-12 398.01
P-60-12S
P-60-13 401.72
P-60-13S
ROST-4-PZ(F) 401.31
W-77
T-24
P-54 399.92
MW-11 399.81
ROST-4-PZ(G) 399.33
ROST-5-PZ
P-68 398.83
MW-17 398.84
T-12 398.60
P-69 398.32
MW-22 399.22
ROST-7-PZ
MW-24 399.66
W-85
A-27
P-70 398.49
MW-18 398.60
P-74
MW-19 398.78
P-59
P-61 398.27
W-78
ROST-21-PZ
MW-16 399.08
GP-9-PZ 398.87
PZ-2(84) PZ-2(70.5)
MW-12 399.68
ROST-10-PZ
P-56 398.68
MW-20 398.84
W-79
MW-1 399.26
MW-2 398.92
T-6 398.64
MW-26 399.25
MW-21 398.85
P-57 398.74
MW-4 399.89
MW-3 399.93
P-93A 398.73
P-93B
P-93C
P-93D
P-73 397.70
MW-25 399.51
W-89
MW-23 400.67
MW-5 400.92
MW-8 399.60
MW-7 399.20
P-58 398.93
P-66 399.47
P-75 398.98
400.16 MW-6A
MW-6B
MW-6C
MW-6D
MW-13 401.11
W-81
MW-14 400.33
P-114
400
399
398

Ø 200 SCALE FEET

N

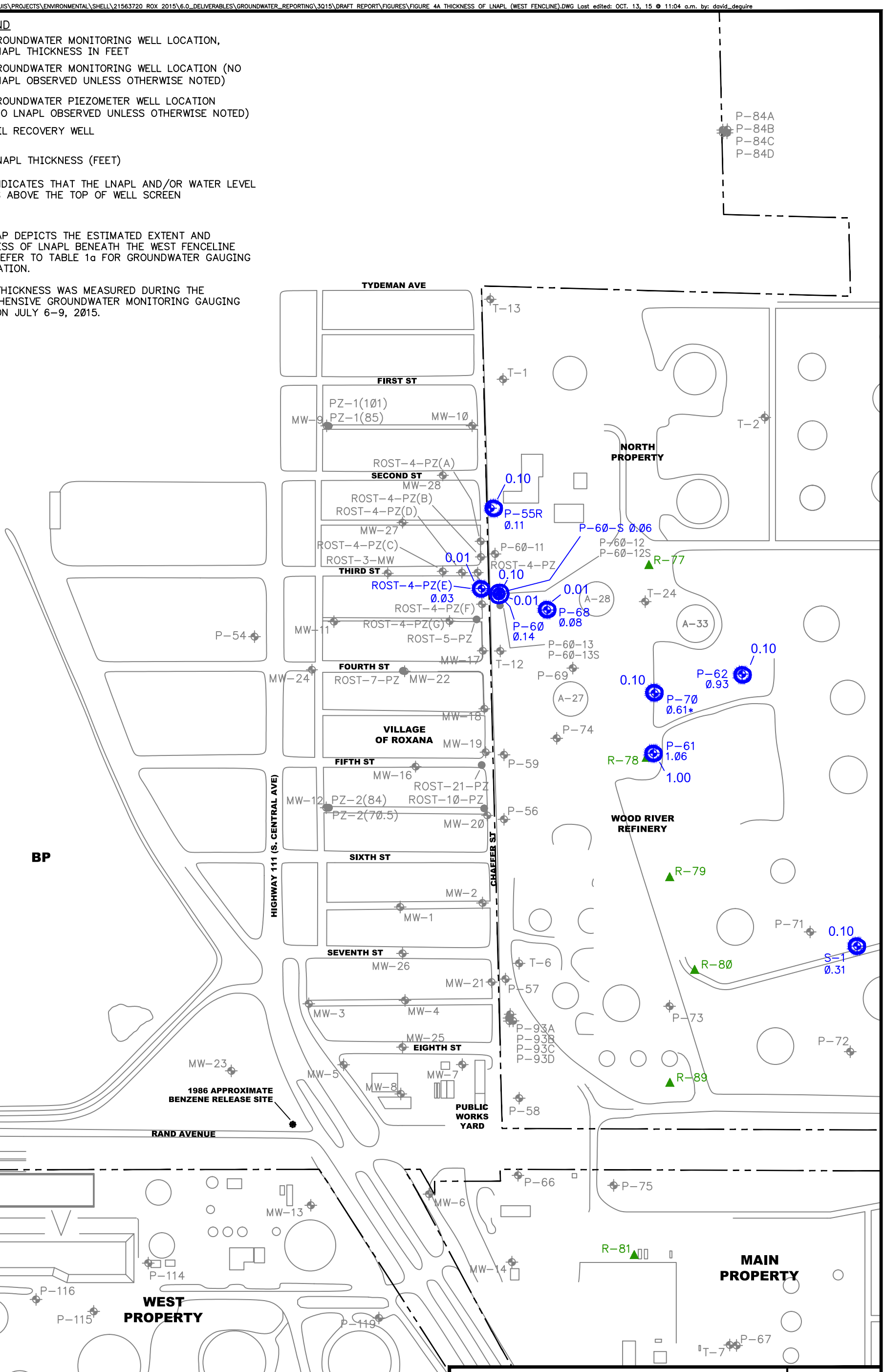
SHELL OIL PRODUCTS US INTERIM GROUNDWATER MONITORING PROGRAM ROXANA, ILLINOIS		PROJECT NO. 60400249
AECOM		
DRN. BY:djd October 2Ø15 DSGN. BY:lr CHKD. BY:bbb	Groundwater Contours 3Q15– West Fenceline	FIG. NO. 3b

File: \\URSSTLOUIS\STLOUIS\PROJECTS\ENVIRONMENTAL\SHELL\21563720 ROX 2015\6.0_DELIVERABLES\GROUNDWATER_REPORTING\3Q15\DRAFT REPORT\FIGURES\FIGURE 4A THICKNESS OF LNAPL (WEST FENCLINE).DWG Last edited: OCT. 13, 15 @ 11:04 a.m. by: david_deguire

LEGEND

- GROUNDWATER MONITORING WELL LOCATION, LNAPL THICKNESS IN FEET
- GROUNDWATER MONITORING WELL LOCATION (NO LNAPL OBSERVED UNLESS OTHERWISE NOTED)
- GROUNDWATER PIEZOMETER WELL LOCATION (NO LNAPL OBSERVED UNLESS OTHERWISE NOTED)
- OIL RECOVERY WELL
- LNAPL THICKNESS (FEET)
- * INDICATES THAT THE LNAPL AND/OR WATER LEVEL IS ABOVE THE TOP OF WELL SCREEN

NOTE:
1. THIS MAP DEPICTS THE ESTIMATED EXTENT AND THICKNESS OF LNAPL BENEATH THE WEST FENCELINE AREA. REFER TO TABLE 1a FOR GROUNDWATER GAUGING INFORMATION.
2. LNAPL THICKNESS WAS MEASURED DURING THE COMPREHENSIVE GROUNDWATER MONITORING GAUGING EVENT ON JULY 6–9, 2015.



SHELL OIL PRODUCTS US INTERIM GROUNDWATER MONITORING PROGRAM ROXANA, ILLINOIS	PROJECT NO. 6Ø4ØØ249
AECOM	
DRN. BY: djd October 2Ø15 DSGN. BY: lr CHKD. BY: bbb	3Q15 Thickness of LNAPL – West Fenceline
	FIG. NO. 4a

LEGEND

- GROUNDWATER MONITORING WELL LOCATION GAUGED, LNAPL THICKNESS IN FEET
- GROUNDWATER MONITORING WELL LOCATION (NO LNAPL OBSERVED UNLESS OTHERWISE NOTED)
- GROUNDWATER PIEZOMETER WELL LOCATION (NO LNAPL OBSERVED UNLESS OTHERWISE NOTED)
- OIL RECOVERY WELL
- LNAPL THICKNESS (FEET)

* INDICATES THAT THE LNAPL AND/OR WATER LEVEL IS ABOVE THE TOP OF WELL SCREEN

NOTES:
1. THIS MAP DEPICTS THE ESTIMATED EXTENT AND THICKNESS OF LNAPL BENEATH THE WRR AREA. REFER TO TABLE 1a FOR GROUNDWATER GAUGING INFORMATION.
2. LNAPL THICKNESS WAS MEASURED DURING A COMPREHENSIVE GROUNDWATER MONITORING GAUGING EVENT ON JULY 6–9, 2015.

NORTH PROPERTY

BP PROPERTY

VILLAGE OF ROXANA

SHELL OIL COMPANY PROPERTY

WEST PROPERTY

MAIN PROPERTY

VILLAGE OF HARTFORD

VALERO PROPERTY

ILLINOIS TERMINAL RAILROAD

RAND AVE.

T ST.

R ST.

O ST.

M ST.

10TH ST.

12TH ST.

21ST ST.

22ND ST.

SCALE 0 800 FEET

N

SHELL OIL PRODUCTS US INTERIM GROUNDWATER MONITORING PROGRAM ROXANA, ILLINOIS		PROJECT NO. 60400249
AECOM		
DRN. BY: djd October 2015 DSGN. BY: lr CHKD. BY: bbb	3Q15 Thickness of LNAPL	FIG. NO. 4b

File: P:\PROJECTS\ENVIRONMENTAL\SHELL\60249720 ROX 2015\6.0 DELIVERABLES\GROUNDWATER REPORTING\2015\DRAFT REPORT\FIGURES\FIGURE 4b THICKNESS OF LNAPL (REFINERY).DWG Last edited: OCT. 13, 15 @ 2:02 p.m. by: david.deguire

File: \\URSSTLOUIS\STLOUIS\PROJECTS\ENVIRONMENTAL\SHELL\21563720 ROX 2015\6.0 DELIVERABLES\GROUNDWATER REPORTING\3Q15\DRAFT REPORT\FIGURES\FIGURE 5 3Q15 GROUNDWATER ANALYTICAL RESULTS SUMMARY.DWG Last edited: OCT. 13, 15 @ 11:07 a.m. by: david deguire

LEGEND

- GROUNDWATER MONITORING WELL SAMPLING LOCATION
- GROUNDWATER MONITORING WELL LOCATION NOT SAMPLED
- GROUNDWATER PIEZOMETER LOCATION NOT SAMPLED

NOTES:

1. PER DIRECTION FROM IEPA, ANALYTICAL RESULTS ARE SCREENED AGAINST CRITERIA OUTLINED IN THE WRR RCRA PART B PERMIT.
2. GROUNDWATER CLASS I SCREENING CRITERIA.

Analyte	Screening Criteria (mg/L)
Benzene	0.005
Carbon Disulfide	0.7
Ethylbenzene	0.7
Naphthalene	0.14
Tetrachloroethene	0.005
Toluene	1.0
1,2,3-Trichlorobenzene	0.0056
Trichloroethene	0.005
1,3,5-Trimethylbenzene	0.07
Xylenes (Total)	10
bis(2-Chloroethyl)ether	0.01
2-Methylnaphthalene	0.028
Phenol	0.1

3. J = THE TARGET ANALYTE DETECTED BELOW THE REPORTING LIMIT AND THE RESULT IS ESTIMATED.

   U = RESULT IS NON-DETECT
4. MULTIPLE RESULTS (e.g., 1300/1370) INDICATE DUPLICATE SAMPLES OR CONFIRMATION SAMPLES.
5. WELLS IDENTIFIED IN BLUE WITH NO DATA BOX INDICATE THE RESULTS DID NOT EXCEED SCREENING CRITERIA.
6. WELLS P-55R AND P-68 WERE NOT SAMPLED DURING 3Q15 DUE TO THE PRESENCE OF LNAPL.

Sample Location	MW-28
Sampled 7/15/15	Result (mg/L)
Benzene	0.0668

Sample Location	ROST-4-PZ(C)
Sampled 7/13/15	Result (mg/L)
Benzene	0.0683

Sample Location	T-12
Sampled 7/10/15	Result (mg/L)
Benzene	2.3
2-Methylnaphthalene	0.0301

Sample Location	MW-22
Sampled 7/15/15	Result (mg/L)
Benzene	2.92
Ethylbenzene	3.21
Naphthalene	0.219
Toluene	5.05
1,3,5-Trimethylbenzene	0.296
Xylenes (total)	10.2
2-Methylnaphthalene	0.0374

Sample Location	P-59
Sampled 7/13/15	Result (mg/L)
Benzene	3.08
Naphthalene	0.162
1,2,3-Trichlorobenzene	0.0283 J

Sample Location	P-56
Sampled 7/10/15	Result (mg/L)
Benzene	0.0683

Sample Location	MW-2
Sampled 7/13/15	Result (mg/L)
Benzene	0.0204
Ethylbenzene	0.984
1,3,5-Trimethylbenzene	0.109
2-Methylnaphthalene	0.0283

Sample Location	P-57
Sampled 7/13/15	Result (mg/L)
Benzene	138
Carbon Disulfide	0.852 J
Trichloroethene	0.44 J
2-Methylnaphthalene	0.0464
Phenol	0.189

Sample Location	MW-4
Sampled 7/14/15	Result (mg/L)
Benzene	0.0630

Sample Location	MW-25
Sampled 7/15/15	Result (mg/L)
Benzene	71.9
Tetrachloroethene	0.0577 J
Phenol	0.112

Sample Location	P-93A	P-93B	P-93C	P-93D
Sampled 7/9/15, 7/13/15	Result (mg/L)	Result (mg/L)	Result (mg/L)	Result (mg/L)
Benzene	315	497 J / 371 J	0.0365	21.2
Naphthalene		<25 / 7.01 J		
bis(2-Chloroethyl)ether		0.0153 / 0.0142		
Phenol	0.128	0.101 / 0.0909		

Sample Location	MW-7
Sampled 7/15/15	Result (mg/L)
Benzene	1300 / 1370
Phenol	0.104 / 0.117

Sample Location	P-58
Sampled 7/14/15	Result (mg/L)
Benzene	266
2-Methylnaphthalene	0.055
Phenol	0.153

Sample Location	MW-8
Sampled 7/15/15	Result (mg/L)
Benzene	879
bis(2-Chloroethyl)ether	0.0171
Phenol	0.135

Sample Location	P-66
Sampled 7/8/15	Result (mg/L)
Benzene	0.0404 / 0.0424

MW-9, MW-10, MW-28, MW-27, MW-11, MW-24, MW-22, MW-17, MW-18, MW-19, MW-16, MW-12, MW-20, MW-1, MW-2, MW-26, MW-21, MW-4, MW-3, MW-25, MW-5, MW-7, MW-8, MW-23, MW-13, MW-6A, MW-6B, MW-6C, MW-6D, MW-14

ROST-4-PZ(A), ROST-4-PZ(B), ROST-4-PZ(C), ROST-4-PZ, ROST-3-MW, ROST-4-PZ(D), ROST-4-PZ(E), ROST-4-PZ(F), ROST-4-PZ(G), ROST-5-PZ, ROST-7-PZ, ROST-21-PZ, ROST-10-PZ

P-55R, P-60-S, P-60-12, P-60-12S, P-60, P-68, P-60-13, P-60-13S, P-54, T-12, P-69, P-70, P-74, P-61, P-59, P-56, P-57, P-93A, P-93B, P-93C, P-93D, P-73, P-58, P-66, P-75, P-114, T-6, T-24, A-28, A-33, A-27

SECOND ST, THIRD ST, FOURTH ST, FIFTH ST, SIXTH ST, SEVENTH ST, EIGHTH ST, RAND AVENUE

HIGHWAY 111 (S. CENTRAL AVE), CHAFFEE ST

NORTH PROPERTY, WOOD RIVER REFINERY, VILLAGE OF ROXANA, BP, WEST PROPERTY, MAIN PROPERTY

1986 APPROXIMATE BENZENE RELEASE SITE

SCALE 0 200 FEET

SHELL OIL PRODUCTS US
INTERIM GROUNDWATER MONITORING PROGRAM
ROXANA, ILLINOIS

PROJECT NO. 60400249

AECOM

DRN. BY: djd October 2015
DSGN. BY: lr
CHKD. BY: bbb

3Q15 Groundwater Monitoring Well Analytical Exceedances

FIG. NO. 5

File: \\URSSTLOUIS\STLOUIS\PROJECTS\ENVIRONMENTAL\SHELL\21563720 ROX 2015\6.0_DELIVERABLES\GROUNDWATER_REPORTING\3Q15\DRAFT REPORT\FIGURES\FIGURE 6 DISSOLVED PHASE BENZENE CONCENTRATIONS IN GROUNDWATER.DWG Last edited: OCT. 13, 15 @ 11:10 a.m. by: david_deguire

LEGEND

- GROUNDWATER MONITORING WELL SAMPLING LOCATION
- GROUNDWATER MONITORING WELL LOCATION NOT SAMPLED
- GROUNDWATER MONITORING WELL, LNAPL THICKNESS IN FEET
- GROUNDWATER PIEZOMETER LOCATION NOT SAMPLED
- LNAPL THICKNESS (FEET)
- * INDICATES THAT THE LNAPL AND/OR WATER LEVEL IS ABOVE THE TOP OF WELL SCREEN
- EXTENT OF EVS MODEL DATA SET
- 50.0 GROUNDWATER CONCENTRATION BENZENE (mg/L)

LNAPL THICKNESS WAS MEASURED DURING THE COMPREHENSIVE GROUNDWATER MONITORING GAUGING EVENT ON JULY 6–9, 2015. REFER TO TABLE 1a FOR GROUNDWATER GAUGING INFORMATION.

NOTES:

1. IMAGES GENERATED UTILIZING CTECH ENVIRONMENTAL VISUALIZATION SYSTEM MODELING SOFTWARE. CONCENTRATIONS BETWEEN KNOWN DATA POINTS (E.G. GROUNDWATER MONITORING WELLS) ARE INTERPOLATIONS AND EXTRAPOLATIONS OF THE MEASURED DATA. SOME INTERPRETATION WAS COMPLETED UTILIZING PROFESSIONAL JUDGEMENT AND CONTOUR LINES WERE MODIFIED BY HAND.
2. ALL RESULTS SHOWN IN mg/L.
3. ANALYTICAL REPORTING LIMITS ARE SHOWN FOR SAMPLES WITH NON–DETECT RESULTS (e.g., <Ø.ØØØ5 mg/L).
4. J = THE TARGET ANALYTE WAS DETECTED BELOW THE REPORTING LIMIT AND THE RESULT IS ESTIMATED.
5. NON–DETECT VALUES ARE MODELED AT HALF THE REPORTING LIMIT.
6. MULTIPLE RESULTS (e.g. 13ØØ/137Ø) INDICATE DUPLICATE SAMPLES OR CONFIRMATION SAMPLES.
7. CONTOUR LINES IN AREA OF P–55R ADJUSTED BASED ON AVAILABLE 3Q15 AND HISTORICAL ANALYTICAL DATA FROM WELLS IN THE AREA.

SECOND ST
THIRD ST
FOURTH ST
FIFTH ST
SIXTH ST
SEVENTH ST
EIGHTH ST
RAND AVENUE
HIGHWAY 111 (S. CENTRAL AVE)
CHAFFER ST
VILLAGE OF ROXANA
BP
NORTH PROPERTY
WOOD RIVER REFINERY
MAIN PROPERTY
WEST PROPERTY
PUBLIC WORKS YARD
1986 APPROXIMATE BENZENE RELEASE SITE

PZ–1(1Ø1) PZ–1(85) MW–9 <Ø.ØØØ5
MW–1Ø <Ø.ØØØ5
MW–28 Ø.Ø668
MW–27 <Ø.ØØØ5
ROST–4–PZ(C) Ø.Ø683
ROST–4–PZ(A)
ROST–4–PZ(B)
P–6Ø–11
ROST–3–MW <Ø.ØØØ5
ROST–4–PZ
ROST–4–PZ(D)
Ø.Ø3 ROST–4–PZ(E)
ROST–4–PZ(F)
P–55R Ø.11
0.10
P–6Ø–S Ø.Ø6
P–6Ø Ø.14
0.01
0.01
P–68 Ø.Ø8
A–28
T–24
MW–11 <Ø.ØØØ5
ROST–4–PZ(G)
ROST–5–PZ
P–54 <Ø.ØØØ5
MW–17
T–12 2.3
P–69
MW–24 <Ø.ØØØ5
ROST–7–PZ
MW–22 2.92
MW–18
A–27
0.10
P–7Ø Ø.61*
0.5
0.05
0.005
P–59 3.Ø8
MW–19
P–74 <Ø.ØØØ5
1.00
P–61 1.Ø6
MW–16 <Ø.ØØØ5/<Ø.ØØØ5
ROST–21–PZ
PZ–2(84) PZ–2(7Ø.5)
MW–12 <Ø.ØØØ5
ROST–1Ø–PZ
MW–2Ø
P–56 Ø.Ø683
MW–1 <Ø.ØØØ5
MW–2 Ø.Ø2Ø4
MW–26 <Ø.ØØØ5
T–6
MW–21
P–57 138
MW–3 <Ø.ØØØ5
MW–4 Ø.Ø63
P–93A 315
P–93B 497J/371J
P–93C Ø.Ø365
P–93D 21.2
500.0
MW–25 71.9
MW–7 13ØØ/137Ø
MW–5 <Ø.ØØØ5
MW–8 879
P–58 266
MW–23 <Ø.ØØØ5
50.0
5.0
0.5
0.05
0.005
P–66 Ø.Ø4Ø4/Ø.Ø424
P–75
MW–13 <Ø.ØØØ5
MW–6A <Ø.ØØØ5
MW–6B <Ø.ØØØ5
MW–6C <Ø.ØØØ5
MW–6D <Ø.ØØØ5
P–114 <Ø.ØØØ5
MW–14 <Ø.ØØØ5
P–116
P–115

Ø 2ØØ
SCALE FEET
N

SHELL OIL PRODUCTS US
INTERIM GROUNDWATER MONITORING PROGRAM
ROXANA, ILLINOIS

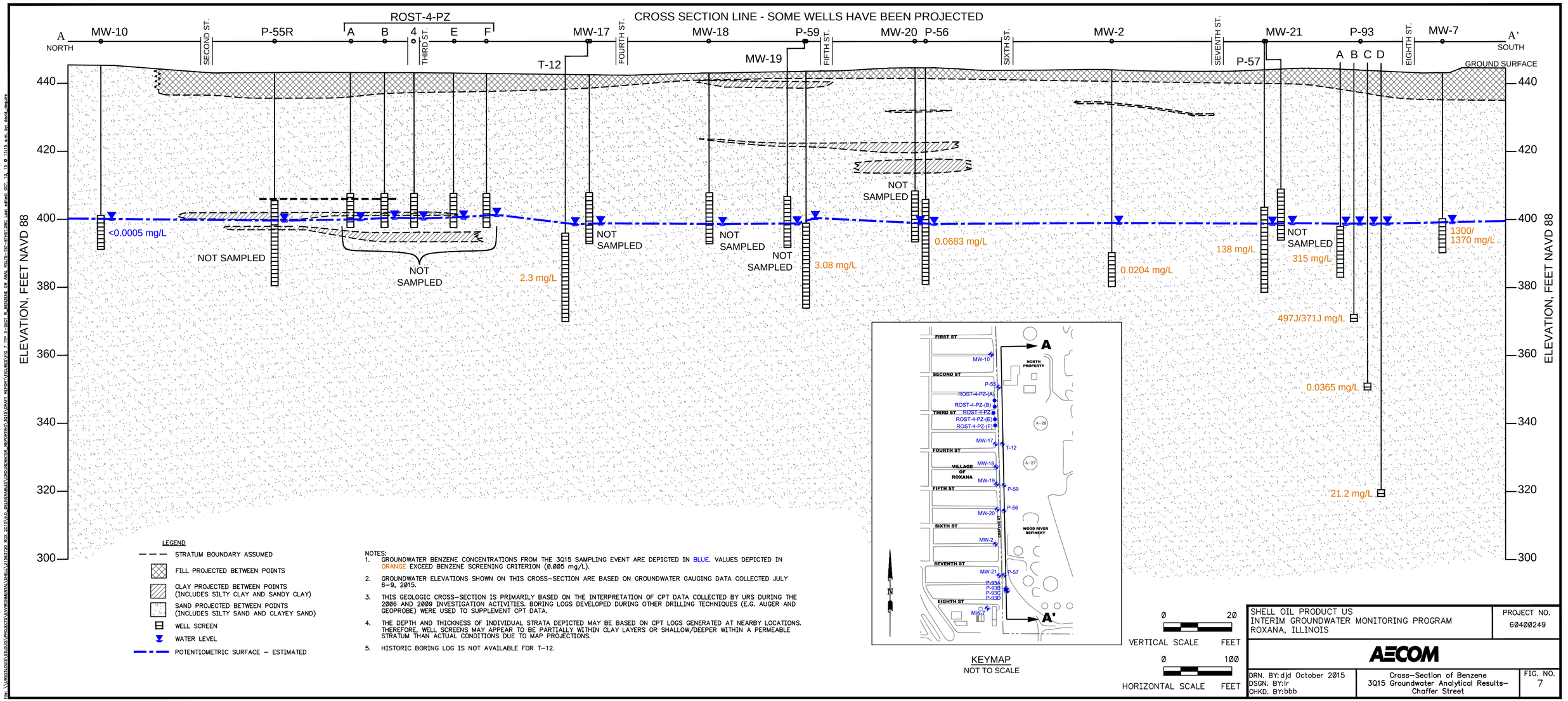
PROJECT NO. 6Ø4ØØ249

AECOM

DRN. BY: djd October 2Ø15
DSGN. BY:nm/lr
CHKD. BY:bbb

3Q15 Dissolved Phase Benzene Concentrations in Groundwater

FIG. NO. 6



NOTES:

1. GROUNDWATER BENZENE CONCENTRATIONS FROM THE 3Q15 SAMPLING EVENT ARE DEPICTED IN BLUE. VALUES DEPICTED IN ORANGE EXCEED BENZENE SCREENING CRITERION (0.005 mg/L).
2. GROUNDWATER ELEVATIONS SHOWN ON THIS CROSS-SECTION ARE BASED ON GROUNDWATER GAUGING DATA COLLECTED JULY 6-9, 2015.
3. THIS GEOLOGIC CROSS-SECTION IS PRIMARILY BASED ON THE INTERPRETATION OF CPT DATA COLLECTED BY URS DURING THE 2006 AND 2009 INVESTIGATION ACTIVITIES. BORING LOGS DEVELOPED DURING OTHER DRILLING TECHNIQUES (E.G. AUGER AND GEOPROBE) WERE USED TO SUPPLEMENT CPT DATA.
4. THE DEPTH AND THICKNESS OF INDIVIDUAL STRATA DEPICTED MAY BE BASED ON CPT LOGS GENERATED AT NEARBY LOCATIONS. THEREFORE, WELL SCREENS MAY APPEAR TO BE PARTIALLY WITHIN CLAY LAYERS OR SHALLOW/DEEPER WITHIN A PERMEABLE STRATUM THAN ACTUAL CONDITIONS DUE TO MAP PROJECTIONS.
5. HISTORIC BORING LOG IS NOT AVAILABLE FOR T-12.

KEYMAP
NOT TO SCALE

Ø 20
VERTICAL SCALE FEET

Ø 100
HORIZONTAL SCALE FEET

SHELL OIL PRODUCT US
INTERIM GROUNDWATER MONITORING PROGRAM
ROXANA, ILLINOIS

PROJECT NO.
60400249

AECOM

DRN. BY: djd October 2015
DSGN. BY: lr
CHKD. BY: bbb

Cross-Section of Benzene
3Q15 Groundwater Analytical Results-
Chaffer Street

FIG. NO.
7

File: \\URSSTLOUIS.STLOUIS\PROJECTS\ENVIRONMENTAL\SHELL\21563720 ROX 2015\6.0_GIS\MAPABLES\GROUNDWATER_REPORTING\3Q15\DRAFT REPORT\FIGURES\FIG 7 TYP X-SECT W_BENZENE GW ANAL RESLTS-1ST-STRGT.DWG Last edited: OCT. 13, 15 @ 11:15 a.m. by: david.deguire

CROSS SECTION LINE - SOME WELLS HAVE BEEN PROJECTED

WEST
B

EAST
B'

MW-6D MW-6C MW-6B MW-6A SVE-27 MW-7 P-93A P-93B P-93C P-93D T-6

(S. CENTARL AVE) HIGHWAY 111

EIGHTH ST

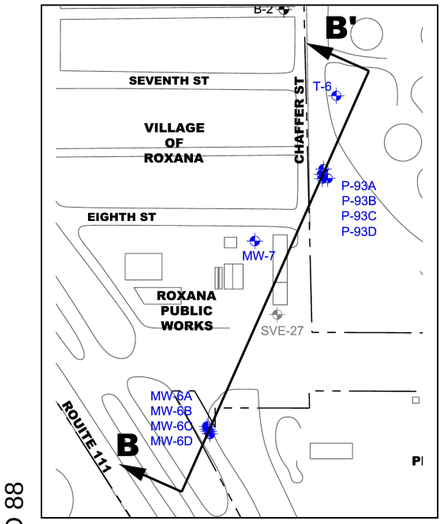
SEVENTH ST

GROUND SURFACE

ELEVATION, FEET NAVD 88

440
420
400
380
360
340
320
300

<0.0005 mg/L
<0.0005 mg/L
<0.0005 mg/L
<0.0005 mg/L
1300/
1370 mg/L
315 mg/L
497J/371J mg/L
0.0365 mg/L
21.2 mg/L
NOT SAMPLED



KEYMAP
NOT TO SCALE

LEGEND

- STRATUM BOUNDARY ASSUMED
- FILL PROJECTED BETWEEN POINTS
- CLAY PROJECTED BETWEEN POINTS (INCLUDES SILTY CLAY AND SANDY CLAY)
- SAND PROJECTED BETWEEN POINTS (INCLUDES SILTY SAND AND CLAYEY SAND)
- SILT PROJECTED BETWEEN POINTS
- SHALE
- WELL SCREEN
- WATER LEVEL
- POTENTIOMETRIC SURFACE – ESTIMATED

Ø 2Ø
VERTICAL SCALE FEET

Ø 1ØØ
HORIZONTAL SCALE FEET

NOTES:
1. GROUNDWATER BENZENE CONCENTRATIONS FROM THE 3Q15 SAMPLING EVENT ARE DEPICTED IN BLUE. VALUES DEPICTED IN ORANGE EXCEED BENZENE SCREENING CRITERION (Ø.ØØ5 mg/L).
2. GROUNDWATER ELEVATIONS SHOWN ON THIS CROSS-SECTION ARE BASED ON GROUNDWATER GAUGING DATA COLLECTED JULY 7-9, 2Ø15.
3. THIS GEOLOGIC CROSS-SECTION IS PRIMARILY BASED ON THE INTERPRETATION OF CPT DATA COLLECTED BY URS DURING THE 2ØØ6 AND 2ØØ9 INVESTIGATION ACTIVITIES. BORING LOGS DEVELOPED DURING OTHER DRILLING TECHNIQUES (E.G. AUGER AND GEOPROBE) WERE USED TO SUPPLEMENT CPT DATA.
4. THE DEPTH AND THICKNESS OF INDIVIDUAL STRATA DEPICTED MAY BE BASED ON CPT LOGS GENERATED AT NEARBY LOCATIONS. THEREFORE, WELL SCREENS MAY APPEAR TO BE PARTIALLY WITHIN CLAY LAYERS OR SHALLOW/DEEPER WITHIN A PERMEABLE STRATUM THAN ACTUAL CONDITIONS DUE TO MAP PROJECTIONS.
5. LITHOLOGICAL INFORMATION FROM SVE-27 WAS OBTAINED FROM BORING LOG TO SUPPLEMENT SITE GEOLOGY ONLY.
6. HISTORIC BORING LOG IS NOT AVAILABLE FOR T-6.

SHELL OIL PRODUCT US INTERIM GROUNDWATER MONITORING PROGRAM ROXANA, ILLINOIS	PROJECT NO. 6Ø4ØØ249
AECOM	
DRN. BY: djd October 2Ø15 DSGN. BY: lr CHKD. BY: wmp	Cross-Section of Benzene 3Q15 Groundwater Analytical Results- Roxana Public Works Yard
	FIG. NO. 8

File: \\URSSTLOUIS\STLOUIS\PROJECTS\ENVIRONMENTAL\SHELL\21563720 ROX 2015\6.0_DELIVERABLES\GROUNDWATER_REPORTING\3Q15\DRAFT REPORT\FIGURES\FIG 8 TYP X-SECT W_BENZENE GW ANAL RSLTS-HWY111-CHAFFER.DWG Last edited: OCT. 13, 15 @ 11:13 a.m. by: david_deguire

Appendix A.
Groundwater Sampling Data Sheets

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher, D. Haxel

DATE: 7-8-15 | WEATHER: 60° Overcast

MONITORING WELL ID: MW-1 | SAMPLE ID: MW1-ROX-070815

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 59.13 ft
Depth to Water (btoc): 43.35 ft
Depth to LNAPL/DNAPL (btoc): — ft
Depth to Top of Screen (btoc): 48.80 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 15.78 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = — ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 53.80 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 00 ppm
Wellbore PID/FID Reading: 0.4 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1344	43.35	clear	odorless	~~6.77~~ 6.82	~~1.265~~	56	6.79	29.23	18.21
600	1346	↓	↓	↓	6.79	1.272	58	0.50	36.52	18.39
1200	1348				6.78	1.274	49	0.34	32.48	18.48
1800	1350				6.77	1.274	40	0.23	23.87	18.56
2400	1352				6.77	1.274	29	0.20	16.95	18.58
3000	1354				6.77	1.274	18	0.16	12.48	18.61
3600	1356				6.76	1.274	11	0.13	8.680	18.63

Start Time: 1344 | Elapsed Time (min): 12 | Water Quality Meter ID & SN: TROLL 9500 - R25642

Stop Time: 1356 | Average Purge Rate (mL/min): 300 | Date Calibrated: 7-8-15

SAMPLING DATA

Sample Date: 8 July 2015 | Sample Time: 1400 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 300 | QA/QCSamples: NONE

VOA Vials, No Headspace ☒ Initials: D.H.

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 3600 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher, D. Haxel

DATE: 7-13-15 | WEATHER: 100° Clear

MONITORING WELL ID: MW-2 | SAMPLE ID: MW2-ROX-071315

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 60.20 ft
Depth to Water (btoc): 44.53 ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 49.87 ft
Screen Length): 10 ft

SF
Water Column Height (do not include LNAPL or DNAPL): ~~54.87~~ 15.67 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at: —
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at: 54.87
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 140.7 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1427	44.53	clear	odorless	6.78	1.310	-100	0.31	7.605	22.39
600	1429	↓	↓	↓	6.77	1.312	-102	0.15	7.717	22.05
1200	1431				6.77	1.313	-104	0.06	9.087	21.91
1800	1433				6.77	1.315	-105	0.03	10.82	21.78
2400	1435				6.77	1.317	-106	0.01	13.93	21.71

13 July 2015

Start Time: 1427 | Elapsed Time (min): 8 | Water Quality Meter ID & SN: TROLL 9500 -- R25642
Stop Time: 1435 | Average Purge Rate (mL/min): 300 | Date Calibrated: 7-13-15

SAMPLING DATA

Sample Date: 13 July 2015 | Sample Time: 1445 | Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 300 | QA/QCSamples: none
VOA Vials, No Headspace [X] | Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 2400 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher / D. Haxel

DATE: 10 July 2015 | WEATHER: P. cloudy 78°F

MONITORING WELL ID: MW-3 | SAMPLE ID: MW3-ROX-071015

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 45.00 ft
Depth to Water (btoc): 30.01 ft
Depth to LNAPL/DNAPL (btoc): — ft
Depth to Top of Screen (btoc): 34.67 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): ~~15.00~~ 14.99 SF ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at: —
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at: 39.67 ft btoc
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) =
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell: 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.3 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1046	30.01	clear	eggy	7.04	1.346	-149	0.66	7.429	20.36
600	1048	↓	↓	↓	7.02	1.344	-152	0.33	6.740	20.05
1200	1050				7.02	1.342	-154	0.13	6.481	19.94
1800	1052				7.02	1.346	-156	0.11	6.878	19.91
2400	1054				7.02	1.348	-157	0.04	3.454	19.81

Samuel Fisher 7-10-15

Start Time: 10:46
Stop Time: 1054

Elapsed Time (min): ~~1100~~ DA 8
Average Purge Rate (mL/min): 300

Water Quality Meter ID & SN: TROLL 9500 -- R25642
Date Calibrated: 10 July 2015

SAMPLING DATA

Sample Date: 10 July 2015
Sample Time: 11:00
Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow
Sample Flow Rate (mL/min): 300
QA/QCSamples: NONE
VOA Vials, No Headspace [X] Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH_ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 2400 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Sullivan

DATE: 7-14-15 | WEATHER: Sunny 98°

MONITORING WELL ID: MW-4 | SAMPLE ID: MW4-Rox-071415

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 56.39 ft
Depth to Water (btoc): 41.30 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 46.06 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 15.09 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = 51.06 ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = N/A ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.4 ppm
Wellbore PID/FID Reading: 5.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1405	41.31	CLEAR	SLIGHT	6.98	1.256	-0.12	0.35	15.80	22.61
800	1407	↓	↓	↓	6.95	1.262	-0.12	0.17	19.55	22.02
1200	1408				6.95	1.256	-0.12	0.07	18.37	21.57
2000	1410				6.95	1.254	-0.12	0.03	19.80	21.28
2400	1411				6.95	1.249	-0.12	0.00	16.43	21.11
3200	1413				6.95	1.250	-0.12	-0.01	14.25	21.01
3600	1414				6.95	1.253	-0.12	-0.02	19.46	20.95
4400	1416				6.95	1.243	-0.12	-0.03	16.48	20.90
4800	1417				6.96	1.246	-0.12	-0.04	15.01	20.80
5600	1419				6.96	1.245	-0.12	-0.04	17.09	20.77
6000	1420				6.96	1.230	-0.12	-0.05	16.98	20.69

7-14-15

Start Time: 1405 | Elapsed Time (min): 16 MINS | Water Quality Meter ID & SN: TROLL 9500 -- R24193

Stop Time: 1421 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-14-15

SAMPLING DATA

Sample Date: 7-14-15 | Sample Time: 1430 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: NONE

VOA Vials, No Headspace ☒ Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 6000 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S, Fisher, D, Haxel

DATE: 7-13-15 | WEATHER: 100° Clear

MONITORING WELL ID: MW-5 | SAMPLE ID: MW5-ROX-071315

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 44.30 ft
Depth to Water (btoc): 29.45 ft
Depth to LNAPL/DNAPL (btoc): — ft
Depth to Top of Screen (btoc): 33.97 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 14.85 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = 38.97 ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = — ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1324	29.45	clear	odorless	6.77	1.548	-123	0.44	7.583	22.12
600	1326	↓	↓	↓	6.76	1.558	-127	0.17	4.307	21.79
1200	1328				6.76	1.538	-128	0.07	9.696	21.56
1800	1330				6.74	1.553	-129	0.04	8.782	21.56
2400	1332				6.76	1.552	-130	0.02	8.314	21.54

Samuel Fisher
7-13-15

Start Time: 1324 | Elapsed Time (min): 8 | Water Quality Meter ID & SN: TROLL 9500 -- F25642
Stop Time: 1332 | Average Purge Rate (mL/min): 300 | Date Calibrated: 7-13-15

SAMPLING DATA

Sample Date: 13 July 2015 | Sample Time: 1335 | Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 300 | QA/QCSamples: NONE
VOA Vials, No Headspace [X] | Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 7400 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher / D. Haxel

DATE: SF 15 July 2015 | WEATHER: Sunny 86°F DH 99°F

MONITORING WELL ID: MW-6A | SAMPLE ID: MW6A-ROX-071515

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 45.16 ft
Depth to Water (btoc): 31.52 ft
Depth to LNAPL/DNAPL (btoc): — ft
Depth to Top of Screen (btoc): 34.83 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 13.64 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = 39.83 ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = — ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.7 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	0947	31.52	slightly cloudy	odorless	6.39	1.786	-85	0.18	271.5	19.99
600	0949				6.42	1.784	-90	0.08	246.8	19.80
1200	0951				6.44	1.781	-92	0.02	200.8	19.71
1800	0953				6.45	1.770	-93	-0.00	154.0	19.68
2400	0955				6.46	1.765	-93	-0.02	107.9	19.66
3000	0957				6.46	1.761	-94	-0.04	80.93	19.67
3600	0959				6.47	1.759	-95	-0.05	62.69	19.68
4200	1001	31.54			6.48	1.758	-97	-0.06	44.94	19.76
4900	1003				6.49	1.757	-98	-0.07	37.21	19.70
5400	1005				6.50	1.758	-99	-0.07	27.24	19.73

15 July 2015

Start Time: 0947 | Elapsed Time (min): 18 | Water Quality Meter ID & SN: TROLL 9500 -- R25642

Stop Time: 1005 | Average Purge Rate (mL/min): 300 | Date Calibrated: 15 July 2015

SAMPLING DATA

Sample Date: 15 July 2015 | Sample Time: 1010 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 300 | QA/QCSamples: NONE equipment blank D.H.

VOA Vials, No Headspace ☒ Initials: D.H.

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 5400 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher / D. Haxel

DATE: 14 July 2015 | WEATHER: 87° Sunny

MONITORING WELL ID: MW-6B | SAMPLE ID: MW6B-ROX-071415

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 69.38 ft
Depth to Water (btoc): 31.50 ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 64.05 ft
Screen Length): 5 ft

Water Column Height (do not include LNAPL or DNAPL): 37.82 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at: ~~64.05~~ ~~63.88~~
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ~~64.05~~ ~~63.88~~ ft btoc 66.55
If Depth to Top of Screen is < Depth to Water, Place Pump at: —
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = _____ ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1111	31.50	clear	none	6.99	1.216	-84	0.72	10.55	21.18
600	1122	↓	↓	↓	6.92	1.257	-91	0.03	7.275	20.61
1200	1124				6.92	1.260	-92	0.01	5.867	20.77
1800	1126				6.91	1.266	-92	0.00	4.644	20.80

Samuel Fisher 7-14-15

Start Time: 1111 | Elapsed Time (min): 15 | Water Quality Meter ID & SN: TROLL 9500 -- R25642
Stop Time: 1126 | Average Purge Rate (mL/min): 300 | Date Calibrated: 7-14-15

SAMPLING DATA

Sample Date: 7-14-15 | Sample Time: 1140 | Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 300 | QA/QCSamples: NONE
VOA Vials, No Headspace ☒ Initials: DH

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)
600 mL reading did not show up in rugged reader, so we restarted
Rugged reader crashed before we could save the data

Total Purge Volume: 1800 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher / D. Haxel

DATE: 14 July 2015 | WEATHER: 87° Sunny

MONITORING WELL ID: MW-6C | SAMPLE ID: MW6C-ROX-071415

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 90.28 ft
Depth to Water (btoc): 31.38 ft
Depth to LNAPL/DNAPL (btoc): NA ft
Depth to Top of Screen (btoc): 84.95 ft
Screen Length): 5 ft

Water Column Height (do not include LNAPL or DNAPL): 58.90 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = 85.95 ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = — ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1029	31.34	clear	odorless	7.20	0.9050	-117	1.01	9.767	20.91
600	1031	↓	↓	↓	7.12	0.9406	-121	0.32	5.864	20.43
1200	1033				7.10	0.9603	-123	0.14	3.372	20.27
1800	1035				7.09	0.9723	-125	0.05	1.192	20.24
2400	1037				7.08	0.9768	-126	0.04	0.6104	20.21

Samuel Fisher 7-14-15

Start Time: 1029 | Elapsed Time (min): 8 | Water Quality Meter ID & SN: TROLL 9500 -- R75642

Stop Time: 1037 | Average Purge Rate (mL/min): 300 | Date Calibrated: 7-14-15

SAMPLING DATA

Sample Date: 14 July 2015 | Sample Time: 1045 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 300 | QA/QCSamples: None

VOA Vials, No Headspace [X] Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH_ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 2400 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher / D. Haxel

DATE: 14 July 2015 | WEATHER: Sunny 87°F

MONITORING WELL ID: MW-6D | SAMPLE ID: MW6D-ROX-071415

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 110.05 ft
Depth to Water (btoc): 31.19 ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 104.72 ft
Screen Length): 5 ft

Water Column Height (do not include LNAPL or DNAPL): SF ~~109.72~~ ~~79.14~~ 78.86 SF ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = 109.72 ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ~~109.57~~ ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	0932	31.19	Cloudy	none	6.77	1.286	-128	0.23	408.6	19.26
600	0934				6.86	1.293	-133	0.03	323.1	19.07
1200	0936				6.92	1.299	-135	0.01	203.5	19.03
1800	0938				6.95	1.302	-137	0.00	127.5	18.97
2400	0940				6.98	1.305	-138	-0.01	90.02	18.98
3000	0942				7.00	1.301	-139	-0.02	61.31	19.03
3600	0944		Clear		7.01	1.301	-139	-0.03	48.13	19.03
4200	0946				7.02	1.307	-139	-0.04	37.72	19.04
4800	0948				7.03	1.308	-140	-0.04	36.17	19.07

Samuel Fisher
7-14-15

Start Time: 0932 | Elapsed Time (min): 16 | Water Quality Meter ID & SN: TROLL 9500 -- R25642

Stop Time: 0948 | Average Purge Rate (mL/min): 300 | Date Calibrated: 7-14-15

SAMPLING DATA

Sample Date: 7-14-15 | Sample Time: 0955 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 300 | QA/QCSamples: none

VOA Vials, No Headspace ☒ Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH_ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 4800 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-15-15 | WEATHER: SUNNY 87°

MONITORING WELL ID: MW-7 | SAMPLE ID: MW7-ROX-071515 / MW7-ROX-071515-DUP

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 52.92 ft
Depth to Water (btoc): 43.54 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 42.92 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 9.38 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 48.54 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.1 ppm
Wellbore PID/FID Reading: 0.1 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1351	43.58	CLEAR	STRONG	6.72	1.622	-90	0.37	10.66	20.66
800	1353	↓	↓	↓	6.72	1.615	-92	0.17	8.459	20.46
1200	1354				6.71	1.608	-93	0.08	9.413	20.32
2000	1356				6.71	1.600	-94	0.05	12.10	20.21
2400	1358				6.72	1.592	-94	0.05	16.55	20.15
3200	1359				6.72	1.585	-94	0.05	18.56	20.11

7-15-15

Start Time: 1351 | Elapsed Time (min): ~~1405~~ 8 MINS | Water Quality Meter ID & SN: TROLL 9500 -- R24193

Stop Time: 1359 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-15-15

SAMPLING DATA

Sample Date: 7-15-15 | Sample Time: 1405 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: DUP

VOA Vials, No Headspace ☒ Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 3200 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-15-15 | WEATHER: SUNNY 84°

MONITORING WELL ID: MW-8 | SAMPLE ID: MW8-ROX-071515

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 43.60 ft
Depth to Water (btoc): 34.07 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 33.60 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 9.53 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 39.07 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.1 ppm
Wellbore PID/FID Reading: 0.1 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Oder	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1303	34.11	CLEAR	STRONG	6.60	1.435	-88	0.30	18.27	21.87
400	1304	↓	↓	↓	6.60	1.437	-89	0.12	17.65	21.98
1200	1306				6.60	1.447	-90	0.05	19.68	21.24
1600	1307				6.61	1.456	-92	0.02	16.16	21.16
2400	1309				6.61	1.467	-93	0.00	16.30	21.06
2800	1310				6.61	1.474	-93	-0.01	16.30	21.01
3600	1312				6.61	1.480	-94	-0.01	15.50	20.96
4000	1313				6.62	1.485	-95	-0.02	13.30	20.88

E. Schumacher 7-15-15

Start Time: 1303 | Elapsed Time (min): 11 MINS | Water Quality Meter ID & SN: TROLL 9500 -- R24193
Stop Time: 1314 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-15-15

SAMPLING DATA

Sample Date: 7-15-15 | Sample Time: 1330 | Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: NONE
VOA Vials, No Headspace [X] Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH_ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 4000 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher / D. Haxel

DATE: 9 July 2015 | WEATHER: cloudy 65°F

MONITORING WELL ID: MW-9 | SAMPLE ID: MW9-ROX-070915

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 56.78 ft
Depth to Water (btoc): 44.81 ft
Depth to LNAPL/DNAPL (btoc): — ft
Depth to Top of Screen (btoc): 46.45 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 11.97 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 51.45 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1052	44.81	clear	odorless	6.77	1.524	-73	0.51	22.73	17.62
600	1054	↓	↓	↓	6.75	1.515	-75	0.35	17.14	17.72
1200	1056				6.75	1.505	-76	0.27	14.88	17.83
1800	1058				6.75	1.491	-77	0.23	12.42	17.93
2400	1100				6.75	1.478	-76	0.18	11.86	18.00

Start Time: 1052 | Elapsed Time (min): 8 | Water Quality Meter ID & SN: TROLL 9500 – R25642

Stop Time: 1100 | Average Purge Rate (mL/min): 300 | Date Calibrated: 9 July 2015

SAMPLING DATA

Sample Date: 9 July 2015 | Sample Time: 1105 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 300 | QA/QCSamples: NONE

VOA Vials, No Headspace ☒ Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 2400 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher, D. Haxel

DATE: 7-9-15 | WEATHER: 65° Overcast

MONITORING WELL ID: MW-10 | SAMPLE ID: MW10-ROX-070915

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 54.76 ft
Depth to Water (btoc): 44.93 ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 44.43 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): ~~9.5~~ 9.83 SF ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at: —
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 49.18 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 13.1 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1004	~~44.93~~	clear	none	6.81	1.964	-103	~~0.34~~	~~19.21~~	~~18.48~~
600	1006	↓	↓		6.81	1.970	-105	0.20	17.08	18.63
1200	1008				6.81	1.972	-108	0.15	17.90	18.68
1800	1010				6.81	1.971	-110	0.09	13.36	18.67

Samuel Fisher 7-9-15

Start Time: 1004 | Elapsed Time (min): 6 | Water Quality Meter ID & SN: TROLL 9500 -- R25642
Stop Time: 1010 | Average Purge Rate (mL/min): 300 | Date Calibrated: 7-9-15

SAMPLING DATA

Sample Date: 7-9-15 | Sample Time: 1015 | Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 300 | QA/QCSamples: none
VOA Vials, No Headspace [X] Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 1,800 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW
PROJECT NUMBER: 60400249-21563720.03003
FIELD PERSONNEL: S. Fisher / D. Haxel

DATE: 9 July 2015
WEATHER: cloudy 57° F

MONITORING WELL ID: MW-11
SAMPLE ID: MW11-ROX-070915

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 51.99 ft
Depth to Water (btoc): 42.45 ft
Depth to LNAPL/DNAPL (btoc): — ft
Depth to Top of Screen (btoc): 41.66 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 9.54 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = — ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 47.22 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell: 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
				STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C
0	0903	42.45	clear	odorless	6.59	1.507	-64	0.63	17.19	17.17
600	0905	↓	↓	↓	6.67	1.517	-73	0.30	16.30	17.30
1200	0907				6.70	1.519	-78	0.16	13.98	17.40
1800	0909				6.72	1.519	-82	0.11	13.78	17.47

[signature]
9 July 2015

Start Time: 0903
Stop Time: 0909
Elapsed Time (min): 6
Average Purge Rate (mL/min): 300
Water Quality Meter ID & SN: TROLL 9500 -- R25642
Date Calibrated: 9 July 2015

SAMPLING DATA

Sample Date: 9 July 2015
Sample Method: Monsoon Pump / Low Flow
VOA Vials, No Headspace ☒ Initials: D.H.
Sample Time: 0915
Sample Flow Rate (mL/min): 300
Lab Analysis: VOC, SVOC
QA/QCSamples: None

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 1800 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher, D. Hexel

DATE: 7-8-15 | WEATHER: 60° Overcast

MONITORING WELL ID: MW-12 | SAMPLE ID: MW12-ROX-070815 / MW12-ROX-070815-EB

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 52.25 ft
Depth to Water (btoc): 42.86 ft
Depth to LNAPL/DNAPL (btoc): NF ft
Depth to Top of Screen (btoc): 41.92 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 9.39 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at: —
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at: 47.56 ft btoc
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) =
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell: 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1510	42.84	clear gray	none	7.01	0.537	172	4.76	217.4	18.46
600	1512	42.83			6.96	0.590	170	4.40	193.4	18.48
1200	1514				6.94	0.643	168	3.93	159.5	18.50
1800	1516				6.93	0.693	168	3.52	138.3	18.52
2400	1518				6.92	0.738	167	3.19	112.3	18.56
3000	1520				6.91	0.778	166	2.89	98.1	18.57
3600	1522				6.91	0.816	166	2.63	85.9	18.54
4200	1524				6.90	0.848	165	2.39	74.8	18.58
4800	1526				6.90	0.875	164	2.19	68.7	18.59
5400	1528		Slightly foggy		6.90	0.901	164	2.02	60.4	18.62
6000	1530				6.90	0.922	163	1.85	55.7	18.62
6600	1532				6.90	0.942	162	1.73	54.0	18.64
7200	1534				6.90	0.959	161	1.63	46.1	18.65

Samuel Fisher

Start Time: 1510 | Elapsed Time (min): 24 | Water Quality Meter ID & SN: TROLL 9500 -- R25642

Stop Time: 1534 | Average Purge Rate (mL/min): 300 | Date Calibrated: 7-8-15

SAMPLING DATA

Sample Date: 7-8-15 | Sample Time: 1540 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 300 | QA/QCSamples: EB

VOA Vials, No Headspace ☒ Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH_ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 7200 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-8-15 | WEATHER: RAINY 66°

MONITORING WELL ID: MW-13 | SAMPLE ID: MW13-ROX-070815

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 35.82 ft
Depth to Water (btoc): 29.16 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 25.57 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 6.66 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = 32.49 ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = N/A ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.5 ppm
Wellbore PID/FID Reading: 351 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	~~+/-3%~~ +/-5%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1332	29.10	CLEAR	SLIGHT HC	6.82	1.095	-0.11	0.12	7.256	67.24
800	1334	↓	↓	↓	6.83	1.096	-0.11	0.07	6.643	67.14
1600	1336	↓	↓	↓	6.82	1.097	-0.11	0.04	5.810	67.09
2400	1338	↓	↓	↓	6.82	1.099	-0.11	0.03	5.074	67.10
3200	1340	29.08	↓	↓	6.82	1.100	-0.12	0.02	4.913	67.09

7-8-15

Start Time: 1332 | Elapsed Time (min): 8 MINS | Water Quality Meter ID & SN: TROLL 9500 -- R24193

Stop Time: 1340 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-8-15

SAMPLING DATA

Sample Date: 7-8-15 | Sample Time: ES ~~1342~~ 1345 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: NONE

VOA Vials, No Headspace ☑ Initials: ES

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

* Turbidity was recorded in FNU and not NTU.

Total Purge Volume: 3200 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Sittenauer

DATE: 7-9-15 | WEATHER: Cloudy 62°

MONITORING WELL ID: MW-14 | SAMPLE ID: MW14-ROX-070915 / MW14-ROX-070915MS / MW14-ROX-070915MSD

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 44.00 ft
Depth to Water (btoc): 39.06 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 33.42 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 9.94 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 39.06 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.3 ppm
Wellbore PID/FID Reading: 44.8 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1017	39.07	CLEAR	NONE	6.79	0.9626 ES	-0.10	0.13	15.66	18.66
800	1019	↓	↓	↓	6.79	0.9558 ES	-0.10	0.10	15.48	18.76
1600	1021				6.80	0.9504 ES	-0.11	0.08	12.40	18.84
2000	1022				6.80	0.9507 ES	-0.11	0.07	11.72	18.90
2800	1024				6.80	0.9526 ES	-0.11	0.06	10.99	18.95
3200	1025				6.80	0.9566 ES	-0.11	0.05	9.98	18.99

7-9-15

Start Time: 1017 | Elapsed Time (min): 9 MINS | Water Quality Meter ID & SN: TROLL 9500 -- R24193

Stop Time: 1026 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-9-15

SAMPLING DATA

Sample Date: 7-9-15 | Sample Time: 1030 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: MS/MSD

VOA Vials, No Headspace ☒ Initials: ES/GW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

* Turbidity was recorded in FNU and not NTU

Total Purge Volume: 3200 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW
PROJECT NUMBER: 60400249-21563720.03003
FIELD PERSONNEL: S. Fisher, D. Haxel

DATE: 7-9-15
WEATHER: 70° Overcast

MONITORING WELL ID: MW-16
SAMPLE ID: MW16-ROX-070915, MW16-ROX-070915-DUP

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 47.31 ft
Depth to Water (btoc): 44.26 ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 37.43 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 3.05 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at: —
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at: —
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = 45.31 ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.1 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
				STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C
0	1308	44.26	clear	slightly eggy	6.62	1.719	-100	1.59	16.39	19.87
600	1310	↓	↓		6.63	1.729	-102	0.79	14.15	19.27
1200	1312				6.64	1.737	-105	0.33	11.47	19.44
1800	1314				6.65	1.746	-107	0.20	9.278	19.45
2400	1316				6.64	1.749	-108	0.14	8.666	19.49

[signature]
9 July 2015

Start Time: 1308
Stop Time: 1316
Elapsed Time (min): 8
Average Purge Rate (mL/min): 300
Water Quality Meter ID & SN: TROLL 9500 -- R25642
Date Calibrated: 7-9-15

SAMPLING DATA

Sample Date: 7-9-15
Sample Method: Monsoon Pump / Low Flow
VOA Vials, No Headspace ☒ Initials: D.H
Sample Time: 1320
Sample Flow Rate (mL/min): 300
Lab Analysis: VOC, SVOC
QA/QCSamples: DUP

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 2400 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW
PROJECT NUMBER: 60400249-21563720.03003
FIELD PERSONNEL: S. Fisher / D. Haxel
DATE: 15 July 2015
WEATHER: Sunny 85°F
MONITORING WELL ID: MW-22
SAMPLE ID: MW22-ROX-071515

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 48.13 ft
Depth to Water (btoc): 42.64 ft
Depth to LNAPL/DNAPL (btoc): — ft
Depth to Top of Screen (btoc): 38.21 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 5.49 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at: —
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ft btoc SF 45.39
If Depth to Top of Screen is < Depth to Water, Place Pump at: SF ~~43.13~~ ~~45.39~~ 45.87
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.2 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1323	42.64	clear	hydrocarbon	6.66	1.012	-117	0.22	19.37	22.96
600	1325	↓	↓	↓	6.66	1.015	-119	0.13	16.98	23.11
1200	1327				6.65	1.022	-120	0.13	15.57	23.03
1800	1329				6.65	1.030	-121	0.15	15.64	23.12

15 July 2015

Start Time: 1323
Stop Time: 1329
Elapsed Time (min): 6
Average Purge Rate (mL/min): 300
Water Quality Meter ID & SN: TROLL 9500 -- R25642
Date Calibrated: 15 July 2015

SAMPLING DATA

Sample Date: 15 July 2015
Sample Time: 1335
Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow
Sample Flow Rate (mL/min): 300
QA/QCSamples: NONE
VOA Vials, No Headspace ☒ Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 1800 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher, D. Haxel

DATE: 7-10-15 | WEATHER: 80° cloudy

MONITORING WELL ID: MW-23 | SAMPLE ID: MW23-ROX-~~070~~ D# 071015-BP

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 39.27 ft
Depth to Water (btoc): 30.54 ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 29.02 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 8.73 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at: —
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at: 34.91
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	0937	30.54	slightly grey	eggie	6.48	1.052	-97	1.04	96.51	18.77
600	0939	↓	↓	↓	6.66	1.061	-107	0.26	104.5	18.76
1200	0941				6.71	1.063	-111	0.11	84.52	18.80
1800	0943				6.73	1.076	-113	0.03	56.82	18.90
2400	0945				6.75	1.088	-114	0.01	35.33	18.82
3000	0947				6.75	1.096	-115	-0.01	20.33	18.81

Daily Std
10 July 2015

Start Time: 0937
Stop Time: 0947

Elapsed Time (min): 10
Average Purge Rate (mL/min): 300

Water Quality Meter ID & SN: TROLL 9500 -- R25642
Date Calibrated: 10 July 2015

SAMPLING DATA

Sample Date: 10 July 2015
Sample Time: 0950
Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow
Sample Flow Rate (mL/min): 300
QA/QCSamples: NONE
VOA Vials, No Headspace ☒ Initials: DH

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 3000 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher / D. Hoekel

DATE: 9 July 2015 | WEATHER: Sunny 75° F

MONITORING WELL ID: MW-24 | SAMPLE ID: MW24-ROX-070915

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 49.14 ft
Depth to Water (btoc): 44.65 ft
Depth to LNAPL/DNAPL (btoc): — ft
Depth to Top of Screen (btoc): 38.89 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 4.49 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = — ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 46.90 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.3 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1408	44.65	clear	odorless	6.88	1.418	-95	1.70	47.44	19.02
600	1416	↓	↓	↓	6.87	1.408	-101	1.17	43.28	18.95
1200	1412				6.86	1.394	-104	1.05	28.06	18.94
1800	1414				6.86	1.383	-107	1.00	17.98	18.93

Samuel Fisher 7-9-15

Start Time: 1408
Stop Time: 1414

Elapsed Time (min): 6
Average Purge Rate (mL/min): 300

Water Quality Meter ID & SN: TROLL 9500 -- R25642
Date Calibrated: 9 July 2015

SAMPLING DATA

Sample Date: 9 July 2015
Sample Time: 1420
Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow
Sample Flow Rate (mL/min): 300
QA/QCSamples: NONE
VOA Vials, No Headspace [X] Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

check ORP readings, they may not be negative

Total Purge Volume: 1800 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-15-15 | WEATHER: Sunny 78°

MONITORING WELL ID: MW-25 | SAMPLE ID: MW25-ROX-071515

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 45.84 ft
Depth to Water (btoc): 38.40 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 35.59 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 7.44 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ~~43.40~~ 42.12 SF ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.1 ppm
Wellbore PID/FID Reading: 0.5 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	0949	38.40	CLEAR	SLIGHT	6.72	1.346	-0.10	0.16	13.14	20.46
800	0951	↓	↓	↓	6.74	1.337	-0.11	0.09	14.85	20.38
1600	0953				6.75	1.322	-0.11	0.04	17.43	20.28
2000	0954				6.77	1.310	-0.11	0.01	14.23	20.22
2800	0956				6.78	1.300	-0.11	-0.00	13.83	20.19
3200	0958				6.78	1.290	-0.11	-0.01	12.82	20.13
4000	0959				6.79	1.280	-0.11	-0.02	12.85	20.10

7-15-15

Start Time: 0949 | Elapsed Time (min): 10 MINS | Water Quality Meter ID & SN: TROLL 9500 -- R24193

Stop Time: 0959 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-15-15

SAMPLING DATA

Sample Date: 7-15-15 | Sample Time: 1005 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: NONE

VOA Vials, No Headspace ☒ | Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 4000 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher / D. Haxfe

DATE: 8 July 2015 | WEATHER: Rain 57°F

MONITORING WELL ID: MW-26 | SAMPLE ID: MW26-ROX-070815, MW26-ROX-070815-MS, MW26-ROX-070815-MSD

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 48.40 ft
Depth to Water (btoc): 41.76 ft
Depth to LNAPL/DNAPL (btoc): — ft
Depth to Top of Screen (btoc): 38.15 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 6.64 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = — ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 45.08 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1121	41.72	clear	none	6.82	0.436.2	193	0.15	8.765	18.37
800	1123	41.72	↓	↓	6.83	0.438	190	0.14	6.559	18.37
1200	1124	41.73			6.83	0.442	187	0.15	5.663	18.42
2000	1126	41.73			6.84	0.444	185	0.17	5.450	18.44
2400	1127	41.73			6.84	0.447	184	0.19	4.191	18.46

Start Time: 1121 | Elapsed Time (min): 6 | Water Quality Meter ID & SN: TROLL 9500 -- R25642
Stop Time: 1127 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-8-15

SAMPLING DATA

Sample Date: 7-8-15 | Sample Time: 1135 | Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: MS/MSD
VOA Vials, No Headspace ☒ Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 2400 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher / D. Haxel

DATE: 10 July 2015 | WEATHER: cloudy 78°F

MONITORING WELL ID: MW-27 | SAMPLE ID: MW27-ROX-071015

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 50.04 ft
Depth to Water (btoc): 43.00 ft
Depth to LNAPL/DNAPL (btoc): — ft
Depth to Top of Screen (btoc): 39.79 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 7.04 ~~7.00~~ DH 6.96 DH ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = — ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ~~46.58~~ DH ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.5 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1314	44.23	orange/brown	slight egg	6.98	1.145	77	2.68	297.4	19.57
600	1317	44.15	↓		6.89	1.148	35	2.18	211.4	19.53
1200	1320	44.15	lighter		6.86	1.149	21	1.94	142.8	19.38
1800	1323	44.15			6.85	1.149	15	1.88	97.62	19.31
2400	1326	44.16			6.84	1.148	12	1.84	78.12	19.32
3000	1329	44.17			6.84	1.146	12	1.80	63.80	19.27
3600	1332	44.19			6.83	1.146	14	1.75	51.36	19.28
4200	1335	44.22			6.83	1.145	15	1.70	42.40	19.24
4800	1339	44.23			6.83	1.145	17	1.60	39.96	19.21
5400	1342	44.23			6.83	1.145	18	1.59	34.95	19.21
6000	1345	44.23			6.87	1.144	18	1.54	31.75	19.24
6600	1348	44.23	↓	↓	6.82	1.144	11	1.49	26.42	19.25

Samuel Fisher 7-10-15

Start Time: 1314 | Elapsed Time (min): 34 | Water Quality Meter ID & SN: TROLL 9500 -- R25642
Stop Time: 1348 | Average Purge Rate (mL/min): 200 | Date Calibrated: 7-10-15

SAMPLING DATA

Sample Date: 7-10-15 | Sample Time: 1355 | Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 200 | QA/QCSamples: EB
VOA Vials, No Headspace ☒ Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)
ORP noted as positive
We purged ~1000 mL before connecting pump to troll.

Total Purge Volume: 6600 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S.Fisher, D.Haxel

DATE: 7-15-15 | WEATHER: 85° Sunny

MONITORING WELL ID: MW-28 | SAMPLE ID: MW28-ROX-071515 / MW28-ROX-071515-EB

INITIAL DATA

Well Diameter: 2 in
Total Well Depth (btoc): 43.86 ft
Depth to Water (btoc): 42.19 ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 33.61 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 1.67 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at: ~
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at: —
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = 42.86 ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.3 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1102	42.26	slightly brown	odorless	6.58	2.671	-81	0.13	73.49	20.74
600	1104	"	↓	↓	6.56	2.704	-83	0.07	64.92	20.84
1200	1106	42.25			6.56	2.744	-86	0.04	43.10	20.84
1800	1108	↓			6.56	2.768	-89	0.01	29.29	20.81
2400	1110				6.57	2.785	-91	-0.00	22.65	20.80

Start Time: 1102 | Elapsed Time (min): 8 | Water Quality Meter ID & SN: TROLL 9500 – R25642

Stop Time: 1110 | Average Purge Rate (mL/min): 300 | Date Calibrated: 15 July 2015

SAMPLING DATA

Sample Date: 15 July 2015 | Sample Time: 1120 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 300 | QA/QCSamples: EB

VOA Vials, No Headspace [X] Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH_ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 2400 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher, D. Haxel

DATE: 7-9-15 | WEATHER: 80° P. Cloudy

MONITORING WELL ID: P-54 | SAMPLE ID: P54-ROX-070915

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 63.00 ft
Depth to Water (btoc): 42.25 ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 38.00 ft
Screen Length): 25 ft

Water Column Height (do not include LNAPL or DNAPL): 20.75 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ____ ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 52.63 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = ____ ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.6 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
STABLE: (over 3 readings)					+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C
0	~~1457~~	42.25	Clear	none	6.95	1.256	126	~~4.67~~	~~13.47~~	~~18.49~~
600	1459	↓	↑	↓	6.89	1.258	150	~~4.63~~	11.81	18.38
1200	1501				6.88	1.257	133	~~4.74~~	11.00	18.33
1800	1503				6.87	1.256	135	~~4.84~~	10.69	18.33

Samuel Fisher 7-9-15

Start Time: 1457 | Elapsed Time (min): 6 | Water Quality Meter ID & SN: TROLL 9500 -- R25642
Stop Time: 1503 | Average Purge Rate (mL/min): 300 | Date Calibrated: 7-9-15

SAMPLING DATA

Sample Date: 7-9-15 | Sample Time: SF ~~1508~~ 1510 | Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 300 | QA/QCSamples: none
VOA Vials, No Headspace [X] Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

ORP noted as positive

Total Purge Volume: 1800 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW PROJECT NUMBER: 60400249-21563720.03003 FIELD PERSONNEL: DC / BP

DATE: 7-15-15 WEATHER: Sunny ~ 80°F

MONITORING WELL ID: P-55 SAMPLE ID: NA

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 50.68 ft
Depth to Water (btoc): 44.08 ft
Depth to LNAPL/DNAPL (btoc): 43.93 ft
Depth to Top of Screen (btoc): 40.43 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): NA ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = NA ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = NA ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = NA ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 397.3 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
				SF						

Start Time: NA
Stop Time: NA
Elapsed Time (min): NA
Average Purge Rate (mL/min): NA
Water Quality Meter ID & SN: TROLL 9500 -- NA
Date Calibrated: NA

SAMPLING DATA

Sample Date: NA
Sample Time: NA
Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow
Sample Flow Rate (mL/min): NA
QA/QCSamples: NA
VOA Vials, No Headspace ☐ Initials: NA

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

not sampled due to LNAPL present

Total Purge Volume: 0 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-10-15 | WEATHER: PARTLY CLOUDY 76°

MONITORING WELL ID: P-56 | SAMPLE ID: P56-ROX-071015 / P56-ROX-071015-EB

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 65.82 ft
Depth to Water (btoc): 47.34 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 40.82 ft
Screen Length): 25 ft

Water Column Height (do not include LNAPL or DNAPL): 18.48 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc 52.34
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ~~52.35~~ 56.85 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1324	47.35	YELLOWISH	STRONG	6.79	1.698	-0.15	0.53	14.42	24.47
400	1325	↓	↓	↓	6.79	1.716	-0.16	0.29	12.39	24.40
1200	1327				6.79	1.721	-0.16	0.18	10.37	24.36
2000	1329				6.79	1.723	-0.17	0.13	9.070	24.31
2800	1331				6.79	1.719	-0.17	0.10	8.158	24.29
3200	1333	47.34			6.79	1.715	-0.17	0.07	7.760	24.25
3600	1334				6.79	1.711	-0.17	0.06	6.721	24.24
4000	1335	↓	↓	↓	6.79	1.709	-0.18	0.05	6.795	24.25

7-10-15

Start Time: 1324 | Elapsed Time (min): 11 MINS | Water Quality Meter ID & SN: TROLL 9500 -- R24193

Stop Time: 1335 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-10-15

SAMPLING DATA

Sample Date: 7-10-15 | Sample Time: 1340 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: EB

VOA Vials, No Headspace ☒ Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 4000 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-13-15 | WEATHER: Sunny 91°

MONITORING WELL ID: P-57 | SAMPLE ID: P57-ROX-071315

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 54.19 ft
Depth to Water (btoc): 47.81 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 44.19 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 7 6.38 SF ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ~~52.81~~ 51.00 SF ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.2 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1222	48.81	CLEAR	SLIGHT	6.65	1.785	-0.13	0.20	2.391	24.99
400	1223				6.59	1.759	-0.12	0.08	2.344	24.56
1200	1225				6.61	1.733	-0.13	0.04	1.998	24.17
1600	1226				6.63	1.718	-0.13	0.01	2.473	23.94
2400	1228				6.64	1.705	-0.13	-0.00	2.568	23.84
2800	1229				6.65	1.698	-0.13	-0.01	2.528	23.80
3600	1231				6.65	1.693	-0.13	-0.02	2.139	23.79

E. Schumacher 7-13-15

Start Time: 1222 | Elapsed Time (min): 9 MINS | Water Quality Meter ID & SN: TROLL 9500 -- R24193
Stop Time: 1231 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-13-15

SAMPLING DATA

Sample Date: 7-13-15 | Sample Time: 1240 | Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: NONE
VOA Vials, No Headspace [X] Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 3600 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-14-15 | WEATHER: Sunny 89°

MONITORING WELL ID: P-58 | SAMPLE ID: P58-ROX-071415

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 65.21 ft
Depth to Water (btoc): 45.54 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 40.21 ft
Screen Length): 25 ft

Water Column Height (do not include LNAPL or DNAPL): 19.67 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ~~50.54~~ ~~55.38~~ 50.54 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.3 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	~~+/-3%~~ +/- 5%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1018	~~49~~ 45.69	CLEAR	SLIGHT	6.49	1.755	-0.11	0.18	5.164	26.64
400	1019	45.68			6.49	1.756	-0.11	0.09	4.562	26.51
1200	1021	45.68			6.50	1.754	-0.11	0.05	4.565	26.50
1600	1022				6.50	1.758	-0.11	0.03	3.788	26.47
2400	1024				6.50	1.754	-0.11	0.01	3.750	26.40
2800	1025				6.51	1.745	-0.11	-0.00	3.809	26.37
3600	1027				6.51	1.736	-0.11	-0.01	3.398	26.34
4000	1028				6.51	1.725	-0.11	-0.02	3.384	26.33
4800	1030				6.52	1.719	-0.11	-0.02	3.290	26.26

7-14-15

Start Time: 1018 | Elapsed Time (min): 13 MINS | Water Quality Meter ID & SN: TROLL 9500 – R24193

Stop Time: 1031 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-14-15

SAMPLING DATA

Sample Date: 7-14-15 | Sample Time: 1040 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QC Samples: NONE

VOA Vials, No Headspace ☒ Initials: ES / LW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 4800 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Silkenmacher

DATE: 7-13-15 | WEATHER: Sunny 80°

MONITORING WELL ID: P-59 | SAMPLE ID: P59-ROX-071315

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 72.91 ft
Depth to Water (btoc): 47.85 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 47.91 ft
Screen Length): 25 ft

Water Column Height (do not include LNAPL or DNAPL): 25.06 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = 52.85 ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = N/A ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	0937	47.86	CLOUDY	STRONG	6.70	1.728	-0.13	0.25	24.57	29.12
800	0939	↓	↓	↓	6.71	1.734	-0.13	0.09	24.17	29.23
1600	0941	↓	↓	↓	6.71	1.735	-0.14	0.02	23.98	29.27
2000	0942	↓	↓	↓	6.71	1.734	-0.14	-0.03	23.01	29.24
2800	0944	47.86	↓	↓	6.71	1.731	-0.14	-0.05	20.57	29.16
~~3200~~ 3200	0945	↓	↓	↓	6.72	1.730	-0.14	-0.07	19.09	29.12
4000	0947	↓	↓	↓	6.72	1.726	-0.14	-0.08	17.78	29.04
4400	0948	↓	↓	↓	6.71	1.723	-0.14	-0.08	17.21	29.00

7-13-15

Start Time: 0937 | Elapsed Time (min): 12 MINS | Water Quality Meter ID & SN: TROLL 9500 -- R24193

Stop Time: 0949 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-13-15

SAMPLING DATA

Sample Date: 7-13-15 | Sample Time: 0955 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QC Samples: NONE

VOA Vials, No Headspace [X] Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH_ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 4400 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: DChase / BPfeiffer

DATE: 7-15-15 | WEATHER: Sunny ~80°F

MONITORING WELL ID: P-60-12S (PERCHED) | SAMPLE ID: N/A

INITIAL DATA

Well Diameter): 0.75 in
Total Well Depth (btoc): 23.84 ft
Depth to Water (btoc): NE ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 13.84 ft
Screen Length): 10 ft

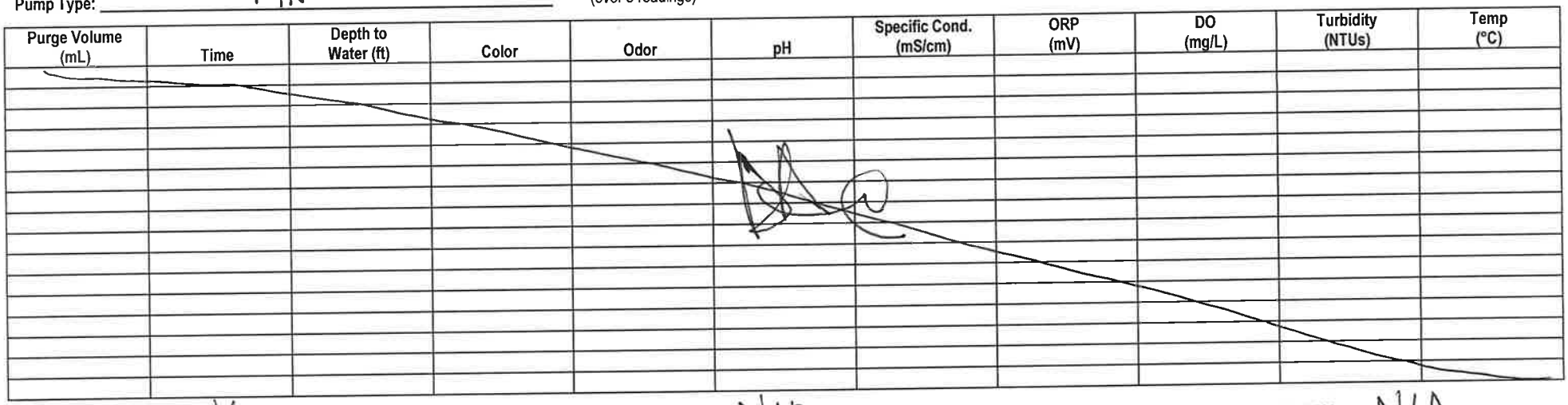
Water Column Height (do not include LNAPL or DNAPL): N/A ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = N/A ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : N/A mL
Minimum Purge Volume = (3 x Flow Cell Volume): N/A mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: N/A

	Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
STABLE: (over 3 readings)						+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C



Start Time: N/A
Stop Time: N/A
Elapsed Time (min): N/A
Average Purge Rate (mL/min): N/A
Water Quality Meter ID & SN: TROLL 9500 -- N/A
Date Calibrated: N/A

SAMPLING DATA

Sample Date: N/A
Sample Time: N/A
Lab Analysis: VOC, SVOC
Sample Method: Peristaltic Pump / Low Flow
Sample Flow Rate (mL/min): N/A
QA/QCSamples: N/A
VOA Vials, No Headspace ☐ Initials: N/A

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Pacing starting cave in Not sampled due to no water

Total Purge Volume: N/A mL

DTB = 21.47

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: DChase / BPfeiffer

DATE: 1-15-15 | WEATHER: Sunny ~80°F

MONITORING WELL ID: P-60-13S (PERCHED) | SAMPLE ID: N/A

INITIAL DATA

Well Diameter): 0.75 in
Total Well Depth (btoc): 20.00 ft
Depth to Water (btoc): 16.75 ft
Depth to LNAPL/DNAPL (btoc): NS ft
Depth to Top of Screen (btoc): 10.00 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): N/A ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = N/A ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

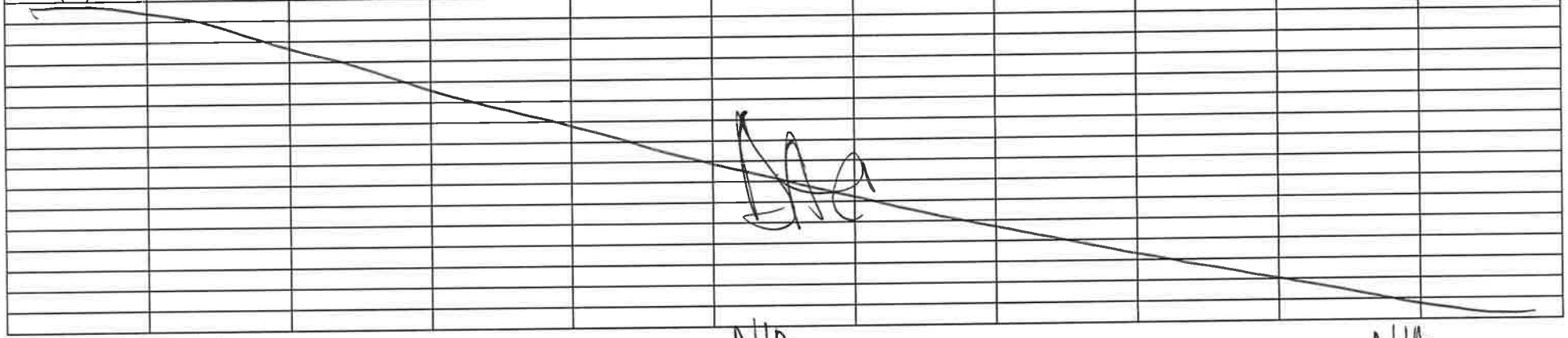
Volume of Flow Through Cell : N/A mL
Minimum Purge Volume = (3 x Flow Cell Volume): N/A mL
Ambient PID/FID Reading: 0.2 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: N/A

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)



Start Time: N/A | Elapsed Time (min): N/A | Water Quality Meter ID & SN: TROLL 9500 -- N/A

Stop Time: N/A | Average Purge Rate (mL/min): N/A | Date Calibrated: N/A

SAMPLING DATA

Sample Date: N/A | Sample Time: N/A | Lab Analysis: VOC, SVOC

Sample Method: Peristaltic Pump / Low Flow | Sample Flow Rate (mL/min): N/A | QA/QC Samples: N/A

VOA Vials, No Headspace ☐ Initials: N/A

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH_ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

not sampled due to not enough water per SOP

Total Purge Volume: N/A mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-8-15 | WEATHER: Cloudy 65°

MONITORING WELL ID: P-66 | SAMPLE ID: P66-ROX-070815 / P66-ROX-070815DUP

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 59.72 ft
Depth to Water (btoc): 37.24 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 34.72 ft
Screen Length): 25 ft

Water Column Height (do not include LNAPL or DNAPL): 22.48 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 48.48 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.5 ppm
Wellbore PID/FID Reading: 28.7 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	~~+/-3%~~ +/-5%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1511	37.24	CLEAR	SLIGHT HC	6.50	0.9.832 ES	-0.08	0.51	14.05	66.86
800	1513	↓	↓	↓	6.50	0.9.898 ES	-0.08	0.23	10.99	67.17
1600	1515				6.50	0.9.889 ES	-0.08	0.15	8.338	67.39
2400	1517				6.50	0.9.859 ES	-0.09	0.11	7.432	67.56
3200	1519				6.50	0.9.818 ES	-0.09	0.08	6.910	67.67
4000	1521				6.50	0.9.785 ES	-0.09	0.07	5.916	67.72

7-8-15

Start Time: 1511 | Elapsed Time (min): 10 MINS | Water Quality Meter ID & SN: TROLL 9500 -- K24193
Stop Time: 1521 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-8-15

SAMPLING DATA

Sample Date: 7-8-15 | Sample Time: 1525 | Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: DUP
VOA Vials, No Headspace [X] Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)
* Turbidity was recorded in FNU and not NTU

Total Purge Volume: 4000 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW PROJECT NUMBER: 60400249-21563720.03003 FIELD PERSONNEL: DChasel, BPfeiffer

DATE: 7-15-15 WEATHER: sunny ~80°F

MONITORING WELL ID: P-68 SAMPLE ID: N/A

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 70.26 ft
Depth to Water (btoc): 46.05 ft
Depth to LNAPL/DNAPL (btoc): 46.11 ft
Depth to Top of Screen (btoc): 45.26 ft
Screen Length): 25 ft

Water Column Height (do not include LNAPL or DNAPL): N/A ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = N/A ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 2.5 ppm
Wellbore PID/FID Reading: 225.5 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C
Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)

Start Time: N/A Elapsed Time (min): N/A Water Quality Meter ID & SN: TROLL 9500 -- N/A

Stop Time: N/A Average Purge Rate (mL/min): N/A Date Calibrated: N/A

SAMPLING DATA

Sample Date: N/A Sample Time: N/A Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow Sample Flow Rate (mL/min): N/A QA/QCSamples: N/A

VOA Vials, No Headspace ☐ Initials: N/A

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH_ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

not sampled due to LNAPL present Total Purge Volume: N/A mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-10-15 | WEATHER: Partly Cloudy 67°

MONITORING WELL ID: P-74 | SAMPLE ID: P74-ROX-071015

INITIAL DATA

Well Diameter): 4 in
Total Well Depth (btoc): 69.43 ft
Depth to Water (btoc): 43.28 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 44.43 ft
Screen Length): 25 ft

Water Column Height (do not include LNAPL or DNAPL): 26.15 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = 49.43 ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = N/A ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1023	43.53	CLEAR	NONE	6.92	0.1565	0.13	7.59	20.40	22.97
800	1025	↓	↓	↓	6.96	0.1527	0.13	7.57	20.50	22.86
1600	1027	↓	↓	↓	6.99	0.1492	0.13	7.57	21.98	22.80
2000	1028	43.54	↓	↓	7.00	0.1480	0.13	7.57	22.45	22.83
2400	1029	↓	↓	↓	7.01	0.1461	0.13	7.58	26.37	22.85
3200	1031	↓	↓	↓	7.02	0.1451	0.14	7.56	26.68	22.91

7-10-15

Start Time: 1023 | Elapsed Time (min): 9 mins | Water Quality Meter ID & SN: TROLL 9500 -- R24193

Stop Time: 1032 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-10-15

SAMPLING DATA

Sample Date: 7-10-15 | Sample Time: 1035 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: NONE

VOA Vials, No Headspace [X] Initials: ES / CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 3200 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-13-15 | WEATHER: Sunny 91°

MONITORING WELL ID: P-93A | SAMPLE ID: P93A-Rox-071315

INITIAL DATA

Well Diameter: 2 in
Total Well Depth (btoc): ~~63.47~~ 54.56 ft
Depth to Water (btoc): 45.93 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): ~~48.17~~ ft
Screen Length: ~~15~~ 10 ft ~~44.5~~

Water Column Height (do not include LNAPL or DNAPL): 8.63 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 50.93 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell: 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 2.5 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
STABLE: (over 3 readings)					+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C
0	1334	46.25	CLEAR	SLIGHT	6.69	1.659	0.65	0.24	39.37	23.44
400	1335	↓	↓	↓	6.68	1.635	0.01	0.09	35.68	22.61
1200	1337	↓	↓	↓	6.67	1.628	-0.01	0.05	30.09	22.39
1600	1338	46.35	↓	↓	6.68	1.626	-0.03	0.03	24.84	22.24
2400	1340	↓	↓	↓	6.68	1.626	-0.05	0.03	22.24	22.34
2800	1341	↓	↓	↓	6.70	1.624	-0.06	0.02	18.48	22.25
3600	1343	↓	↓	↓	6.71	1.620	-0.06	0.01	16.25	22.11

7-13-15

Start Time: 1334
Stop Time: 1344

Elapsed Time (min): ~~ES-1350~~ 10 MINS
Average Purge Rate (mL/min): 400

Water Quality Meter ID & SN: TROLL 9500 -- R24193
Date Calibrated: 7-13-15

SAMPLING DATA

Sample Date: 7-13-15
Sample Time: 1350
Lab Analysis: VOC, SVOC
Sample Method: Bladder Pump / Low Flow
Sample Flow Rate (mL/min): 400
QA/QC Samples: NONE
VOA Vials, No Headspace [X] Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: L. Williams / E. Schumacher

DATE: 7-9-15 | WEATHER: Sunny 74°

MONITORING WELL ID: P-93B | SAMPLE ID: P93B-ROX-070915 / P93B-ROX-070915-DUP

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 76.60 ft
Depth to Water (btoc): 47.74 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 74.60 ft
Screen Length): 2 ft

Water Column Height (do not include LNAPL or DNAPL): 28.86 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = N/A ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: ppm
Wellbore PID/FID Reading: 0.2 ppm

PURGE DATA

Pump Type: Dedicated Well Wizard

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1416	47.74	CLEAR	SLIGHT	6.83	1.267	-0.12	0.16	1.622	18.82
2400	1422	↓	↓	↓	6.86	1.440	-0.12	0.07	0.8593	18.70
4800	1428				6.87	1.424	-0.12	0.05	3.546	18.68
7200	1434				6.88	1.420	-0.12	0.04	0.7483	18.65

E. Schumacher 7-9-15

Start Time: 1416 | Elapsed Time (min): 19 mins | Water Quality Meter ID & SN: TROLL 9500 -- R24193
Stop Time: 1435 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-9-15

SAMPLING DATA

Sample Date: 7-9-15 | Sample Time: 1440 | Lab Analysis: VOC, SVOC
Sample Method: Bladder Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: DUP
VOA Vials, No Headspace ☒ Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 7200 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-13-15 | WEATHER: SUNNY 90°

MONITORING WELL ID: P-93C | SAMPLE ID: P93C-ROX-071315

INITIAL DATA

Well Diameter): 2 in | Total Well Depth (btoc): ~~96.20~~ 97.47 ft | Depth to Water (btoc): 47.09 ft | Depth to LNAPL/DNAPL (btoc): N/A ft | Depth to Top of Screen (btoc): ~~94.20~~ 92.47 ft | Screen Length): ~~2~~ 5 ft

Water Column Height (do not include LNAPL or DNAPL): 50.38 ft btoc

If Depth to Top of Screen is > Depth to Water, Place Pump at: ES ~~92.09~~ 94.97 ft btoc

Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) =

If Depth to Top of Screen is < Depth to Water, Place Pump at:

Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = N/A ft btoc

If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL

Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL

Ambient PID/FID Reading: 0.0 ppm

Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1122	47.12	CLEAR	STRONG	7.23	1.172	-0.20	0.49	1.379	23.14
400	1123	↓	↓	↓	7.11	1.190	-0.20	0.16	0.5665	21.90
1200	1125				7.06	1.201	-0.20	0.05	0.1268	21.46
1600	1126				7.04	1.216	-0.19	0.01	-0.0340	21.47
2400	1128				7.03	1.223	-0.19	-0.00	0.0573	21.45
2800	1129				7.02	1.222	-0.18	-0.01	0.3835	21.36
3600	1131				7.02	1.221	-0.18	-0.01	0.4135	21.17

7-13-15

Start Time: 1122 | Stop Time: 1132 | Elapsed Time (min): 10 MINS | Average Purge Rate (mL/min): 400

Water Quality Meter ID & SN: TROLL 9500 -- K24193 | Date Calibrated: 7-13-15

SAMPLING DATA

Sample Date: 7-13-15 | Sample Time: 1140 | Lab Analysis: VOC, SVOC

Sample Method: Bladder Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: NONE

VOA Vials, No Headspace ☒ Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 3600 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schwandtner

DATE: 7-9-15 | WEATHER: Cloudy 67°

MONITORING WELL ID: P-93D | SAMPLE ID: P93D-ROX-070915

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 128.00 ft
Depth to Water (btoc): 47.82 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 125.75 ft
Screen Length): 2 ft

Water Column Height (do not include LNAPL or DNAPL): 80.18 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = N/A ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.1 ppm
Wellbore PID/FID Reading: 0.1 ppm

PURGE DATA

Pump Type: Dedicated Well Wizard

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1333	47.82	CLEAR	SLIGHT	7.04	1.416	-0.18	0.62	0.9941	19.06
400	1334	↓	↓	↓	7.04	1.412	-0.18	0.48	0.8739	18.96
1200	1336				7.04	1.405	-0.18	0.40	1.238	19.02
1600	1337				7.04	1.396	-0.18	0.35	1.050	18.94
2800	1340				7.04	1.397	-0.17	0.27	1.246	18.94
4000	1343				7.04	1.401	-0.17	0.24	1.023	18.90
5200	1346				7.04	1.402	-0.16	0.22	0.2163	18.90
6400	1349				7.04	1.405	-0.16	0.20	0.6029	18.98

E. Schwandtner

7-9-15

Start Time: 1333 | Elapsed Time (min): 17 MINS | Water Quality Meter ID & SN: TROLL 9500 -- A24193

Stop Time: 1350 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-9-15

SAMPLING DATA

Sample Date: 7-9-15 | Sample Time: 1400 | Lab Analysis: VOC, SVOC

Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: NONE

VOA Vials, No Headspace ☒ Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

* Turbidity was recorded in FNU and not NTU.

Total Purge Volume: 6400 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW PROJECT NUMBER: 60400249-21563720.03003 FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-8-15 WEATHER: 62° Rainy

MONITORING WELL ID: P-114 SAMPLE ID: P-114-ROX-070815

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 52.67 ft
Depth to Water (btoc): 29.16 ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 32.67 ft
Screen Length): 20 ft

Water Column Height (do not include LNAPL or DNAPL): 23.51 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = N/A ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.6 ppm

PURGE DATA

Pump Type: Dedicated Well Wizard

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
					STABLE: (over 3 readings)	+/- 0.2	~~+/-3%~~ +/- 5%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C
0	1147	29.16	Brown	Slight HC	11.51	1.833	-0.12	4.44	200.8	66.75
ES ~~1200~~ 1200	1152				10.91	1.243	-0.12	4.00	174.1	66.93
ES ~~2400~~ 2600	1154				9.93	1.091	-0.10	3.94	133.8	66.97
ES ~~3200~~ 4800	1157				9.44	1.079	-0.10	3.03	114.8	67.00
ES ~~4000~~ 5000	1200				9.00	1.094	-0.10	3.85	78.59	66.97
ES ~~5200~~ 6200	1202				8.77	1.102	-0.10	2.96	73.19	66.89
ES ~~6000~~ 7400	1205				8.48	1.118	-0.10	3.20	60.70	66.93
ES ~~7800~~ 8600	1208				8.19	1.133	-0.11	2.82	66.00	66.94
9800	1210				7.97	1.139	-0.12	2.51	53.46	66.97
10000	1213				7.72	1.153	-0.11	2.82	65.18	67.03
11200	1216				7.59	1.156	-0.11	2.46	42.07	67.05
12400	1218				7.48	1.160	-0.11	2.39	55.10	67.05
13600	1221				7.42	1.164	-0.10	2.86	39.10	67.06
14800	1224				7.37	1.168	-0.10	2.53	71.94	67.07
15000	1226				7.33	1.174	-0.10	2.55	51.72	67.10
16200	1229				7.31	1.177	-0.10	2.40	33.39	67.14

Start Time: 1147 Elapsed Time (min): CW ~~83~~ min 43 mins Water Quality Meter ID & SN: TROLL 9500 -- R24193

Stop Time: 1230 Average Purge Rate (mL/min): ES ~~600~~ 400 Date Calibrated: 7-8-15

SAMPLING DATA

Sample Date: 7-8-15 Sample Time: 1235 Lab Analysis: VOC, SVOC

Sample Method: Bladder Pump / Low Flow Sample Flow Rate (mL/min): ES ~~600~~ 400 QA/QCSamples: ~~NONE~~ ES

VOA Vials, No Headspace ☒ Initials: ES/CW

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

* Turbidity was recorded in FNU and not NTU

Total Purge Volume: 16200 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: B. Tesfu / S. Fisher

DATE: 07/13/15 | WEATHER: 90°F / Humid

MONITORING WELL ID: ROST-3-MW | SAMPLE ID: ROST3MN-ROX-071315

INITIAL DATA

Well Diameter): 2 in
Total Well Depth (btoc): 48.06 ft
Depth to Water (btoc): 42.36 ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 37.81 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 5.7 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = — ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 45.21 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = — ft btoc

Volume of Flow Through Cell : 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C
Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	11:13	42.36	clear	SF	6.97	1.393	-124	0.07	28.26	18.73
600	11:15	↓	↓	↓	6.97	1.388	-127	0.03	24.57	18.73
1200	11:17				6.96	1.381	-128	0.00	14.06	18.78
1800	11:19				6.95	1.373	-130	-0.02	12.56	18.83

Samuel Fisher 7-13-15

Start Time: 11:13
Stop Time: 11:19

Elapsed Time (min): 6
Average Purge Rate (mL/min): ~~BT-2~~ 300

Water Quality Meter ID & SN: TROLL 9500 --
Date Calibrated: 07/13/15

SAMPLING DATA

Sample Date: 07/13/15
Sample Time: 11:25
Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow
Sample Flow Rate (mL/min): 300
QA/QCSamples: none
VOA Vials, No Headspace [X] Initials: SF

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Total Purge Volume: 1800 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: B. Tesfu / S. Fisher

DATE: 07/13/15 | WEATHER: 90°s F

MONITORING WELL ID: ROST-4-PZ(C) | SAMPLE ID: ROST4PZC-ROX-071315

INITIAL DATA

Well Diameter: 2 in
Total Well Depth (btoc): 45.20 ft
Depth to Water (btoc): 42.59 ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 34.95 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): 2.61 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ~ ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 43.90 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = ~ ft btoc

Volume of Flow Through Cell: 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.0 ppm
Wellbore PID/FID Reading: 0.0 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
~~300~~ 0	9:20	42.59	clear	N/A	6.72	2.234	-115	0.29	6.246	20.95
600	9:22	»	»		6.76	2.235	-117	0.09	3.081	20.5
1200	9:24				6.78	2.235	-118	0.02	5.213	20.17
1800	9:26		SF ~~grey~~ cloudy		6.80	2.237	-120	-0.03	6.667	19.94
0	10:13				6.84	2.253	-122	-0.00	36.55	20.34
300	10:15				6.88	2.250	-123	-0.05	27.67	20.0
1600	10:17				6.87	2.240	-124	-0.06	20.29	19.88
2400	10:19		Clear		6.87	2.232	-125	-0.07	11.48	19.64
				Samuel Fisher 7-13-15						

STABLE: (over 3 readings) | +/- 0.2 | +/-3% | +/-20 | +/-0.2 mg /L or +/-10% | <10 or +/-10% | +/- 0.2 °C

Start Time: 9:20
Stop Time: ~~9:26~~ SF 1019
Elapsed Time (min): SF ~~6~~ 59
Average Purge Rate (mL/min): ~~300 mL/min~~ 350
Water Quality Meter ID & SN: TROLL 9500 -- R25647
Date Calibrated: 07/13/15

SAMPLING DATA

Sample Date: 07/13/15
Sample Time: SF ~~9:35~~ 1025
Sample Method: Monsoon Pump / Low Flow
Sample Flow Rate (mL/min): SF ~~300~~ 400
VOA Vials, No Headspace ☒ Initials: SF
Lab Analysis: VOC, SVOC
QA/QC Samples: none

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH_ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Had issues with pump, some restabilized parameters before sampling Total Purge Volume: 4200 mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW PROJECT NUMBER: 60400249-21563720.03003 FIELD PERSONNEL: S. Fisher, D. Haxel

DATE: 7-8-15 WEATHER: 57° Rain

MONITORING WELL ID: ROST-5-PZ (PERCHED) SAMPLE ID:

INITIAL DATA

Well Diameter): 1 in
Total Well Depth (btoc): 23.20 ft
Depth to Water (btoc): NE ft
Depth to LNAPL/DNAPL (btoc): ft
Depth to Top of Screen (btoc): 13.20 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = ft btoc

Volume of Flow Through Cell : mL
Minimum Purge Volume = (3 x Flow Cell Volume): mL
Ambient PID/FID Reading: ppm
Wellbore PID/FID Reading: ppm

PURGE DATA

Pump Type:

	Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
STABLE: (over 3 readings)						+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Start Time: Elapsed Time (min): Water Quality Meter ID & SN: TROLL 9500 --

Stop Time: Average Purge Rate (mL/min): Date Calibrated:

SAMPLING DATA

Sample Date: Sample Time: Lab Analysis: VOC, SVOC

Sample Method: Peristaltic Pump / Low Flow Sample Flow Rate (mL/min): QA/QCSamples:

VOA Vials, No Headspace ☐ Initials:

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Not sampled per the SOP Total Purge Volume: mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW PROJECT NUMBER: 60400249-21563720.03003 FIELD PERSONNEL: S. Fisher, D. Haxel

DATE: 7-8-15 WEATHER: 87° Rain

MONITORING WELL ID: ROST-7-PZ (PERCHED) SAMPLE ID:

INITIAL DATA

Well Diameter): 1 in
Total Well Depth (btoc): 30.00 ft
Depth to Water (btoc): 20.54 ft
Depth to LNAPL/DNAPL (btoc): NE ft
Depth to Top of Screen (btoc): 20.00 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): _____ ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = _____ ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = _____ ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = _____ ft btoc

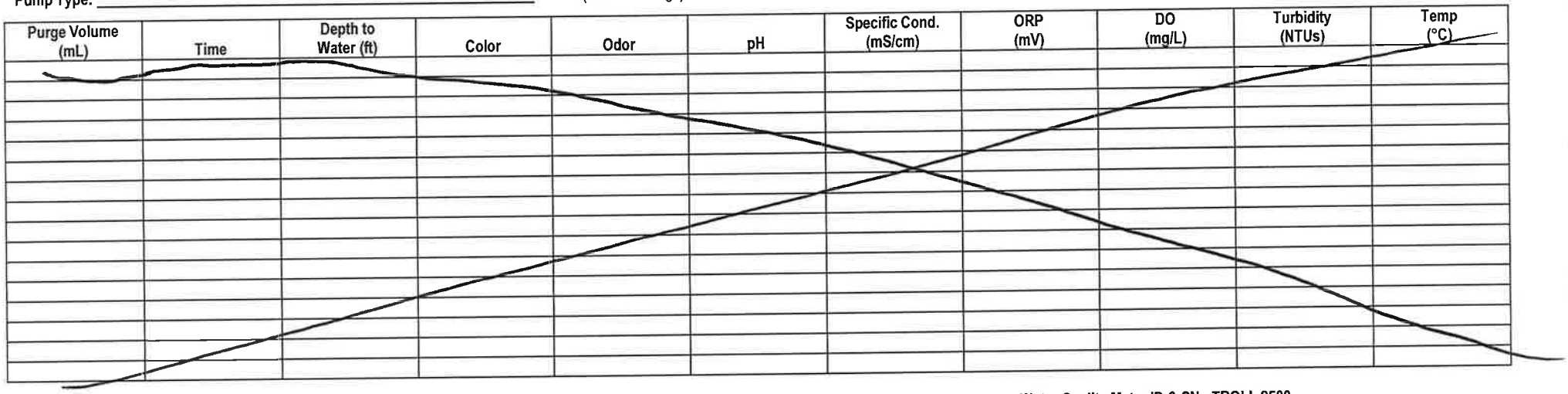
Volume of Flow Through Cell : _____ mL
Minimum Purge Volume = (3 x Flow Cell Volume): _____ mL
Ambient PID/FID Reading: _____ ppm
Wellbore PID/FID Reading: _____ ppm

PURGE DATA

Pump Type: _____

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)



Start Time: _____ Elapsed Time (min): _____ Water Quality Meter ID & SN: TROLL 9500 --

Stop Time: _____ Average Purge Rate (mL/min): _____ Date Calibrated: _____

SAMPLING DATA

Sample Date: _____ Sample Time: _____ Lab Analysis: VOC, SVOC

Sample Method: Peristaltic Pump / Low Flow Sample Flow Rate (mL/min): _____ QA/QCSamples: _____

VOA Vials, No Headspace ☐ Initials: _____

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Not sampled per the SOP

Total Purge Volume: _____ mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW PROJECT NUMBER: 60400249-21563720.03003 FIELD PERSONNEL: S. Fisher, D. Hexel

DATE: 7-8-15 WEATHER: 57° Rain

MONITORING WELL ID: ROST-10-PZ (PERCHED) SAMPLE ID:

NE

INITIAL DATA

Well Diameter): 1 in
Total Well Depth (btoc): 20.00 ft
Depth to Water (btoc): ~~18.85~~ ft
Depth to LNAPL/DNAPL (btoc): ft
Depth to Top of Screen (btoc): 10.00 ft
Screen Length): 10 ft

SF

Water Column Height (do not include LNAPL or DNAPL): ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = ft btoc

Volume of Flow Through Cell : mL
Minimum Purge Volume = (3 x Flow Cell Volume): mL
Ambient PID/FID Reading: ppm
Wellbore PID/FID Reading: ppm

PURGE DATA

Pump Type:

	Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
STABLE: (over 3 readings)						+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Start Time: Elapsed Time (min): Water Quality Meter ID & SN: TROLL 9500 --

Stop Time: Average Purge Rate (mL/min): Date Calibrated:

SAMPLING DATA

Sample Date: Sample Time: Lab Analysis: VOC, SVOC

Sample Method: Peristaltic Pump / Low Flow Sample Flow Rate (mL/min): QA/QCSamples:

VOA Vials, No Headspace ☐ Initials:

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH_ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Not Sampled per the SOP

Total Purge Volume: mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: S. Fisher, D. Haxel

DATE: 7-8-15 | WEATHER: 57° Rain

MONITORING WELL ID: ROST-21-PZ (PERCHED) | SAMPLE ID:

INITIAL DATA

Well Diameter): 1 in
Total Well Depth (btoc): 20.00 ft
Depth to Water (btoc): 18.84 ft
Depth to LNAPL/DNAPL (btoc): ft
Depth to Top of Screen (btoc): 10.00 ft
Screen Length): 10 ft

Water Column Height (do not include LNAPL or DNAPL): ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = ft btoc

Volume of Flow Through Cell : mL
Minimum Purge Volume = (3 x Flow Cell Volume): mL
Ambient PID/FID Reading: ppm
Wellbore PID/FID Reading: ppm

PURGE DATA

Pump Type:

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)

Start Time: | Elapsed Time (min): | Water Quality Meter ID & SN: TROLL 9500 --

Stop Time: | Average Purge Rate (mL/min): | Date Calibrated:

SAMPLING DATA

Sample Date: | Sample Time: | Lab Analysis: VOC, SVOC

Sample Method: Peristaltic Pump / Low Flow | Sample Flow Rate (mL/min): | QA/QCSamples:

VOA Vials, No Headspace ☐ Initials:

COMMENTS:

* Flow through cell volume calculated as: Volume = cup (725 mL) - pH ORP (16 mL) - RDO (56 mL) - Cond (13 mL) - Turb (40 mL)

Not sampled per the SOP

Total Purge Volume: mL

LOW FLOW GROUNDWATER SAMPLING DATA SHEET

PROJECT NAME: Roxana 3Q15 GW | PROJECT NUMBER: 60400249-21563720.03003 | FIELD PERSONNEL: C. Williams / E. Schumacher

DATE: 7-10-15 | WEATHER: Partly Cloudy 77°

MONITORING WELL ID: T-12 | SAMPLE ID: T12-ROX-071015

INITIAL DATA

Well Diameter: 6 in
Total Well Depth (btoc): 72.46 ft
Depth to Water (btoc): 46.09 ft
Depth to LNAPL/DNAPL (btoc): N/A ft
Depth to Top of Screen (btoc): 46.46 ft
Screen Length): 26 ft

Water Column Height (do not include LNAPL or DNAPL): 26.37 ft btoc
If Depth to Top of Screen is > Depth to Water, Place Pump at:
Total Well Depth – 0.5 (Screen Length + DNAPL Column Height) = N/A ft btoc
If Depth to Top of Screen is < Depth to Water, Place Pump at:
Total Well Depth – (0.5 X Water Column Height + DNAPL Column Height) = 51.09 ft btoc
If Screen Length and/or water column height is < 4 ft, Place Pump at: Total Well Depth - 2 ft = N/A ft btoc

Volume of Flow Through Cell: 600* mL
Minimum Purge Volume = (3 x Flow Cell Volume): 1800 mL
Ambient PID/FID Reading: 0.1 ppm
Wellbore PID/FID Reading: 7.9 ppm

PURGE DATA

Pump Type: Monsoon Stainless Steel Submersible Pump

	STABLE: (over 3 readings)	+/- 0.2	+/-3%	+/-20	+/-0.2 mg /L or +/-10%	<10 or +/-10%	+/- 0.2 °C

Purge Volume (mL)	Time	Depth to Water (ft)	Color	Odor	pH	Specific Cond. (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTUs)	Temp (°C)
0	1413	46.11	CLEAR	SLIGHT	6.76	0.9594	-0.11	0.55	2.241	23.14
800	1415	↓	↓	↓	6.75	0.9538	-0.12	0.29	2.003	22.90
1200	1416				6.75	0.9491	-0.12	0.18	2.191	22.63
2000	1418				6.75	0.9465	-0.12	0.14	1.894	22.51
2800	1420				6.75	0.9428	-0.12	0.10	1.780	22.32
3600	1422				6.75	0.9415	-0.12	0.07	1.742	22.27
4000	1423				6.75	0.9418	-0.12	0.05	1.771	22.26
4400	1424				6.75	0.9426	-0.12	0.04	1.768	22.31

7-10-15

Start Time: 1413 | Elapsed Time (min): 12 | Water Quality Meter ID & SN: TROLL 9500 -- R24193
Stop Time: 1425 | Average Purge Rate (mL/min): 400 | Date Calibrated: 7-10-15

SAMPLING DATA

Sample Date: 7-10-15 | Sample Time: 1430 | Lab Analysis: VOC, SVOC
Sample Method: Monsoon Pump / Low Flow | Sample Flow Rate (mL/min): 400 | QA/QCSamples: NONE
VOA Vials, No Headspace [X] Initials: ES/CW

COMMENTS:

Total Purge Volume: 4400 mL

Appendix B.
Data Review Forms and Laboratory Analytical Reports

Roxana Groundwater Quarterly – 3rd Quarter 2015 Data Review

Laboratory SDG: MC39909

Data Reviewer: Elizabeth Kunkel

Peer Reviewer: Steve Gragert

Date Reviewed: 7/27/2015

Guidance: USEPA National Functional Guidelines for Superfund Organic Methods Data Review 2014

Sample Identification	Sample Identification
MW26-ROX-070815	P114-ROX-070815
MW13-ROX-070815	MW1-ROX-070815
MW12-ROX-070815-EB	MW12-ROX-070815
P66-ROX-070815	P66-ROX-070815-Dup
TB-ROX-070815-A-HCL	TB-ROX-070815-A-ST
TB-ROX-070815-B-HCL	TB-ROX-070815-B-ST

1.0 Data Package Completeness

Were all items delivered as specified in the QAPP and COC as appropriate?

Yes

2.0 Laboratory Case Narrative \ Cooler Receipt Form

Were problems noted in the laboratory case narrative or cooler receipt form?

Yes, the laboratory case narrative indicated VOC MS/MSD and SVOC MSD recoveries and VOC and SVOC MS/MSD RPDs were outside evaluation criteria in sample MW26-ROX-070815. The surrogate bromofluorobenzene was outside criteria for Method 8011 VOCs in sample P66-ROX-070815-Dup and in trip blank TB-ROX-070815-B-ST. Although not indicated in the laboratory case narrative, analytes were detected in the equipment blank. These issues are addressed further in the appropriate sections below.

Additionally, initial calibration verifications exceeded 30 percent difference (%D) for VOC compounds acrolein, acetone, carbon disulfide, 2-butanone, and 2-hexanone, and for the SVOC compound hexachlorocyclopentadiene. Continuing calibration verifications exceeded 15% deviation for 1,2-dibromoethane and 1,2-dibromo-3-chloropropane. Please see validation reports associated with this SDG for further information on initial and continuing verification calibration %Ds and percent deviations outside evaluation criteria.

The cooler receipt form indicated that two of three coolers were received by the laboratory at temperatures of 1.3°C and 1.0°C, which are outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

3.0 Holding Times

Were samples extracted/analyzed within applicable limits?

Yes

4.0 Blank Contamination

Were any analytes detected in the Method Blanks, Field Blanks or Trip Blanks?

Yes

Blank ID	Parameter	Analyte	Concentration/ Amount
MW12-ROX-070815-EB	VOCs	Chloroform	0.42 µg/L
MW12-ROX-070815-EB	SVOCs	Benzyl alcohol	0.70 µg/L
MW12-ROX-070815-EB	PAHs	Phenanthrene	0.021 µg/L

Analytical data that were reported non-detect or at concentrations greater than five times (5X) the associated blank concentration did not require qualification. Please see section 12.0 of this review for additional qualifications regarding samples associated with phenanthrene in equipment blank MW12-ROX-070815-EB.

5.0 Laboratory Control Sample

Were LCS recoveries within evaluation criteria?

Yes

6.0 Surrogate Recoveries

Were surrogate recoveries within evaluation criteria?

No

Sample ID	Parameter	Surrogate	Recovery (%)	Criteria (%)
P66-ROX-070815-Dup	VOCs by 8011	Bromofluorobenzene	**151**	60-140
TB-ROX-070815-B-ST	VOCs by 8011	Bromofluorobenzene	**141**	60-140

Analytical data reported as non-detect and associated with surrogate recoveries above evaluation criteria, indicating a possible high bias, did not require qualification. Trip blank, TB-ROX-070815-B-ST is a quality control sample and did not require qualification. No qualification of data was required.

7.0 Matrix Spike and Matrix Spike Duplicate Recoveries

Were MS/MSD samples analyzed as part of this SDG?

Yes, sample MW26-ROX-070815 was spiked and analyzed for Method 8260 VOCs, Method 8011 VOCs, SVOCs, and PAHs.

Were MS/MSD recoveries within evaluation criteria?

No

MS/MSD ID	Parameter	Analyte	MS/MSD Recovery (%)	RPD	MS/MSD/ RPD Criteria
MW26-ROX-070815	VOCs	2-Chloroethyl vinyl ether	**9/0**	**200**	10-200/30
MW26-ROX-070815	VOCs	1,2,3-Trichlorobenzene	74/103	**33**	12-184/30
MW26-ROX-070815	SVOCs	Benzoic acid	51/**0**	**200**	10-69/20
MW26-ROX-070815	SVOCs	2-Chlorophenol	69/**138**	**66**	35-104/20
MW26-ROX-070815	SVOCs	4-Chloro-3-methyl	78/**155**	**65**	43-115/20

MS/MSD ID	Parameter	Analyte	MS/MSD Recovery (%)	RPD	MS/MSD/ RPD Criteria
		phenol			
MW26-ROX-070815	SVOCs	2,4-Dichlorophenol	80/**164**	**67**	42-116/20
MW26-ROX-070815	SVOCs	2,4-Dimethylphenol	47/**112**	**79**	26-109/20
MW26-ROX-070815	SVOCs	2,4-Dinitrophenol	88/**0**	**200**	19-140/20
MW26-ROX-070815	SVOCs	4,6-Dinitro-o-cresol	107/85	**25**	45-136/20
MW26-ROX-070815	SVOCs	2-Methylphenol	58/**118**	**66**	31-94/20
MW26-ROX-070815	SVOCs	3&4-Methylphenol	57/**111**	**62**	30-91/20
MW26-ROX-070815	SVOCs	2-Nitrophenol	89/**186**	**69**	38-121/20
MW26-ROX-070815	SVOCs	Pentachlorophenol	94/**164**	**52**	41-126/20
MW26-ROX-070815	SVOCs	Phenol	34/**64**	**60**	16-51/20
MW26-ROX-070815	SVOCs	2,4,5-Trichlorophenol	86/**178**	**68**	50-124/20
MW26-ROX-070815	SVOCs	2,4,6-Trichlorophenol	86/**168**	**63**	43-123/20
MW26-ROX-070815	SVOCs	Aniline	55/73	**26**	17-89/20
MW26-ROX-070815	SVOCs	Pyridine	33/56	**48**	10-73/20

LCS/LCSD recoveries were within evaluation criteria; no further qualification of data was required.

8.0 Internal Standard (IS) Recoveries

Were internal standard area recoveries within evaluation criteria?

Yes

9.0 Laboratory Duplicate Results

Were laboratory duplicate samples analyzed as part of this SDG?

No

10.0 Field Duplicate Results

Were field duplicate samples collected as part of this SDG?

Yes

Field ID	Field Duplicate ID
P66-ROX-070815	P66-ROX-070815-Dup

Were field duplicates within evaluation criteria?

Yes

11.0 Sample Dilutions

For samples that were diluted and nondetect, were undiluted results also reported?

Not applicable; samples analyzed did not require dilution.

12.0 Additional Qualifications

Were additional qualifications applied?

Yes, professional judgment was also used to qualify as estimated, however not reject, data that was associated with phenanthrene in equipment blank MW12-ROX-070815-EB, due to comparable historical detections.

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
MW12-ROX-070815	PAHs	Phenanthrene	-	**J**

1.0 VALIDATION OF EDB/DBCP DATA – SDG MC39909

This section describes the validation for seven groundwater samples and one equipment blank which were prepared and analyzed for 1,2-dibromoethane (EDB) and 1,2-dibromo-3-chloropropane (DBCP) by USEPA SW-846 Method 8011. The samples were analyzed by Accutest Laboratories of Marlborough, Massachusetts and submitted as part of the sample delivery group (SDG) MC39909. The samples included as part of this validation are listed below.

Sample Identification	Sample Identification
MW26-ROX-070815	P114-ROX-070815
MW13-ROX-070815	MW1-ROX-070815
MW12-ROX-070815-EB	P66-ROX-070815
P66-ROX-070815-Dup	MW12-ROX-070815

Evaluation of the analytical data followed procedures outlined in the USEPA Contract Laboratory National Functional Guidelines for Superfund Organic Methods Data Review (EPA 2014).

Criteria evaluated included the following method performance criteria:

- Data package completeness
- Laboratory case narrative/cooler receipt form
- Holding times and sample preservation
- Initial calibration
- Calibration verification
- Blank samples
- Surrogate spike recoveries
- Matrix spike/matrix spike duplicate (MS/MSD) samples
- Internal standards
- Laboratory control spike (LCS) samples
- Target compound identification and quantification
- Overall data assessment

1.1 Data Package Completeness

The data package was reviewed to make certain that it contained the data contractually required in the deliverable. This included checking the data package for the results of each analyte requested for each field sample submitted in the analytical batch, along with requested QC documentation for the respective methods.

1.2 Laboratory Case Narrative/Cooler Receipt Form

The laboratory case narrative indicated the surrogate bromofluorobenzene was outside criteria for Method 8011 VOCs in sample P66-ROX-070815-Dup. Continuing calibration verifications exceeded 15% deviation for 1,2-dibromoethane and 1,2-dibromo-3-chloropropane. These issues are addressed further in the appropriate sections of this validation.

The cooler receipt form indicated that two of three coolers were received by the laboratory at temperatures of 1.3°C and 1.0°C, which are outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

1.3 Holding Times and Sample Preservation

Review of the sample collection and analysis dates involved comparing the sample chain-of-custody, the summary forms, the raw data forms, and the chromatograms for accuracy, consistency, and holding time compliance. The samples were received in good condition at temperatures of 1.3ºC and 1.0ºC, and maintained at approximately 4°C $\pm$ 2°C. In addition, the samples were analyzed within 14 days of collection. No qualifications to the data were required based on holding times and sample preservation.

1.4 Initial Calibration

An initial calibration (ICAL) was established to assess whether the instrument was capable of producing acceptable qualitative and quantitative data for EDB/DBCP analyses. Validated samples included in SDG MC39909 were analyzed using instrument GCBB. The ICAL for instrument GCBK was established on 7/20/2015. At least five standard concentrations were used to establish the ICAL curve as required by Method 8011.

Review of the initial calibration summary forms indicated percent relative standard deviations (%RSDs) were ≤ 15% for target analytes or were determined using least square linear regression and correlation coefficients (r) were greater than 0.990. A recalculation of the %RSDs was performed from the raw data and no errors in calculation were noted; therefore, no qualification of data was required.

Review of the sample chromatograms indicated that a second source calibration was performed following the initial calibration. Review of ICV summary forms indicated percent difference (%D) ≤ 15% for target analytes. Recalculation of the percent recoveries was completed and no errors in calculation were noted.

1.5 Calibration Verification

Review of the sample chromatograms indicated that all calibration verifications (CVs) were performed before the start of sample analysis. Percent differences (%Ds) met the evaluation criteria of ≤ 15% for target analytes with the exceptions summarized in the table below.

CV (Date/Time)	Analyte	%D
7/20/2015 9:32	1,2-Dibromoethane	**-27.2**
7/20/2015 9:32	1,2-Dibromo-3-chloropropane	**-28.8**

Analytical data reported as non-detect and associated with decreases in %D indicating a possible high bias, did not require qualification. No qualification of data was required.

Recalculations of the %Ds for target compounds were completed for each CV, and no errors in calculation were noted; therefore, no qualifications of data were required.

1.6 Blank Samples

The purpose of the method blank samples is to evaluate the existence and magnitude of contamination problems emanating from laboratory activities. Method blank samples were analyzed with each analytical batch as required by USEPA SW-846 Method 8011. Also, trip blanks were analyzed to evaluate the existence and magnitude of contamination problems emanating during sample shipment to the laboratory. Equipment blank samples were used to evaluate the efficiency of the decontamination of sampling equipment. Target compounds were reported as non-detect. No qualification of data was required.

1.7 Surrogate Spike Recoveries

Surrogate compounds were used to evaluate the overall laboratory sample preparation efficiency on a per sample basis. Surrogate recoveries were within the method acceptance criteria for the validated samples with the exception summarized in the table below.

Sample ID	Parameter	Surrogate	Recovery (%)	Criteria (%)
P66-ROX-070815-Dup	VOCs by 8011	Bromofluorobenzene	**151**	60-140

Analytical data reported as non-detect and associated with surrogate recoveries above evaluation criteria, indicating a possible high bias, did not require qualification. No qualification of data was required.

Approximately 10% of the recoveries were recalculated and no calculation or transcription errors were noted.

1.8 Matrix Spike/Matrix Spike Duplicate (MS/MSD) Samples

MS/MSD samples are analyzed to assess potential matrix effects. Sample MW26-ROX-070815 was spiked and analyzed for 1,2-dibromo-3-chloropropane and 1,2-dibromomethane. MS/MSD data were within evaluation criteria.

Approximately 10% of the MS/MSD spiking recoveries were verified using the MS/MSD summary forms, and no errors were noted.

1.9 Laboratory Control Spike (LCS) Samples

Laboratory control samples were analyzed with each analytical batch to assess the accuracy of the analytical process. LCS data were within evaluation criteria. Approximately 10% of spiking compound recoveries for the LCS were recalculated and verified using the LCS summary forms, and no calculation or transcription errors were noted.

1.10 Target Compound Identification and Quantification

For validation of the compound identification, chromatograms were reviewed to verify the major peaks were identified, and the relative retention time was no greater than 0.06 different from the associated CV retention times. Approximately 10% of the detected target analytes were verified. No anomalies were noted with the identification of the target compounds in the samples.

For the validation of compound quantitation, the matrix spike results were recalculated from the raw data since all target analytes were non-detect, and no calculation errors were noted. Additionally, the reporting limits were verified to determine if reporting limits (RLs) were adjusted for dilutions. No qualification of the data was required and review of the data indicated the correct RLs were reported.

1.11 Overall Data Assessment

Based on the criteria outlined, it is recommended that the results reported for these analyses are accepted for their intended use. Acceptable levels of accuracy and precision, based on LCS, MS/MSD, and surrogate data were achieved for this SDG.

1.0 VALIDATION OF VOC DATA – SDG MC39909

This section describes the validation for seven groundwater samples and one equipment blank which were prepared by USEPA SW-846 Method 5030B and analyzed for volatile organic compounds (VOCs) by USEPA SW-846 Method 8260C. The samples were analyzed by Accutest Laboratories of Marlborough, Massachusetts and submitted as part of the sample delivery group (SDG) MC39909. The samples included as part of this validation are listed below.

Sample Identification	Sample Identification
MW26-ROX-070815	P114-ROX-070815
MW13-ROX-070815	MW1-ROX-070815
MW12-ROX-070815-EB	P66-ROX-070815
P66-ROX-070815-Dup	MW12-ROX-070815

Evaluation of the analytical data followed procedures outlined in the USEPA Contract Laboratory National Functional Guidelines for Superfund Organic Methods Data Review (EPA 2014).

Criteria evaluated included the following method performance criteria:

- Data package completeness
- Laboratory case narrative/cooler receipt form
- Holding times and sample preservation
- GC/MS instrument performance
- Initial calibration
- Calibration verification
- Blank samples
- Surrogate spike recoveries
- Matrix spike/matrix spike duplicate (MS/MSD) samples
- Internal standards
- Laboratory control spike (LCS) samples
- Target compound identification and quantification
- Overall data assessment

1.1 Data Package Completeness

The data package was reviewed to make certain that it contained the data contractually required in the deliverable. This included checking the data package for the results of each analyte requested for each field sample submitted in the analytical batch, along with requested QC documentation for the respective methods.

1.2 Laboratory Case Narrative/Cooler Receipt Form

The laboratory case narrative indicated VOC MS/MSD recoveries and MS/MSD RPDs were outside evaluation criteria in sample MW26-ROX-070815. Chloroform was detected in the equipment blank. Initial calibration verifications exceeded 30 percent difference (%D) for acrolein, acetone, carbon disulfide, 2-butanone, and 2-hexanone. These issues are addressed further in the appropriate sections of this validation.

The cooler receipt form indicated two of two coolers were received by the laboratory at temperatures of 1.3ºC and 1.0ºC, which are outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

1.3 Holding Times and Sample Preservation

Review of the sample collection and analysis dates involved comparing the sample chain-of-custody, the summary forms, the raw data forms, and the chromatograms for accuracy, consistency, and holding time compliance. The samples were received in good condition at temperatures of 1.3ºC and 1.0ºC, and maintained at approximately $4^{o}C \pm 2^{o}$ C. In addition, the samples were analyzed within 14 days of collection at a pH < 2. No qualifications to the data were required based on holding times and sample preservation.

1.4 GC/MS Instrument Performance

GC/MS instrument performance checks were performed to ensure mass resolution, identification, and instrument sensitivity. Criteria for evaluation of instrument performance included possible transcription/calculation errors, adherence to instrument tuning frequency requirements, mass assignments, and ion abundance criteria. Instrument performance check samples were evaluated against criteria established in USEPA SW-846 Method 8260.

Based on the summary forms, the ion abundance criteria were within evaluation criteria for all masses. No qualifications to the data were required based on instrument performance criteria.

1.5 Initial Calibration

An initial calibration (ICAL) was established to assess whether the instrument was capable of producing acceptable qualitative and quantitative data for volatiles analyses. Validated samples included in SDG MC39909 were analyzed using instrument MSV. The ICAL for instrument MSV was established on 7/15/2015. At least five standard concentrations were used to establish the ICAL curves as required by Method 8260C.

The ICAL response factors (RFs) were reviewed and were greater than 0.01 for chloromethane, 0.30 for 1,1-dichloroethane, 0.10 for bromoform, 0.40 for chlorobenzene, 0.20 for 1,1,2,2-tetrachloroethane, and greater than National Functional Guideline (NFG) specified minimum RRFs for all other target analytes. Non-detect data associated with low response factors for acrolein (0.011), acetone (0.035), 2-butanone (0.030), and 1,4-dioxane (0.001) were qualified as estimated. NFG (2014) does not list acrolein in any initial calibration tables, and only lists 1,4-dioxane under SVOCs. Qualifications of data due to ICAL RRF are summarized in the following table.

Sample ID	Analyte	Qualification
MW26-ROX-070815	Acrolein	**UJ**
MW26-ROX-070815	Acetone	**UJ**
MW26-ROX-070815	2-Butanone	**UJ**

Sample ID	Analyte	Qualification
MW26-ROX-070815	1,4-Dioxane	**UJ**
P114-ROX-070815	Acrolein	**UJ**
P114-ROX-070815	Acetone	**UJ**
P114-ROX-070815	2-Butanone	**UJ**
P114-ROX-070815	1,4-Dioxane	**UJ**
MW13-ROX-070815	Acrolein	**UJ**
MW13-ROX-070815	Acetone	**UJ**
MW13-ROX-070815	2-Butanone	**UJ**
MW13-ROX-070815	1,4-Dioxane	**UJ**
MW1-ROX-070815	Acrolein	**UJ**
MW1-ROX-070815	Acetone	**UJ**
MW1-ROX-070815	2-Butanone	**UJ**
MW1-ROX-070815	1,4-Dioxane	**UJ**
P66-ROX-070815	Acrolein	**UJ**
P66-ROX-070815	Acetone	**UJ**
P66-ROX-070815	2-Butanone	**UJ**
P66-ROX-070815	1,4-Dioxane	**UJ**
P66-ROX-070815-Dup	Acrolein	**UJ**
P66-ROX-070815-Dup	Acetone	**UJ**
P66-ROX-070815-Dup	2-Butanone	**UJ**
P66-ROX-070815-Dup	1,4-Dioxane	**UJ**
MW12-ROX-070815	Acrolein	**UJ**
MW12-ROX-070815	Acetone	**UJ**
MW12-ROX-070815	2-Butanone	**UJ**
MW12-ROX-070815	1,4-Dioxane	**UJ**

Review of the initial calibration summary forms indicated %RSDs were $\leq$ 30% for calibration check compounds (CCCs) [1,1-dichloroethene, toluene, chloroform, ethylbenzene, 1,2-dichloropropane, and vinyl chloride], and $\leq$ 15% for non-CCCs with some exceptions. The initial calibration for compounds with %RSD values outside evaluation criteria was determined using least square linear regression: correlation coefficients (r) were greater than 0.990.

An initial calibration verification (ICV) was analyzed following the initial calibration. Percent difference (%D) values from comparing ICV RF to the average ICAL RFs were within criteria specified in NFG (2014) with the exception of carbon disulfide (-33.8%). NFG (2014) does not list acrolein (-45.5% D) in the calibration tables. The following table summarizes %Ds > 20%; if outside 2014 NFG criteria, the %D is marked with an asterisk.

ICV (Date/Time)	Analyte	%D
7/15/2015 9:02	Dichlorodifluoromethane	**24.6**
7/15/2015 9:02	Acrolein	**-45.5**
7/15/2015 9:02	Acetone	**-48.6**
7/15/2015 9:02	Carbon disulfide	**-33.8***
7/15/2015 9:02	2-Butanone	**-36.7**
7/15/2015 9:02	2-Hexanone	**-48.7**

The results for acrolein, acetone, carbon disulfide, 2-butanone, and 2-hexanone in the validated samples associated with increases in %D, indicating a potential high bias, were non-detect and were not qualified. Dichlorodifluoromethane %D showed potential negative bias, however was within 2014 NFG criteria. No qualification of data was required.

A recalculation of the %RSDs and RFs for a compound associated with each internal standard was performed from the raw data and no errors in calculation were noted; therefore, no qualification of data was required.

1.6 Calibration Verification

Review of the sample chromatograms indicated that all calibration verifications (CVs) were performed before the start of sample analysis. Review of CV summary forms indicated RFs met the evaluation criteria of greater than 0.01 for chloromethane, 0.30 for 1,1-dichloroethane, 0.10 for bromoform, 0.40 for chlorobenzene, 0.20 for 1,1,2,2-tetrachloroethane, and greater than 2014 NFG specified minimum RRFs for all other target analytes. Non-detect data associated with low response factors for acrolein (0.011), acetone (0.040), and 2-butanone (0.032) were previously qualified as estimated from the initial calibration. Therefore, no further qualification of data was required.

Percent difference (%D) values were within criteria specified in NFG (2014). The following table summarizes %Ds > 20%.

CV (Date/Time)	Analyte	%D
7/17/2015 9:50	Dichlorodifluoromethane	**25.6%**
7/17/2015 9:50	Carbon disulfide	**23.7%**

Dichlorodifluoromethane and carbon disulfide %Ds showed potential negative bias, however were within 2014 NFG criteria. No qualification of data was required.

Recalculations of the RFs and %Ds for two target compounds were completed for each CV, and no errors in calculation were noted; therefore, no qualifications of data were required.

1.7 Blank Samples

The purpose of the method blank samples is to evaluate the existence and magnitude of contamination problems emanating from laboratory activities. Method blank samples were analyzed with each analytical batch as required by USEPA SW-846 Method 8260C. Also, trip blanks were analyzed to evaluate the existence and magnitude of contamination problems emanating during sample shipment to the laboratory. Equipment blank samples are used to evaluate the efficiency of the decontamination of sampling equipment. Target compounds were reported as non-detect with the exception summarized in the table below.

Blank ID	Parameter	Analyte	Concentration/ Amount
MW12-ROX-070815-EB	VOCs	Chloroform	0.42 µg/L

Analytical data that were reported non-detect or at concentrations greater than five times (5X) the associated blank concentration did not require qualification. No qualification of data was required.

1.8 Surrogate Spike Recoveries

Surrogate compounds were used to evaluate the overall laboratory sample preparation efficiency on a per sample basis. All surrogate recoveries were within the method acceptance criteria for the validated samples. Approximately 10% of the recoveries were recalculated and no calculation or transcription errors were noted.

1.9 Matrix Spike/Matrix Spike Duplicate (MS/MSD) Samples

MS/MSD samples are analyzed to assess potential matrix effects. Sample MW26-ROX-070815 was spiked and analyzed for 8260 VOCs. MS/MSD data were within evaluation criteria, with the exception of those summarized in the following table.

MS/MSD ID	Parameter	Analyte	MS/MSD Recovery (%)	RPD	MS/MSD/ RPD Criteria
MW26-ROX-070815	VOCs	2-Chloroethyl vinyl ether	**9/0**	**200**	10-200/30
MW26-ROX-070815	VOCs	1,2,3-Trichlorobenzene	74**/**103	**33**	12-184/30

LCS/LCSD recoveries were within evaluation criteria; therefore, no further qualification of data was required.

Approximately 10% of the MS/MSD spiking recoveries were recalculated and verified using the MS/MSD summary forms, and no errors were noted.

1.10 Internal Standards

Internal standard (IS) performance criteria ensure that the GC/MS sensitivity and response are stable during each analytical run. IS areas must be within -50% to +100%, and the IS retention times must be within 30 seconds of the IS continuing calibration retention time. IS areas and retention times for the validated samples in this SDG were within evaluation criteria.

The summary forms versus the raw data were verified and no transcription errors were noted. No qualification of data was required.

1.11 Laboratory Control Spike (LCS) Samples

Laboratory control samples were analyzed with each analytical batch to assess the accuracy of the analytical process. LCS data were within evaluation criteria.

Approximately 10% of spiking compound recoveries for the LCS were recalculated and verified using the LCS summary forms, and no calculation or transcription errors were noted. No qualification of data was required.

1.12 Target Compound Identification and Quantification

For validation of the compound identification, chromatograms were reviewed to verify the major peaks were identified, and the relative retention time was no greater than 0.06 different from the associated CV retention times. Approximately 10% of the detected target analytes were recalculated and verified. No anomalies were noted with the identification of the target compounds in the samples.

For the validation of compound quantitation, approximately 10% of the detected target analytes were recalculated from the raw data, and no calculation errors were noted.

Additionally, the reporting limits were verified to determine if reporting limits (RLs) were adjusted for dilutions. No qualification of the data was required and review of the data indicated the correct RLs were reported.

1.13 Overall Data Assessment

Based on the criteria outlined, it is recommended that the results for these analyses are accepted for their intended use. Acceptable levels of accuracy and precision, based on LCS and surrogate data were achieved for this SDG.

1.0 VALIDATION OF SVOC DATA – SDG MC39909

This section describes the validation for seven groundwater samples and one equipment blank which were prepared by USEPA SW-846 Method 3520C and analyzed for semi-volatile organic compounds (SVOCs) by USEPA SW-846 Method 8270C and for polycyclic aromatic hydrocarbons (PAHs) by USEPA SW-846 Method 8270C SIM. Samples were analyzed by Accutest Laboratories of Marlborough, Massachusetts, and submitted as part of sample delivery group (SDG) MC39909. Samples included as part of this validation are listed below:

Sample Identification	Sample Identification
MW26-ROX-070815	P114-ROX-070815
MW13-ROX-070815	MW1-ROX-070815
MW12-ROX-070815-EB	MW12-ROX-070815
P66-ROX-070815	P66-ROX-070815-Dup

Evaluation of the analytical data followed procedures outlined in the USEPA Contract Laboratory National Functional Guidelines for Superfund Organic Methods Data Review (EPA 2014).

Criteria evaluated included the following method performance criteria:

- Data package completeness
- Laboratory case narrative/cooler receipt form
- Holding times and sample preservation
- GC/MS instrument performance
- Initial calibration
- Calibration verification
- Blank samples
- Surrogate spike recoveries
- Matrix spike/matrix spike duplicate (MS/MSD) samples
- Internal standard areas
- Laboratory control sample (LCS)
- Target compound identification and quantitation
- Overall data assessment

1.0 Data Package Completeness

The data package was reviewed to make certain that it contained the data contractually required in the deliverable. This included checking the data package for the results of each analyte requested for each field sample submitted in the analytical batch, along with requested QC documentation for the respective methods. The data package was complete.

1.2 Laboratory Case Narrative/Cooler Receipt Form

The cooler receipt form indicated that two of three coolers were received by the laboratory at temperatures of 1.3°C and 1.0°C, which are outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

The laboratory case narrative indicated SVOC MSD recoveries and MS/MSD RPDs were outside evaluation criteria in sample MW26-ROX-070815. Initial calibration verification and continuing calibration verification percent differences were outside evaluation criteria. Initial calibration verifications exceeded 30 percent difference (%D) for hexachlorocyclopentadiene. These issues are addressed further in the appropriate sections of this validation.

The cooler receipt form indicated two of two coolers were received by the laboratory at temperatures of 1.3ºC and 1.0ºC, which are outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

1.3 Holding Times and Sample Preservation

Review of the sample collection and analysis dates involved comparing the chain-of-custody, the summary forms, the raw data forms, and the chromatograms for accuracy, consistency, and holding time compliance. The validated samples were received in good condition at temperatures of 1.3ºC and 1.0ºC and maintained at approximately $4^{o}C \pm 2^{o}C$, and were extracted within seven days of collection and analyzed within 40 days of extraction. No qualification of data was required due to sample preservation or holding time criteria.

1.4 GC/MS Instrument Performance

GC/MS instrument performance checks were performed to ensure mass resolution, identification, and instrument sensitivity. Criteria for evaluation of instrument performance included possible transcription/calculation errors, adherence to instrument tuning frequency requirements, mass assignments, and ion abundance criteria. Instrument performance check samples were evaluated against the laboratory tuning criteria established in Method 8270C.

Based on the raw data, the ion abundance criteria were within evaluation criteria for all masses, therefore; no qualification of the data was required. The raw data forms were checked against the summary forms and no calculation or transcription errors were noted.

1.5 Initial Calibration

An Initial calibration (ICAL) was established to assess whether the instrument was capable of producing acceptable qualitative and quantitative data for semi-volatile analysis. SVOC samples as part of SDG MC9909 were analyzed using instrument MSX, and PAH samples were analyzed using instrument MSI. The ICAL for instrument MSX was established on 5/11/2015. The ICAL for instrument MSI was established on 7/21/2015. ICALs for instruments MSX and MSI were established prior to sample analysis and using at least five concentration standards to establish the initial calibration curve as required by Method 8270C and 8270C SIM. An average response factor (RF) was determined for each target analyte, and the RFs were reviewed and verified as greater than 0.05 for all target analytes.

Review of the initial calibration summary forms for SVOCs and PAHs indicated calibration check compounds (CCCs) had percent relative standard deviations (%RSDs) $\leq$ 30%. All other target analytes had %RSDs less than 15% for CCCs with some exceptions. The initial calibration for compounds with %RSD values outside evaluation criteria was determined using least square linear regression and the correlation coefficients (r) were greater than 0.990.

Initial calibration verifications (ICVs) for SVOCs and PAHs were analyzed following the initial calibrations. Percent difference (%D) values comparing ICV RF to the average ICAL RFs were less than those specified in NFG (2014) for target, or closely analgous, compounds with the exceptions summarized in the following table.

ICV (Date/Time)	Analyte	%D
5/11/2015 9:17	4-Chloroaniline	**25.1**
5/11/2015 9:17	Hexachlorocyclopentadiene	**35.2**

Qualifications of data due to ICV %D are summarized in the following table.

Sample ID	Analyte	Qualifications
MW26-ROX-070815	4-Chloroaniline	**UJ**
MW26-ROX-070815	Hexachlorocyclopentadiene	**UJ**
P114-ROX-070815	4-Chloroaniline	**UJ**
P114-ROX-070815	Hexachlorocyclopentadiene	**UJ**
MW13-ROX-070815	4-Chloroaniline	**UJ**
MW13-ROX-070815	Hexachlorocyclopentadiene	**UJ**
MW1-ROX-070815	4-Chloroaniline	**UJ**
MW1-ROX-070815	Hexachlorocyclopentadiene	**UJ**
MW12-ROX-070815	4-Chloroaniline	**UJ**
MW12-ROX-070815	Hexachlorocyclopentadiene	**UJ**
P66-ROX-070815	4-Chloroaniline	**UJ**
P66-ROX-070815	Hexachlorocyclopentadiene	**UJ**
P66-ROX-070815-Dup	4-Chloroaniline	**UJ**
P66-ROX-070815-Dup	Hexachlorocyclopentadiene	**UJ**

Recalculations of the RFs and %RSD for one compound per internal standard were performed, and no errors in calculation were noted.

1.6 Calibration Verification

Review of sample chromatograms indicated the calibration verifications (CVs) were performed prior to sample analysis. Review of continuing calibration summary forms for SVOCs and PAHs indicated all RFs met the evaluation criteria of greater than 0.05 for all target analytes. In addition, percent differences (%Ds) met the evaluation criteria of less than or equal to specified in NFG (2014) for target, or closely analgous, compounds, with the exception summarized in the table below.

CV (Date/Time)	Analyte	%D
7/21/2015 8:19	Benzo(k)fluoranthene	**-21.6**
7/22/2015 9:39	Benzoic acid	**25.8**
7/22/2015 10:34	bis(2-Chloroisopropyl)ether	**20.5**
7/22/2015 10:34	Benzoic acid	**20.5**
7/22/2015 10:34	2,6-Dinitrotoluene	**-22.6**

Analytical data that required qualification based on continuing calibration %Ds are included in the table below. Analytical data reported as non-detect and associated with increases in continuing calibration %Ds, indicating a possible high bias, did not require qualification.

Sample ID	Analyte	Qualifications
MW26-ROX-070815	Benzoic acid	**UJ**
MW26-ROX-070815	bis(2-Chloroisopropyl)ether	**UJ**
P114-ROX-070815	Benzoic acid	**UJ**
P114-ROX-070815	bis(2-Chloroisopropyl)ether	**UJ**
MW13-ROX-070815	Benzoic acid	**UJ**
MW13-ROX-070815	bis(2-Chloroisopropyl)ether	**UJ**
MW1-ROX-070815	Benzoic acid	**UJ**
MW1-ROX-070815	bis(2-Chloroisopropyl)ether	**UJ**
MW12-ROX-070815	Benzo(k)fluoranthene	**J**
MW12-ROX-070815	Benzoic acid	**UJ**
MW12-ROX-070815	bis(2-Chloroisopropyl)ether	**UJ**
P66-ROX-070815	Benzoic acid	**UJ**
P66-ROX-070815	bis(2-Chloroisopropyl)ether	**UJ**
P66-ROX-070815-Dup	Benzoic acid	**UJ**
P66-ROX-070815-Dup	bis(2-Chloroisopropyl)ether	**UJ**

Recalculations of the RFs and %RSD for one compound per internal standard were performed, and no errors in calculation were noted.

1.7 Blank Samples

The purpose of method blank samples is to evaluate the existence and magnitude of contamination problems emanating from laboratory activities. Method blank samples were analyzed with each analytical batch as required by USEPA SW-846 Method 8270C. Equipment blank samples are used to evaluate the efficiency of the decontamination of sampling equipment. Target compounds in the blank samples were reported as non-detect with the exceptions of those summarized in the table below.

Blank ID	Parameter	Analyte	Concentration/ Amount
MW12-ROX-070815-EB	SVOCs	Benzyl alcohol	0.70 µg/L
MW12-ROX-070815-EB	PAHs	Phenanthrene	0.021 µg/L

Analytical data that were reported non-detect or at concentrations greater than five times (5X) the associated blank concentration did not require qualification. Professional judgment was used to qualify as estimated, however not reject, data that was associated with phenanthrene in equipment blank MW12-ROX-070815-EB, due to comparable historical detections.

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
MW12-ROX-070815	PAHs	Phenanthrene	-	**J**

1.8 Surrogate Spike Recoveries

Surrogate compounds were used to evaluate the overall laboratory sample preparation efficiency on a per-sample basis. Surrogate recoveries were within the method acceptance criteria for all validated samples.

Approximately 10% of the surrogate recoveries were recalculated, and the summary forms versus the raw data were verified. No calculation or transcription errors were noted.

1.9 Matrix Spike/Matrix Spike Duplicate (MS/MSD) Samples

MS/MSD samples are analyzed to assess potential matrix effects. Sample MW26-ROX-070815 was spiked and analyzed for SVOCs.

MS/MSD recoveries were within the method acceptance criteria for the validated samples with the exception of those summarized in the table below.

MS/MSD ID	Parameter	Analyte	MS/MSD Recovery (%)	RPD	MS/MSD/ RPD Criteria
MW26-ROX-070815	SVOCs	Benzoic acid	51/**0**	**200**	10-69/20
MW26-ROX-070815	SVOCs	2-Chlorophenol	69/**138**	**66**	35-104/20
MW26-ROX-070815	SVOCs	4-Chloro-3-methyl phenol	78/**155**	**65**	43-115/20
MW26-ROX-070815	SVOCs	2,4-Dichlorophenol	80/**164**	**67**	42-116/20
MW26-ROX-070815	SVOCs	2,4-Dimethylphenol	47/**112**	**79**	26-109/20
MW26-ROX-070815	SVOCs	2,4-Dinitrophenol	88/**0**	**200**	19-140/20
MW26-ROX-070815	SVOCs	4,6-Dinitro-o-cresol	107/85	**25**	45-136/20
MW26-ROX-070815	SVOCs	2-Methylphenol	58/**118**	**66**	31-94/20
MW26-ROX-070815	SVOCs	3&4-Methylphenol	57/**111**	**62**	30-91/20
MW26-ROX-070815	SVOCs	2-Nitrophenol	89/**186**	**69**	38-121/20
MW26-ROX-070815	SVOCs	Pentachlorophenol	94/**164**	**52**	41-126/20
MW26-ROX-070815	SVOCs	Phenol	34/**64**	**60**	16-51/20
MW26-ROX-070815	SVOCs	2,4,5-Trichlorophenol	86/**178**	**68**	50-124/20
MW26-ROX-070815	SVOCs	2,4,6-Trichlorophenol	86/**168**	**63**	43-123/20
MW26-ROX-070815	SVOCs	Aniline	55/73	**26**	17-89/20
MW26-ROX-070815	SVOCs	Pyridine	33/56	**48**	10-73/20

LCS/LCSD recoveries were within evaluation criteria. No further qualification of data was required.

Approximately 10% of the MS/MSD spiking recoveries were recalculated and verified using MS/MSD summary forms, and no calculation or transcription errors were noted,

1.10 Internal Standards

Internal standard (IS) performance criteria ensure that the GC/MS sensitivity and response are stable during each analytical run. Following Method 8270C, the IS areas for the samples and CVs must be within –50% to +100% and retention times must be within 30 seconds of the IS area and retention time of the midpoint of the ICAL.

The IS areas for the CVs and the validated samples in this SDG were within evaluation criteria.

1.11 Laboratory Control Spike (LCS) Samples

Laboratory control samples were analyzed with each analytical batch to assess the accuracy of the analytical process. LCS recoveries were within evaluation criteria. No qualification of data was required.

Approximately 10% of the spiking compound recoveries for the LCS were recalculated from the raw data and verified using the LCS summary forms, and no calculation or transcription errors were noted.

1.12 Target Compound Identification and Quantification

For validation of the compound identification, chromatograms were reviewed to verify the major peaks were identified, the spectra of the identified compounds were verified against the library spectra, and the relative retention time was no greater than 0.06 different from the associated CV retention times. A minimum of 10% of the detected target analytes and spiking compounds were verified. No anomalies were noted with the identification of the target compounds in the samples.

For the validation of compound quantitation, 10% of the target analytes were recalculated from the raw data, and no calculation errors were noted. Additionally, the reporting limits were verified to determine if reporting limits (RLs) were adjusted for dilutions. No qualification of the data was required and review of the data indicated the correct RLs were reported.

1.13 Overall Data Assessment

Based on the criteria outlined, it is recommended that the results reported for these analyses are accepted for their intended use. Acceptable levels of accuracy and precision, based on LCS, MS/MSD, and surrogate data were achieved for this SDG.

New England ACCUTEST LABORATORIES

07/24/15



Technical Report for

Shell Oil

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, 60400249

Accutest Job Number: MC39909

Sampling Date: 07/08/15

Report to:

AECOM, INC.

elizabeth.kunkel@URS.com

ATTN: Elizabeth Kunkel

Total number of pages in report: 122

Reviewed on 7/27/2015

Reza Pand
Lab Director

Test results contained within this data package meet the requirements of the National Environmental Laboratory Accreditation Program and/or state specific certification programs as applicable.

Client Service contact: Jeremy Vienneau 508-481-6200

Certifications: MA (M-MA136,SW846 NELAC) CT (PH-0109) NH (250210) RI (00071) ME (MA00136) FL (E87579) NY (11791) NJ (MA926) PA (6801121) ND (R-188) CO MN (11546AA) NC (653) IL (002337) WI (399080220) DoD ELAP (L-A-B L2235)

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Test results relate only to samples analyzed.

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Sample Summary

Shell Oil

Job No: MC39909

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Collected Date	Time By	Received	Matrix Code	Matrix Type	Client Sample ID
MC39909-1	07/08/15	11:35 SFDH	07/09/15	AQ	Ground Water	MW26-ROX-070815
MC39909-1D	07/08/15	11:35 SFDH	07/09/15	AQ	Water Dup/MSD	MW26-ROX-070815
MC39909-1S	07/08/15	11:35 SFDH	07/09/15	AQ	Water Matrix Spike	MW26-ROX-070815
MC39909-2	07/08/15	12:35 SFDH	07/09/15	AQ	Ground Water	P114-ROX-070815
MC39909-3	07/08/15	13:45 SFDH	07/09/15	AQ	Ground Water	MW13-ROX-070815
MC39909-4	07/08/15	14:00 SFDH	07/09/15	AQ	Ground Water	MW1-ROX-070815
MC39909-5	07/08/15	14:15 SFDH	07/09/15	AQ	Equipment Blank	MW12-ROX-070815-EB
MC39909-6	07/08/15	15:25 SFDH	07/09/15	AQ	Ground Water	P66-ROX-070815
MC39909-7	07/08/15	15:25 SFDH	07/09/15	AQ	Ground Water	P66-ROX-070815-DUP
MC39909-8	07/08/15	15:40 SFDH	07/09/15	AQ	Ground Water	MW12-ROX-070815
MC39909-9	07/08/15	00:00 SFDH	07/09/15	AQ	Trip Blank Water	TB-ROX-070815-A-HCL
MC39909-10	07/08/15	00:00 SFDH	07/09/15	AQ	Trip Blank Water	TB-ROX-070815-B-HCL
MC39909-11	07/08/15	00:00 SFDH	07/09/15	AQ	Trip Blank Water	TB-ROX-070815-A-ST

Sample Summary
(continued)

Shell Oil

Job No: MC39909

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Collected Date	Time	By	Received	Matrix Code	Type	Client Sample ID
MC39909-12	07/08/15	00:00	SFDH	07/09/15	AQ	Trip Blank Water	TB-ROX-070815-B-ST

ACCUTEST LABORATORIES

2

SAMPLE DELIVERY GROUP CASE NARRATIVE

Client: Shell Oil **Job No** MC39909

Site: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Centra **Report Date** 7/24/2015 10:41:23 AM

8 Sample(s) and 4 Trip Blank(s) were collected on 07/08/2015 and were received at Accutest on 07/09/2015 properly preserved, at 2.4 Deg. C and intact. These Samples received an Accutest job number of MC39909. A listing of the Laboratory Sample ID, Client Sample ID and dates of collection are presented in the Results Summary Section of this report. 1-Chlorohexane, Benzenethiol, Dibenz(a,h)acridine, Indene, and Quinoline were searched in the library search and reported only if detections were found.

Except as noted below, all method specified calibrations and quality control performance criteria were met for this job. For more information, please refer to QC summary pages.

Volatiles by GCMS By Method SW846 8260C

Matrix: AQ **Batch ID:** MSV1484

- All samples were analyzed within the recommended method holding time.
- Sample(s) MC39909-1MS, MC39909-1MSD were used as the QC samples indicated.
- All method blanks for this batch meet method specific criteria.
- MC39909-1MS/MSD Recovery(s) for 2-Chloroethyl vinyl ether are outside control limits. Outside control limits due to possible matrix interference. Refer to Blank Spike.
- Initial calibration verification standard MSV1479-ICV1479 for acrolein, acetone, carbon disulfide, 2-butanone, 2-hexanone exceed 30% Difference (response bias high). Associated samples are non-detect for this compound.
- RPD(s) for MSD for 1,2,3-Trichlorobenzene, 2-Chloroethyl vinyl ether are outside control limits for sample MC39909-1MSD. High RPD due to possible matrix interference and/or sample non-homogeneity.

Extractables by GCMS By Method SW846 8270D

Matrix: AQ **Batch ID:** OP43772

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- Sample(s) MC39909-1MS, MC39909-1MSD were used as the QC samples indicated.
- All method blanks for this batch meet method specific criteria.
- Initial calibraton verification standard MSX194-ICV194 for Hexachlorocyclopentadiene exceed 30% Differnece. Hexachlorocyclopentadiene is within criteria in continuing calibration check standard MSX202-CC194, MSX203-CC194.
- Matrix Spike Duplicate Recovery(s) for 2,4,5-Trichlorophenol, 2,4,6-Trichlorophenol, 2,4-Dichlorophenol, 2,4-Dimethylphenol, 2,4-Dinitrophenol, 2-Chlorophenol, 2-Methylphenol, 2-Nitrophenol, 3&4-Methylphenol, 4-Chloro-3-methyl phenol, Benzoic Acid, Pentachlorophenol, Phenol are outside control limits. Outside control limits due to possible matrix interference. Refer to Blank Spike.
- RPD(s) for MSD for 2,4,5-Trichlorophenol, 2,4,6-Trichlorophenol, 2,4-Dichlorophenol, 2,4-Dimethylphenol, 2,4-Dinitrophenol, 2-Chlorophenol, 2-Methylphenol, 2-Nitrophenol, 3&4-Methylphenol, 4,6-Dinitro-o-cresol, 4-Chloro-3-methyl phenol, Aniline, Benzoic Acid, Pentachlorophenol, Phenol, Pyridine are outside control limits for sample OP43772-MSD. High RPD due to possible matrix interference and/or sample non-homogeneity.
- Continuing calibration check standard MSX203-CC194 for 2,4-Dinitrophenol, 4,6-Dinitro-2-methylphenol exceed 40% Difference (response bias high). Associated samples are non-detect for this compound.

Extractables by GCMS By Method SW846 8270D BY SIM

Matrix: AQ	Batch ID: OP43773

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- Sample(s) MC39909-1MS, MC39909-1MSD were used as the QC samples indicated.
- All method blanks for this batch meet method specific criteria.

Volatiles by GC By Method SW846 8011

Matrix: AQ	Batch ID: OP43854

- All samples were analyzed within the recommended method holding time.
- Sample(s) MC39909-1MS, MC39909-1MSD were used as the QC samples indicated.
- All method blanks for this batch meet method specific criteria.
- All samples were extracted within the recommended method holding time.
- MC39909-7,12 for Bromofluorobenzene (S): Outside control limits.Sample non-detect for target analytes.
- Continuing calibration check standard GBB3458-CC3458, file BB63755A, signal #1 for Bromofluorobenzene (S) exceed 15% Dev (response bias high).Sample non-detect for target analytes.
- Continuing calibration check standard GBB3459-CC3458, signal #2, file BB637583 for 1,2-Dibromoethane, 1,2-Dibromo-3-chloropropane and file BB63794 for 1,2-Dibromo-3-chloropropane exceed 15% Dev (response bias high).Associated samples are non-detect for target analytes.

The Accutest Laboratories of New England certifies that all analysis were performed within method specification. It is further recommended that this report to be used in its entirety.The Accutest Laboratories of NE, Laboratory Director or assignee as verified by the signature on the cover page has authorized the release of this report(MC39909).

Summary of Hits

Job Number: MC39909
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/08/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
MC39909-1	MW26-ROX-070815					
1-Methylnaphthalene		0.046 J	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.065 J	2.1	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.030 J	0.053	0.011	ug/l	SW846 8270D BY SIM
MC39909-2	P114-ROX-070815					
Chloromethane		1.5 J	2.0	0.49	ug/l	SW846 8260C
Methyl Tert Butyl Ether		26.5	1.0	0.35	ug/l	SW846 8260C
Naphthalene		2.0 J	5.0	0.61	ug/l	SW846 8260C
Acenaphthene		0.20	0.10	0.0075	ug/l	SW846 8270D BY SIM
Anthracene		0.035 J	0.10	0.0098	ug/l	SW846 8270D BY SIM
Fluorene		0.033 J	0.10	0.015	ug/l	SW846 8270D BY SIM
Phenanthrene		0.023 J	0.050	0.011	ug/l	SW846 8270D BY SIM
Pyrene		0.032 J	0.10	0.0085	ug/l	SW846 8270D BY SIM
MC39909-3	MW13-ROX-070815					
Chloromethane		1.6 J	2.0	0.49	ug/l	SW846 8260C
Methyl Tert Butyl Ether		5.4	1.0	0.35	ug/l	SW846 8260C
Phenol		0.32 J	5.3	0.26	ug/l	SW846 8270D
Acenaphthene		0.089 J	0.11	0.0079	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.057 J	0.11	0.0088	ug/l	SW846 8270D BY SIM
Anthracene		0.028 J	0.11	0.010	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.031 J	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.047 J	2.1	0.012	ug/l	SW846 8270D BY SIM
Pyrene		0.016 J	0.11	0.0089	ug/l	SW846 8270D BY SIM
MC39909-4	MW1-ROX-070815					
1-Methylnaphthalene		0.038 J	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.066 J	2.1	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.022 J	0.053	0.011	ug/l	SW846 8270D BY SIM
MC39909-5	MW12-ROX-070815-EB					
Chloroform		0.42 J	1.0	0.40	ug/l	SW846 8260C
Benzyl Alcohol		0.70 J	10	0.52	ug/l	SW846 8270D
Phenanthrene		0.021 J	0.052	0.011	ug/l	SW846 8270D BY SIM
MC39909-6	P66-ROX-070815					
Benzene		40.4	0.50	0.27	ug/l	SW846 8260C
n-Butylbenzene		12.4	5.0	0.50	ug/l	SW846 8260C

Summary of Hits

Job Number: MC39909
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/08/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
sec-Butylbenzene		16.4	5.0	0.50	ug/l	SW846 8260C
tert-Butylbenzene		2.7 J	5.0	0.57	ug/l	SW846 8260C
Chlorobenzene		0.35 J	1.0	0.24	ug/l	SW846 8260C
Ethylbenzene		2.4	1.0	0.24	ug/l	SW846 8260C
Isopropylbenzene		133	5.0	0.27	ug/l	SW846 8260C
n-Propylbenzene		117	5.0	0.29	ug/l	SW846 8260C
Toluene		1.7	1.0	0.29	ug/l	SW846 8260C
1,2,4-Trimethylbenzene		0.30 J	5.0	0.29	ug/l	SW846 8260C
m,p-Xylene		1.6	1.0	0.47	ug/l	SW846 8260C
o-Xylene		1.1	1.0	0.22	ug/l	SW846 8260C
Xylene (total)		2.7	1.0	0.22	ug/l	SW846 8260C
Dibenzofuran		1.0 J	2.1	0.21	ug/l	SW846 8270D
Acenaphthene		0.54	0.11	0.0079	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.17	0.11	0.0088	ug/l	SW846 8270D BY SIM
Fluoranthene		0.027 J	0.11	0.0078	ug/l	SW846 8270D BY SIM
Fluorene		1.1	0.11	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		54.6	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		7.5	2.1	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.53	0.053	0.011	ug/l	SW846 8270D BY SIM
Pyrene		0.028 J	0.11	0.0089	ug/l	SW846 8270D BY SIM
MC39909-7	P66-ROX-070815-DUP					
Benzene		42.4	0.50	0.27	ug/l	SW846 8260C
n-Butylbenzene		12.6	5.0	0.50	ug/l	SW846 8260C
sec-Butylbenzene		16.7	5.0	0.50	ug/l	SW846 8260C
tert-Butylbenzene		2.7 J	5.0	0.57	ug/l	SW846 8260C
Chlorobenzene		0.38 J	1.0	0.24	ug/l	SW846 8260C
Ethylbenzene		2.2	1.0	0.24	ug/l	SW846 8260C
Isopropylbenzene		132	5.0	0.27	ug/l	SW846 8260C
n-Propylbenzene		119	5.0	0.29	ug/l	SW846 8260C
Toluene		1.8	1.0	0.29	ug/l	SW846 8260C
1,2,4-Trimethylbenzene		0.32 J	5.0	0.29	ug/l	SW846 8260C
m,p-Xylene		1.6	1.0	0.47	ug/l	SW846 8260C
o-Xylene		1.1	1.0	0.22	ug/l	SW846 8260C
Xylene (total)		2.7	1.0	0.22	ug/l	SW846 8260C
Dibenzofuran		1.1 J	2.1	0.21	ug/l	SW846 8270D
Acenaphthene		0.51	0.11	0.0080	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.21	0.11	0.0089	ug/l	SW846 8270D BY SIM
Chrysene		0.017 J	0.11	0.014	ug/l	SW846 8270D BY SIM
Fluoranthene		0.024 J	0.11	0.0079	ug/l	SW846 8270D BY SIM
Fluorene		1.1	0.11	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		57.4	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		7.7	2.1	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.56	0.053	0.011	ug/l	SW846 8270D BY SIM

Summary of Hits

Job Number: MC39909
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/08/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
Pyrene		0.040 J	0.11	0.0090	ug/l	SW846 8270D BY SIM
MC39909-8	MW12-ROX-070815					
Acenaphthene		0.018 J	0.11	0.0083	ug/l	SW846 8270D BY SIM
Benzo(a)anthracene		0.046 J	0.056	0.026	ug/l	SW846 8270D BY SIM
Benzo(a)pyrene		0.067 J	0.11	0.017	ug/l	SW846 8270D BY SIM
Benzo(b)fluoranthene		0.083	0.056	0.021	ug/l	SW846 8270D BY SIM
Benzo(g,h,i)perylene		0.081 J	0.11	0.014	ug/l	SW846 8270D BY SIM
Benzo(k)fluoranthene		0.11 J	0.11	0.011	ug/l	SW846 8270D BY SIM
Chrysene		0.080 J	0.11	0.015	ug/l	SW846 8270D BY SIM
Fluoranthene		0.12	0.11	0.0082	ug/l	SW846 8270D BY SIM
Fluorene		0.030 J	0.11	0.017	ug/l	SW846 8270D BY SIM
Indeno(1,2,3-cd)pyrene		0.059 J	0.11	0.023	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.035 J	2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.079 J	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.067	0.056	0.012	ug/l	SW846 8270D BY SIM
Pyrene		0.081 J	0.11	0.0094	ug/l	SW846 8270D BY SIM
MC39909-9	TB-ROX-070815-A-HCL					
No hits reported in this sample.						
MC39909-10	TB-ROX-070815-B-HCL					
No hits reported in this sample.						
MC39909-11	TB-ROX-070815-A-ST					
No hits reported in this sample.						
MC39909-12	TB-ROX-070815-B-ST					
No hits reported in this sample.						

New England ACCUTEST LABORATORIES

4

Sample Results

Report of Analysis

Report of Analysis

Client Sample ID:	MW26-ROX-070815		
Lab Sample ID:	MC39909-1	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41127.D	1	07/17/15	JB	n/a	n/a	MSV1484
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW26-ROX-070815		
Lab Sample ID:	MC39909-1	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW26-ROX-070815		
Lab Sample ID:	MC39909-1	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	103%		72-133%
2037-26-5	Toluene-D8	99%		85-114%
460-00-4	4-Bromofluorobenzene	100%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

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Report of Analysis

Client Sample ID:	MW26-ROX-070815		
Lab Sample ID:	MC39909-1	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	X06432.D	1	07/21/15	KD	07/12/15	OP43772	MSX202
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.6	ug/l	UJ
95-57-8	2-Chlorophenol	ND	5.3	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.53	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.0	ug/l	
95-48-7	2-Methylphenol	ND	11	0.22	ug/l	
	3&4-Methylphenol	ND	11	0.49	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.43	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.31	ug/l	
108-95-2	Phenol	ND	5.3	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.31	ug/l	
62-53-3	Aniline	ND	11	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.3	0.86	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.3	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.3	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.57	ug/l	UJ
111-91-1	bis(2-Chloroethoxy)methane	ND	5.3	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.3	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.3	0.25	ug/l	UJ
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.3	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.3	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.3	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.3	0.39	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.3	0.76	ug/l	

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Report of Analysis

Client Sample ID:	MW26-ROX-070815		
Lab Sample ID:	MC39909-1	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

4.1

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.3	0.60	ug/l	
131-11-3	Dimethyl phthalate	ND	5.3	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.3	0.81	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	U
67-72-1	Hexachloroethane	ND	5.3	0.30	ug/l	
78-59-1	Isophorone	ND	5.3	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.3	ug/l	
98-95-3	Nitrobenzene	ND	5.3	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.3	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.3	0.55	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.3	0.81	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	45%		10-80%
4165-62-2	Phenol-d5	36%		10-72%
118-79-6	2,4,6-Tribromophenol	115%		42-134%
4165-60-0	Nitrobenzene-d5	88%		25-117%
321-60-8	2-Fluorobiphenyl	86%		24-112%
1718-51-0	Terphenyl-d14	107%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

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Report of Analysis

Client Sample ID:	MW26-ROX-070815		
Lab Sample ID:	MC39909-1	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96873.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0079	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0088	ug/l	
120-12-7	Anthracene	ND	0.11	0.010	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.053	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.053	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0078	ug/l	
86-73-7	Fluorene	ND	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.021	ug/l	
90-12-0	1-Methylnaphthalene	0.046	2.1	0.013	ug/l	J
91-57-6	2-Methylnaphthalene	0.065	2.1	0.012	ug/l	J
85-01-8	Phenanthrene	0.030	0.053	0.011	ug/l	J
129-00-0	Pyrene	ND	0.11	0.0089	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	86%		26-121%
321-60-8	2-Fluorobiphenyl	77%		28-107%
1718-51-0	Terphenyl-d14	98%		29-129%

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Report of Analysis

Client Sample ID:	MW26-ROX-070815		
Lab Sample ID:	MC39909-1	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63760.D	1	07/17/15	NK	07/16/15	OP43854	GBB3458
Run #2							

	Initial Volume	Final Volume
Run #1	37.2 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	77%		60-140%
460-00-4	Bromofluorobenzene (S)	74%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P114-ROX-070815		
Lab Sample ID:	MC39909-2	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41126.D	1	07/17/15	JB	n/a	n/a	MSV1484
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	1.5	2.0	0.49	ug/l	J
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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Report of Analysis

Client Sample ID:	P114-ROX-070815		
Lab Sample ID:	MC39909-2	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	26.5	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	2.0	5.0	0.61	ug/l	J
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P114-ROX-070815		
Lab Sample ID:	MC39909-2	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	103%		72-133%
2037-26-5	Toluene-D8	99%		85-114%
460-00-4	4-Bromofluorobenzene	103%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P114-ROX-070815		
Lab Sample ID:	MC39909-2	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	X06433.D	1	07/21/15	KD	07/12/15	OP43772	MSX202
Run #2							

	Initial Volume	Final Volume
Run #1	1000 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.5	ug/l	UJ
95-57-8	2-Chlorophenol	ND	5.0	0.29	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.37	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.28	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.50	ug/l	
51-28-5	2,4-Dinitrophenol	ND	20	2.5	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	1.9	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.47	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.41	ug/l	
100-02-7	4-Nitrophenol	ND	20	2.5	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.30	ug/l	
108-95-2	Phenol	ND	5.0	0.25	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.34	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.30	ug/l	
62-53-3	Aniline	ND	10	2.5	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.0	0.82	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.0	0.21	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.51	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.0	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.54	ug/l	UJ
111-91-1	bis(2-Chloroethoxy)methane	ND	5.0	0.24	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.0	0.42	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.0	0.24	ug/l	UJ
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.0	0.21	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.0	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.0	0.37	ug/l	
132-64-9	Dibenzofuran	ND	2.0	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.0	0.37	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.0	0.72	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P114-ROX-070815		
Lab Sample ID:	MC39909-2	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.0	0.57	ug/l	
131-11-3	Dimethyl phthalate	ND	5.0	0.27	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.0	0.30	ug/l	
118-74-1	Hexachlorobenzene	ND	5.0	0.77	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.3	ug/l	UJ
67-72-1	Hexachloroethane	ND	5.0	0.29	ug/l	
78-59-1	Isophorone	ND	5.0	0.23	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.6	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.1	ug/l	
98-95-3	Nitrobenzene	ND	5.0	0.26	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.0	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.0	0.52	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.0	0.77	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	42%		10-80%
4165-62-2	Phenol-d5	33%		10-72%
118-79-6	2,4,6-Tribromophenol	121%		42-134%
4165-60-0	Nitrobenzene-d5	86%		25-117%
321-60-8	2-Fluorobiphenyl	86%		24-112%
1718-51-0	Terphenyl-d14	97%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P114-ROX-070815		
Lab Sample ID:	MC39909-2	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96875.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	1000 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.20	0.10	0.0075	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0084	ug/l	
120-12-7	Anthracene	0.035	0.10	0.0098	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.050	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.015	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.050	0.019	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.013	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0074	ug/l	
86-73-7	Fluorene	0.033	0.10	0.015	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.020	ug/l	
90-12-0	1-Methylnaphthalene	ND	2.0	0.012	ug/l	
91-57-6	2-Methylnaphthalene	ND	2.0	0.011	ug/l	
85-01-8	Phenanthrene	0.023	0.050	0.011	ug/l	J
129-00-0	Pyrene	0.032	0.10	0.0085	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	86%		26-121%
321-60-8	2-Fluorobiphenyl	79%		28-107%
1718-51-0	Terphenyl-d14	96%		29-129%

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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P114-ROX-070815		
Lab Sample ID:	MC39909-2	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63761.D	1	07/17/15	NK	07/16/15	OP43854	GBB3458
Run #2							

	Initial Volume	Final Volume
Run #1	36.8 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	98%		60-140%
460-00-4	Bromofluorobenzene (S)	98%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW13-ROX-070815		
Lab Sample ID:	MC39909-3	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41128.D	1	07/17/15	JB	n/a	n/a	MSV1484
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	1.6	2.0	0.49	ug/l	J
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW13-ROX-070815		
Lab Sample ID:	MC39909-3	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	U
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	5.4	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW13-ROX-070815		
Lab Sample ID:	MC39909-3	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	101%		72-133%
2037-26-5	Toluene-D8	99%		85-114%
460-00-4	4-Bromofluorobenzene	103%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW13-ROX-070815		
Lab Sample ID:	MC39909-3	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	X06454.D	1	07/22/15	KD	07/12/15	OP43772	MSX203
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.6	ug/l	UJ
95-57-8	2-Chlorophenol	ND	5.3	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.53	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.0	ug/l	
95-48-7	2-Methylphenol	ND	11	0.22	ug/l	
	3&4-Methylphenol	ND	11	0.49	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.43	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.31	ug/l	
108-95-2	Phenol	0.32	5.3	0.26	ug/l	J
95-95-4	2,4,5-Trichlorophenol	ND	11	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.31	ug/l	
62-53-3	Aniline	ND	11	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.3	0.86	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.3	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.3	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.57	ug/l	UJ
111-91-1	bis(2-Chloroethoxy)methane	ND	5.3	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.3	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.3	0.25	ug/l	UJ
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.3	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.3	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.3	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.3	0.39	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.3	0.76	ug/l	

ND = Not detected MDL = Method Detection Limit
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Report of Analysis

Client Sample ID:	MW13-ROX-070815		
Lab Sample ID:	MC39909-3	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.3	0.60	ug/l	
131-11-3	Dimethyl phthalate	ND	5.3	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.3	0.81	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	U
67-72-1	Hexachloroethane	ND	5.3	0.30	ug/l	
78-59-1	Isophorone	ND	5.3	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.3	ug/l	
98-95-3	Nitrobenzene	ND	5.3	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.3	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.3	0.55	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.3	0.81	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	42%		10-80%
4165-62-2	Phenol-d5	33%		10-72%
118-79-6	2,4,6-Tribromophenol	124%		42-134%
4165-60-0	Nitrobenzene-d5	84%		25-117%
321-60-8	2-Fluorobiphenyl	86%		24-112%
1718-51-0	Terphenyl-d14	101%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW13-ROX-070815		
Lab Sample ID:	MC39909-3	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96876.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.089	0.11	0.0079	ug/l	J
208-96-8	Acenaphthylene	0.057	0.11	0.0088	ug/l	J
120-12-7	Anthracene	0.028	0.11	0.010	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.053	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.053	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0078	ug/l	
86-73-7	Fluorene	ND	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.021	ug/l	
90-12-0	1-Methylnaphthalene	0.031	2.1	0.013	ug/l	J
91-57-6	2-Methylnaphthalene	0.047	2.1	0.012	ug/l	J
85-01-8	Phenanthrene	ND	0.053	0.011	ug/l	
129-00-0	Pyrene	0.016	0.11	0.0089	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	80%		26-121%
321-60-8	2-Fluorobiphenyl	75%		28-107%
1718-51-0	Terphenyl-d14	95%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW13-ROX-070815		
Lab Sample ID:	MC39909-3	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63762.D	1	07/17/15	NK	07/16/15	OP43854	GBB3458
Run #2							

	Initial Volume	Final Volume
Run #1	36.7 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	83%		60-140%
460-00-4	Bromofluorobenzene (S)	91%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW1-ROX-070815		
Lab Sample ID:	MC39909-4	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41129.D	1	07/17/15	JB	n/a	n/a	MSV1484
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW1-ROX-070815		
Lab Sample ID:	MC39909-4	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	u5
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW1-ROX-070815		
Lab Sample ID:	MC39909-4	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	102%		72-133%
2037-26-5	Toluene-D8	98%		85-114%
460-00-4	4-Bromofluorobenzene	100%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW1-ROX-070815		
Lab Sample ID:	MC39909-4	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	X06455.D	1	07/22/15	KD	07/12/15	OP43772	MSX203
Run #2							

	Initial Volume	Final Volume
Run #1	940 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	UJ
95-57-8	2-Chlorophenol	ND	5.3	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.39	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.53	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.0	ug/l	
95-48-7	2-Methylphenol	ND	11	0.22	ug/l	
	3&4-Methylphenol	ND	11	0.50	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.43	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.32	ug/l	
108-95-2	Phenol	ND	5.3	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.37	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.32	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.3	0.87	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.3	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.54	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.3	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.57	ug/l	UJ
111-91-1	bis(2-Chloroethoxy)methane	ND	5.3	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.3	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.3	0.26	ug/l	UJ
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.3	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.3	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.3	0.40	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.3	0.40	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.3	0.76	ug/l	

ND = Not detected MDL = Method Detection Limit
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Report of Analysis

Client Sample ID:	MW1-ROX-070815		
Lab Sample ID:	MC39909-4	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.3	0.60	ug/l	
131-11-3	Dimethyl phthalate	ND	5.3	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.32	ug/l	
118-74-1	Hexachlorobenzene	ND	5.3	0.82	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	UJ
67-72-1	Hexachloroethane	ND	5.3	0.31	ug/l	
78-59-1	Isophorone	ND	5.3	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.9	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.3	ug/l	
98-95-3	Nitrobenzene	ND	5.3	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.3	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.3	0.55	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.3	0.82	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	41%		10-80%
4165-62-2	Phenol-d5	33%		10-72%
118-79-6	2,4,6-Tribromophenol	117%		42-134%
4165-60-0	Nitrobenzene-d5	83%		25-117%
321-60-8	2-Fluorobiphenyl	79%		24-112%
1718-51-0	Terphenyl-d14	105%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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J = Indicates an estimated value
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Report of Analysis

Client Sample ID:	MW1-ROX-070815		
Lab Sample ID:	MC39909-4	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96877.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	940 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0080	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0089	ug/l	
120-12-7	Anthracene	ND	0.11	0.010	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.053	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.053	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0079	ug/l	
86-73-7	Fluorene	ND	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	0.038	2.1	0.013	ug/l	J
91-57-6	2-Methylnaphthalene	0.066	2.1	0.012	ug/l	J
85-01-8	Phenanthrene	0.022	0.053	0.011	ug/l	J
129-00-0	Pyrene	ND	0.11	0.0090	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	81%		26-121%
321-60-8	2-Fluorobiphenyl	72%		28-107%
1718-51-0	Terphenyl-d14	102%		29-129%

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
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Report of Analysis

Client Sample ID:	MW1-ROX-070815		
Lab Sample ID:	MC39909-4	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63763.D	1	07/17/15	NK	07/16/15	OP43854	GBB3458
Run #2							

	Initial Volume	Final Volume
Run #1	36.9 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	104%		60-140%
460-00-4	Bromofluorobenzene (S)	118%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815-EB		
Lab Sample ID:	MC39909-5	Date Sampled:	07/08/15
Matrix:	AQ - Equipment Blank	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41124.D	1	07/17/15	JB	n/a	n/a	MSV1484
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	0.42	1.0	0.40	ug/l	J
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815-EB		
Lab Sample ID:	MC39909-5	Date Sampled:	07/08/15
Matrix:	AQ - Equipment Blank	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815-EB		
Lab Sample ID:	MC39909-5	Date Sampled:	07/08/15
Matrix:	AQ - Equipment Blank	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	103%		72-133%
2037-26-5	Toluene-D8	99%		85-114%
460-00-4	4-Bromofluorobenzene	98%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815-EB		
Lab Sample ID:	MC39909-5	Date Sampled:	07/08/15
Matrix:	AQ - Equipment Blank	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	X06456.D	1	07/22/15	KD	07/12/15	OP43772	MSX203
Run #2							

	Initial Volume	Final Volume
Run #1	970 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.2	0.30	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.29	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.52	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	2.0	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.48	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.42	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.31	ug/l	
108-95-2	Phenol	ND	5.2	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.35	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.31	ug/l	
62-53-3	Aniline	ND	10	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.2	0.84	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.2	0.22	ug/l	
100-51-6	Benzyl Alcohol	0.70	10	0.52	ug/l	J
91-58-7	2-Chloronaphthalene	ND	5.2	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.56	ug/l	UJ
111-91-1	bis(2-Chloroethoxy)methane	ND	5.2	0.25	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.2	0.43	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.2	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.2	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.2	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.2	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.2	0.38	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.2	0.74	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815-EB		
Lab Sample ID:	MC39909-5	Date Sampled:	07/08/15
Matrix:	AQ - Equipment Blank	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.2	0.58	ug/l	
131-11-3	Dimethyl phthalate	ND	5.2	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.2	0.79	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.2	0.30	ug/l	
78-59-1	Isophorone	ND	5.2	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.2	ug/l	
98-95-3	Nitrobenzene	ND	5.2	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.2	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.2	0.54	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.2	0.80	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	41%		10-80%
4165-62-2	Phenol-d5	34%		10-72%
118-79-6	2,4,6-Tribromophenol	113%		42-134%
4165-60-0	Nitrobenzene-d5	89%		25-117%
321-60-8	2-Fluorobiphenyl	85%		24-112%
1718-51-0	Terphenyl-d14	113%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815-EB		
Lab Sample ID:	MC39909-5	Date Sampled:	07/08/15
Matrix:	AQ - Equipment Blank	Date Received:	07/09/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96878.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	970 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.10	0.0077	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0087	ug/l	
120-12-7	Anthracene	ND	0.10	0.010	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.052	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.052	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0076	ug/l	
86-73-7	Fluorene	ND	0.10	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.021	ug/l	
90-12-0	1-Methylnaphthalene	ND	2.1	0.013	ug/l	
91-57-6	2-Methylnaphthalene	ND	2.1	0.011	ug/l	
85-01-8	Phenanthrene	0.021	0.052	0.011	ug/l	J
129-00-0	Pyrene	ND	0.10	0.0088	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	78%		26-121%
321-60-8	2-Fluorobiphenyl	71%		28-107%
1718-51-0	Terphenyl-d14	103%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815-EB		
Lab Sample ID:	MC39909-5	Date Sampled:	07/08/15
Matrix:	AQ - Equipment Blank	Date Received:	07/09/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63764.D	1	07/17/15	NK	07/16/15	OP43854	GBB3458
Run #2							

	Initial Volume	Final Volume
Run #1	36.8 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	100%		60-140%
460-00-4	Bromofluorobenzene (S)	114%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815		
Lab Sample ID:	MC39909-6	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41131.D	1	07/17/15	JB	n/a	n/a	MSV1484
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	40.4	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	12.4	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	16.4	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	2.7	5.0	0.57	ug/l	J
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	0.35	1.0	0.24	ug/l	J
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815		
Lab Sample ID:	MC39909-6	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	U
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	2.4	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	133	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	117	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	1.7	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	0.30	5.0	0.29	ug/l	J
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	1.6	1.0	0.47	ug/l	
95-47-6	o-Xylene	1.1	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	2.7	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815		
Lab Sample ID:	MC39909-6	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	95%		72-133%
2037-26-5	Toluene-D8	106%		85-114%
460-00-4	4-Bromofluorobenzene	101%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815		
Lab Sample ID:	MC39909-6	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	X06457.D	1	07/22/15	KD	07/12/15	OP43772	MSX203
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.6	ug/l	UJ
95-57-8	2-Chlorophenol	ND	5.3	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.53	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.0	ug/l	
95-48-7	2-Methylphenol	ND	11	0.22	ug/l	
	3&4-Methylphenol	ND	11	0.49	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.43	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.31	ug/l	
108-95-2	Phenol	ND	5.3	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.31	ug/l	
62-53-3	Aniline	ND	11	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.3	0.86	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.3	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.3	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.57	ug/l	UJ
111-91-1	bis(2-Chloroethoxy)methane	ND	5.3	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.3	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.3	0.25	ug/l	UJ
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.3	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.3	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.3	0.39	ug/l	
132-64-9	Dibenzofuran	1.0	2.1	0.21	ug/l	J
84-74-2	Di-n-butyl phthalate	ND	5.3	0.39	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.3	0.76	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815		
Lab Sample ID:	MC39909-6	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.3	0.60	ug/l	
131-11-3	Dimethyl phthalate	ND	5.3	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.3	0.81	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	UJ
67-72-1	Hexachloroethane	ND	5.3	0.30	ug/l	
78-59-1	Isophorone	ND	5.3	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.3	ug/l	
98-95-3	Nitrobenzene	ND	5.3	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.3	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.3	0.55	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.3	0.81	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	42%		10-80%
4165-62-2	Phenol-d5	34%		10-72%
118-79-6	2,4,6-Tribromophenol	126%		42-134%
4165-60-0	Nitrobenzene-d5	84%		25-117%
321-60-8	2-Fluorobiphenyl	81%		24-112%
1718-51-0	Terphenyl-d14	101%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815		
Lab Sample ID:	MC39909-6	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96879.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.54	0.11	0.0079	ug/l	
208-96-8	Acenaphthylene	0.17	0.11	0.0088	ug/l	
120-12-7	Anthracene	ND	0.11	0.010	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.053	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.053	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	0.027	0.11	0.0078	ug/l	J
86-73-7	Fluorene	1.1	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.021	ug/l	
90-12-0	1-Methylnaphthalene	54.6	2.1	0.013	ug/l	
91-57-6	2-Methylnaphthalene	7.5	2.1	0.012	ug/l	
85-01-8	Phenanthrene	0.53	0.053	0.011	ug/l	
129-00-0	Pyrene	0.028	0.11	0.0089	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	77%		26-121%
321-60-8	2-Fluorobiphenyl	73%		28-107%
1718-51-0	Terphenyl-d14	93%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815		
Lab Sample ID:	MC39909-6	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63765.D	1	07/17/15	NK	07/16/15	OP43854	GBB3458
Run #2							

	Initial Volume	Final Volume
Run #1	37.4 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	88%		60-140%
460-00-4	Bromofluorobenzene (S)	123%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815-DUP		
Lab Sample ID:	MC39909-7	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41132.D	1	07/17/15	JB	n/a	n/a	MSV1484
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	42.4	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	12.6	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	16.7	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	2.7	5.0	0.57	ug/l	J
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	0.38	1.0	0.24	ug/l	J
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815-DUP		
Lab Sample ID:	MC39909-7	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	2.2	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	132	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	119	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	1.8	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	0.32	5.0	0.29	ug/l	J
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	1.6	1.0	0.47	ug/l	
95-47-6	o-Xylene	1.1	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	2.7	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815-DUP		
Lab Sample ID:	MC39909-7	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	95%		72-133%
2037-26-5	Toluene-D8	106%		85-114%
460-00-4	4-Bromofluorobenzene	102%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815-DUP		
Lab Sample ID:	MC39909-7	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	X06458.D	1	07/22/15	KD	07/12/15	OP43772	MSX203
Run #2							

	Initial Volume	Final Volume
Run #1	940 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	UJ
95-57-8	2-Chlorophenol	ND	5.3	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.39	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.53	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.0	ug/l	
95-48-7	2-Methylphenol	ND	11	0.22	ug/l	
	3&4-Methylphenol	ND	11	0.50	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.43	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.32	ug/l	
108-95-2	Phenol	ND	5.3	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.37	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.32	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.3	0.87	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.3	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.54	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.3	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.57	ug/l	UJ
111-91-1	bis(2-Chloroethoxy)methane	ND	5.3	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.3	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.3	0.26	ug/l	UJ
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.3	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.3	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.3	0.40	ug/l	
132-64-9	Dibenzofuran	1.1	2.1	0.21	ug/l	J
84-74-2	Di-n-butyl phthalate	ND	5.3	0.40	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.3	0.76	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815-DUP		
Lab Sample ID:	MC39909-7	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.3	0.60	ug/l	
131-11-3	Dimethyl phthalate	ND	5.3	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.32	ug/l	
118-74-1	Hexachlorobenzene	ND	5.3	0.82	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	UJ
67-72-1	Hexachloroethane	ND	5.3	0.31	ug/l	
78-59-1	Isophorone	ND	5.3	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.9	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.3	ug/l	
98-95-3	Nitrobenzene	ND	5.3	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.3	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.3	0.55	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.3	0.82	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	42%		10-80%
4165-62-2	Phenol-d5	33%		10-72%
118-79-6	2,4,6-Tribromophenol	121%		42-134%
4165-60-0	Nitrobenzene-d5	86%		25-117%
321-60-8	2-Fluorobiphenyl	79%		24-112%
1718-51-0	Terphenyl-d14	97%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815-DUP		
Lab Sample ID:	MC39909-7	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSM OSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96880.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	940 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.51	0.11	0.0080	ug/l	
208-96-8	Acenaphthylene	0.21	0.11	0.0089	ug/l	
120-12-7	Anthracene	ND	0.11	0.010	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.053	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.053	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	0.017	0.11	0.014	ug/l	J
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	0.024	0.11	0.0079	ug/l	J
86-73-7	Fluorene	1.1	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	57.4	2.1	0.013	ug/l	
91-57-6	2-Methylnaphthalene	7.7	2.1	0.012	ug/l	
85-01-8	Phenanthrene	0.56	0.053	0.011	ug/l	
129-00-0	Pyrene	0.040	0.11	0.0090	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	66%		26-121%
321-60-8	2-Fluorobiphenyl	74%		28-107%
1718-51-0	Terphenyl-d14	91%		29-129%

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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P66-ROX-070815-DUP		
Lab Sample ID:	MC39909-7	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63786.D	1	07/18/15	NK	07/16/15	OP43854	GBB3459
Run #2							

	Initial Volume	Final Volume
Run #1	36.7 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	84%		60-140%
460-00-4	Bromofluorobenzene (S)	151% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815		
Lab Sample ID:	MC39909-8	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41130.D	1	07/17/15	JB	n/a	n/a	MSV1484
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815		
Lab Sample ID:	MC39909-8	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

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VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815		
Lab Sample ID:	MC39909-8	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	102%		72-133%
2037-26-5	Toluene-D8	99%		85-114%
460-00-4	4-Bromofluorobenzene	100%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815		
Lab Sample ID:	MC39909-8	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	X06459.D	1	07/22/15	KD	07/12/15	OP43772	MSX203
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.8	ug/l	UJ
95-57-8	2-Chlorophenol	ND	5.6	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.41	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.56	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.8	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.52	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.45	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.8	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.33	ug/l	
108-95-2	Phenol	ND	5.6	0.28	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.38	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.8	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.6	0.91	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.6	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.56	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.6	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.60	ug/l	UJ
111-91-1	bis(2-Chloroethoxy)methane	ND	5.6	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.6	0.46	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.6	0.27	ug/l	UJ
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.6	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.6	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.7	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.6	0.42	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.6	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.6	0.80	ug/l	

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Report of Analysis

Client Sample ID:	MW12-ROX-070815		
Lab Sample ID:	MC39909-8	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL: Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.6	0.63	ug/l	
131-11-3	Dimethyl phthalate	ND	5.6	0.30	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.6	0.85	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	U
67-72-1	Hexachloroethane	ND	5.6	0.32	ug/l	
78-59-1	Isophorone	ND	5.6	0.26	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.1	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.5	ug/l	
98-95-3	Nitrobenzene	ND	5.6	0.29	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.6	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.6	0.58	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.6	0.86	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	39%		10-80%
4165-62-2	Phenol-d5	34%		10-72%
118-79-6	2,4,6-Tribromophenol	107%		42-134%
4165-60-0	Nitrobenzene-d5	92%		25-117%
321-60-8	2-Fluorobiphenyl	87%		24-112%
1718-51-0	Terphenyl-d14	107%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815		
Lab Sample ID:	MC39909-8	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96881.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.018	0.11	0.0083	ug/l	J
208-96-8	Acenaphthylene	ND	0.11	0.0093	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	0.046	0.056	0.026	ug/l	J
50-32-8	Benzo(a)pyrene	0.067	0.11	0.017	ug/l	J
205-99-2	Benzo(b)fluoranthene	0.083	0.056	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	0.081	0.11	0.014	ug/l	J
207-08-9	Benzo(k)fluoranthene	0.11	0.11	0.011	ug/l	
218-01-9	Chrysene	0.080	0.11	0.015	ug/l	J
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.017	ug/l	
206-44-0	Fluoranthene	0.12	0.11	0.0082	ug/l	
86-73-7	Fluorene	0.030	0.11	0.017	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	0.059	0.11	0.023	ug/l	J
90-12-0	1-Methylnaphthalene	0.035	2.2	0.014	ug/l	J
91-57-6	2-Methylnaphthalene	0.079	2.2	0.012	ug/l	J
85-01-8	Phenanthrene	0.067	0.056	0.012	ug/l	
129-00-0	Pyrene	0.081	0.11	0.0094	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	72%		26-121%
321-60-8	2-Fluorobiphenyl	75%		28-107%
1718-51-0	Terphenyl-d14	92%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW12-ROX-070815		
Lab Sample ID:	MC39909-8	Date Sampled:	07/08/15
Matrix:	AQ - Ground Water	Date Received:	07/09/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63787.D	1	07/18/15	NK	07/16/15	OP43854	GBB3459
Run #2							

	Initial Volume	Final Volume
Run #1	37.6 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	96%		60-140%
460-00-4	Bromofluorobenzene (S)	139%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070815-A-HCL		
Lab Sample ID:	MC39909-9	Date Sampled:	07/08/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41122.D	1	07/17/15	JB	n/a	n/a	MSV1484
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070815-A-HCL		
Lab Sample ID:	MC39909-9	Date Sampled:	07/08/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070815-A-HCL		
Lab Sample ID:	MC39909-9	Date Sampled:	07/08/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	101%		72-133%
2037-26-5	Toluene-D8	99%		85-114%
460-00-4	4-Bromofluorobenzene	99%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070815-B-HCL		
Lab Sample ID:	MC39909-10	Date Sampled:	07/08/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41123.D	1	07/17/15	JB	n/a	n/a	MSV1484
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070815-B-HCL		
Lab Sample ID:	MC39909-10	Date Sampled:	07/08/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070815-B-HCL		
Lab Sample ID:	MC39909-10	Date Sampled:	07/08/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/09/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	102%		72-133%
2037-26-5	Toluene-D8	99%		85-114%
460-00-4	4-Bromofluorobenzene	99%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070815-A-ST		
Lab Sample ID:	MC39909-11	Date Sampled:	07/08/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/09/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63788.D	1	07/18/15	NK	07/16/15	OP43854	GBB3459
Run #2							

	Initial Volume	Final Volume
Run #1	37.2 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	96%		60-140%
460-00-4	Bromofluorobenzene (S)	132%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070815-B-ST		
Lab Sample ID:	MC39909-12	Date Sampled:	07/08/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/09/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63789.D	1	07/18/15	NK	07/16/15	OP43854	GBB3459
Run #2							

	Initial Volume	Final Volume
Run #1	37.0 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	100%		60-140%
460-00-4	Bromofluorobenzene (S)	141% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

New England ACCUTEST LABORATORIES

Misc. Forms

Custody Documents and Other Forms

Includes the following where applicable:

- Chain of Custody
- Sample Tracking Chronicle
- Internal Chain of Custody

LAB (LOCATION)

☐ XENCO (_____)
☐ CALSCIENCE (_____)
☑ OTHER Accutest Labs, 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200)
☐ Lab Vendor # (_____)
☐ SPL (_____)

Lab Vendor #

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:

☑ ENV. SERVICES ☐ MOTIVA RETAIL ☐ SHELL RETAIL
☐ MOTIVA SD&CM ☐ CONSULTANT ☐ LUBES
☐ SHELL PIPELINE ☐ OTHER _____

Print Bill To Contact Name: Bob Billman

PO #

INCIDENT # (ENV SERVICES): 9 7 2 1 6 6 4 0

SAP #: 3 4 0 0 6 1

☐ CHECK IF NO INCIDENT # APPLIES

DATE: 07/08/15

PAGE: 1 of 2

SAMPLING COMPANY: AECOM

LOG CODE:

SITE ADDRESS: Street and City: 900 South Central Ave; ROXANA

State: IL

GLOBAL ID NO.:

ADDRESS: 1001 HIGHLANDS PLAZA DRIVE WEST - SUITE 300; ST. LOUIS, MO 63110

EDF DELIVERABLE TO (Name, Company, Office Location):

PHONE NO.:

E-MAIL:

CONSULTANT PROJECT NO.: Roxana Quarterly GW / 60400249-21563720.03003

PROJECT CONTACT (Hard copy or PDF Report to): Elizabeth Kunkel, Bob Billman, Lindsay Rathnow

TELEPHONE: 314-429-0100

FAX: 314-429-0462

Bill To Contact E-MAIL: bob.billman@aecom.com, elizabeth.kunkel@aecom.com, lindsay.rathnow@aecom.com

SAMPLER NAME(S) (Print): S. Fisher, D. Haxel, C. Williams, and E. Schumacher

LAB USE ONLY: MC39909

TURNAROUND TIME (CALENDAR DAYS): ☑ STANDARD (10 DAY) ☐ 5 DAYS ☐ 3 DAYS ☐ 2 DAYS ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

DELIVERABLES: ☐ LEVEL 1 ☑ LEVEL 2 ☐ LEVEL 3 ☑ LEVEL 4 ☑ OTHER (SPECIFY) EDD

TEMPERATURE ON RECEIPT C°: Cooler #1 | Cooler #2 | Cooler #3

SPECIAL INSTRUCTIONS OR NOTES:
* Please include "J" values on Reports.
* Please provide sample receipt upon login.

☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMBURSEMENT RATE APPLIES
☐ EDD NOT NEEDED
☑ RECEIPT VERIFICATION REQUESTED
☐ PROVIDE LEDD DISK

REQUESTED ANALYSIS

FIELD NOTES:

TEMPERATURE ON RECEIPT C°

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
-1	MW26-ROX-070815	7/8/15	1135	Water	2			2	2	6	X	X	X	X	0.0
-1S	MW26-ROX-070815-MS		1135		2			2	2	6	X	X	X	X	
-1SD	MW26-ROX-070815-MSD		1135		2			2	2	6	X	X	X	X	
-2	P114-ROX-070815		1235		2			2	2	6	X	X	X	X	
-3	MW13-ROX-070815		1345		2			2	2	6	X	X	X	X	
-4	MW1-ROX-070815		1400		2			2	2	6	X	X	X	X	
-5	MW12-ROX-070815-EB		1415		2			2	2	6	X	X	X	X	1N3,19DD
-6	P66-ROX-070815		1525		2			2	2	6	X	X	X	X	
-7	P66-ROX-070815-DUP		1525		2			2	2	6	X	X	X	X	
-8	MW12-ROX-070815		1540		2			2	2	6	X	X	X	X	

Relinquished by: (Signature)	Received by: (Signature)	Date	Time
[signature]	FED EX # 8066 2852 5110	07-08-15	18:00
FEDX	[signature]	7-9-15	930

Custody seals # 07/08/2015 -01A -01B -02A -02B 07/08/2015 -03A -03B

07/08 Revision

2.4-1.3-1.0°C

MC39909: Chain of Custody
Page 1 of 3

LAB (LOCATION)

☐ XENCO ( )
☐ CALSCIENCE ( )
☑ OTHER Accutest Labs, 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200)
☐ SPL ☐ Lab Vendor # ( )

Lab Vendor #

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:

☑ ENV. SERVICES ☐ MOTIVA RETAIL ☐ SHELL RETAIL
☐ MOTIVA SD&CM ☐ CONSULTANT ☐ LUBES
☐ SHELL PIPELINE ☐ OTHER

Print Bill To Contact Name: Bob Billman

PO #

INCIDENT # (ENV SERVICES): 9 7 2 1 8 6 4 0

SAP #: 3 4 0 0 6 1

☐ CHECK IF NO INCIDENT # APPLIES

DATE: 07/08/15

PAGE: 2 of 2

SAMPLING COMPANY: AECOM

LOG CODE:

SITE ADDRESS: Street and City: 900 South Central Ave; ROXANA

State: IL

GLOBAL ID NO:

ADDRESS: 1001 HIGHLANDS PLAZA DRIVE WEST - SUITE 300; ST. LOUIS, MO 63110

EDF DELIVERABLE TO (Name, Company, Office Location):

PHONE NO.:

E-MAIL:

CONSULTANT PROJECT NO.: Roxana Quarterly GW / 60400249-21663720.03003

PROJECT CONTACT (Hardcopy or PDF Report to): Elizabeth Kunkel, Bob Billman, Lindsay Rathnow

TELEPHONE: 314-429-0100

FAX: 314-429-0462

BS To Contact E-MAIL: bob.billman@aecom.com, elizabeth.kunkel@aecom.com, lindsay.rathnow@aecom.com

SAMPLER NAME(S) (Print): S. Fisher, D. Haxel, C. Williams, & E. Schumacher

LAB USE ONLY: MC39909

TURNAROUND TIME (CALENDAR DAYS): ☑ STANDARD (10 DAY) ☐ 5 DAYS ☐ 3 DAYS ☐ 2 DAYS ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

DELIVERABLES ☐ LEVEL 1 ☑ LEVEL 2 ☐ LEVEL 3 ☑ LEVEL 4 ☑ OTHER (SPECIFY) EDD

TEMPERATURE ON RECEIPT C° Cooler #1 Cooler #2 Cooler #3

SPECIAL INSTRUCTIONS OR NOTES:
* Please include "J" values on Reports.
* Please provide sample receipt upon login.

☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMBURSEMENT RATE APPLIES
☐ EDD NOT NEEDED
☑ RECEIPT VERIFICATION REQUESTED
☐ PROVIDE LEDD DISK

REQUESTED ANALYSIS

FIELD NOTES:

TEMPERATURE ON RECEIPT C°

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
-9	TB-ROX-070815-A-HCL	07/08/15	0000	Water	2					2	X				0.0
-10	TB-ROX-070815-B-HCL	07/08/15	0000	↓	2					2	X				↓
-11	TB-ROX-070815-A-ST	07/08/15	0000						2	2		X			
-12	TB-ROX-070815-B-ST	07/08/15	0000	↓					2	2		X			↓

Relinquished by: (Signature)	Received by: (Signature)	Date	Time
	FED EX #	07-08-15	
FEDX	[signature]	7-9-15	930

06/2/06 Revision

2.4-1.3-1.0°C

MC39909: Chain of Custody
Page 2 of 3

Accutest Laboratories Sample Receipt Summary

Accutest Job Number: MC39909 **Client:** URS **Project:** 900 SOUTH CENTRAL AVE

Date / Time Received: 7/9/2015 9:30:00 AM **Delivery Method:** **Airbill #'s:**

Cooler Temps (Initial/Adjusted): #1: (2.4/2.4); #2: (1/1); #3: (1.3/1.3);

Cooler Security	Y or N		Y or N
1. Custody Seals Present:	☑ ☐	3. COC Present:	☑ ☐
2. Custody Seals Intact:	☑ ☐	4. Smpl Dates/Time OK	☑ ☐

Cooler Temperature	Y or N
1. Temp criteria achieved:	☑ ☐
2. Thermometer ID:	G1;
3. Cooler media:	Ice (Bag)
4. No. Coolers:	3

Quality Control Preservation	Y or N	N/A
1. Trip Blank present / cooler:	☑ ☐	☐
2. Trip Blank listed on COC:	☑ ☐	☐
3. Samples preserved properly:	☑ ☐	
4. VOCs headspace free:	☑ ☐	☐

Sample Integrity - Documentation	Y or N
1. Sample labels present on bottles:	☑ ☐
2. Container labeling complete:	☑ ☐
3. Sample container label / COC agree:	☑ ☐

Sample Integrity - Condition	Y or N
1. Sample recvd within HT:	☑ ☐
2. All containers accounted for:	☑ ☐
3. Condition of sample:	Intact

Sample Integrity - Instructions	Y or N	N/A
1. Analysis requested is clear:	☑ ☐	
2. Bottles received for unspecified tests	☐ ☑	
3. Sufficient volume recvd for analysis:	☑ ☐	
4. Compositing instructions clear:	☐ ☐	☑
5. Filtering instructions clear:	☐ ☐	☑

Comments

Accutest Laboratories
V:(508) 481-6200

495 Technology Center West, Bldg One
F: (508) 481-7753

Marlborough, MA 01752
www/accutest.com

5.1

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MC39909: Chain of Custody
Page 3 of 3

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC39909

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC39909-1 Collected: 08-JUL-15 11:35 By: SFDH Received: 09-JUL-15 By: MW26-ROX-070815						
MC39909-1	SW846 8260C	17-JUL-15 14:16	JB			V8260SL+
MC39909-1	SW846 8011	17-JUL-15 18:35	NK	16-JUL-15	AW	V8011SL
MC39909-1	SW846 8270D BY SIM	21-JUL-15 11:54	MR	12-JUL-15	AW	B8270SIMSL
MC39909-1	SW846 8270D	21-JUL-15 20:14	KD	12-JUL-15	AW	AB8270SL+
MC39909-2 Collected: 08-JUL-15 12:35 By: SFDH Received: 09-JUL-15 By: P114-ROX-070815						
MC39909-2	SW846 8260C	17-JUL-15 13:47	JB			V8260SL+
MC39909-2	SW846 8011	17-JUL-15 19:03	NK	16-JUL-15	AW	V8011SL
MC39909-2	SW846 8270D BY SIM	21-JUL-15 12:40	MR	12-JUL-15	AW	B8270SIMSL
MC39909-2	SW846 8270D	21-JUL-15 20:55	KD	12-JUL-15	AW	AB8270SL+
MC39909-3 Collected: 08-JUL-15 13:45 By: SFDH Received: 09-JUL-15 By: MW13-ROX-070815						
MC39909-3	SW846 8260C	17-JUL-15 14:44	JB			V8260SL+
MC39909-3	SW846 8011	17-JUL-15 19:31	NK	16-JUL-15	AW	V8011SL
MC39909-3	SW846 8270D BY SIM	21-JUL-15 13:03	MR	12-JUL-15	AW	B8270SIMSL
MC39909-3	SW846 8270D	22-JUL-15 10:44	KD	12-JUL-15	AW	AB8270SL+
MC39909-4 Collected: 08-JUL-15 14:00 By: SFDH Received: 09-JUL-15 By: MW1-ROX-070815						
MC39909-4	SW846 8260C	17-JUL-15 15:12	JB			V8260SL+
MC39909-4	SW846 8011	17-JUL-15 20:00	NK	16-JUL-15	AW	V8011SL
MC39909-4	SW846 8270D BY SIM	21-JUL-15 13:26	MR	12-JUL-15	AW	B8270SIMSL
MC39909-4	SW846 8270D	22-JUL-15 11:05	KD	12-JUL-15	AW	AB8270SL+
MC39909-5 Collected: 08-JUL-15 14:15 By: SFDH Received: 09-JUL-15 By: MW12-ROX-070815-EB						
MC39909-5	SW846 8260C	17-JUL-15 12:50	JB			V8260SL+
MC39909-5	SW846 8011	17-JUL-15 20:28	NK	16-JUL-15	AW	V8011SL
MC39909-5	SW846 8270D BY SIM	21-JUL-15 13:51	MR	12-JUL-15	AW	B8270SIMSL
MC39909-5	SW846 8270D	22-JUL-15 11:25	KD	12-JUL-15	AW	AB8270SL+

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC39909

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC39909-6 Collected: 08-JUL-15 15:25 By: SFDH Received: 09-JUL-15 By: P66-ROX-070815						
MC39909-6	SW846 8260C	17-JUL-15 16:09	JB			V8260SL+
MC39909-6	SW846 8011	17-JUL-15 20:56	NK	16-JUL-15	AW	V8011SL
MC39909-6	SW846 8270D BY SIM	21-JUL-15 14:14	MR	12-JUL-15	AW	B8270SIMSL
MC39909-6	SW846 8270D	22-JUL-15 11:46	KD	12-JUL-15	AW	AB8270SL+
MC39909-7 Collected: 08-JUL-15 15:25 By: SFDH Received: 09-JUL-15 By: P66-ROX-070815-DUP						
MC39909-7	SW846 8260C	17-JUL-15 16:38	JB			V8260SL+
MC39909-7	SW846 8011	18-JUL-15 18:17	NK	16-JUL-15	AW	V8011SL
MC39909-7	SW846 8270D BY SIM	21-JUL-15 14:37	MR	12-JUL-15	AW	B8270SIMSL
MC39909-7	SW846 8270D	22-JUL-15 12:10	KD	12-JUL-15	AW	AB8270SL+
MC39909-8 Collected: 08-JUL-15 15:40 By: SFDH Received: 09-JUL-15 By: MW12-ROX-070815						
MC39909-8	SW846 8260C	17-JUL-15 15:41	JB			V8260SL+
MC39909-8	SW846 8011	18-JUL-15 18:45	NK	16-JUL-15	AW	V8011SL
MC39909-8	SW846 8270D BY SIM	21-JUL-15 15:00	MR	12-JUL-15	AW	B8270SIMSL
MC39909-8	SW846 8270D	22-JUL-15 12:30	KD	12-JUL-15	AW	AB8270SL+
MC39909-9 Collected: 08-JUL-15 00:00 By: SFDH Received: 09-JUL-15 By: TB-ROX-070815-A-HCL						
MC39909-9	SW846 8260C	17-JUL-15 11:53	JB			V8260SL+
MC39909-10 Collected: 08-JUL-15 00:00 By: SFDH Received: 09-JUL-15 By: TB-ROX-070815-B-HCL						
MC39909-10	SW846 8260C	17-JUL-15 12:21	JB			V8260SL+
MC39909-11 Collected: 08-JUL-15 00:00 By: SFDH Received: 09-JUL-15 By: TB-ROX-070815-A-ST						
MC39909-11	SW846 8011	18-JUL-15 19:13	NK	16-JUL-15	AW	V8011SL

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC39909

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC39909-12	Collected: 08-JUL-15 00:00 By: SFDH Received: 09-JUL-15 By: TB-ROX-070815-B-ST					
MC39909-12	SW846 8011	18-JUL-15 19:40	NK	16-JUL-15	AW	V8011SL

Accutest Internal Chain of Custody

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 2156 3720.03003 900 South Central Avenue, Roxana, IL
Received: 07/09/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39909-1.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39909-1.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39909-1.2	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39909-1.2	Forrest Thompson		07/15/15 21:43	Depleted
MC39909-1.4	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39909-1.4	Forrest Thompson		07/15/15 21:43	Depleted
MC39909-1.7	VOC Ref #1	Elizabeth Stefanik	07/20/15 15:54	Retrieve from Storage
MC39909-1.7	Elizabeth Stefanik	VOC Ref #1	07/20/15 18:40	Return to Storage
MC39909-1.8	VOC Ref #1	Elizabeth Stefanik	07/16/15 19:37	Retrieve from Storage
MC39909-1.8	Elizabeth Stefanik		07/16/15 22:30	Depleted
MC39909-1.9	VOC Ref #1	Elizabeth Stefanik	07/16/15 19:37	Retrieve from Storage
MC39909-1.9	Elizabeth Stefanik		07/16/15 22:30	Depleted
MC39909-1.10	VOC Ref #1	Elizabeth Stefanik	07/20/15 15:54	Retrieve from Storage
MC39909-1.10	Elizabeth Stefanik	VOC Ref #1	07/20/15 18:40	Return to Storage
MC39909-1.11	VOC Ref #1	Elizabeth Stefanik	07/16/15 19:37	Retrieve from Storage
MC39909-1.11	Elizabeth Stefanik		07/16/15 22:30	Depleted
MC39909-1.12	VOC Ref #1	Elizabeth Stefanik	07/20/15 15:54	Retrieve from Storage
MC39909-1.12	Elizabeth Stefanik	VOC Ref #1	07/20/15 18:40	Return to Storage
MC39909-1.14	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-1.14	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument
MC39909-1.14	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-1.14	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage
MC39909-1.16	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-1.16	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument
MC39909-1.16	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-1.16	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage
MC39909-1.17	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-1.17	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument
MC39909-1.17	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-1.17	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage
MC39909-1.18	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-1.18	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument

5.3

Accutest Internal Chain of Custody

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/09/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39909-1.18	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-1.18	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage
MC39909-2.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39909-2.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39909-2.3	VOC Ref #1	Elizabeth Stefanik	07/20/15 15:54	Retrieve from Storage
MC39909-2.3	Elizabeth Stefanik	VOC Ref #1	07/20/15 18:40	Return to Storage
MC39909-2.4	VOC Ref #1	Elizabeth Stefanik	07/16/15 19:37	Retrieve from Storage
MC39909-2.4	Elizabeth Stefanik		07/16/15 22:30	Depleted
MC39909-2.6	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-2.6	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument
MC39909-2.6	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-2.6	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage
MC39909-3.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39909-3.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39909-3.3	VOC Ref #1	Elizabeth Stefanik	07/16/15 19:37	Retrieve from Storage
MC39909-3.3	Elizabeth Stefanik		07/16/15 22:30	Depleted
MC39909-3.4	VOC Ref #1	Elizabeth Stefanik	07/20/15 15:54	Retrieve from Storage
MC39909-3.4	Elizabeth Stefanik	VOC Ref #1	07/20/15 18:40	Return to Storage
MC39909-3.5	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-3.5	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument
MC39909-3.5	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-3.5	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage
MC39909-4.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39909-4.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39909-4.3	VOC Ref #1	Elizabeth Stefanik	07/20/15 15:54	Retrieve from Storage
MC39909-4.3	Elizabeth Stefanik	VOC Ref #1	07/20/15 18:40	Return to Storage
MC39909-4.4	VOC Ref #1	Elizabeth Stefanik	07/16/15 19:37	Retrieve from Storage
MC39909-4.4	Elizabeth Stefanik		07/16/15 22:30	Depleted
MC39909-4.6	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-4.6	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument
MC39909-4.6	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-4.6	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage

Accutest Internal Chain of Custody

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/09/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39909-5.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39909-5.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39909-5.3	VOC Ref #1	Elizabeth Stefanik	07/20/15 15:54	Retrieve from Storage
MC39909-5.3	Elizabeth Stefanik	VOC Ref #1	07/20/15 18:40	Return to Storage
MC39909-5.4	VOC Ref #1	Elizabeth Stefanik	07/16/15 19:37	Retrieve from Storage
MC39909-5.4	Elizabeth Stefanik		07/16/15 22:30	Depleted
MC39909-5.5	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-5.5	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument
MC39909-5.5	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-5.5	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage
MC39909-6.2	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39909-6.2	Forrest Thompson		07/15/15 21:43	Depleted
MC39909-6.3	VOC Ref #1	Elizabeth Stefanik	07/20/15 15:54	Retrieve from Storage
MC39909-6.3	Elizabeth Stefanik	VOC Ref #1	07/20/15 18:40	Return to Storage
MC39909-6.4	VOC Ref #1	Elizabeth Stefanik	07/16/15 19:37	Retrieve from Storage
MC39909-6.4	Elizabeth Stefanik		07/16/15 22:30	Depleted
MC39909-6.5	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-6.5	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument
MC39909-6.5	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-6.5	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage
MC39909-7.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39909-7.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39909-7.3	VOC Ref #1	Elizabeth Stefanik	07/20/15 15:54	Retrieve from Storage
MC39909-7.3	Elizabeth Stefanik	VOC Ref #1	07/20/15 18:40	Return to Storage
MC39909-7.4	VOC Ref #1	Elizabeth Stefanik	07/16/15 19:37	Retrieve from Storage
MC39909-7.4	Elizabeth Stefanik		07/16/15 22:30	Depleted
MC39909-7.5	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-7.5	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument
MC39909-7.5	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-7.5	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage
MC39909-8.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage

5.3
5

Accutest Internal Chain of Custody

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/09/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39909-8.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39909-8.3	VOC Ref #1	Elizabeth Stefanik	07/16/15 19:37	Retrieve from Storage
MC39909-8.3	Elizabeth Stefanik		07/16/15 22:30	Depleted
MC39909-8.4	VOC Ref #1	Elizabeth Stefanik	07/20/15 15:54	Retrieve from Storage
MC39909-8.4	Elizabeth Stefanik	VOC Ref #1	07/20/15 18:40	Return to Storage
MC39909-8.6	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-8.6	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument
MC39909-8.6	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-8.6	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage
MC39909-9.2	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-9.2	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument
MC39909-9.2	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-9.2	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage
MC39909-10.2	VOC Ref #1	Jaclyn Bergeron	07/17/15 10:18	Retrieve from Storage
MC39909-10.2	Jaclyn Bergeron	GCMSV	07/17/15 10:18	Load on Instrument
MC39909-10.2	GCMSV	Jaclyn Bergeron	07/20/15 11:30	Unload from Instrument
MC39909-10.2	Jaclyn Bergeron	VOC Ref #1	07/20/15 11:30	Return to Storage
MC39909-11.1	VOC Ref #1	Elizabeth Stefanik	07/16/15 19:37	Retrieve from Storage
MC39909-11.1	Elizabeth Stefanik		07/16/15 22:30	Depleted
MC39909-11.2	VOC Ref #1	Elizabeth Stefanik	07/20/15 15:54	Retrieve from Storage
MC39909-11.2	Elizabeth Stefanik	VOC Ref #1	07/20/15 18:40	Return to Storage
MC39909-12.1	VOC Ref #1	Elizabeth Stefanik	07/16/15 19:37	Retrieve from Storage
MC39909-12.1	Elizabeth Stefanik		07/16/15 22:30	Depleted
MC39909-12.2	VOC Ref #1	Elizabeth Stefanik	07/20/15 15:54	Retrieve from Storage
MC39909-12.2	Elizabeth Stefanik	VOC Ref #1	07/20/15 18:40	Return to Storage

New England ACCUTEST LABORATORIES

GC/MS Volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1484-MB	V41120.D	1	07/17/15	JB	n/a	n/a	MSV1484

The QC reported here applies to the following samples: Method: SW846 8260C

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8, MC39909-9, MC39909-10

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	

Method Blank Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1484-MB	V41120.D	1	07/17/15	JB	n/a	n/a	MSV1484

The QC reported here applies to the following samples: Method: SW846 8260C

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8, MC39909-9, MC39909-10

CAS No.	Compound	Result	RL	MDL	Units	Q
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

Method Blank Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1484-MB	V41120.D	1	07/17/15	JB	n/a	n/a	MSV1484

The QC reported here applies to the following samples: Method: SW846 8260C

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8, MC39909-9, MC39909-10

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	98%	72-133%
2037-26-5	Toluene-D8	98%	85-114%
460-00-4	4-Bromofluorobenzene	98%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1484-BS	V41117.D	1	07/17/15	JB	n/a	n/a	MSV1484
MSV1484-BSD	V41118.D	1	07/17/15	JB	n/a	n/a	MSV1484

The QC reported here applies to the following samples: Method: SW846 8260C

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8, MC39909-9, MC39909-10

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	73.7	147	79.0	158	7	14-172/25
107-02-8	Acrolein	250	369	148	385	154	4	10-168/25
107-13-1	Acrylonitrile	50	52.9	106	53.4	107	1	41-158/25
71-43-2	Benzene	50	52.5	105	51.9	104	1	68-127/25
108-86-1	Bromobenzene	50	51.1	102	50.5	101	1	74-124/25
74-97-5	Bromochloromethane	50	51.6	103	51.2	102	1	68-135/25
75-27-4	Bromodichloromethane	50	44.1	88	44.5	89	1	72-144/25
75-25-2	Bromoform	50	45.3	91	46.7	93	3	59-147/25
74-83-9	Bromomethane	50	47.7	95	47.2	94	1	34-175/25
78-93-3	2-Butanone (MEK)	50	70.2	140	72.0	144	3	43-147/25
104-51-8	n-Butylbenzene	50	58.2	116	57.1	114	2	77-136/25
135-98-8	sec-Butylbenzene	50	55.2	110	54.5	109	1	75-134/25
98-06-6	tert-Butylbenzene	50	54.6	109	54.4	109	0	74-132/25
75-15-0	Carbon disulfide	50	67.8	136	71.4	143	5	34-171/25
56-23-5	Carbon tetrachloride	50	54.8	110	53.3	107	3	55-153/25
108-90-7	Chlorobenzene	50	48.4	97	48.2	96	0	71-123/25
75-00-3	Chloroethane	50	49.2	98	49.2	98	0	58-175/25
110-75-8	2-Chloroethyl vinyl ether	50	45.7	91	46.8	94	2	44-169/25
67-66-3	Chloroform	50	47.7	95	46.7	93	2	67-136/25
74-87-3	Chloromethane	50	44.9	90	44.6	89	1	25-182/25
95-49-8	o-Chlorotoluene	50	53.9	108	52.9	106	2	72-130/25
106-43-4	p-Chlorotoluene	50	53.1	106	52.0	104	2	73-127/25
124-48-1	Dibromochloromethane	50	45.8	92	46.7	93	2	73-139/25
95-50-1	1,2-Dichlorobenzene	50	49.9	100	49.9	100	0	77-125/25
541-73-1	1,3-Dichlorobenzene	50	50.2	100	49.8	100	1	77-124/25
106-46-7	1,4-Dichlorobenzene	50	47.6	95	47.4	95	0	73-128/25
75-71-8	Dichlorodifluoromethane	50	28.3	57	27.0	54	5	23-157/25
75-34-3	1,1-Dichloroethane	50	51.8	104	50.9	102	2	63-145/25
107-06-2	1,2-Dichloroethane	50	46.0	92	46.9	94	2	58-145/25
75-35-4	1,1-Dichloroethene	50	61.8	124	66.8	134	8	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	56.8	114	55.6	111	2	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	54.4	109	53.1	106	2	66-136/25
78-87-5	1,2-Dichloropropane	50	47.5	95	47.3	95	0	75-133/25
142-28-9	1,3-Dichloropropane	50	49.2	98	50.5	101	3	70-127/25
594-20-7	2,2-Dichloropropane	50	52.6	105	52.2	104	1	52-163/25
563-58-6	1,1-Dichloropropene	50	50.0	100	50.1	100	0	77-140/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1484-BS	V41117.D	1	07/17/15	JB	n/a	n/a	MSV1484
MSV1484-BSD	V41118.D	1	07/17/15	JB	n/a	n/a	MSV1484

The QC reported here applies to the following samples: Method: SW846 8260C

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8, MC39909-9, MC39909-10

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	50	58.3	117	59.2	118	2	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	49.6	99	51.0	102	3	77-143/25
123-91-1	1,4-Dioxane	250	230	92	228	91	1	30-182/25
97-63-2	Ethyl methacrylate	50	52.0	104	54.1	108	4	64-131/25
100-41-4	Ethylbenzene	50	52.2	104	51.1	102	2	71-129/25
87-68-3	Hexachlorobutadiene	50	51.4	103	51.4	103	0	64-146/25
591-78-6	2-Hexanone	50	74.4	149	77.8	156	4	22-163/25
98-82-8	Isopropylbenzene	50	57.2	114	56.2	112	2	72-133/25
99-87-6	p-Isopropyltoluene	50	57.8	116	56.9	114	2	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	54.4	109	57.7	115	6	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	55.5	111	57.4	115	3	47-145/25
74-95-3	Methylene bromide	50	45.8	92	47.3	95	3	70-132/25
75-09-2	Methylene chloride	50	51.0	102	53.3	107	4	55-146/25
91-20-3	Naphthalene	50	45.3	91	49.3	99	8	39-176/25
103-65-1	n-Propylbenzene	50	55.5	111	54.1	108	3	74-134/25
100-42-5	Styrene	50	57.3	115	56.4	113	2	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	47.4	95	46.8	94	1	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	47.5	95	48.5	97	2	58-145/25
127-18-4	Tetrachloroethene	50	48.1	96	47.7	95	1	63-137/25
108-88-3	Toluene	50	49.5	99	48.3	97	2	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	56.1	112	62.3	125	10	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	53.2	106	56.0	112	5	40-176/25
71-55-6	1,1,1-Trichloroethane	50	49.8	100	49.6	99	0	68-144/25
79-00-5	1,1,2-Trichloroethane	50	47.1	94	48.0	96	2	72-133/25
79-01-6	Trichloroethene	50	47.8	96	48.0	96	0	73-126/25
75-69-4	Trichlorofluoromethane	50	41.4	83	41.5	83	0	43-152/25
96-18-4	1,2,3-Trichloropropane	50	51.9	104	52.7	105	2	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	57.5	115	56.5	113	2	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	58.0	116	56.8	114	2	71-127/25
108-05-4	Vinyl Acetate	50	55.2	110	55.6	111	1	10-170/25
75-01-4	Vinyl chloride	50	44.6	89	44.6	89	0	36-167/25
	m,p-Xylene	100	108	108	106	106	2	68-130/25
95-47-6	o-Xylene	50	54.9	110	54.0	108	2	69-126/25
1330-20-7	Xylene (total)	150	163	109	160	107	2	67-129/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1484-BS	V41117.D	1	07/17/15	JB	n/a	n/a	MSV1484
MSV1484-BSD	V41118.D	1	07/17/15	JB	n/a	n/a	MSV1484

The QC reported here applies to the following samples: Method: SW846 8260C

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8, MC39909-9, MC39909-10

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	97%	96%	72-133%
2037-26-5	Toluene-D8	102%	101%	85-114%
460-00-4	4-Bromofluorobenzene	102%	101%	70-134%

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MC39909-1MS	V41133.D	1	07/17/15	JB	n/a	n/a	MSV1484
MC39909-1MSD	V41134.D	1	07/17/15	JB	n/a	n/a	MSV1484
MC39909-1	V41127.D	1	07/17/15	JB	n/a	n/a	MSV1484

The QC reported here applies to the following samples: Method: SW846 8260C

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8, MC39909-9, MC39909-10

CAS No.	Compound	MC39909-1 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	ND		50	31.7	63	50	31.0	62	2	10-135/30
107-02-8	Acrolein	ND		250	374	150	250	396	158	6	10-175/30
107-13-1	Acrylonitrile	ND		50	52.8	106	50	52.4	105	1	37-163/30
71-43-2	Benzene	ND		50	50.3	101	50	51.7	103	3	61-138/30
108-86-1	Bromobenzene	ND		50	48.2	96	50	51.0	102	6	71-126/30
74-97-5	Bromochloromethane	ND		50	48.8	98	50	49.9	100	2	70-136/30
75-27-4	Bromodichloromethane	ND		50	42.2	84	50	43.6	87	3	73-146/30
75-25-2	Bromoform	ND		50	43.0	86	50	44.0	88	2	54-147/30
74-83-9	Bromomethane	ND		50	48.6	97	50	52.0	104	7	20-171/30
78-93-3	2-Butanone (MEK)	ND		50	41.7	83	50	42.5	85	2	33-127/30
104-51-8	n-Butylbenzene	ND		50	54.1	108	50	56.3	113	4	69-138/30
135-98-8	sec-Butylbenzene	ND		50	51.0	102	50	53.8	108	5	71-137/30
98-06-6	tert-Butylbenzene	ND		50	52.7	105	50	55.1	110	4	68-137/30
75-15-0	Carbon disulfide	ND		50	66.0	132	50	70.0	140	6	29-178/30
56-23-5	Carbon tetrachloride	ND		50	49.5	99	50	51.8	104	5	57-155/30
108-90-7	Chlorobenzene	ND		50	46.7	93	50	47.8	96	2	69-126/30
75-00-3	Chloroethane	ND		50	52.1	104	50	54.7	109	5	57-182/30
110-75-8	2-Chloroethyl vinyl ether	ND		50	4.6	9* a	50	ND	0* a	200* b	10-200/30
67-66-3	Chloroform	ND		50	45.7	91	50	46.3	93	1	66-142/30
74-87-3	Chloromethane	ND		50	46.5	93	50	49.6	99	6	18-182/30
95-49-8	o-Chlorotoluene	ND		50	50.8	102	50	53.4	107	5	60-145/30
106-43-4	p-Chlorotoluene	ND		50	49.7	99	50	52.4	105	5	64-138/30
124-48-1	Dibromochloromethane	ND		50	43.3	87	50	44.8	90	3	71-138/30
95-50-1	1,2-Dichlorobenzene	ND		50	47.2	94	50	49.0	98	4	75-125/30
541-73-1	1,3-Dichlorobenzene	ND		50	47.6	95	50	49.4	99	4	74-125/30
106-46-7	1,4-Dichlorobenzene	ND		50	45.6	91	50	47.0	94	3	72-128/30
75-71-8	Dichlorodifluoromethane	ND		50	24.7	49	50	27.7	55	11	23-159/30
75-34-3	1,1-Dichloroethane	ND		50	49.5	99	50	50.3	101	2	63-150/30
107-06-2	1,2-Dichloroethane	ND		50	44.4	89	50	45.8	92	3	57-150/30
75-35-4	1,1-Dichloroethene	ND		50	60.8	122	50	65.3	131	7	53-165/30
156-59-2	cis-1,2-Dichloroethene	ND		50	54.0	108	50	55.5	111	3	66-138/30
156-60-5	trans-1,2-Dichloroethene	ND		50	50.8	102	50	52.4	105	3	65-141/30
78-87-5	1,2-Dichloropropane	ND		50	45.9	92	50	47.7	95	4	76-136/30
142-28-9	1,3-Dichloropropane	ND		50	48.4	97	50	49.8	100	3	71-127/30
594-20-7	2,2-Dichloropropane	ND		50	50.4	101	50	53.5	107	6	33-175/30
563-58-6	1,1-Dichloropropene	ND		50	47.8	96	50	49.0	98	2	76-145/30

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MC39909-1MS	V41133.D	1	07/17/15	JB	n/a	n/a	MSV1484
MC39909-1MSD	V41134.D	1	07/17/15	JB	n/a	n/a	MSV1484
MC39909-1	V41127.D	1	07/17/15	JB	n/a	n/a	MSV1484

The QC reported here applies to the following samples: Method: SW846 8260C

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8, MC39909-9, MC39909-10

CAS No.	Compound	MC39909-1 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	ND		50	54.9	110	50	57.6	115	5	75-137/30
10061-02-6	trans-1,3-Dichloropropene	ND		50	47.3	95	50	50.2	100	6	77-139/30
123-91-1	1,4-Dioxane	ND		250	94.5	38	250	122	49	25	29-167/30
97-63-2	Ethyl methacrylate	ND		50	54.2	108	50	55.1	110	2	60-135/30
100-41-4	Ethylbenzene	ND		50	50.2	100	50	51.0	102	2	61-137/30
87-68-3	Hexachlorobutadiene	ND		50	40.6	81	50	45.5	91	11	59-141/30
591-78-6	2-Hexanone	ND		50	42.3	85	50	43.1	86	2	12-141/30
98-82-8	Isopropylbenzene	ND		50	54.0	108	50	57.3	115	6	64-141/30
99-87-6	p-Isopropyltoluene	ND		50	53.1	106	50	56.3	113	6	73-135/30
1634-04-4	Methyl Tert Butyl Ether	ND		50	54.9	110	50	58.5	117	6	34-160/30
108-10-1	4-Methyl-2-pentanone (MIBK)	ND		50	53.2	106	50	55.1	110	4	47-143/30
74-95-3	Methylene bromide	ND		50	44.2	88	50	46.0	92	4	73-132/30
75-09-2	Methylene chloride	ND		50	50.0	100	50	52.6	105	5	52-154/30
91-20-3	Naphthalene	ND		50	36.3	73	50	42.1	84	15	21-185/30
103-65-1	n-Propylbenzene	ND		50	51.8	104	50	54.7	109	5	66-141/30
100-42-5	Styrene	ND		50	55.6	111	50	55.9	112	1	60-142/30
630-20-6	1,1,1,2-Tetrachloroethane	ND		50	46.3	93	50	46.8	94	1	69-138/30
79-34-5	1,1,2,2-Tetrachloroethane	ND		50	46.4	93	50	48.6	97	5	58-147/30
127-18-4	Tetrachloroethene	ND		50	45.8	92	50	47.0	94	3	60-140/30
108-88-3	Toluene	ND		50	46.9	94	50	48.8	98	4	74-131/30
87-61-6	1,2,3-Trichlorobenzene	ND		50	37.0	74	50	51.6	103	33* b	12-184/30
120-82-1	1,2,4-Trichlorobenzene	ND		50	43.0	86	50	47.1	94	9	30-175/30
71-55-6	1,1,1-Trichloroethane	ND		50	46.8	94	50	49.2	98	5	67-151/30
79-00-5	1,1,2-Trichloroethane	ND		50	46.0	92	50	47.0	94	2	73-134/30
79-01-6	Trichloroethene	ND		50	45.6	91	50	47.4	95	4	68-133/30
75-69-4	Trichlorofluoromethane	ND		50	41.9	84	50	44.8	90	7	40-159/30
96-18-4	1,2,3-Trichloropropane	ND		50	50.2	100	50	52.8	106	5	54-141/30
95-63-6	1,2,4-Trimethylbenzene	ND		50	53.8	108	50	56.2	112	4	62-142/30
108-67-8	1,3,5-Trimethylbenzene	ND		50	53.9	108	50	57.0	114	6	62-133/30
108-05-4	Vinyl Acetate	ND		50	54.9	110	50	56.2	112	2	10-169/30
75-01-4	Vinyl chloride	ND		50	46.4	93	50	49.4	99	6	29-176/30
	m,p-Xylene	ND		100	104	104	100	105	105	1	58-139/30
95-47-6	o-Xylene	ND		50	52.7	105	50	53.6	107	2	61-135/30
1330-20-7	Xylene (total)	ND		150	156	104	150	159	106	2	60-136/30

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MC39909-1MS	V41133.D	1	07/17/15	JB	n/a	n/a	MSV1484
MC39909-1MSD	V41134.D	1	07/17/15	JB	n/a	n/a	MSV1484
MC39909-1	V41127.D	1	07/17/15	JB	n/a	n/a	MSV1484

The QC reported here applies to the following samples: Method: SW846 8260C

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8, MC39909-9, MC39909-10

CAS No.	Surrogate Recoveries	MS	MSD	MC39909-1	Limits
1868-53-7	Dibromofluoromethane	96%	95%	103%	72-133%
2037-26-5	Toluene-D8	100%	101%	99%	85-114%
460-00-4	4-Bromofluorobenzene	101%	102%	100%	70-134%

(a) Outside control limits due to possible matrix interference. Refer to Blank Spike.
(b) High RPD due to possible matrix interference and/or sample non-homogeneity.

* = Outside of Control Limits.

Volatile Internal Standard Area Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSV1484-CC1479	Injection Date:	07/17/15
Lab File ID:	V41116.D	Injection Time:	09:01
Instrument ID:	GCMSV	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	1231882	7.73	555677	11.07	112637	3.52	760275	6.55	555050	13.28
Upper Limit [a]	2463764	8.23	1111354	11.57	225274	4.02	1520550	7.05	1110100	13.78
Lower Limit [b]	615941	7.23	277839	10.57	56319	3.02	380138	6.05	277525	12.78

Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSV1484-BS	1168449	7.73	530244	11.07	100266	3.52	737661	6.54	528638	13.28
MSV1483-BS1	1168449	7.73	530244	11.07	100266	3.52	737661	6.54	528638	13.28
MSV1483-BSD1	1227083	7.74	553635	11.07	114893	3.53	770310	6.55	550663	13.28
MSV1484-BSD	1227083	7.74	553635	11.07	114893	3.53	770310	6.55	550663	13.28
MSV1483-MB1	1095002	7.73	472370	11.07	99626	3.52	703252	6.55	486418	13.28
MSV1484-MB	1095002	7.73	472370	11.07	99626	3.52	703252	6.55	486418	13.28
ZZZZZZ	1161037	7.73	503588	11.07	105200	3.52	725154	6.55	504074	13.28
MC39909-9	1150421	7.73	509119	11.07	105462	3.53	708255	6.55	514911	13.28
MC39909-10	1059212	7.74	459471	11.07	98991	3.52	652654	6.55	461410	13.29
MC39909-5	1051242	7.74	462112	11.07	92044	3.52	651169	6.55	468369	13.29
ZZZZZZ	1047919	7.74	466628	11.07	103777	3.53	646815	6.55	495018	13.28
MC39909-2	1105170	7.74	479957	11.07	110533	3.53	679342	6.55	496321	13.29
MC39909-1	1108759	7.74	482081	11.07	83659	3.53	688365	6.55	474090	13.29
MC39400-22	1108759	7.74	482081	11.07	83659	3.53	688365	6.55	474090	13.29
MC39909-3	1076048	7.74	473846	11.07	93248	3.53	662876	6.55	472073	13.29
MC39909-4	1074106	7.74	458664	11.07	80957	3.53	668781	6.55	460913	13.29
MC39909-8	1061851	7.74	465024	11.07	81113	3.52	669900	6.55	463032	13.29
MC39909-6	1114318	7.74	504865	11.07	100415	3.53	727412	6.55	506498	13.29
MC39909-7	1160404	7.74	528085	11.08	104607	3.53	738466	6.55	525299	13.29
MC39400-22MS	1243406	7.74	553854	11.08	84616	3.54	774233	6.56	563486	13.29
MC39909-1MS	1243406	7.74	553854	11.08	84616	3.54	774233	6.56	563486	13.29
MC39909-1MSD	1155945	7.74	520516	11.08	81252	3.53	720182	6.55	510251	13.29
MC39400-22MSD	1155945	7.74	520516	11.08	81252	3.53	720182	6.55	510251	13.29
ZZZZZZ	1184518	7.74	493774	11.08	77211	3.53	740093	6.55	512688	13.29
ZZZZZZ	1128841	7.74	483887	11.08	73978	3.53	708674	6.55	483397	13.29
ZZZZZZ	1145229	7.74	522193	11.07	81739	3.52	715369	6.55	509360	13.29
ZZZZZZ	1186820	7.74	528211	11.08	91196	3.53	747357	6.56	522272	13.29
ZZZZZZ	1231872	7.74	526407	11.07	105236	3.53	770758	6.56	541994	13.29

IS 1 = 1,4-Difluorobenzene
IS 2 = Chlorobenzene-D5
IS 3 = Tert Butyl Alcohol-D9
IS 4 = Pentafluorobenzene
IS 5 = 1,4-Dichlorobenzene-d4

Volatile Internal Standard Area Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSV1484-CC1479	Injection Date:	07/17/15
Lab File ID:	V41116.D	Injection Time:	09:01
Instrument ID:	GCMSV	Method:	SW846 8260C

Lab	IS 1		IS 2		IS 3		IS 4		IS 5	
Sample ID	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

6.4.1

Volatile Surrogate Recovery Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8260C Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC39909-1	V41127.D	103	99	100
MC39909-2	V41126.D	103	99	103
MC39909-3	V41128.D	101	99	103
MC39909-4	V41129.D	102	98	100
MC39909-5	V41124.D	103	99	98
MC39909-6	V41131.D	95	106	101
MC39909-7	V41132.D	95	106	102
MC39909-8	V41130.D	102	99	100
MC39909-9	V41122.D	101	99	99
MC39909-10	V41123.D	102	99	99
MC39909-1MS	V41133.D	96	100	101
MC39909-1MSD	V41134.D	95	101	102
MSV1484-BS	V41117.D	97	102	102
MSV1484-BSD	V41118.D	96	101	101
MSV1484-MB	V41120.D	98	98	98

Surrogate Compounds	Recovery Limits
S1 = Dibromofluoromethane	72-133%
S2 = Toluene-D8	85-114%
S3 = 4-Bromofluorobenzene	70-134%

New England ACCUTEST LABORATORIES

GC/MS Semi-volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43772-MB	X06426.D	1	07/21/15	KD	07/12/15	OP43772	MSX202

The QC reported here applies to the following samples: Method: SW846 8270D

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.5	ug/l	
95-57-8	2-Chlorophenol	ND	5.0	0.29	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.37	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.28	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.50	ug/l	
51-28-5	2,4-Dinitrophenol	ND	20	2.5	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	1.9	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.47	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.41	ug/l	
100-02-7	4-Nitrophenol	ND	20	2.5	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.30	ug/l	
108-95-2	Phenol	ND	5.0	0.25	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.34	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.30	ug/l	
62-53-3	Aniline	ND	10	2.5	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.0	0.82	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.0	0.21	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.51	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.0	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.54	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.0	0.24	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.0	0.42	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.0	0.24	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.0	0.21	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.0	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.0	0.37	ug/l	
132-64-9	Dibenzofuran	ND	2.0	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.0	0.37	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.0	0.72	ug/l	
84-66-2	Diethyl phthalate	ND	5.0	0.57	ug/l	
131-11-3	Dimethyl phthalate	ND	5.0	0.27	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.0	0.30	ug/l	
118-74-1	Hexachlorobenzene	ND	5.0	0.77	ug/l	

Method Blank Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43772-MB	X06426.D	1	07/21/15	KD	07/12/15	OP43772	MSX202

The QC reported here applies to the following samples: Method: SW846 8270D

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8

CAS No.	Compound	Result	RL	MDL	Units	Q
77-47-4	Hexachlorocyclopentadiene	ND	10	1.3	ug/l	
67-72-1	Hexachloroethane	ND	5.0	0.29	ug/l	
78-59-1	Isophorone	ND	5.0	0.23	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.6	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.1	ug/l	
98-95-3	Nitrobenzene	ND	5.0	0.26	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.0	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.0	0.52	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.0	0.77	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries		Limits
367-12-4	2-Fluorophenol	48%	10-80%
4165-62-2	Phenol-d5	40%	10-72%
118-79-6	2,4,6-Tribromophenol	109%	42-134%
4165-60-0	Nitrobenzene-d5	87%	25-117%
321-60-8	2-Fluorobiphenyl	82%	24-112%
1718-51-0	Terphenyl-d14	109%	48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

Method Blank Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43773-MB	I96866.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.10	0.0075	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0084	ug/l	
120-12-7	Anthracene	ND	0.10	0.0098	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.050	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.015	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.050	0.019	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.013	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0074	ug/l	
86-73-7	Fluorene	ND	0.10	0.015	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.020	ug/l	
90-12-0	1-Methylnaphthalene	ND	2.0	0.012	ug/l	
91-57-6	2-Methylnaphthalene	ND	2.0	0.011	ug/l	
85-01-8	Phenanthrene	ND	0.050	0.011	ug/l	
129-00-0	Pyrene	ND	0.10	0.0085	ug/l	

CAS No.	Surrogate Recoveries		Limits
4165-60-0	Nitrobenzene-d5	80%	26-121%
321-60-8	2-Fluorobiphenyl	78%	28-107%
1718-51-0	Terphenyl-d14	105%	29-129%

Blank Spike Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43772-BS	X06427.D	1	07/21/15	KD	07/12/15	OP43772	MSX202

The QC reported here applies to the following samples: Method: SW846 8270D

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	Limits
65-85-0	Benzoic Acid	50	22.8	46	10-70
95-57-8	2-Chlorophenol	50	35.8	72	39-100
59-50-7	4-Chloro-3-methyl phenol	50	40.2	80	43-112
120-83-2	2,4-Dichlorophenol	50	40.6	81	44-113
105-67-9	2,4-Dimethylphenol	50	28.3	57	21-108
51-28-5	2,4-Dinitrophenol	50	36.9	74	22-128
534-52-1	4,6-Dinitro-o-cresol	50	49.0	98	42-132
95-48-7	2-Methylphenol	50	31.9	64	34-91
	3&4-Methylphenol	100	61.3	61	31-90
88-75-5	2-Nitrophenol	50	45.0	90	40-118
100-02-7	4-Nitrophenol	50	18.1	36	10-71
87-86-5	Pentachlorophenol	50	46.0	92	33-123
108-95-2	Phenol	50	19.5	39	11-57
95-95-4	2,4,5-Trichlorophenol	50	43.6	87	50-122
88-06-2	2,4,6-Trichlorophenol	50	42.5	85	48-118
62-53-3	Aniline	50	35.1	70	18-90
101-55-3	4-Bromophenyl phenyl ether	50	47.4	95	55-126
85-68-7	Butyl benzyl phthalate	50	42.6	85	56-124
100-51-6	Benzyl Alcohol	50	38.3	77	13-106
91-58-7	2-Chloronaphthalene	50	43.5	87	45-123
106-47-8	4-Chloroaniline	50	43.0	86	35-111
111-91-1	bis(2-Chloroethoxy)methane	50	42.8	86	41-117
111-44-4	bis(2-Chloroethyl)ether	50	39.8	80	31-114
108-60-1	bis(2-Chloroisopropyl)ether	50	43.4	87	33-135
7005-72-3	4-Chlorophenyl phenyl ether	50	47.6	95	52-124
122-66-7	1,2-Diphenylhydrazine	50	44.5	89	45-119
121-14-2	2,4-Dinitrotoluene	50	47.8	96	52-128
606-20-2	2,6-Dinitrotoluene	50	49.3	99	50-126
91-94-1	3,3'-Dichlorobenzidine	50	46.4	93	46-134
132-64-9	Dibenzofuran	50	43.1	86	51-118
84-74-2	Di-n-butyl phthalate	50	45.0	90	57-120
117-84-0	Di-n-octyl phthalate	50	43.4	87	58-125
84-66-2	Diethyl phthalate	50	44.1	88	40-125
131-11-3	Dimethyl phthalate	50	44.0	88	10-145
117-81-7	bis(2-Ethylhexyl)phthalate	50	44.4	89	60-126
118-74-1	Hexachlorobenzene	50	48.7	97	53-127

* = Outside of Control Limits.

Blank Spike Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43772-BS	X06427.D	1	07/21/15	KD	07/12/15	OP43772	MSX202

The QC reported here applies to the following samples: Method: SW846 8270D

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	Limits
77-47-4	Hexachlorocyclopentadiene	50	15.8	32	10-75
67-72-1	Hexachloroethane	50	35.6	71	15-98
78-59-1	Isophorone	50	41.7	83	36-106
88-74-4	2-Nitroaniline	50	48.2	96	52-130
99-09-2	3-Nitroaniline	50	46.5	93	47-120
100-01-6	4-Nitroaniline	50	46.4	93	51-121
98-95-3	Nitrobenzene	50	40.8	82	27-120
62-75-9	n-Nitrosodimethylamine	50	30.4	61	10-87
621-64-7	N-Nitroso-di-n-propylamine	50	40.2	80	37-123
86-30-6	N-Nitrosodiphenylamine	50	43.2	86	50-112
110-86-1	Pyridine	50	23.4	47	10-72

CAS No.	Surrogate Recoveries	BSP	Limits
367-12-4	2-Fluorophenol	51%	10-80%
4165-62-2	Phenol-d5	41%	10-72%
118-79-6	2,4,6-Tribromophenol	116%	42-134%
4165-60-0	Nitrobenzene-d5	90%	25-117%
321-60-8	2-Fluorobiphenyl	72%	24-112%
1718-51-0	Terphenyl-d14	103%	48-133%

* = Outside of Control Limits.

Blank Spike Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43773-BS	I96867.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	Limits
83-32-9	Acenaphthene	50	39.1	78	45-116
208-96-8	Acenaphthylene	50	37.5	75	34-110
120-12-7	Anthracene	50	41.1	82	50-117
56-55-3	Benzo(a)anthracene	50	41.0	82	55-139
50-32-8	Benzo(a)pyrene	50	48.4	97	48-131
205-99-2	Benzo(b)fluoranthene	50	44.8	90	49-141
191-24-2	Benzo(g,h,i)perylene	50	46.2	92	60-130
207-08-9	Benzo(k)fluoranthene	50	47.3	95	49-133
218-01-9	Chrysene	50	40.2	80	52-128
53-70-3	Dibenzo(a,h)anthracene	50	47.2	94	60-136
206-44-0	Fluoranthene	50	42.2	84	46-132
86-73-7	Fluorene	50	41.0	82	53-120
193-39-5	Indeno(1,2,3-cd)pyrene	50	46.1	92	57-134
90-12-0	1-Methylnaphthalene	50	35.4	71	41-105
91-57-6	2-Methylnaphthalene	50	38.2	76	36-111
85-01-8	Phenanthrene	50	38.3	77	50-120
129-00-0	Pyrene	50	41.3	83	48-127

CAS No.	Surrogate Recoveries	BSP	Limits
4165-60-0	Nitrobenzene-d5	84%	26-121%
321-60-8	2-Fluorobiphenyl	68%	28-107%
1718-51-0	Terphenyl-d14	103%	29-129%

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43772-MS	X06428.D	1	07/21/15	KD	07/12/15	OP43772	MSX202
OP43772-MSD	X06429.D	1	07/21/15	KD	07/12/15	OP43772	MSX202
MC39909-1	X06432.D	1	07/21/15	KD	07/12/15	OP43772	MSX202

The QC reported here applies to the following samples: Method: SW846 8270D

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8

7.3.1

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CAS No.	Compound	MC39909-1 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
65-85-0	Benzoic Acid	ND		52.6	26.8	51	51.5	ND	0* a	200* b	10-69/20
95-57-8	2-Chlorophenol	ND		52.6	36.1	69	51.5	71.3	138* a	66* b	35-104/20
59-50-7	4-Chloro-3-methyl phenol	ND		52.6	40.9	78	51.5	80.0	155* a	65* b	43-115/20
120-83-2	2,4-Dichlorophenol	ND		52.6	42.3	80	51.5	84.7	164* a	67* b	42-116/20
105-67-9	2,4-Dimethylphenol	ND		52.6	24.8	47	51.5	57.5	112* a	79* b	26-109/20
51-28-5	2,4-Dinitrophenol	ND		52.6	46.1	88	51.5	ND	0* a	200* b	19-140/20
534-52-1	4,6-Dinitro-o-cresol	ND		52.6	56.2	107	51.5	43.8	85	25* b	45-136/20
95-48-7	2-Methylphenol	ND		52.6	30.4	58	51.5	60.6	118* a	66* b	31-94/20
	3&4-Methylphenol	ND		105	60.1	57	103	114	111* a	62* b	30-91/20
88-75-5	2-Nitrophenol	ND		52.6	46.6	89	51.5	95.7	186* a	69* b	38-121/20
100-02-7	4-Nitrophenol	ND		52.6	18.5	35	51.5	18.6	36	1	18-57/20
87-86-5	Pentachlorophenol	ND		52.6	49.4	94	51.5	84.4	164* a	52* b	41-126/20
108-95-2	Phenol	ND		52.6	17.8	34	51.5	33.0	64* a	60* b	16-51/20
95-95-4	2,4,5-Trichlorophenol	ND		52.6	45.1	86	51.5	91.8	178* a	68* b	50-124/20
88-06-2	2,4,6-Trichlorophenol	ND		52.6	45.1	86	51.5	86.4	168* a	63* b	43-123/20
62-53-3	Aniline	ND		52.6	28.9	55	51.5	37.4	73	26* b	17-89/20
101-55-3	4-Bromophenyl phenyl ether	ND		52.6	48.5	92	51.5	48.6	94	0	54-128/20
85-68-7	Butyl benzyl phthalate	ND		52.6	42.6	81	51.5	43.0	83	1	55-125/20
100-51-6	Benzyl Alcohol	ND		52.6	37.5	71	51.5	34.9	68	7	13-106/20
91-58-7	2-Chloronaphthalene	ND		52.6	44.5	85	51.5	46.5	90	4	40-126/20
106-47-8	4-Chloroaniline	ND		52.6	40.7	77	51.5	44.1	86	8	32-109/20
111-91-1	bis(2-Chloroethoxy)methane	ND		52.6	44.0	84	51.5	45.0	87	2	40-117/20
111-44-4	bis(2-Chloroethyl)ether	ND		52.6	40.4	77	51.5	41.4	80	2	34-111/20
108-60-1	bis(2-Chloroisopropyl)ether	ND		52.6	43.8	83	51.5	43.7	85	0	33-133/20
7005-72-3	4-Chlorophenyl phenyl ether	ND		52.6	49.4	94	51.5	50.3	98	2	48-128/20
122-66-7	1,2-Diphenylhydrazine	ND		52.6	44.0	84	51.5	44.8	87	2	46-116/20
121-14-2	2,4-Dinitrotoluene	ND		52.6	50.0	95	51.5	50.2	97	0	53-130/20
606-20-2	2,6-Dinitrotoluene	ND		52.6	51.4	98	51.5	52.8	102	3	41-134/20
91-94-1	3,3'-Dichlorobenzidine	ND		52.6	42.2	80	51.5	48.5	94	14	29-140/20
132-64-9	Dibenzofuran	ND		52.6	44.8	85	51.5	46.1	89	3	48-121/20
84-74-2	Di-n-butyl phthalate	ND		52.6	45.5	86	51.5	46.8	91	3	55-121/20
117-84-0	Di-n-octyl phthalate	ND		52.6	43.8	83	51.5	44.7	87	2	56-126/20
84-66-2	Diethyl phthalate	ND		52.6	45.4	86	51.5	47.1	91	4	42-125/20
131-11-3	Dimethyl phthalate	ND		52.6	45.2	86	51.5	46.6	90	3	11-144/20
117-81-7	bis(2-Ethylhexyl)phthalate	ND		52.6	44.4	84	51.5	44.3	86	0	55-130/20
118-74-1	Hexachlorobenzene	ND		52.6	48.6	92	51.5	49.4	96	2	53-129/20

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43772-MS	X06428.D	1	07/21/15	KD	07/12/15	OP43772	MSX202
OP43772-MSD	X06429.D	1	07/21/15	KD	07/12/15	OP43772	MSX202
MC39909-1	X06432.D	1	07/21/15	KD	07/12/15	OP43772	MSX202

The QC reported here applies to the following samples: Method: SW846 8270D

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8

7.3.1

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CAS No.	Compound	MC39909-1 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
77-47-4	Hexachlorocyclopentadiene	ND		52.6	15.7	30	51.5	16.0	31	2	10-75/20
67-72-1	Hexachloroethane	ND		52.6	37.0	70	51.5	38.5	75	4	10-104/20
78-59-1	Isophorone	ND		52.6	42.8	81	51.5	44.2	86	3	35-106/20
88-74-4	2-Nitroaniline	ND		52.6	50.8	97	51.5	51.8	100	2	50-132/20
99-09-2	3-Nitroaniline	ND		52.6	45.8	87	51.5	48.8	95	6	43-121/20
100-01-6	4-Nitroaniline	ND		52.6	47.3	90	51.5	48.5	94	3	41-129/20
98-95-3	Nitrobenzene	ND		52.6	42.3	80	51.5	43.1	84	2	25-122/20
62-75-9	n-Nitrosodimethylamine	ND		52.6	30.1	57	51.5	29.3	57	3	10-88/20
621-64-7	N-Nitroso-di-n-propylamine	ND		52.6	40.9	78	51.5	41.4	80	1	36-120/20
86-30-6	N-Nitrosodiphenylamine	ND		52.6	43.2	82	51.5	43.5	84	1	50-113/20
110-86-1	Pyridine	ND		52.6	17.6	33	51.5	28.8	56	48* b	10-73/20

CAS No.	Surrogate Recoveries	MS	MSD	MC39909-1	Limits
367-12-4	2-Fluorophenol	47%	47%	45%	10-80%
4165-62-2	Phenol-d5	36%	35%	36%	10-72%
118-79-6	2,4,6-Tribromophenol	115%	117%	115%	42-134%
4165-60-0	Nitrobenzene-d5	91%	94%	88%	25-117%
321-60-8	2-Fluorobiphenyl	86%	90%	86%	24-112%
1718-51-0	Terphenyl-d14	100%	103%	107%	48-133%

(a) Outside control limits due to possible matrix interference. Refer to Blank Spike.
(b) High RPD due to possible matrix interference and/or sample non-homogeneity.

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43773-MS	I96868.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
OP43773-MSD	I96870.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
MC39909-1	I96873.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8

7.3.2

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CAS No.	Compound	MC39909-1 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
83-32-9	Acenaphthene	ND		52.6	39.4	75	51.5	41.6	81	5	36-124/20
208-96-8	Acenaphthylene	ND		52.6	38.8	74	51.5	39.1	76	1	25-116/20
120-12-7	Anthracene	ND		52.6	44.5	85	51.5	42.9	83	4	42-122/20
56-55-3	Benzo(a)anthracene	ND		52.6	41.0	78	51.5	42.2	82	3	45-145/20
50-32-8	Benzo(a)pyrene	ND		52.6	47.3	90	51.5	49.6	96	5	40-136/20
205-99-2	Benzo(b)fluoranthene	ND		52.6	49.8	95	51.5	46.0	89	8	41-148/20
191-24-2	Benzo(g,h,i)perylene	ND		52.6	47.6	90	51.5	47.2	92	1	48-140/20
207-08-9	Benzo(k)fluoranthene	ND		52.6	44.7	85	51.5	48.3	94	8	45-131/20
218-01-9	Chrysene	ND		52.6	40.5	77	51.5	41.5	81	2	41-135/20
53-70-3	Dibenzo(a,h)anthracene	ND		52.6	48.5	92	51.5	48.6	94	0	49-144/20
206-44-0	Fluoranthene	ND		52.6	41.3	78	51.5	41.0	80	1	38-136/20
86-73-7	Fluorene	ND		52.6	38.7	74	51.5	39.6	77	2	43-127/20
193-39-5	Indeno(1,2,3-cd)pyrene	ND		52.6	47.5	90	51.5	47.2	92	1	45-142/20
90-12-0	1-Methylnaphthalene	0.046	J	52.6	36.9	70	51.5	38.6	75	5	29-116/20
91-57-6	2-Methylnaphthalene	0.065	J	52.6	39.9	76	51.5	42.5	82	6	27-117/20
85-01-8	Phenanthrene	0.030	J	52.6	39.5	75	51.5	39.4	76	0	41-126/20
129-00-0	Pyrene	ND		52.6	39.7	75	51.5	38.5	75	3	41-131/20

CAS No.	Surrogate Recoveries	MS	MSD	MC39909-1	Limits
4165-60-0	Nitrobenzene-d5	87%	93%	86%	26-121%
321-60-8	2-Fluorobiphenyl	81%	77%	77%	28-107%
1718-51-0	Terphenyl-d14	103%	99%	98%	29-129%

* = Outside of Control Limits.

Semivolatile Internal Standard Area Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSI3624-CC3621	Injection Date:	07/21/15
Lab File ID:	I96865.D	Injection Time:	08:19
Instrument ID:	GCMSI	Method:	SW846 8270D BY SIM

	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT
Check Std	371419	3.70	783967	4.74	384262	6.26	634062	7.59	614288	10.58	1746365	12.25
Upper Limit [a]	742838	4.20	1567934	5.24	768524	6.76	1268124	8.09	1228576	11.08	3492730	12.75
Lower Limit [b]	185710	3.20	391984	4.24	192131	5.76	317031	7.09	307144	10.08	873183	11.75
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43773-MB	406798	3.70	875757	4.74	390171	6.26	641110	7.59	709791	10.58	1800763	12.25
OP43773-BS	385728	3.70	818989	4.75	376642	6.27	677425	7.60	685190	10.59	1777697	12.25
OP43773-MS	463591	3.70	952594	4.75	420944	6.27	658274	7.60	689841	10.59	1815595	12.25
ZZZZZZ	392683	3.70	764701	4.75	375282	6.27	592257	7.61	666433	10.59	1738178	12.25
OP43773-MSD	389060	3.70	774099	4.75	377960	6.27	601333	7.60	658872	10.59	1705550	12.25
OP43773-MS1	425070	3.69	872974	4.74	399192	6.27	676342	7.60	676075	10.59	1837948	12.25
OP43773-MSD1	405954	3.70	835054	4.75	384349	6.27	682469	7.60	710005	10.60	1821387	12.26
MC39909-1	416093	3.70	822661	4.74	385249	6.26	612034	7.59	647211	10.58	1699865	12.25
MC39947-7	376391	3.70	803397	4.74	398127	6.26	629985	7.59	630447	10.58	1629727	12.25
MC39909-2	389286	3.70	804415	4.75	385700	6.27	655444	7.60	669647	10.59	1717571	12.26
MC39909-3	397532	3.70	812069	4.75	396344	6.27	609027	7.59	672390	10.59	1623155	12.25
MC39909-4	398863	3.70	818610	4.74	382846	6.26	606093	7.59	604613	10.58	1642581	12.25
MC39909-5	359005	3.70	829576	4.75	396713	6.27	600916	7.59	631232	10.58	1677828	12.25
MC39909-6	381476	3.70	776187	4.75	363980	6.27	622149	7.60	652914	10.59	1600972	12.25
MC39909-7	357244	3.70	770837	4.75	358603	6.27	596064	7.60	635875	10.59	1538060	12.25
MC39909-8	389512	3.70	796811	4.75	373670	6.27	582877	7.59	641512	10.58	1654581	12.25
ZZZZZZ	372806	3.70	814299	4.75	390080	6.26	578164	7.59	666572	10.59	1809377	12.25
ZZZZZZ	314588	3.70	671700	4.74	315111	6.26	482662	7.59	565588	10.58	1489811	12.25
ZZZZZZ	346810	3.70	716216	4.75	342894	6.26	534204	7.59	570161	10.58	1477874	12.25
ZZZZZZ	316381	3.70	689039	4.74	326263	6.26	519357	7.59	547287	10.58	1394941	12.25
ZZZZZZ	287106	3.70	706111	4.74	320250	6.26	554247	7.59	595270	10.58	1582995	12.25
ZZZZZZ	332813	3.70	708973	4.74	328372	6.26	512859	7.59	560472	10.58	1509720	12.25
ZZZZZZ	377970	3.69	814330	4.74	383076	6.26	606129	7.59	609385	10.58	1618879	12.25
ZZZZZZ	346618	3.70	745010	4.75	346366	6.26	548365	7.59	594702	10.59	1414461	12.25
ZZZZZZ	354616	3.70	817755	4.75	361898	6.27	556034	7.59	583431	10.59	1411858	12.25
ZZZZZZ	349311	3.70	646304	4.74	301504	6.26	572827	7.59	608298	10.58	1587515	12.25

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.

7.4.1

Semivolatile Internal Standard Area Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSI3624-CC3621	Injection Date:	07/21/15
Lab File ID:	I96865.D	Injection Time:	08:19
Instrument ID:	GCMSI	Method:	SW846 8270D BY SIM

Lab	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
Sample ID	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT

(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

7.4.1

7

Semivolatile Internal Standard Area Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSX202-CC194	Injection Date:	07/21/15
Lab File ID:	X06402.D	Injection Time:	09:41
Instrument ID:	GCMSX	Method:	SW846 8270D

	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT
Check Std	313255	3.63	1097744	4.68	607000	6.19	1082369	7.47	1079645	9.91	883922	11.52
Upper Limit [a]	626510	4.13	2195488	5.18	1214000	6.69	2164738	7.97	2159290	10.41	1767844	12.02
Lower Limit [b]	156628	3.13	548872	4.18	303500	5.69	541185	6.97	539823	9.41	441961	11.02
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43848-MB	439462	3.63	1547586	4.67	848012	6.19	1378482	7.46	1251081	9.90	1054010	11.51
OP43848-BS	428942	3.63	1473477	4.67	791768	6.19	1354278	7.46	1329964	9.91	1164057	11.51
OP43848-MS	362841	3.63	1025726	4.68	718711	6.19	1241475	7.46	1189020	9.91	1056570	11.51
OP43848-MSD	330521	3.63	934719	4.68	647420	6.19	1122096	7.46	1052715	9.90	946176	11.51
MC40043-1	368122	3.63	1063821	4.68	717279	6.19	1218816	7.46	1155734	9.90	1010652	11.51
ZZZZZZ	336521	3.65	622203	4.70	622303	6.23	1256358	7.47	1225103	9.90	1123273	11.51
ZZZZZZ	330601	3.64	577592	4.71	538387	6.24	1237289	7.47	1189853	9.90	1076336	11.51
ZZZZZZ	340557	3.63	917277	4.68	704393	6.20	1172467	7.46	1129072	9.90	1027124	11.51
ZZZZZZ	344360	3.63	928462	4.68	715720	6.20	1197980	7.46	1179327	9.90	1054092	11.51
ZZZZZZ	389455	3.63	1239102	4.67	707047	6.19	1216313	7.46	1156448	9.90	1003985	11.51
ZZZZZZ	591522	3.63	2040051	4.67	1088794	6.19	1698974	7.46	1420925	9.90	1168502	11.51
ZZZZZZ	485932	3.63	1705633	4.67	940963	6.19	1523240	7.46	1300974	9.90	1095500	11.51
ZZZZZZ	433145	3.63	1530277	4.67	845085	6.19	1406146	7.46	1303917	9.90	1183188	11.51
ZZZZZZ	415217	3.63	1457157	4.67	795265	6.19	1326065	7.46	1293792	9.91	1248705	11.52
ZZZZZZ	382570	3.63	1335534	4.67	725153	6.19	1200792	7.46	1130701	9.90	1074592	11.51
ZZZZZZ	385235	3.63	1362195	4.67	737183	6.19	1207480	7.46	1151283	9.91	1162319	11.51
ZZZZZZ	389101	3.63	1376562	4.68	749200	6.19	1230915	7.47	1138455	9.91	1137206	11.52
ZZZZZZ	370889	3.63	1299503	4.67	709282	6.19	1179865	7.46	1078860	9.91	1040540	11.52
ZZZZZZ	365704	3.63	1249294	4.67	662610	6.19	1113251	7.46	1056506	9.90	1018029	11.51
ZZZZZZ	489476	3.63	1688053	4.67	885720	6.19	1392074	7.46	1127099	9.90	976965	11.51
ZZZZZZ	364200	3.63	1297676	4.67	706426	6.19	1176511	7.46	1090469	9.90	994352	11.51
ZZZZZZ	373099	3.63	1228024	4.67	684629	6.19	1153819	7.46	1073314	9.90	997690	11.51
OP43772-MB	354929	3.63	1267535	4.67	700732	6.19	1173141	7.46	1098648	9.90	982055	11.51
OP43772-BS	335638	3.63	1163442	4.68	635723	6.19	1090812	7.46	1056275	9.91	953692	11.51
OP43772-MS	350224	3.63	1214880	4.68	671150	6.19	1183375	7.46	1158513	9.91	1036168	11.51
OP43772-MSD	321961	3.63	1115242	4.68	606633	6.19	1064256	7.46	1044600	9.91	914924	11.51
OP43772-MS1	356250	3.63	1225109	4.68	670125	6.19	1163868	7.46	1164071	9.91	1041381	11.52
OP43772-MSD1	344974	3.63	1183496	4.68	649128	6.19	1135084	7.46	1127083	9.91	1010215	11.51
MC39909-1	319571	3.63	1147470	4.67	636132	6.19	1065103	7.46	1007703	9.90	884612	11.51
MC39947-7	321756	3.63	1141557	4.67	625023	6.19	1036691	7.46	1002554	9.90	898304	11.51
MC39909-2	339430	3.63	1187502	4.67	639712	6.19	1083312	7.46	1118800	9.91	1039186	11.52

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10

7.4.2

Semivolatile Internal Standard Area Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSX202-CC194	Injection Date:	07/21/15
Lab File ID:	X06402.D	Injection Time:	09:41
Instrument ID:	GCMSX	Method:	SW846 8270D

Lab	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
Sample ID	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT

IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

7.4.2

Semivolatile Internal Standard Area Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSX203-CC194	Injection Date:	07/22/15
Lab File ID:	X06450.D	Injection Time:	09:21
Instrument ID:	GCMSX	Method:	SW846 8270D

	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT
Check Std	271946	3.62	965052	4.67	530568	6.18	966999	7.46	970015	9.90	833763	11.50
Upper Limit [a]	543892	4.12	1930104	5.17	1061136	6.68	1933998	7.96	1940030	10.40	1667526	12.00
Lower Limit [b]	135973	3.12	482526	4.17	265284	5.68	483500	6.96	485008	9.40	416882	11.00
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
ZZZZZZ	396037	3.62	1409943	4.66	788653	6.18	1357680	7.45	1309097	9.89	1176502	11.50
MC39909-3	306507	3.62	1084287	4.66	596326	6.18	998974	7.45	997989	9.89	916175	11.50
MC39909-4	310147	3.62	1110243	4.66	624023	6.18	1038310	7.45	986750	9.89	877762	11.50
MC39909-5	326487	3.62	1162413	4.66	657291	6.18	1104204	7.45	1040770	9.89	929962	11.50
MC39909-6	304339	3.62	1028269	4.66	600850	6.18	1015557	7.45	1006471	9.89	925131	11.50
MC39909-7	296916	3.62	1018959	4.67	589144	6.18	974033	7.45	974914	9.89	907400	11.50
MC39909-8	319215	3.62	1137189	4.66	637210	6.18	1085774	7.45	1018734	9.89	889006	11.50
ZZZZZZ	275159	3.62	808333	4.67	566922	6.19	943564	7.45	942588	9.89	845122	11.50
ZZZZZZ	269116	3.62	800701	4.67	552354	6.18	940923	7.45	910707	9.89	827544	11.49

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

7.4.3

Semivolatile Surrogate Recovery Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3	S4	S5	S6
MC39909-1	X06432.D	45	36	115	88	86	107
MC39909-2	X06433.D	42	33	121	86	86	97
MC39909-3	X06454.D	42	33	124	84	86	101
MC39909-4	X06455.D	41	33	117	83	79	105
MC39909-5	X06456.D	41	34	113	89	85	113
MC39909-6	X06457.D	42	34	126	84	81	101
MC39909-7	X06458.D	42	33	121	86	79	97
MC39909-8	X06459.D	39	34	107	92	87	107
OP43772-BS	X06427.D	51	41	116	90	72	103
OP43772-MB	X06426.D	48	40	109	87	82	109
OP43772-MS	X06428.D	47	36	115	91	86	100
OP43772-MSD	X06429.D	47	35	117	94	90	103

Surrogate Compounds	Recovery Limits
S1 = 2-Fluorophenol	10-80%
S2 = Phenol-d5	10-72%
S3 = 2,4,6-Tribromophenol	42-134%
S4 = Nitrobenzene-d5	25-117%
S5 = 2-Fluorobiphenyl	24-112%
S6 = Terphenyl-d14	48-133%

Semivolatile Surrogate Recovery Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D BY SIM Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC39909-1	I96873.D	86	77	98
MC39909-2	I96875.D	86	79	96
MC39909-3	I96876.D	80	75	95
MC39909-4	I96877.D	81	72	102
MC39909-5	I96878.D	78	71	103
MC39909-6	I96879.D	77	73	93
MC39909-7	I96880.D	66	74	91
MC39909-8	I96881.D	72	75	92
OP43773-BS	I96867.D	84	68	103
OP43773-MB	I96866.D	80	78	105
OP43773-MS	I96868.D	87	81	103
OP43773-MSD	I96870.D	93	77	99

Surrogate Compounds	Recovery Limits
S1 = Nitrobenzene-d5	26-121%
S2 = 2-Fluorobiphenyl	28-107%
S3 = Terphenyl-d14	29-129%

7.5.2

7

New England ACCUTEST LABORATORIES

GC Volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Surrogate Recovery Summaries
- GC Surrogate Retention Time Summaries

Method Blank Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43854-MB	BB63756.D	1	07/17/15	NK	07/16/15	OP43854	GBB3458

The QC reported here applies to the following samples: Method: SW846 8011

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8, MC39909-11, MC39909-12

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.015	0.0061	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.015	0.0061	ug/l	

CAS No.	Surrogate Recoveries		Limits
460-00-4	Bromofluorobenzene (S)	101%	60-140%
460-00-4	Bromofluorobenzene (S)	100%	60-140%

8.1.1

Blank Spike Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43854-BS	BB63757.D	1	07/17/15	NK	07/16/15	OP43854	GBB3458

The QC reported here applies to the following samples: Method: SW846 8011

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8, MC39909-11, MC39909-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	Limits
96-12-8	1,2-Dibromo-3-chloropropane	0.071	0.079	111	45-149
106-93-4	1,2-Dibromoethane	0.071	0.073	103	51-149

CAS No.	Surrogate Recoveries	BSP	Limits
460-00-4	Bromofluorobenzene (S)	101%	60-140%
460-00-4	Bromofluorobenzene (S)	98%	60-140%

8.2.1

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43854-MS	BB63758.D	1	07/17/15	NK	07/16/15	OP43854	GBB3458
OP43854-MSD	BB63759.D	1	07/17/15	NK	07/16/15	OP43854	GBB3458
MC39909-1	BB63760.D	1	07/17/15	NK	07/16/15	OP43854	GBB3458

The QC reported here applies to the following samples: Method: SW846 8011

MC39909-1, MC39909-2, MC39909-3, MC39909-4, MC39909-5, MC39909-6, MC39909-7, MC39909-8, MC39909-11, MC39909-12

CAS No.	Compound	MC39909-1 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
96-12-8	1,2-Dibromo-3-chloropropane	ND		0.0666	0.060	90	0.0666	0.073	110	20	31-169/30
106-93-4	1,2-Dibromoethane	ND		0.0666	0.068	102	0.0666	0.062	93	9	34-175/30

CAS No.	Surrogate Recoveries	MS	MSD	MC39909-1	Limits
460-00-4	Bromofluorobenzene (S)	89%	80%	77%	60-140%
460-00-4	Bromofluorobenzene (S)	89%	78%	74%	60-140%

8.3.1

* = Outside of Control Limits.

Volatile Surrogate Recovery Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8011 Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1 [a]	S1 [b]
MC39909-1	BB63760.D	77	74
MC39909-2	BB63761.D	98	98
MC39909-3	BB63762.D	83	91
MC39909-4	BB63763.D	104	118
MC39909-5	BB63764.D	100	114
MC39909-6	BB63765.D	88	123
MC39909-7	BB63786.D	84	151* [c]
MC39909-8	BB63787.D	96	139
MC39909-11	BB63788.D	96	132
MC39909-12	BB63789.D	100	141* [c]
OP43854-BS	BB63757.D	101	98
OP43854-MB	BB63756.D	101	100
OP43854-MS	BB63758.D	89	89
OP43854-MSD	BB63759.D	80	78

Surrogate Compounds	Recovery Limits
S1 = Bromofluorobenzene (S)	60-140%

(a) Recovery from GC signal #2
(b) Recovery from GC signal #1
(c) Outside control limits.Sample non-detect for target analytes.

8.4.1

GC Surrogate Retention Time Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3458-CC3458	Injection Date:	07/17/15
Lab File ID:	BB63755A.D	Injection Time:	16:15
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	6.76	8.67

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
OP43854-MB	BB63756.D	07/17/15	16:43	6.77	8.68
OP43854-BS	BB63757.D	07/17/15	17:12	6.77	8.68
OP43854-MS	BB63758.D	07/17/15	17:40	6.77	8.69
OP43854-MSD	BB63759.D	07/17/15	18:07	6.77	8.68
MC39909-1	BB63760.D	07/17/15	18:35	6.77	8.67
MC39909-2	BB63761.D	07/17/15	19:03	6.76	8.67
MC39909-3	BB63762.D	07/17/15	19:31	6.76	8.68
MC39909-4	BB63763.D	07/17/15	20:00	6.77	8.67
MC39909-5	BB63764.D	07/17/15	20:28	6.77	8.68
MC39909-6	BB63765.D	07/17/15	20:56	6.76	8.67

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

GC Surrogate Retention Time Summary

Job Number: MC39909
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3459-CC3458	Injection Date:	07/18/15
Lab File ID:	BB63783.D	Injection Time:	16:53
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	6.53	7.64

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
MC39909-7	BB63786.D	07/18/15	18:17	6.53	7.64
MC39909-8	BB63787.D	07/18/15	18:45	6.54	7.65
MC39909-11	BB63788.D	07/18/15	19:13	6.54	7.65
MC39909-12	BB63789.D	07/18/15	19:40	6.54	7.65

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

8.5.2

Roxana Groundwater Quarterly – 3rd Quarter 2015 Data Review

Laboratory SDG: MC39947

Data Reviewer: Melissa Mansker

Peer Reviewer: Elizabeth Kunkel

Date Reviewed: 8/5/2015

Guidance: USEPA National Functional Guidelines for Superfund Organic Methods Data Review 2014

Sample Identification	Sample Identification
TB-ROX-070915-HCL-A	TB-ROX-070915-HCL-B
TB-ROX-070915-ST-A	TB-ROX-070915-ST-B
MW11-ROX-070915	MW10-ROX-070915
MW14-ROX-070915	MW9-ROX-070915
MW16-ROX-070915	MW16-ROX-070915-Dup
P93D-ROX-070915	MW24-ROX-070915
P93B-ROX-070915	P93B-ROX-070915-Dup
P54-ROX-070915	

1.0 Data Package Completeness

Were all items delivered as specified in the QAPP and COC as appropriate?

Yes

2.0 Laboratory Case Narrative \ Cooler Receipt Form

Were problems noted in the laboratory case narrative or cooler receipt form?

Yes, the laboratory case narrative indicated VOCs were detected in the method blank, and although not indicated in the laboratory case narrative, VOCs were detected in the trip blanks. VOC LCS/LCSD recoveries, and VOC LCS/LCSD RPDs, were outside evaluation criteria. SVOC MS/MSD RPDs were outside evaluation criteria in sample MW14-ROX-070915. The difference in phenanthrene results for the field duplicate pair P93B-ROX-070915/P93B-ROX-070915-Dup was greater than two times (2X) the reporting level, and benzene results were also qualified due to field duplicate RPD above evaluation criteria; therefore results were qualified as estimated (**J/J**). Sample P93D-ROX-070915 and field duplicate pair P93B-ROX-070915/P93B-ROX-070915-Dup were diluted due to high levels of benzene. These issues are addressed further in the appropriate sections below.

Additionally, the initial calibration verifications for vinyl acetate, 2-chloroethyl vinyl ether, acrolein, and hexachlorocyclopentadiene exceeded 30 percent difference (%D). Continuing calibration verifications for acetone, vinyl acetate, and 2-butanone exceeded 40%D, and the continuing calibration verification for 1,2-dibromo-3-chloropropane and exceeded 15%D.

The cooler receipt form indicated four of four coolers were received by the laboratory at temperatures of 1.4°C, 0.1°C, 1.2°C, and 1.1°C, which are outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

3.0 Holding Times

Were samples extracted/analyzed within applicable limits?

Yes

4.0 Blank Contamination

Were any analytes detected in the Method Blanks, Field Blanks or Trip Blanks?

Yes

Blank ID	Parameter	Analyte	Concentration/ Amount
TB-ROX-070915-HCL-A	VOCs	Carbon disulfide	0.24 µg/L
TB-ROX-070915-HCL-A	VOCs	Hexachlorobutadiene	0.59 µg/L
TB-ROX-070915-HCL-A	VOCs	Naphthalene	3.5 µg/L
TB-ROX-070915-HCL-B	VOCs	Carbon disulfide	0.23 µg/L
TB-ROX-070915-HCL-B	VOCs	Naphthalene	3.5 µg/L
TB-ROX-070915-HCL-B	VOCs	1,2,4-Trichlorobenzene	0.94 µg/L
MSL4085-MB	VOCs	Carbon disulfide	0.43 µg/L
MSL4085-MB	VOCs	Hexachlorobutadiene	1.7 µg/L
MSL4085-MB	VOCs	Naphthalene	3.6 µg/L
MSL4085-MB	VOCs	1,2,3-Trichlorobenzene	1.6 µg/L
MSL4085-MB	VOCs	1,2,4-Trichlorobenzene	1.4 µg/L
MSL4086-MB	VOCs	Carbon disulfide	0.40 µg/L
MSL4087-MB	VOCs	Carbon disulfide	0.59 µg/L
MSL4087-MB	VOCs	Hexachlorobutadiene	1.9 µg/L
MSL4087-MB	VOCs	1,2,4-Trichlorobenzene	1.5 µg/L
MSL4089-MB	VOCs	Hexachlorobutadiene	0.76 µg/L
MSL4089-MB	VOCs	Naphthalene	3.7 µg/L
MSL4089-MB	VOCs	1,2,3-Trichlorobenzene	1.5 µg/L
MSL4086-MB1	VOCs	Hexachlorobutadiene	0.76 µg/L
MSL4086-MB1	VOCs	Naphthalene	3.7 µg/L
MSL4086-MB1	VOCs	1,2,3-Trichlorobenzene	1.5 µg/L

Qualifications due to blank contamination are included in the table below. Analytical data that were reported non-detect or at concentrations greater than five times (5X) the associated blank concentration did not require qualification.

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
MW11-ROX-070915	VOCs	Carbon disulfide	-	**U**
MW10-ROX-070915	VOCs	Carbon disulfide	-	**U**
MW14-ROX-070915	VOCs	Carbon disulfide	-	**U**
MW16-ROX-070915	VOCs	Carbon disulfide	-	**U**
MW24-ROX-070915	VOCs	Carbon disulfide	-	**U**
MW16-ROX-070915-Dup	VOCs	Naphthalene	-	**U**
P54-ROX-070915	VOCs	Naphthalene	-	**U**

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
MW14-ROX-070915	VOCs	1,2,4-Trichlorobenzene	-	**U**
P54-ROX-070915	VOCs	1,2,4-Trichlorobenzene	-	**U**

5.0 Laboratory Control Sample

Were LCS recoveries within evaluation criteria?

No

LCS/LCSD ID	Parameter	Analyte	LCS/LCSD Recovery	RPD	LCS/LCSD/ RPD Criteria
MSL4085-BS/BSD	VOCs	Acetone	**284**/162	**55**	14-172/25
MSL4085-BS/BSD	VOCs	2-Butanone (MEK)	**153/149**	3	43-147/25
MSL4086-BS/BSD	VOCs	Acrolein	85/110	**26**	10-168/25
MSL4087-BS/BSD	VOCs	2-Butanone (MEK)	**167/**126	**28**	43-147/25
MSL4086-BS1/BSD1	VOCs	2-Butanone (MEK)	**155**/131	17	43-147/25
MSL4089-BS/BSD	VOCs	2-Butanone (MEK)	**155**/131	17	43-147/25

Analytical data reported as non-detect and associated with LCS recoveries above evaluation criteria, indicating a possible high bias, did not require qualification. No qualification of data was required.

6.0 Surrogate Recoveries

Were surrogate recoveries within evaluation criteria?

Yes

7.0 Matrix Spike and Matrix Spike Duplicate Recoveries

Were MS/MSD samples analyzed as part of this SDG?

Yes, sample MW14-ROX-070915 was spiked and analyzed for VOCs, SVOCs, and PAHs.

Were MS/MSD recoveries within evaluation criteria?

No

MS/MSD ID	Parameter	Analyte	MS/MSD Recovery (%)	RPD	MS/MSD/ RPD Criteria
MW14-ROX-070915	SVOCs	Aniline	64/47	**33**	17-89/20
MW14-ROX-070915	SVOCs	3,3'-Dichlorobenzidine	63/45	**34**	29-140/20
MW14-ROX-070915	SVOCs	Pyridine	42/18	**80**	10-73/20

LCS/LCSD recoveries were within evaluation criteria with the exception of those listed in Section 5.0 of this Review; no further qualification of data was required.

8.0 Internal Standard (IS) Recoveries

Were internal standard area recoveries within evaluation criteria?

Yes

9.0 Laboratory Duplicate Results

Were laboratory duplicate samples analyzed as part of this SDG?

No

10.0 Field Duplicate Results

Were field duplicate samples collected as part of this SDG?

Yes

Field ID	Field Duplicate ID
MW16-ROX-070915	MW16-ROX-070915-Dup
P93B-ROX-070915	P93B-ROX-070915-Dup

Were field duplicates within evaluation criteria?

No

Field ID	Field Duplicate ID	Parameter	Analyte	RPD	Qualification
P93B-ROX-070915	P93B-ROX-070915-Dup	VOCs	Benzene	**29**	**J/J**
P93B-ROX-070915	P93B-ROX-070915-Dup	PAHs	Phenanthrene	**> 2X RL**	**J/J**

11.0 Sample Dilutions

For samples that were diluted and nondetect, were undiluted results also reported?

Not applicable; analytes were detected in samples that were diluted.

12.0 Additional Qualifications

Were additional qualifications applied?

No

1.0 VALIDATION OF EDB/DBCP DATA – SDG MC39947

This section describes the validation for eleven groundwater samples which were prepared and analyzed for 1,2-dibromoethane (EDB) and 1,2-dibromo-3-chloropropane (DBCP) by USEPA SW-846 Method 8011. The samples were analyzed by Accutest Laboratories of Marlborough, Massachusetts and submitted as part of the sample delivery group (SDG) MC39947. The samples included as part of this validation are listed below.

Sample Identification	Sample Identification
MW11-ROX-070915	MW10-ROX-070915
MW14-ROX-070915	MW9-ROX-070915
MW16-ROX-070915	MW16-ROX-070915-DUP
P93D-ROX-070915	MW24-ROX-070915
P93B-ROX-070915	P93B-ROX-070915-DUP
P54-ROX-070915	

Evaluation of the analytical data followed procedures outlined in the USEPA Contract Laboratory National Functional Guidelines for Superfund Organic Methods Data Review (EPA 2014).

Criteria evaluated included the following method performance criteria:

- Data package completeness
- Laboratory case narrative/cooler receipt form
- Holding times and sample preservation
- Initial calibration
- Calibration verification
- Blank samples
- Surrogate spike recoveries
- Matrix spike/matrix spike duplicate (MS/MSD) samples
- Internal standards
- Laboratory control spike (LCS) samples
- Target compound identification and quantification
- Overall data assessment

1.1 Data Package Completeness

The data package was reviewed to make certain that it contained the data contractually required in the deliverable. This included checking the data package for the results of each analyte requested for each field sample submitted in the analytical batch, along with requested QC documentation for the respective methods.

1.2 Laboratory Case Narrative/Cooler Receipt Form

The laboratory case narrative indicated continuing calibration for 1,2-dibromo-3-chloropropane exceeded 15% difference (%D). This issue is addressed further in the appropriate section below.

The cooler receipt form indicated four of four coolers were received by the laboratory at temperatures of 1.4ºC, 0.1ºC, 1.2ºC and 1.1ºC, which are outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

1.3 Holding Times and Sample Preservation

Review of the sample collection and analysis dates involved comparing the sample chain-of-custody, the summary forms, the raw data forms, and the chromatograms for accuracy, consistency, and holding time compliance. The samples were received in god condition at temperatures of 1.4ºC, 0.1ºC, 1.2ºC and 1.1ºC, and maintained at approximately 4°C ± 2°C. In addition, the samples were analyzed within 14 days of collection. No qualifications to the data were required based on holding times and sample preservation.

1.4 Initial Calibration

An initial calibration (ICAL) was established to assess whether the instrument was capable of producing acceptable qualitative and quantitative data for EDB/DBCP analyses. Validated samples included in SDG MC39947 were analyzed using instrument GCBB. The ICAL for instrument GCBK was established on 7/21/2015. At least five standard concentrations were used to establish the ICAL curve as required by Method 8011.

Review of the initial calibration summary forms indicated percent relative standard deviations (%RSDs) were ≤ 15% for target analytes. A recalculation of the %RSDs was performed from the raw data and no errors in calculation were noted; therefore, no qualification of data was required.

Review of the sample chromatograms indicated that a second source calibration was performed immediately following the initial calibration. Review of ICV summary forms indicated percent difference (%D) ≤ 15% for target analytes. Recalculation of the percent recoveries was completed and no errors in calculation were noted.

1.5 Calibration Verification

Review of the sample chromatograms indicated that all calibration verifications (CVs) were performed before the start of sample analysis. Percent differences (%Ds) met the evaluation criteria of ≤ 15% for target analytes with exceptions summarized in the table below.

CV (Date/Time)	Analyte	%D
7/21/2015 17:26 Signal #1	1,2-Dibromo-3-chloropropane	**-27.2**
7/21/2015 17:26 Signal #2	1,2-Dibromo-3-chloropropane	**-15.8**

Analytical data reported as non-detect and associated with decreases in %D indicating a possible high bias, did not require qualification. No qualification of data was required.

Recalculations of the %Ds for target compounds were completed for each CV, and no errors in calculation were noted; therefore, no qualifications of data were required.

1.6 Blank Samples

The purpose of the method blank samples is to evaluate the existence and magnitude of contamination problems emanating from laboratory activities. Method blank samples were analyzed with each analytical batch as required by USEPA SW-846 Method 8011. Also, trip blanks were analyzed to evaluate the existence and magnitude of contamination problems emanating during sample shipment to the laboratory. Equipment blank samples are used to evaluate the efficiency of the decontamination of sampling equipment. Target compounds were reported as non-detect. No qualification of data was required.

1.7 Surrogate Spike Recoveries

Surrogate compounds were used to evaluate the overall laboratory sample preparation efficiency on a per sample basis. Surrogate recoveries were within the method acceptance criteria for the validated samples.

Approximately 10% of the recoveries were recalculated and no calculation or transcription errors were noted.

1.8 Matrix Spike/Matrix Spike Duplicate (MS/MSD) Samples

MS/MSD samples are analyzed to assess potential matrix effects. Sample MW14-ROX-070915 (SDG MC39947) was spiked and analyzed for 8011 VOCs. MS/MSD data were within evaluation criteria. No qualification of data was required.

Approximately 10% of the MS/MSD spiking recoveries were verified using the MS/MSD summary forms, and no errors were noted.

1.9 Laboratory Control Spike (LCS) Samples

Laboratory control samples were analyzed with each analytical batch to assess the accuracy of the analytical process. All LCS data were within evaluation criteria. Approximately 10% of spiking compound recoveries for the LCS were recalculated and verified using the LCS summary forms, and no calculation or transcription errors were noted.

1.10 Target Compound Identification and Quantification

For validation of the compound identification, chromatograms were reviewed to verify the major peaks were identified, and the relative retention time was no greater than 0.06 different from the associated CV retention times. Approximately 10% of the detected target analytes were verified. No anomalies were noted with the identification of the target compounds in the samples.

For the validation of compound quantitation, the matrix spike results were recalculated from the raw data since all target analytes were non-detect, and no calculation errors were noted. Additionally, the reporting limits were verified to determine if reporting limits (RLs) were adjusted for dilutions. No qualification of the data was required and review of the data indicated the correct RLs were reported.

1.11 Overall Data Assessment

Based on the criteria outlined, it is recommended that the results reported for these analyses are accepted for their intended use. Acceptable levels of accuracy and precision, based on LCS and surrogate data were achieved for this SDG.

1.0 VALIDATION OF VOC DATA – SDG MC39947

This section describes the validation for eleven groundwater samples which were prepared by USEPA SW-846 Method 5030B and analyzed for volatile organic compounds (VOCs) by USEPA SW-846 Method 8260C. The samples were analyzed by Accutest Laboratories of Marlborough, Massachusetts and submitted as part of the sample delivery group (SDG) MC39947. The samples included as part of this validation are listed below.

Sample Identification	Sample Identification
MW11-ROX-070915	MW10-ROX-070915
MW14-ROX-070915	MW9-ROX-070915
MW16-ROX-070915	MW16-ROX-070915-Dup
P93D-ROX-070915	MW24-ROX-070915
P93B-ROX-070915	P93B-ROX-070915-Dup
P54-ROX-070915	TB-ROX-070915-HCL-A
TB-ROX-070915-HCL-B	TB-ROX-070915-ST-A
TB-ROX-070915-ST-B	

Evaluation of the analytical data followed procedures outlined in the USEPA Contract Laboratory National Functional Guidelines for Superfund Organic Methods Data Review (EPA 2014, EPA 2008).

Criteria evaluated included the following method performance criteria:

- Data package completeness
- Laboratory case narrative/cooler receipt form
- Holding times and sample preservation
- GC/MS instrument performance
- Initial calibration
- Calibration verification
- Blank samples
- Surrogate spike recoveries
- Matrix spike/matrix spike duplicate (MS/MSD) samples
- Internal standards
- Laboratory control spike (LCS) samples
- Target compound identification and quantification
- Overall data assessment

1.1 Data Package Completeness

The data package was reviewed to make certain that it contained the data contractually required in the deliverable. This included checking the data package for the results of each analyte requested for each field sample submitted in the analytical batch.

1.2 Laboratory Case Narrative/Cooler Receipt Form

The laboratory case narrative indicated VOCs were detected in the method blank, and although not indicated in the laboratory case narrative, VOCs were detected in the trip blanks. VOC LCS/LCSD recoveries and RPDs were outside evaluation criteria. Sample P93D-ROX-070915 and field duplicate pair P93B-ROX-070915/P93B-ROX-070915-Dup was diluted due to high levels of benzene. Additionally, the initial calibration verification for vinyl acetate, 2-chloroethyl vinyl ether, acrolein, and hexachlorocyclopentadiene exceeded 30 percent difference (%D). Continuing calibration verifications for acetone, vinyl acetate, and 2-butanone exceeded 40%D. These issues are addressed further in the appropriate sections of this validation. The laboratory report was revised on August 4, 2015 to include matrix spike/matrix spike duplicate QA/QC data that had previously been omitted by the laboratory.

The cooler receipt form indicated that four of four coolers were received by the laboratory at temperatures of 1.4°C, 0.1°C, 1.2°C, and 1.1°C, which are outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

1.3 Holding Times and Sample Preservation

Review of the sample collection and analysis dates involved comparing the sample chain-of-custody, the summary forms, the raw data forms, and the chromatograms for accuracy, consistency, and holding time compliance. The samples were received in good condition at temperatures of 1.4°C, 0.1°C, 1.2°C, and 1.1°C, and maintained at approximately $4^{o}C \pm 2^{o}$ C. In addition, the samples were analyzed within 14 days of collection at a pH < 2. No qualifications to the data were required based on holding times and sample preservation.

1.4 GC/MS Instrument Performance

GC/MS instrument performance checks were performed to ensure mass resolution, identification, and instrument sensitivity. Criteria for evaluation of instrument performance included possible transcription/calculation errors, adherence to instrument tuning frequency requirements, mass assignments, and ion abundance criteria. Instrument performance check samples were evaluated against criteria established in USEPA SW-846 Method 8260C.

Based on the summary forms, the ion abundance criteria were within evaluation criteria for all masses. No qualifications to the data were required based on instrument performance criteria.

1.5 Initial Calibration

An initial calibration (ICAL) was established to assess whether the instrument was capable of producing acceptable qualitative and quantitative data for volatiles analyses. Validated samples included in SDG MC39947 were analyzed using instrument MSL. The ICAL for instrument MSL was established on 6/26/2015. At least five standard concentrations were used to establish the ICAL curve as required by Method 8260C.

The ICAL response factors (RFs) were reviewed and were greater than 0.01 for chloromethane, 0.30 for 1,1-dichloroethane, 0.10 for bromoform, 0.40 for chlorobenzene,

0.20 for 1,1,2,2-tetrachloroethane, and greater than National Functional Guideline (NFG) specified minimum RRFs for all other target analytes. Data associated with low response factors for acrolein (0.022), acetone (0.025), 2-butanone (0.039), 2-chloroethyl vinyl ether (0.011), and 1,4-dioxane (0.003) were qualified as estimated. NFG (2014) does not list acrolein or 2-chloroethyl vinyl ether in any initial calibration tables, and only lists 1,4-dioxane under SVOCs. Qualifications of data due to ICAL RRF are summarized in the following table.

Sample ID	Analyte	Qualification
MW11-ROX-070915	Acrolein	**UJ**
MW11-ROX-070915	Acetone	**UJ**
MW11-ROX-070915	2-Butanone (MEK)	**UJ**
MW11-ROX-070915	2-Chloroethyl vinyl ether	**UJ**
MW11-ROX-070915	1,4-Dioxane	**UJ**
MW10-ROX-070915	Acrolein	**UJ**
MW10-ROX-070915	Acetone	**UJ**
MW10-ROX-070915	2-Butanone (MEK)	**UJ**
MW10-ROX-070915	2-Chloroethyl vinyl ether	**UJ**
MW10-ROX-070915	1,4-Dioxane	**UJ**
MW14-ROX-070915	Acrolein	**UJ**
MW14-ROX-070915	Acetone	**UJ**
MW14-ROX-070915	2-Butanone (MEK)	**UJ**
MW14-ROX-070915	2-Chloroethyl vinyl ether	**UJ**
MW14-ROX-070915	1,4-Dioxane	**UJ**
MW9-ROX-070915	Acrolein	**UJ**
MW9-ROX-070915	Acetone	**UJ**
MW9-ROX-070915	2-Butanone (MEK)	**UJ**
MW9-ROX-070915	2-Chloroethyl vinyl ether	**UJ**
MW9-ROX-070915	1,4-Dioxane	**UJ**
MW16-ROX-070915	Acrolein	**UJ**
MW16-ROX-070915	Acetone	**UJ**
MW16-ROX-070915	2-Butanone (MEK)	**UJ**
MW16-ROX-070915	2-Chloroethyl vinyl ether	**UJ**
MW16-ROX-070915	1,4-Dioxane	**UJ**
MW16-ROX-070915-Dup	Acrolein	**UJ**
MW16-ROX-070915-Dup	Acetone	**UJ**
MW16-ROX-070915-Dup	2-Butanone (MEK)	**UJ**
MW16-ROX-070915-Dup	2-Chloroethyl vinyl ether	**UJ**
MW16-ROX-070915-Dup	1,4-Dioxane	**UJ**
P93D-ROX-070915	Acrolein	**UJ**
P93D-ROX-070915	Acetone	**UJ**
P93D-ROX-070915	2-Butanone (MEK)	**UJ**
P93D-ROX-070915	2-Chloroethyl vinyl ether	**UJ**
P93D-ROX-070915	1,4-Dioxane	**UJ**
MW24-ROX-070915	Acrolein	**UJ**
MW24-ROX-070915	Acetone	**UJ**
MW24-ROX-070915	2-Butanone (MEK)	**UJ**

Sample ID	Analyte	Qualification
MW24-ROX-070915	2-Chloroethyl vinyl ether	**UJ**
MW24-ROX-070915	1,4-Dioxane	**UJ**
P93B-ROX-070915	Acrolein	**UJ**
P93B-ROX-070915	Acetone	**UJ**
P93B-ROX-070915	2-Butanone (MEK)	**UJ**
P93B-ROX-070915	2-Chloroethyl vinyl ether	**UJ**
P93B-ROX-070915	1,4-Dioxane	**UJ**
P93B-ROX-070915-Dup	Acrolein	**UJ**
P93B-ROX-070915-Dup	Acetone	**UJ**
P93B-ROX-070915-Dup	2-Butanone (MEK)	**UJ**
P93B-ROX-070915-Dup	2-Chloroethyl vinyl ether	**UJ**
P93B-ROX-070915-Dup	1,4-Dioxane	**UJ**
P54-ROX-070915	Acrolein	**UJ**
P54-ROX-070915	Acetone	**UJ**
P54-ROX-070915	2-Butanone (MEK)	**UJ**
P54-ROX-070915	2-Chloroethyl vinyl ether	**UJ**
P54-ROX-070915	1,4-Dioxane	**UJ**

Review of the initial calibration summary forms indicated %RSDs were $\leq$ 30% for calibration check compounds (CCCs) [1,1-dichloroethene, toluene, chloroform, ethylbenzene, 1,2-dichloropropane, and vinyl chloride], and $\leq$ 15% for non-CCCs with some exceptions. The initial calibration for compounds with %RSD values outside evaluation criteria was determined using least square linear regression: correlation coefficients (r) were greater than 0.990.

An initial calibration verification (ICV) was analyzed following the initial calibration. Percent difference (%D) values from comparing ICV RF to the average ICAL RFs were within criteria specified in NFG (2014) with the exception of methyl tert-butyl ether (-25.6%). NFG (2014) does not list acrolein (38.7% D) in the calibration tables. The following table summarizes %Ds > 20%; if outside 2014 NFG criteria, the %D is marked with an asterisk.

ICV (Date/Time)	Analyte	%D
6/27/2015 12:04	Dichlorodifluoromethane	**20.4**
6/27/2015 12:04	Bromoethane	**-21.3**
6/27/2015 12:04	Acrolein	**38.7**
6/27/2015 12:04	Methyl tert-butyl ether	**-25.6***
6/27/2015 12:04	Vinyl acetate	**-49.9**
6/27/2015 12:04	2-chloroethyl vinyl ether	**-343.2**

Analytical data reported as non-detect and associated with decreases in %D indicating a possible high bias, did not require qualification. The results for bromoethane, vinyl acetate, and 2-chloroethyl vinyl ether in the validated samples associated with increases in %D, indicating a potential high bias, were non-detect and were not qualified. Dichlorodifluoromethane showed potential negative bias, however was within 2014 NFG criteria. No qualification of data was required.

A recalculation of the %RSDs and RFs for a compound associated with each internal standard was performed from the raw data and no errors in calculation were noted; therefore, no qualification of data was required.

1.6 Calibration Verification

Review of the sample chromatograms indicated that all calibration verifications (CVs) were performed before the start of sample analysis. Review of CV summary forms indicated RFs met the evaluation criteria of greater than 0.01 for chloromethane, 0.30 for 1,1-dichloroethane, 0.10 for bromoform, 0.40 for chlorobenzene, 0.20 for 1,1,2,2-tetrachloroethane, and greater than NFG specified minimum RRFs for all other target analytes.

Percent difference (%D) values were within criteria specified in NFG (2014), with the exceptions of acetone (-184.7%D, -42.7%D), 2-butanone (-53.5%D, -67.2%D), dibromochloromethane (-24.5%D, -24.6%D), and 1,1-dichloroethene (36.0%D, asterisked in the table below. The following table summarizes %Ds > 20%.

CV (Date/Time)	Analyte	%D
7/20/2015 9:36	Dichlorodifluoromethane	**36.3**
7/20/2015 9:36	Acetone	**-184.7***
7/20/2015 9:36	Acrylonitrile	**-36.5**
7/20/2015 9:36	Vinyl acetate	**-40.3**
7/20/2015 9:36	2-Butanone	**-53.5***
7/20/2015 9:36	2,2-Dichloropropane	**-32.9**
7/20/2015 9:36	1,4-Dioxane	**21.1**
7/20/2015 9:36	cis-1,3-Dichloropropane	**-22.5**
7/20/2015 9:36	Dibromochloromethane	**-24.5***
7/20/2015 9:36	2-Hexanone	**-35.0**
7/20/2015 17:49	Dichlorodifluoromethane	**40.4**
7/20/2015 17:49	Acrylonitrile	**-32.7**
7/20/2015 17:49	Vinyl acetate	**-22.3**
7/20/2015 17:49	2-Butanone	**-38.7**
7/20/2015 17:49	1,4-Dioxane	**26.6**
7/20/2015 17:49	Naphthalene	**21.9**
7/21/2015 10:27	Dichlorodifluoromethane	**35.5**
7/21/2015 10:27	Acetone	**-42.7***
7/21/2015 10:27	Acrylonitrile	**-37.2**
7/21/2015 10:27	Vinyl acetate	**-52.5**
7/21/2015 10:27	2-Butanone	**-67.2***
7/21/2015 10:27	2,2-Dichloropropane	**-30.7**
7/21/2015 10:27	Dibromochloromethane	**-24.6**
7/21/2015 10:27	2-Hexanone	**-37.7**
7/22/2015 11:35	Dichlorodifluoromethane	**21.9**
7/22/2015 11:35	Chloromethane	**22.6**
7/22/2015 11:35	1,1-Dichloroethene	**36.0***

CV (Date/Time)	Analyte	%D
7/22/2015 11:35	trans-1,2-dichloroethene	**29.0**
7/22/2015 11:35	2-Butanone	**-20.5**
7/22/2015 11:35	1,1,1-Trichloroethane	**20.4**

Analytical data that required qualification based on continuing calibration verification data are included in the table below. Analytical data reported as non-detect and associated with decreases in %D indicating a possible high bias, did not require qualification.

Sample ID	Analyte	Qualifications
MW14-ROX-070915	1,1-Dichloroethene	**UJ**
MW16-ROX-070915	1,1-Dichloroethene	**UJ**
MW16-ROX-070915-Dup	1,1-Dichloroethene	**UJ**
P93D-ROX-070915	1,1-Dichloroethene	**UJ**
MW24-ROX-070915	1,1-Dichloroethene	**UJ**
P93B-ROX-070915-Dup	1,1-Dichloroethene	**UJ**
P54-ROX-070915	1,1-Dichloroethene	**UJ**

Recalculations of the RFs and %Ds for two target compounds were completed for each CV, and no errors in calculation were noted; therefore, no qualifications of data were required.

1.7 Blank Samples

The purpose of the method blank samples is to evaluate the existence and magnitude of contamination problems emanating from laboratory activities. Method blank samples were analyzed with each analytical batch as required by USEPA SW-846 Method 8260C. Equipment blank samples are used to evaluate the efficiency of the decontamination of sampling equipment. Also, trip blanks were analyzed to evaluate the existence and magnitude of contamination problems emanating during sample shipment to the laboratory. Target compounds were reported as non-detect with the exceptions summarized in the table below.

Blank ID	Parameter	Analyte	Concentration/ Amount
TB-ROX-070915-HCL-A	VOCs	Carbon disulfide	0.24 µg/L
TB-ROX-070915-HCL-A	VOCs	Hexachlorobutadiene	0.59 µg/L
TB-ROX-070915-HCL-A	VOCs	Naphthalene	3.5 µg/L
TB-ROX-070915-HCL-B	VOCs	Carbon disulfide	0.23 µg/L
TB-ROX-070915-HCL-B	VOCs	Naphthalene	3.5 µg/L
TB-ROX-070915-HCL-B	VOCs	1,2,4-Trichlorobenzene	0.94 µg/L
MSL4085-MB	VOCs	Carbon disulfide	0.43 µg/L
MSL4085-MB	VOCs	Hexachlorobutadiene	1.7 µg/L
MSL4085-MB	VOCs	Naphthalene	3.6 µg/L
MSL4085-MB	VOCs	1,2,3-Trichlorobenzene	1.6 µg/L
MSL4085-MB	VOCs	1,2,4-Trichlorobenzene	1.4 µg/L
MSL4086-MB	VOCs	Carbon disulfide	0.40 µg/L
MSL4087-MB	VOCs	Carbon disulfide	0.59 µg/L
MSL4087-MB	VOCs	Hexachlorobutadiene	1.9 µg/L

Blank ID	Parameter	Analyte	Concentration/ Amount
MSL4087-MB	VOCs	1,2,4-Trichlorobenzene	1.5 µg/L
MSL4089-MB	VOCs	Hexachlorobutadiene	0.76 µg/L
MSL4089-MB	VOCs	Naphthalene	3.7 µg/L
MSL4089-MB	VOCs	1,2,3-Trichlorobenzene	1.5 µg/L
MSL4086-MB1	VOCs	Hexachlorobutadiene	0.76 µg/L
MSL4086-MB1	VOCs	Naphthalene	3.7 µg/L
MSL4086-MB1	VOCs	1,2,3-Trichlorobenzene	1.5 µg/L

Qualifications due to blank contamination are included in the table below. Analytical data that were reported non-detect or at concentrations greater than five times (5X) the associated blank concentration did not require qualification.

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
MW11-ROX-070915	VOCs	Carbon disulfide	-	**U**
MW10-ROX-070915	VOCs	Carbon disulfide	-	**U**
MW14-ROX-070915	VOCs	Carbon disulfide	-	**U**
MW16-ROX-070915	VOCs	Carbon disulfide	-	**U**
MW24-ROX-070915	VOCs	Carbon disulfide	-	**U**
MW16-ROX-070915-Dup	VOCs	Naphthalene	-	**U**
P54-ROX-070915	VOCs	Naphthalene	-	**U**
MW14-ROX-070915	VOCs	1,2,4-Trichlorobenzene	-	**U**
P54-ROX-070915	VOCs	1,2,4-Trichlorobenzene	-	**U**

1.8 Surrogate Spike Recoveries

Surrogate compounds were used to evaluate the overall laboratory sample preparation efficiency on a per sample basis. All surrogate recoveries were within the method acceptance criteria for the validated samples. No qualification of data was required.

Approximately 10% of the recoveries were recalculated and no calculation or transcription errors were noted.

1.9 Matrix Spike/Matrix Spike Duplicate (MS/MSD) Samples

MS/MSD samples are analyzed to assess potential matrix effects. Sample MW14-ROX-070915 was spiked and analyzed for 8260 VOCs. MS/MSD data were within evaluation criteria.

Approximately 10% of the MS/MSD spiking recoveries were recalculated and verified using the MS/MSD summary forms, and no errors were noted.

1.10 Internal Standards

Internal standard (IS) performance criteria ensure that the GC/MS sensitivity and response are stable during each analytical run. IS areas must be within -50% to +100%, and the IS retention times must be within 30 seconds of the IS continuing calibration retention time. IS areas and retention times for the validated samples in this SDG were within evaluation criteria.

The summary forms versus the raw data were verified and no transcription errors were noted. No qualifications to the data were required based on internal standard areas or retention times.

1.11 Laboratory Control Spike (LCS) Samples

Laboratory control samples were analyzed with each analytical batch to assess the accuracy of the analytical process. LCS data were within evaluation criteria, with the exception of those summarized in the following table:

LCS/LCSD ID	Parameter	Analyte	LCS/LCSD Recovery	RPD	LCS/LCSD/ RPD Criteria
MSL4085-BS/BSD	VOCs	Acetone	**284**/162	**55**	14-172/25
MSL4085-BS/BSD	VOCs	2-Butanone (MEK)	**153/149**	3	43-147/25
MSL4086-BS/BSD	VOCs	Acrolein	85/110	**26**	10-168/25
MSL4087-BS/BSD	VOCs	2-Butanone (MEK)	**167/**126	**28**	43-147/25
MSL4086-BS1/BSD1	VOCs	2-Butanone (MEK)	**155**/131	17	43-147/25
MSL4089-BS/BSD	VOCs	2-Butanone (MEK)	**155**/131	17	43-147/25

Analytical data reported as non-detect and associated with LCS recoveries above evaluation criteria, indicating a possible high bias, did not require qualification. No qualification of data was required.

Approximately 10% of spiking compound recoveries for the LCS were recalculated and verified using the LCS summary forms, and no calculation or transcription errors were noted.

1.12 Target Compound Identification and Quantification

For validation of the compound identification, chromatograms were reviewed to verify the major peaks were identified, and the relative retention time was no greater than 0.06 different from the associated CV retention times. Approximately 10% of the detected target analytes were verified. No anomalies were noted with the identification of the target compounds in the samples.

For the validation of compound quantitation, approximately 10% of the detected target analytes were recalculated from the raw data, and no calculation errors were noted. Additionally, the reporting limits were verified to determine if reporting limits (RLs) were adjusted for dilutions. No qualification of the data was required and review of the data indicated the correct RLs were reported.

1.13 Overall Data Assessment

Based on the criteria outlined, it is recommended that the results for these analyses are accepted for their intended use. Acceptable levels of accuracy and precision, based on LCS and surrogate data were achieved for this SDG.

1.0 VALIDATION OF SVOC DATA – SDG MC39947

This section describes the validation for eleven groundwater samples which were prepared by USEPA SW-846 Method 3520C and analyzed for semi-volatile organic compounds (SVOCs) by USEPA SW-846 Method 8270C and for polycyclic aromatic hydrocarbons (PAHs) by USEPA SW-846 Method 8270C SIM. Samples were analyzed by Accutest Laboratories of Marlborough, Massachusetts, and submitted as part of sample delivery group (SDG) MC39947. Samples included as part of this validation are listed below:

Sample Identification	Sample Identification
MW11-ROX-070915	MW10-ROX-070915
MW14-ROX-070915	MW9-ROX-070915
MW16-ROX-070915	MW16-ROX-070915-DUP
P93D-ROX-070915	MW24-ROX-070915
P93B-ROX-070915	P93B-ROX-070915-DUP
P54-ROX-070915	

Evaluation of the analytical data followed procedures outlined in the USEPA Contract Laboratory National Functional Guidelines for Superfund Organic Methods Data Review (EPA 2014).

Criteria evaluated included the following method performance criteria:

- Data package completeness
- Laboratory case narrative/cooler receipt form
- Holding times and sample preservation
- GC/MS instrument performance
- Initial calibration
- Calibration verification
- Blank samples
- Surrogate spike recoveries
- Matrix spike/matrix spike duplicate (MS/MSD) samples
- Internal standard areas
- Laboratory control sample (LCS)
- Target compound identification and quantitation
- Overall data assessment

1.0 Data Package Completeness

The data package was reviewed to make certain that it contained the data contractually required in the deliverable. This included checking the data package for the results of each analyte requested for each field sample submitted in the analytical batch, along with requested QC documentation for the respective methods. The data package was complete.

The laboratory case narrative indicated SVOC MS/MSD RPDs were outside evaluation criteria in sample MW14-ROX-070915. Sample P93D-ROX-070915 and field duplicate pair P93B-

ROX-070915/P93B-ROX-070915-Dup was diluted due to high levels of benzene. Initial calibration verification for hexachlorocyclopentadiene percent difference (%D) was outside evaluation criteria. These issues are addressed further in the appropriate sections below.

The cooler receipt form indicated four of four coolers were received by the laboratory at temperatures of 1.4ºC, 0.1ºC, 1.2ºC, and 1.1ºC, which are outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

1.3 Holding Times and Sample Preservation

Review of the sample collection and analysis dates involved comparing the chain-of-custody, the summary forms, the raw data forms, and the chromatograms for accuracy, consistency, and holding time compliance. The validated samples were received in good condition at temperatures of 1.4ºC, 0.1ºC, 1.2ºC, and 1.1ºC, and were maintained at $4^{o}C \pm 2^{o}C$, and were extracted within seven days of collection and analyzed within 40 days of extraction. No qualification of data was required due to sample preservation or holding time criteria.

1.4 GC/MS Instrument Performance

GC/MS instrument performance checks were performed to ensure mass resolution, identification, and instrument sensitivity. Criteria for evaluation of instrument performance included possible transcription/calculation errors, adherence to instrument tuning frequency requirements, mass assignments, and ion abundance criteria. Instrument performance check samples were evaluated against the laboratory tuning criteria established in Method 8270C.

Based on the raw data, the ion abundance criteria were within evaluation criteria for all masses, therefore; no qualification of the data was required. The raw data forms were checked against the summary forms and no calculation or transcription errors were noted.

1.5 Initial Calibration

An Initial calibration (ICAL) was established to assess whether the instrument was capable of producing acceptable qualitative and quantitative data for semi-volatile analysis. SVOC samples as part of SDG MC39947 were analyzed using instrument MSR and MSX, and PAH samples were analyzed using instrument MSI. The ICAL for instruments MSR and MSX were established on 7/15/2015 and 5/11/2015. The ICAL for instrument MSI was established on 7/21/2015. ICAL for instruments MSR, MSX, and MSI were established prior to sample analysis and using at least five concentration standards to establish the initial calibration curve as required by Method 8270C and 8270C SIM. An average response factor (RF) was determined for each target analyte, and the RFs were reviewed and verified as greater than 0.05 for all target analytes.

Review of the initial calibration summary forms for SVOCs and PAHs indicated calibration check compounds (CCCs) had percent relative standard deviations (%RSDs) $\leq$ 30%. All other target analytes had %RSDs less than 15% for CCCs with some exceptions. The initial calibration for compounds with %RSD values outside evaluation criteria was determined using least square linear regression and the correlation coefficients (r) were greater than 0.990.

Initial calibration verifications (ICVs) for SVOCs and PAHs were analyzed following the initial calibrations. Percent difference (%D) values comparing ICV RF to the average ICAL RFs were less than those specified in NFG (2014) for target, or closely analgous, compounds with the exceptions summarized in the following table.

ICV ID	Analyte	%D
7/15/2015 9:17	bis-(2-Chloroethyl)ether	**-28.3**
5/11/2015 9:17	4-Chloroaniline	**25.1**
5/11/2015 9:17	Hexachlorocyclopentadiene	**35.2**

Qualifications of SVOC data due to ICV %D are summarized in the following table. The results for bis-(2-chloroethyl)ether in the validated samples associated with marginal increases in %D, indicating a potential high bias, were not qualified.

Sample ID	Analyte	Qualification
MW14-ROX-070915	4-Chloroaniline	**UJ**
MW14-ROX-070915	Hexachlorocyclopentadiene	**UJ**

Recalculations of the RFs and %RSD for one compound per internal standard were performed, and no errors in calculation were noted.

1.6 Calibration Verification

Review of sample chromatograms indicated the calibration verifications (CVs) were performed prior to sample analysis. Review of continuing calibration summary forms for SVOCs and PAHs indicated all RFs met the evaluation criteria of greater than 0.05 for all target analytes. In addition, percent differences (%Ds) met the evaluation criteria of less than or equal to specified in NFG (2014) for target, or closely analgous, compounds with the exceptions summarized in the following table.

CCV ID	Analyte	Qualifications
7/22/2015 16:25	Benzo[k]fluoranthene	**-21.6**
7/21/2015 9:41	Benzoic acid	**25.8**

Qualifications of SVOC data due to CCV %D are summarized in the following table. Data that was non-detect and associated with increases in %D, indicating a potential high bias, did not require qualification.

Sample ID	Analyte	Qualification
MW10-ROX-070915	Benzo[k]fluoranthene	**J**
MW14-ROX-070915	Benzoic acid	**UJ**

Recalculations of the RFs and %RSD for one compound per internal standard were performed, and no errors in calculation were noted.

1.7 Blank Samples

The purpose of method blank samples is to evaluate the existence and magnitude of contamination problems emanating from laboratory activities. Method blank samples were analyzed with each analytical batch as required by USEPA SW-846 Method 8270C. Equipment blank samples are used to evaluate the efficiency of the decontamination of sampling equipment. Target compounds in the blank samples were reported as non-detect. No qualifications of data were required.

1.8 Surrogate Spike Recoveries

Surrogate compounds were used to evaluate the overall laboratory sample preparation efficiency on a per-sample basis. Surrogate recoveries were within the method acceptance criteria for all validated samples.

Approximately 10% of the surrogate recoveries were recalculated, and the summary forms versus the raw data were verified. No calculation or transcription errors were noted.

1.9 Matrix Spike/Matrix Spike Duplicate (MS/MSD) Samples

MS/MSD samples are analyzed to assess potential matrix effects. Sample MW14-ROX-070915 was spiked and analyzed for SVOCs and PAHs.

All MS/MSD recoveries and MS/MSD RPDs were within the method acceptance criteria for the validated samples with the exception of those summarized in the table below.

MS/MSD ID	Parameter	Analyte	MS/MSD Recovery (%)	RPD	MS/MSD/ RPD Criteria
MW14-ROX-070915	SVOCs	Aniline	64/47	**33**	17-89/20
MW14-ROX-070915	SVOCs	3,3'-Dichlorobenzidine	63/45	**34**	29-140/20
MW14-ROX-070915	SVOCs	Pyridine	42/18	**80**	10-73/20

LCS/LCSD recoveries were within evaluation criteria with the exception of compounds listed and qualified as appropriate in the data review for SDG MC39947. No further qualification of data was required.

Approximately 10% of the MS/MSD spiking recoveries were recalculated and verified using MS/MSD summary forms, and no calculation or transcription errors were noted,

1.10 Internal Standards

Internal standard (IS) performance criteria ensure that the GC/MS sensitivity and response are stable during each analytical run. Following Method 8270C, the IS areas for the samples and CVs must be within –50% to +100% and retention times must be within 30 seconds of the IS area and retention time of the midpoint of the ICAL.

The IS areas for the CVs and the validated samples in this SDG were within evaluation criteria.

1.11 Laboratory Control Spike (LCS) Samples

Laboratory control samples were analyzed with each analytical batch to assess the accuracy of the analytical process. LCS recoveries were within evaluation criteria. No qualification of data was required.

Approximately 10% of the spiking compound recoveries for the LCS were recalculated from the raw data and verified using the LCS summary forms, and no calculation or transcription errors were noted.

1.12 Target Compound Identification and Quantification

For validation of the compound identification, chromatograms were reviewed to verify the major peaks were identified, the spectra of the identified compounds were verified against the library spectra, and the relative retention time was no greater than 0.06 different from the associated

CV retention times. A minimum of 10% of the detected target analytes and spiking compounds were verified. No anomalies were noted with the identification of the target compounds in the samples.

For the validation of compound quantitation, 10% of the target analytes were recalculated from the raw data, and no calculation errors were noted. Additionally, the reporting limits were verified to determine if reporting limits (RLs) were adjusted for dilutions. No qualification of the data was required and review of the data indicated the correct RLs were reported.

1.13 Overall Data Assessment

Based on the criteria outlined, it is recommended that the results reported for these analyses are accepted for their intended use. Acceptable levels of accuracy and precision, based on LCS, MS/MSD, and surrogate data were achieved for this SDG.

New England
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LABORATORIES

08/10/15



Technical Report for

Shell Oil

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, 60400249

Accutest Job Number: MC39947

Sampling Date: 07/09/15

Report to:

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Total number of pages in report: **166**

Reviewed 8/5/15

Reza Tand
Lab Director

Test results contained within this data package meet the requirements of the National Environmental Laboratory Accreditation Program and/or state specific certification programs as applicable.

Client Service contact: Jeremy Vienneau 508-481-6200

Certifications: MA (M-MA136,SW846 NELAC) CT (PH-0109) NH (250210) RI (00071) ME (MA00136) FL (E87579) NY (11791) NJ (MA926) PA (6801121) ND (R-188) CO MN (11546AA) NC (653) IL (002337) WI (399080220) DoD ELAP (L-A-B L2235)

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Sample Summary

Shell Oil

Job No: MC39947

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Collected Date	Time	By	Received	Matrix Code	Matrix Type	Client Sample ID
MC39947-1	07/09/15	00:00	SFCW	07/10/15	AQ	Trip Blank Water	TB-ROX-070915-HCL-A
MC39947-2	07/09/15	00:00	SFCW	07/10/15	AQ	Trip Blank Water	TB-ROX-070915-HCL-B
MC39947-3	07/09/15	00:00	SFCW	07/10/15	AQ	Trip Blank Water	TB-ROX-070915-ST-A
MC39947-4	07/09/15	00:00	SFCW	07/10/15	AQ	Trip Blank Water	TB-ROX-070915-ST-B
MC39947-5	07/09/15	09:15	SFCW	07/10/15	AQ	Ground Water	MW11-ROX-070915
MC39947-6	07/09/15	10:15	SFCW	07/10/15	AQ	Ground Water	MW10-ROX-070915
MC39947-7	07/09/15	10:30	SFCW	07/10/15	AQ	Ground Water	MW14-ROX-070915
MC39947-7D	07/09/15	10:30	SFCW	07/10/15	AQ	Water Dup/MSD	MW14-ROX-070915
MC39947-7S	07/09/15	10:30	SFCW	07/10/15	AQ	Water Matrix Spike	MW14-ROX-070915
MC39947-8	07/09/15	11:05	SFCW	07/10/15	AQ	Ground Water	MW9-ROX-070915
MC39947-9	07/09/15	13:20	SFCW	07/10/15	AQ	Ground Water	MW16-ROX-070915
MC39947-10	07/09/15	13:20	SFCW	07/10/15	AQ	Ground Water	MW16-ROX-070915-DUP
MC39947-11	07/09/15	14:00	SFCW	07/10/15	AQ	Ground Water	P93D-ROX-070915

Sample Summary
(continued)

Shell Oil

Job No: MC39947

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Collected Date	Time By	Received	Matrix Code	Type	Client Sample ID
MC39947-12	07/09/15	14:20 SFCW	07/10/15	AQ	Ground Water	MW24-ROX-070915
MC39947-13	07/09/15	14:40 SFCW	07/10/15	AQ	Ground Water	P93B-ROX-070915
MC39947-14	07/09/15	14:40 SFCW	07/10/15	AQ	Ground Water	P93B-ROX-070915-DUP
MC39947-15	07/09/15	15:10 SFCW	07/10/15	AQ	Ground Water	P54-ROX-070915

SAMPLE DELIVERY GROUP CASE NARRATIVE

Client:	Shell Oil	**Job No**	MC39947
Site:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central	**Report Date**	7/24/2015 11:23:26 AM

11 Sample(s), 4 Trip Blank(s) and 0 Field Blank(s) were collected on 07/09/2015 and were received at Accutest on 07/10/2015 properly preserved, at 1.4 Deg. C and intact. These Samples received an Accutest job number of MC39947. A listing of the Laboratory Sample ID, Client Sample ID and dates of collection are presented in the Results Summary Section of this report. 1-Chlorohexane, Benzenethiol, Dibenz(a,h)acridine, Indene, and Quinoline were searched in the library search and reported only if detections were found.

Except as noted below, all method specified calibrations and quality control performance criteria were met for this job. For more information, please refer to QC summary pages.

Volatiles by GCMS By Method SW846 8260C

Matrix: AQ **Batch ID:** MSL4085

- All samples were analyzed within the recommended method holding time.
- Sample(s) MC39947-1, MC39947-2, MC39947-6 have compound(s) reported with a "B" qualifier, indicating analyte is found in the associated method blank.
- RPD for MSL4085-BSD for Acetone: Outside control limits. Associated samples are non-detect for this compound.
- MSL4085-BS for Acetone: Outside control limits. Associated samples are non-detect for this compound.
- MSL4085-BS/BSD for 2-Butanone (MEK): Outside control limits. Associated samples are non-detect for this compound.
- Continuing calibration check standard MSL4085-CC4070 for acetone, vinyl acetate, 2-butanone exceed 40% Difference. (response bias high). Associated samples are non-detect for this compound.
- Initial calibration verification MSL4070-ICV4070 for 2-chloroethyl vinyl ether, vinyl acetate exceed 30% Difference (response bias high). Associated samples are non-detect for this compound.
- Initial calibration verification MSL4070-ICV4070 for acrolein exceed 30% Difference. Acrolein is within criteria in continuing calibration check standards MSL4085-CC4070, MSL4086-CC4070, MSL4087-CC4070.

Matrix: AQ **Batch ID:** MSL4086

- All samples were analyzed within the recommended method holding time.
- Sample(s) MC39947-7MS, MC39947-7MSD were used as the QC samples indicated.
- Sample(s) MC39947-12, MC39947-7, MC39947-9 have compound(s) reported with a "B" qualifier, indicating analyte is found in the associated method blank.
- RPD for MSL4086-BSD for Acrolein: Outside control limits. Individual spike recoveries within acceptance limits.

Matrix: AQ **Batch ID:** MSL4087

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- MSL4087-BS for 2-Butanone (MEK): Outside control limits. Associated samples are non-detect for this compound.
- RPD for MSL4087-BSD for 2-Butanone (MEK): Outside control limits. Associated samples are non-detect for this compound.
- Continuing calibration check standard MSL4087-CC4070 for acetone, vinyl acetate, 2-butanone exceed 40% Difference. (response bias high). Associated samples are non-detect for this compound.

Matrix: AQ **Batch ID:** MSL4089

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- MSL4089-BS for 2-Butanone (MEK): Outside control limits. Associated samples are non-detect for this compound.

Extractables by GCMS By Method SW846 8270D

Matrix: AQ	Batch ID: OP43772

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- Sample(s) MC39947-7MS, MC39947-7MSD were used as the QC samples indicated.
- RPD(s) for MSD for 3,3'-Dichlorobenzidine, Aniline, Pyridine are outside control limits for sample OP43772-MSD1. High RPD due to possible matrix interference and/or sample non-homogeneity.
- Initial calibration verification MSX194-ICV194, file X06126 for Hexachlorocyclopentadiene exceed 30% Difference. Hexachlorocyclopentadiene is within criteria in continuing calibration check standards MSX202-CC194 and MSX203-CC194.

Extractables by GCMS By Method SW846 8270D BY SIM

Matrix: AQ	Batch ID: OP43773

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- Sample(s) MC39947-7MS, MC39947-7MSD were used as the QC samples indicated.

Volatiles by GC By Method SW846 8011

Matrix: AQ	Batch ID: OP43891

- All samples were analyzed within the recommended method holding time.
- Sample(s) MC39947-7MS, MC39947-7MSD were used as the QC samples indicated.
- All method blanks for this batch meet method specific criteria.
- Continuing calibration check standard GBB3460-CC3460, signal #1, file BB63839 for 1,2-Dibromo-3-chloropropane exceeds 15% Dev (response bias high).Associated samples are non-detect for target analytes.
- Continuing calibration check standard GBB3460-CC3460, file BB63839, signal #1 for Bromofluorobenzene (S) exceed 15% Dev (response bias high).Sample non-detect for target analytes.

The Accutest Laboratories of New England certifies that all analysis were performed within method specification. It is further recommended that this report to be used in its entirety.The Accutest Laboratories of NE, Laboratory Director or assignee as verified by the signature on the cover page has authorized the release of this report(MC39947).

Summary of Hits

Job Number: MC39947
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/09/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
MC39947-1	TB-ROX-070915-HCL-A					
Carbon disulfide		0.24 JB	5.0	0.19	ug/l	SW846 8260C
Hexachlorobutadiene		0.59 JB	5.0	0.45	ug/l	SW846 8260C
Naphthalene		3.5 JB	5.0	0.61	ug/l	SW846 8260C
MC39947-2	TB-ROX-070915-HCL-B					
Carbon disulfide		0.23 JB	5.0	0.19	ug/l	SW846 8260C
Naphthalene		3.5 JB	5.0	0.61	ug/l	SW846 8260C
1,2,4-Trichlorobenzene		0.94 JB	5.0	0.74	ug/l	SW846 8260C
MC39947-3	TB-ROX-070915-ST-A					
No hits reported in this sample.						
MC39947-4	TB-ROX-070915-ST-B					
No hits reported in this sample.						
MC39947-5	MW11-ROX-070915					
Carbon disulfide		~~0.21 J~~ U	5.0	0.19	ug/l	SW846 8260C
Chloromethane		0.58 J	2.0	0.49	ug/l	SW846 8260C
1-Methylnaphthalene		0.029 J	2.2	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.045 J	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.029 J	0.054	0.012	ug/l	SW846 8270D BY SIM
MC39947-6	MW10-ROX-070915					
Carbon disulfide		~~0.48 JB~~ U	5.0	0.19	ug/l	SW846 8260C
Butyl benzyl phthalate		0.28 J	5.4	0.23	ug/l	SW846 8270D
Di-n-butyl phthalate		0.64 J	5.4	0.41	ug/l	SW846 8270D
bis(2-Ethylhexyl)phthalate		0.45 J	2.2	0.33	ug/l	SW846 8270D
Acenaphthene		0.023 J	0.11	0.0082	ug/l	SW846 8270D BY SIM
Anthracene		0.039 J	0.11	0.011	ug/l	SW846 8270D BY SIM
Benzo(a)anthracene		0.035 J	0.054	0.026	ug/l	SW846 8270D BY SIM
Benzo(a)pyrene		0.022 J	0.11	0.017	ug/l	SW846 8270D BY SIM
Benzo(b)fluoranthene		0.028 J	0.054	0.021	ug/l	SW846 8270D BY SIM
Benzo(g,h,i)perylene		0.027 J	0.11	0.014	ug/l	SW846 8270D BY SIM
Benzo(k)fluoranthene		0.041 J	0.11	0.011	ug/l	SW846 8270D BY SIM
Chrysene		0.045 J	0.11	0.014	ug/l	SW846 8270D BY SIM
Dibenzo(a,h)anthracene		0.020 J	0.11	0.016	ug/l	SW846 8270D BY SIM
Fluoranthene		0.057 J	0.11	0.0080	ug/l	SW846 8270D BY SIM
Fluorene		0.037 J	0.11	0.016	ug/l	SW846 8270D BY SIM

Summary of Hits

Job Number: MC39947
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/09/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
Indeno(1,2,3-cd)pyrene		0.024 J	0.11	0.022	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.035 J	2.2	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.058 J	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.077	0.054	0.012	ug/l	SW846 8270D BY SIM
Pyrene		0.059 J	0.11	0.0092	ug/l	SW846 8270D BY SIM
MC39947-7	MW14-ROX-070915					
Carbon disulfide		~~0.81 JB~~ U	5.0	0.19	ug/l	SW846 8260C
1,2,4-Trichlorobenzene		~~1.1 J~~ U	5.0	0.74	ug/l	SW846 8260C
Di-n-butyl phthalate		0.44 J	5.2	0.38	ug/l	SW846 8270D
bis(2-Ethylhexyl)phthalate		0.51 J	2.1	0.31	ug/l	SW846 8270D
Acenaphthene		0.20	0.10	0.0077	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.051 J	0.10	0.0087	ug/l	SW846 8270D BY SIM
Anthracene		0.027 J	0.10	0.010	ug/l	SW846 8270D BY SIM
Fluoranthene		0.016 J	0.10	0.0076	ug/l	SW846 8270D BY SIM
Fluorene		0.17	0.10	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.19 J	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.12 J	2.1	0.011	ug/l	SW846 8270D BY SIM
Phenanthrene		0.062	0.052	0.011	ug/l	SW846 8270D BY SIM
Pyrene		0.017 J	0.10	0.0088	ug/l	SW846 8270D BY SIM
MC39947-8	MW9-ROX-070915					
Di-n-butyl phthalate		0.42 J	5.5	0.41	ug/l	SW846 8270D
1-Methylnaphthalene		0.073 J	2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.13 J	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.044 J	0.055	0.012	ug/l	SW846 8270D BY SIM
MC39947-9	MW16-ROX-070915					
Carbon disulfide		~~0.30 JB~~ U	5.0	0.19	ug/l	SW846 8260C
Trichloroethene		0.38 J	1.0	0.25	ug/l	SW846 8260C
Di-n-butyl phthalate		0.43 J	5.5	0.41	ug/l	SW846 8270D
Acenaphthene		0.026 J	0.11	0.0082	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.020 J	0.11	0.0092	ug/l	SW846 8270D BY SIM
Fluorene		0.037 J	0.11	0.017	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.067 J	2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.12 J	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.043 J	0.055	0.012	ug/l	SW846 8270D BY SIM
MC39947-10	MW16-ROX-070915-DUP					
Ethylbenzene		0.40 J	1.0	0.24	ug/l	SW846 8260C
Naphthalene		~~4.8 J~~ U	5.0	0.61	ug/l	SW846 8260C

Summary of Hits

Job Number: MC39947
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/09/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
m,p-Xylene		0.97 J	1.0	0.47	ug/l	SW846 8260C
Xylene (total)		0.97 J	1.0	0.22	ug/l	SW846 8260C
Anthracene		0.025 J	0.11	0.011	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.047 J	2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.074 J	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.023 J	0.056	0.012	ug/l	SW846 8270D BY SIM
MC39947-11	P93D-ROX-070915					
Benzene		21200	250	140	ug/l	SW846 8260C
Phenol		27.8	5.1	0.25	ug/l	SW846 8270D
bis(2-Chloroethyl)ether		4.3 J	5.1	0.42	ug/l	SW846 8270D
Anthracene		0.018 J	0.10	0.0099	ug/l	SW846 8270D BY SIM
Chrysene		0.016 J	0.10	0.013	ug/l	SW846 8270D BY SIM
Fluoranthene		0.025 J	0.10	0.0075	ug/l	SW846 8270D BY SIM
Fluorene		0.019 J	0.10	0.015	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.026 J	2.0	0.012	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.038 J	2.0	0.011	ug/l	SW846 8270D BY SIM
Phenanthrene		0.043 J	0.051	0.011	ug/l	SW846 8270D BY SIM
Pyrene		0.026 J	0.10	0.0086	ug/l	SW846 8270D BY SIM
MC39947-12	MW24-ROX-070915					
Carbon disulfide		~~0.19~~ JB U	5.0	0.19	ug/l	SW846 8260C
Anthracene		0.044 J	0.10	0.010	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.049 J	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.081 J	2.1	0.011	ug/l	SW846 8270D BY SIM
Phenanthrene		0.041 J	0.052	0.011	ug/l	SW846 8270D BY SIM
MC39947-13	P93B-ROX-070915					
Benzene		497000 J	2500	1400	ug/l	SW846 8260C
2,4-Dimethylphenol		0.90 J	10	0.51	ug/l	SW846 8270D
Phenol		101	5.1	0.26	ug/l	SW846 8270D
bis(2-Chloroethyl)ether		15.3	5.1	0.43	ug/l	SW846 8270D
Anthracene		0.029 J	0.10	0.010	ug/l	SW846 8270D BY SIM
Chrysene		0.017 J	0.10	0.013	ug/l	SW846 8270D BY SIM
Fluoranthene		0.035 J	0.10	0.0076	ug/l	SW846 8270D BY SIM
Fluorene		0.031 J	0.10	0.015	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.041 J	2.0	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.059 J	2.0	0.011	ug/l	SW846 8270D BY SIM
Phenanthrene		0.054 J	0.051	0.011	ug/l	SW846 8270D BY SIM
Pyrene		0.025 J	0.10	0.0087	ug/l	SW846 8270D BY SIM

Summary of Hits

Job Number: MC39947
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/09/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
MC39947-14	P93B-ROX-070915-DUP					
Benzene		371000 J	1000	540	ug/l	SW846 8260C
Naphthalene		7010 J	10000	1200	ug/l	SW846 8260C
2,4-Dimethylphenol		0.82 J	10	0.51	ug/l	SW846 8270D
Phenol		90.9	5.1	0.26	ug/l	SW846 8270D
bis(2-Chloroethyl)ether		14.2	5.1	0.43	ug/l	SW846 8270D
Acenaphthene		0.062 J	0.10	0.0077	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.040 J	0.10	0.0086	ug/l	SW846 8270D BY SIM
Anthracene		0.041 J	0.10	0.010	ug/l	SW846 8270D BY SIM
Chrysene		0.016 J	0.10	0.013	ug/l	SW846 8270D BY SIM
Fluoranthene		0.029 J	0.10	0.0076	ug/l	SW846 8270D BY SIM
Fluorene		0.095 J	0.10	0.015	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.058 J	2.0	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.077 J	2.0	0.011	ug/l	SW846 8270D BY SIM
Phenanthrene		0.31 J	0.051	0.011	ug/l	SW846 8270D BY SIM
MC39947-15	P54-ROX-070915					
Naphthalene		~~3.7 J~~ U	5.0	0.61	ug/l	SW846 8260C
1,2,4-Trichlorobenzene		~~0.92~~ J U	5.0	0.74	ug/l	SW846 8260C
Xylene (total)		0.28 J	1.0	0.22	ug/l	SW846 8260C
Fluorene		0.019 J	0.10	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.089 J	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.15 J	2.1	0.011	ug/l	SW846 8270D BY SIM
Phenanthrene		0.041 J	0.052	0.011	ug/l	SW846 8270D BY SIM

New England ACCUTEST LABORATORIES

Sample Results

Report of Analysis

Report of Analysis

Client Sample ID:	TB-ROX-070915-HCL-A		
Lab Sample ID:	MC39947-1	Date Sampled:	07/09/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92871.D	1	07/20/15	MC	n/a	n/a	MSL4085
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	0.24	5.0	0.19	ug/l	JB
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070915-HCL-A		
Lab Sample ID:	MC39947-1	Date Sampled:	07/09/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	0.59	5.0	0.45	ug/l	JB
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	3.5	5.0	0.61	ug/l	JB
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070915-HCL-A		
Lab Sample ID:	MC39947-1	Date Sampled:	07/09/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	119%		72-133%
2037-26-5	Toluene-D8	103%		85-114%
460-00-4	4-Bromofluorobenzene	104%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070915-HCL-B		
Lab Sample ID:	MC39947-2	Date Sampled:	07/09/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92872.D	1	07/20/15	MC	n/a	n/a	MSL4085
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	0.23	5.0	0.19	ug/l	JB
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070915-HCL-B		
Lab Sample ID:	MC39947-2	Date Sampled:	07/09/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	3.5	5.0	0.61	ug/l	JB
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	0.94	5.0	0.74	ug/l	JB
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070915-HCL-B		
Lab Sample ID:	MC39947-2	Date Sampled:	07/09/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	117%		72-133%
2037-26-5	Toluene-D8	99%		85-114%
460-00-4	4-Bromofluorobenzene	105%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070915-ST-A		
Lab Sample ID:	MC39947-3	Date Sampled:	07/09/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63833.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	36.9 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	104%		60-140%
460-00-4	Bromofluorobenzene (S)	110%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-070915-ST-B		
Lab Sample ID:	MC39947-4	Date Sampled:	07/09/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63834.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	37.5 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	106%		60-140%
460-00-4	Bromofluorobenzene (S)	114%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW11-ROX-070915		
Lab Sample ID:	MC39947-5	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92873.D	1	07/20/15	MC	n/a	n/a	MSL4085
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	~~0.21~~ U	5.0	0.19	ug/l	J U
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	UJ
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	0.58	2.0	0.49	ug/l	J
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW11-ROX-070915		
Lab Sample ID:	MC39947-5	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW11-ROX-070915		
Lab Sample ID:	MC39947-5	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	119%		72-133%
2037-26-5	Toluene-D8	103%		85-114%
460-00-4	4-Bromofluorobenzene	104%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW11-ROX-070915		
Lab Sample ID:	MC39947-5	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	R44801.D	1	07/22/15	MR	07/12/15	OP43772	MSR1653
Run #2							

	Initial Volume	Final Volume
Run #1	920 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.4	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.40	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.54	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.51	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.44	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.32	ug/l	
108-95-2	Phenol	ND	5.4	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.37	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.4	0.89	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.4	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.55	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.4	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.59	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.4	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.4	0.45	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.4	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.4	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.4	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.4	0.41	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.4	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.4	0.78	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW11-ROX-070915		
Lab Sample ID:	MC39947-5	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.4	0.62	ug/l	
131-11-3	Dimethyl phthalate	ND	5.4	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.4	0.84	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.4	0.31	ug/l	
78-59-1	Isophorone	ND	5.4	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.0	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.4	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.4	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.4	0.56	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.4	0.84	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	43%		10-80%
4165-62-2	Phenol-d5	25%		10-72%
118-79-6	2,4,6-Tribromophenol	92%		42-134%
4165-60-0	Nitrobenzene-d5	71%		25-117%
321-60-8	2-Fluorobiphenyl	77%		24-112%
1718-51-0	Terphenyl-d14	104%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW11-ROX-070915		
Lab Sample ID:	MC39947-5	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96882.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	920 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0082	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0091	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.054	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.054	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0080	ug/l	
86-73-7	Fluorene	ND	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	0.029	2.2	0.013	ug/l	J
91-57-6	2-Methylnaphthalene	0.045	2.2	0.012	ug/l	J
85-01-8	Phenanthrene	0.029	0.054	0.012	ug/l	J
129-00-0	Pyrene	ND	0.11	0.0092	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	75%		26-121%
321-60-8	2-Fluorobiphenyl	67%		28-107%
1718-51-0	Terphenyl-d14	90%		29-129%

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J = Indicates an estimated value
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW11-ROX-070915		
Lab Sample ID:	MC39947-5	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63835.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	37.4 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	99%		60-140%
460-00-4	Bromofluorobenzene (S)	104%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW10-ROX-070915		
Lab Sample ID:	MC39947-6	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92875.D	1	07/20/15	MC	n/a	n/a	MSL4085
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	~~0.48~~ U	5.0	0.19	ug/l	JB U
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	UJ
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW10-ROX-070915		
Lab Sample ID:	MC39947-6	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW10-ROX-070915		
Lab Sample ID:	MC39947-6	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	115%		72-133%
2037-26-5	Toluene-D8	101%		85-114%
460-00-4	4-Bromofluorobenzene	105%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW10-ROX-070915		
Lab Sample ID:	MC39947-6	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	R44802.D	1	07/22/15	MR	07/12/15	OP43772	MSR1653
Run #2							

	Initial Volume	Final Volume
Run #1	920 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.4	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.40	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.54	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.51	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.44	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.32	ug/l	
108-95-2	Phenol	ND	5.4	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.37	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.4	0.89	ug/l	
85-68-7	Butyl benzyl phthalate	0.28	5.4	0.23	ug/l	J
100-51-6	Benzyl Alcohol	ND	11	0.55	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.4	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.59	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.4	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.4	0.45	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.4	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.4	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.4	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.4	0.41	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	0.64	5.4	0.41	ug/l	J
117-84-0	Di-n-octyl phthalate	ND	5.4	0.78	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW10-ROX-070915		
Lab Sample ID:	MC39947-6	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.4	0.62	ug/l	
131-11-3	Dimethyl phthalate	ND	5.4	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	0.45	2.2	0.33	ug/l	J
118-74-1	Hexachlorobenzene	ND	5.4	0.84	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.4	0.31	ug/l	
78-59-1	Isophorone	ND	5.4	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.0	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.4	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.4	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.4	0.56	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.4	0.84	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	50%		10-80%
4165-62-2	Phenol-d5	30%		10-72%
118-79-6	2,4,6-Tribromophenol	103%		42-134%
4165-60-0	Nitrobenzene-d5	76%		25-117%
321-60-8	2-Fluorobiphenyl	85%		24-112%
1718-51-0	Terphenyl-d14	107%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW10-ROX-070915		
Lab Sample ID:	MC39947-6	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96883.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	920 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.023	0.11	0.0082	ug/l	J
208-96-8	Acenaphthylene	ND	0.11	0.0091	ug/l	
120-12-7	Anthracene	0.039	0.11	0.011	ug/l	J
56-55-3	Benzo(a)anthracene	0.035	0.054	0.026	ug/l	J
50-32-8	Benzo(a)pyrene	0.022	0.11	0.017	ug/l	J
205-99-2	Benzo(b)fluoranthene	0.028	0.054	0.021	ug/l	J
191-24-2	Benzo(g,h,i)perylene	0.027	0.11	0.014	ug/l	J
207-08-9	Benzo(k)fluoranthene	0.041	0.11	0.011	ug/l	J
218-01-9	Chrysene	0.045	0.11	0.014	ug/l	J
53-70-3	Dibenzo(a,h)anthracene	0.020	0.11	0.016	ug/l	J
206-44-0	Fluoranthene	0.057	0.11	0.0080	ug/l	J
86-73-7	Fluorene	0.037	0.11	0.016	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	0.024	0.11	0.022	ug/l	J
90-12-0	1-Methylnaphthalene	0.035	2.2	0.013	ug/l	J
91-57-6	2-Methylnaphthalene	0.058	2.2	0.012	ug/l	J
85-01-8	Phenanthrene	0.077	0.054	0.012	ug/l	
129-00-0	Pyrene	0.059	0.11	0.0092	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	81%		26-121%
321-60-8	2-Fluorobiphenyl	75%		28-107%
1718-51-0	Terphenyl-d14	93%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW10-ROX-070915		
Lab Sample ID:	MC39947-6	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63836.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	37.1 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	103%		60-140%
460-00-4	Bromofluorobenzene (S)	106%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW14-ROX-070915		
Lab Sample ID:	MC39947-7	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92971.D	1	07/22/15	MC	n/a	n/a	MSL4086
Run #2	L92895.D	1	07/21/15	MC	n/a	n/a	MSL4086

	Purge Volume
Run #1	5.0 ml
Run #2	5.0 ml

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND [a]	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND [a]	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND [a]	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	10	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	~~0.81~~ [a] U	5.0	0.19	ug/l	JB U
56-23-5	Carbon tetrachloride	ND [a]	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND [a]	5.0	1.3	ug/l	UJ
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	UJ
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW14-ROX-070915		
Lab Sample ID:	MC39947-7	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND [a]	25	20	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	10	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	~~1.1~~ U	5.0	0.74	ug/l	J U
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW14-ROX-070915		
Lab Sample ID:	MC39947-7	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	118%	119%	72-133%
2037-26-5	Toluene-D8	102%	101%	85-114%
460-00-4	4-Bromofluorobenzene	103%	106%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

(a) Result is from Run# 2

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW14-ROX-070915		
Lab Sample ID:	MC39947-7	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	X06432A.D	1	07/21/15	KD	07/12/15	OP43772	MSX202
Run #2							

	Initial Volume	Final Volume
Run #1	970 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.6	ug/l	UJ
95-57-8	2-Chlorophenol	ND	5.2	0.30	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.29	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.52	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	2.0	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.48	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.42	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.31	ug/l	
108-95-2	Phenol	ND	5.2	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.35	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.31	ug/l	
62-53-3	Aniline	ND	10	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.2	0.84	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.2	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.52	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.2	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.56	ug/l	UJ
111-91-1	bis(2-Chloroethoxy)methane	ND	5.2	0.25	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.2	0.43	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.2	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.2	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.2	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.2	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	0.44	5.2	0.38	ug/l	J
117-84-0	Di-n-octyl phthalate	ND	5.2	0.74	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW14-ROX-070915		
Lab Sample ID:	MC39947-7	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

4.7

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.2	0.58	ug/l	
131-11-3	Dimethyl phthalate	ND	5.2	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	0.51	2.1	0.31	ug/l	J
118-74-1	Hexachlorobenzene	ND	5.2	0.79	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.4	ug/l	UJ
67-72-1	Hexachloroethane	ND	5.2	0.30	ug/l	
78-59-1	Isophorone	ND	5.2	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.2	ug/l	
98-95-3	Nitrobenzene	ND	5.2	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.2	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.2	0.54	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.2	0.80	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	46%		10-80%
4165-62-2	Phenol-d5	37%		10-72%
118-79-6	2,4,6-Tribromophenol	125%		42-134%
4165-60-0	Nitrobenzene-d5	90%		25-117%
321-60-8	2-Fluorobiphenyl	88%		24-112%
1718-51-0	Terphenyl-d14	105%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW14-ROX-070915		
Lab Sample ID:	MC39947-7	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96874.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	970 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.20	0.10	0.0077	ug/l	
208-96-8	Acenaphthylene	0.051	0.10	0.0087	ug/l	J
120-12-7	Anthracene	0.027	0.10	0.010	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.052	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.052	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	0.016	0.10	0.0076	ug/l	J
86-73-7	Fluorene	0.17	0.10	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.021	ug/l	
90-12-0	1-Methylnaphthalene	0.19	2.1	0.013	ug/l	J
91-57-6	2-Methylnaphthalene	0.12	2.1	0.011	ug/l	J
85-01-8	Phenanthrene	0.062	0.052	0.011	ug/l	
129-00-0	Pyrene	0.017	0.10	0.0088	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	89%		26-121%
321-60-8	2-Fluorobiphenyl	77%		28-107%
1718-51-0	Terphenyl-d14	109%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW14-ROX-070915		
Lab Sample ID:	MC39947-7	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63837.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	37.9 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0056	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0056	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	100%		60-140%
460-00-4	Bromofluorobenzene (S)	107%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW9-ROX-070915		
Lab Sample ID:	MC39947-8	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92874.D	1	07/20/15	MC	n/a	n/a	MSL4085
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	UJ
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW9-ROX-070915		
Lab Sample ID:	MC39947-8	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW9-ROX-070915		
Lab Sample ID:	MC39947-8	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	121%		72-133%
2037-26-5	Toluene-D8	101%		85-114%
460-00-4	4-Bromofluorobenzene	104%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
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Report of Analysis

Client Sample ID:	MW9-ROX-070915		
Lab Sample ID:	MC39947-8	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	R44803.D	1	07/22/15	MR	07/12/15	OP43772	MSR1653
Run #2							

	Initial Volume	Final Volume
Run #1	910 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.5	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.40	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.55	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.51	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.45	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.33	ug/l	
108-95-2	Phenol	ND	5.5	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.38	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.5	0.90	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.5	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.56	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.5	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.59	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.5	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.5	0.46	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.5	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.5	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.5	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.5	0.41	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	0.42	5.5	0.41	ug/l	J
117-84-0	Di-n-octyl phthalate	ND	5.5	0.79	ug/l	

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Report of Analysis

Client Sample ID:	MW9-ROX-070915		
Lab Sample ID:	MC39947-8	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.5	0.62	ug/l	
131-11-3	Dimethyl phthalate	ND	5.5	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.5	0.84	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.5	0.32	ug/l	
78-59-1	Isophorone	ND	5.5	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.0	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.5	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.5	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.5	0.57	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.5	0.85	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	48%		10-80%
4165-62-2	Phenol-d5	26%		10-72%
118-79-6	2,4,6-Tribromophenol	98%		42-134%
4165-60-0	Nitrobenzene-d5	71%		25-117%
321-60-8	2-Fluorobiphenyl	78%		24-112%
1718-51-0	Terphenyl-d14	104%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW9-ROX-070915		
Lab Sample ID:	MC39947-8	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96884.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	910 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0082	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0092	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.055	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.055	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0081	ug/l	
86-73-7	Fluorene	ND	0.11	0.017	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	0.073	2.2	0.014	ug/l	J
91-57-6	2-Methylnaphthalene	0.13	2.2	0.012	ug/l	J
85-01-8	Phenanthrene	0.044	0.055	0.012	ug/l	J
129-00-0	Pyrene	ND	0.11	0.0093	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	78%		26-121%
321-60-8	2-Fluorobiphenyl	66%		28-107%
1718-51-0	Terphenyl-d14	94%		29-129%

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW9-ROX-070915		
Lab Sample ID:	MC39947-8	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63838.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	37.1 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	107%		60-140%
460-00-4	Bromofluorobenzene (S)	107%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW16-ROX-070915		
Lab Sample ID:	MC39947-9	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92974.D	1	07/22/15	MC	n/a	n/a	MSL4089
Run #2	L92896.D	1	07/21/15	MC	n/a	n/a	MSL4086

	Purge Volume
Run #1	5.0 ml
Run #2	5.0 ml

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND [a]	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND [a]	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND [a]	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	~~0.30~~ [a] U	5.0	0.19	ug/l	JB U
56-23-5	Carbon tetrachloride	ND [a]	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND [a]	5.0	1.3	ug/l	UJ
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	UJ
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW16-ROX-070915		
Lab Sample ID:	MC39947-9	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND [a]	25	20	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	0.38	1.0	0.25	ug/l	J
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW16-ROX-070915		
Lab Sample ID:	MC39947-9	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	122%	118%	72-133%
2037-26-5	Toluene-D8	103%	101%	85-114%
460-00-4	4-Bromofluorobenzene	104%	105%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

(a) Result is from Run# 2

ND = Not detected MDL = Method Detection Limit
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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW16-ROX-070915		
Lab Sample ID:	MC39947-9	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	R44804.D	1	07/22/15	MR	07/12/15	OP43772	MSR1653
Run #2							

	Initial Volume	Final Volume
Run #1	910 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.5	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.40	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.55	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.51	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.45	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.33	ug/l	
108-95-2	Phenol	ND	5.5	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.38	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.5	0.90	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.5	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.56	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.5	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.59	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.5	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.5	0.46	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.5	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.5	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.5	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.5	0.41	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	0.43	5.5	0.41	ug/l	J
117-84-0	Di-n-octyl phthalate	ND	5.5	0.79	ug/l	

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Report of Analysis

Client Sample ID:	MW16-ROX-070915		
Lab Sample ID:	MC39947-9	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.5	0.62	ug/l	
131-11-3	Dimethyl phthalate	ND	5.5	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.5	0.84	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.5	0.32	ug/l	
78-59-1	Isophorone	ND	5.5	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.0	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.5	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.5	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.5	0.57	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.5	0.85	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	54%		10-80%
4165-62-2	Phenol-d5	31%		10-72%
118-79-6	2,4,6-Tribromophenol	102%		42-134%
4165-60-0	Nitrobenzene-d5	79%		25-117%
321-60-8	2-Fluorobiphenyl	84%		24-112%
1718-51-0	Terphenyl-d14	110%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW16-ROX-070915		
Lab Sample ID:	MC39947-9	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96885.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	910 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.026	0.11	0.0082	ug/l	J
208-96-8	Acenaphthylene	0.020	0.11	0.0092	ug/l	J
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.055	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.055	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0081	ug/l	
86-73-7	Fluorene	0.037	0.11	0.017	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	0.067	2.2	0.014	ug/l	J
91-57-6	2-Methylnaphthalene	0.12	2.2	0.012	ug/l	J
85-01-8	Phenanthrene	0.043	0.055	0.012	ug/l	J
129-00-0	Pyrene	ND	0.11	0.0093	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	80%		26-121%
321-60-8	2-Fluorobiphenyl	72%		28-107%
1718-51-0	Terphenyl-d14	94%		29-129%

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW16-ROX-070915		
Lab Sample ID:	MC39947-9	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63840.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	37.4 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	108%		60-140%
460-00-4	Bromofluorobenzene (S)	118%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW16-ROX-070915-DUP		
Lab Sample ID:	MC39947-10	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92981.D	1	07/22/15	MC	n/a	n/a	MSL4089
Run #2	L92897.D	1	07/21/15	MC	n/a	n/a	MSL4086

	Purge Volume
Run #1	5.0 ml
Run #2	5.0 ml

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND [a]	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND [a]	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND [a]	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND [a]	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND [a]	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND [a]	5.0	1.3	ug/l	UJ
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	UJ
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW16-ROX-070915-DUP		
Lab Sample ID:	MC39947-10	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND [a]	25	20	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	0.40	1.0	0.24	ug/l	J
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	~~4.8~~ U	5.0	0.61	ug/l	J U
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	0.97	1.0	0.47	ug/l	J
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	0.97	1.0	0.22	ug/l	J

ND = Not detected MDL = Method Detection Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW16-ROX-070915-DUP		
Lab Sample ID:	MC39947-10	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	115%	120%	72-133%
2037-26-5	Toluene-D8	99%	100%	85-114%
460-00-4	4-Bromofluorobenzene	104%	104%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

(a) Result is from Run# 2

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW16-ROX-070915-DUP		
Lab Sample ID:	MC39947-10	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	R44805.D	1	07/22/15	MR	07/12/15	OP43772	MSR1653
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.8	ug/l	
95-57-8	2-Chlorophenol	ND	5.6	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.41	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.56	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.8	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.52	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.45	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.8	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.33	ug/l	
108-95-2	Phenol	ND	5.6	0.28	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.38	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.8	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.6	0.91	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.6	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.56	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.6	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.60	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.6	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.6	0.46	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.6	0.27	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.6	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.6	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.7	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.6	0.42	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.6	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.6	0.80	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW16-ROX-070915-DUP		
Lab Sample ID:	MC39947-10	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.6	0.63	ug/l	
131-11-3	Dimethyl phthalate	ND	5.6	0.30	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.6	0.85	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.6	0.32	ug/l	
78-59-1	Isophorone	ND	5.6	0.26	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.1	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.5	ug/l	
98-95-3	Nitrobenzene	ND	5.6	0.29	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.6	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.6	0.58	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.6	0.86	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	43%		10-80%
4165-62-2	Phenol-d5	25%		10-72%
118-79-6	2,4,6-Tribromophenol	93%		42-134%
4165-60-0	Nitrobenzene-d5	68%		25-117%
321-60-8	2-Fluorobiphenyl	76%		24-112%
1718-51-0	Terphenyl-d14	99%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW16-ROX-070915-DUP		
Lab Sample ID:	MC39947-10	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96886.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0083	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0093	ug/l	
120-12-7	Anthracene	0.025	0.11	0.011	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.056	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.056	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.017	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0082	ug/l	
86-73-7	Fluorene	ND	0.11	0.017	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.023	ug/l	
90-12-0	1-Methylnaphthalene	0.047	2.2	0.014	ug/l	J
91-57-6	2-Methylnaphthalene	0.074	2.2	0.012	ug/l	J
85-01-8	Phenanthrene	0.023	0.056	0.012	ug/l	J
129-00-0	Pyrene	ND	0.11	0.0094	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	79%		26-121%
321-60-8	2-Fluorobiphenyl	71%		28-107%
1718-51-0	Terphenyl-d14	87%		29-129%

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Report of Analysis

Client Sample ID:	MW16-ROX-070915-DUP		
Lab Sample ID:	MC39947-10	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63841.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	37.7 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	106%		60-140%
460-00-4	Bromofluorobenzene (S)	112%		60-140%

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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93D-ROX-070915		
Lab Sample ID:	MC39947-11	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92985.D	500	07/22/15	MC	n/a	n/a	MSL4089
Run #2	L92908.D	500	07/21/15	MC	n/a	n/a	MSL4086

	Purge Volume
Run #1	5.0 ml
Run #2	5.0 ml

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	5000	1000	ug/l	UJ
107-02-8	Acrolein	ND [a]	13000	5500	ug/l	UJ
107-13-1	Acrylonitrile	ND	2500	1100	ug/l	
71-43-2	Benzene	21200 [a]	250	140	ug/l	
108-86-1	Bromobenzene	ND	2500	130	ug/l	
74-97-5	Bromochloromethane	ND	2500	180	ug/l	
75-27-4	Bromodichloromethane	ND	500	89	ug/l	
75-25-2	Bromoform	ND	500	200	ug/l	
74-83-9	Bromomethane	ND [a]	1000	390	ug/l	
78-93-3	2-Butanone (MEK)	ND	2500	1500	ug/l	UJ
104-51-8	n-Butylbenzene	ND	2500	250	ug/l	
135-98-8	sec-Butylbenzene	ND	2500	250	ug/l	
98-06-6	tert-Butylbenzene	ND	2500	290	ug/l	
75-15-0	Carbon disulfide	ND [a]	2500	93	ug/l	
56-23-5	Carbon tetrachloride	ND [a]	500	170	ug/l	
108-90-7	Chlorobenzene	ND	500	120	ug/l	
75-00-3	Chloroethane	ND	1000	250	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND [a]	2500	630	ug/l	UJ
67-66-3	Chloroform	ND	500	200	ug/l	
74-87-3	Chloromethane	ND	1000	240	ug/l	
95-49-8	o-Chlorotoluene	ND	2500	300	ug/l	
106-43-4	p-Chlorotoluene	ND	2500	230	ug/l	
124-48-1	Dibromochloromethane	ND	500	110	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	500	120	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	500	120	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	500	190	ug/l	
75-71-8	Dichlorodifluoromethane	ND	1000	270	ug/l	
75-34-3	1,1-Dichloroethane	ND	500	140	ug/l	
107-06-2	1,2-Dichloroethane	ND	500	150	ug/l	
75-35-4	1,1-Dichloroethene	ND	500	140	ug/l	UJ
156-59-2	cis-1,2-Dichloroethene	ND	500	160	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	500	240	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93D-ROX-070915		
Lab Sample ID:	MC39947-11	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	1000	110	ug/l	
142-28-9	1,3-Dichloropropane	ND	2500	140	ug/l	
594-20-7	2,2-Dichloropropane	ND	2500	840	ug/l	
563-58-6	1,1-Dichloropropene	ND	2500	120	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	250	130	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	250	220	ug/l	
123-91-1	1,4-Dioxane	ND [a]	13000	10000	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	2500	250	ug/l	
100-41-4	Ethylbenzene	ND	500	120	ug/l	
87-68-3	Hexachlorobutadiene	ND	2500	230	ug/l	
591-78-6	2-Hexanone	ND	2500	1300	ug/l	
98-82-8	Isopropylbenzene	ND	2500	130	ug/l	
99-87-6	p-Isopropyltoluene	ND	2500	160	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	500	170	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	2500	380	ug/l	
74-95-3	Methylene bromide	ND	2500	150	ug/l	
75-09-2	Methylene chloride	ND	1000	130	ug/l	
91-20-3	Naphthalene	ND	2500	300	ug/l	
103-65-1	n-Propylbenzene	ND	2500	150	ug/l	
100-42-5	Styrene	ND	2500	140	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	500	120	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	250	150	ug/l	
127-18-4	Tetrachloroethene	ND	500	100	ug/l	
108-88-3	Toluene	ND	500	150	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	2500	390	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	2500	370	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	500	210	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	500	160	ug/l	
79-01-6	Trichloroethene	ND	500	120	ug/l	
75-69-4	Trichlorofluoromethane	ND	500	240	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	2500	200	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	2500	140	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	2500	100	ug/l	
108-05-4	Vinyl Acetate	ND	2500	720	ug/l	
75-01-4	Vinyl chloride	ND	500	230	ug/l	
	m,p-Xylene	ND	500	230	ug/l	
95-47-6	o-Xylene	ND	500	110	ug/l	
1330-20-7	Xylene (total)	ND	500	110	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93D-ROX-070915		
Lab Sample ID:	MC39947-11	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	124%	126%	72-133%
2037-26-5	Toluene-D8	98%	99%	85-114%
460-00-4	4-Bromofluorobenzene	102%	107%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

(a) Result is from Run# 2

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93D-ROX-070915		
Lab Sample ID:	MC39947-11	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	R44806.D	1	07/22/15	MR	07/12/15	OP43772	MSR1653
Run #2							

	Initial Volume	Final Volume
Run #1	990 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.5	ug/l	
95-57-8	2-Chlorophenol	ND	5.1	0.29	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.37	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.29	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.51	ug/l	
51-28-5	2,4-Dinitrophenol	ND	20	2.5	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	1.9	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.47	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.41	ug/l	
100-02-7	4-Nitrophenol	ND	20	2.5	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.30	ug/l	
108-95-2	Phenol	27.8	5.1	0.25	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.35	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.30	ug/l	
62-53-3	Aniline	ND	10	2.5	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.1	0.83	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.1	0.21	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.51	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.1	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.54	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.1	0.25	ug/l	
111-44-4	bis(2-Chloroethyl)ether	4.3	5.1	0.42	ug/l	J
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.1	0.24	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.1	0.21	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.1	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.1	0.38	ug/l	
132-64-9	Dibenzofuran	ND	2.0	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.1	0.38	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.1	0.73	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93D-ROX-070915		
Lab Sample ID:	MC39947-11	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.1	0.57	ug/l	
131-11-3	Dimethyl phthalate	ND	5.1	0.27	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.0	0.30	ug/l	
118-74-1	Hexachlorobenzene	ND	5.1	0.78	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.3	ug/l	
67-72-1	Hexachloroethane	ND	5.1	0.29	ug/l	
78-59-1	Isophorone	ND	5.1	0.23	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.7	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.2	ug/l	
98-95-3	Nitrobenzene	ND	5.1	0.26	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.1	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.1	0.52	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.1	0.78	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	50%		10-80%
4165-62-2	Phenol-d5	23%		10-72%
118-79-6	2,4,6-Tribromophenol	106%		42-134%
4165-60-0	Nitrobenzene-d5	80%		25-117%
321-60-8	2-Fluorobiphenyl	83%		24-112%
1718-51-0	Terphenyl-d14	112%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93D-ROX-070915		
Lab Sample ID:	MC39947-11	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96887.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	990 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.10	0.0076	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0085	ug/l	
120-12-7	Anthracene	0.018	0.10	0.0099	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.051	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.015	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.051	0.019	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	0.016	0.10	0.013	ug/l	J
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	0.025	0.10	0.0075	ug/l	J
86-73-7	Fluorene	0.019	0.10	0.015	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.021	ug/l	
90-12-0	1-Methylnaphthalene	0.026	2.0	0.012	ug/l	J
91-57-6	2-Methylnaphthalene	0.038	2.0	0.011	ug/l	J
85-01-8	Phenanthrene	0.043	0.051	0.011	ug/l	J
129-00-0	Pyrene	0.026	0.10	0.0086	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	87%		26-121%
321-60-8	2-Fluorobiphenyl	72%		28-107%
1718-51-0	Terphenyl-d14	95%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93D-ROX-070915		
Lab Sample ID:	MC39947-11	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63842.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	37.4 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	103%		60-140%
460-00-4	Bromofluorobenzene (S)	119%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW24-ROX-070915		
Lab Sample ID:	MC39947-12	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92983.D	1	07/22/15	MC	n/a	n/a	MSL4089
Run #2	L92898.D	1	07/21/15	MC	n/a	n/a	MSL4086

	Purge Volume
Run #1	5.0 ml
Run #2	5.0 ml

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND [a]	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND [a]	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND [a]	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	~~0.19 [a]~~ U	5.0	0.19	ug/l	JB U
56-23-5	Carbon tetrachloride	ND [a]	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND [a]	5.0	1.3	ug/l	UJ
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	UJ
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW24-ROX-070915		
Lab Sample ID:	MC39947-12	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND [a]	25	20	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW24-ROX-070915		
Lab Sample ID:	MC39947-12	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	126%	121%	72-133%
2037-26-5	Toluene-D8	102%	101%	85-114%
460-00-4	4-Bromofluorobenzene	105%	103%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

(a) Result is from Run# 2

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW24-ROX-070915		
Lab Sample ID:	MC39947-12	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	R44807.D	1	07/22/15	MR	07/12/15	OP43772	MSR1653
Run #2							

	Initial Volume	Final Volume
Run #1	970 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.2	0.30	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.29	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.52	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	2.0	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.48	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.42	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.31	ug/l	
108-95-2	Phenol	ND	5.2	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.35	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.31	ug/l	
62-53-3	Aniline	ND	10	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.2	0.84	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.2	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.52	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.2	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.56	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.2	0.25	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.2	0.43	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.2	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.2	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.2	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.2	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.2	0.38	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.2	0.74	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW24-ROX-070915		
Lab Sample ID:	MC39947-12	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.2	0.58	ug/l	
131-11-3	Dimethyl phthalate	ND	5.2	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.2	0.79	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.2	0.30	ug/l	
78-59-1	Isophorone	ND	5.2	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.2	ug/l	
98-95-3	Nitrobenzene	ND	5.2	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.2	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.2	0.54	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.2	0.80	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	45%		10-80%
4165-62-2	Phenol-d5	26%		10-72%
118-79-6	2,4,6-Tribromophenol	98%		42-134%
4165-60-0	Nitrobenzene-d5	73%		25-117%
321-60-8	2-Fluorobiphenyl	76%		24-112%
1718-51-0	Terphenyl-d14	105%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW24-ROX-070915		
Lab Sample ID:	MC39947-12	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96888.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	970 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.10	0.0077	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0087	ug/l	
120-12-7	Anthracene	0.044	0.10	0.010	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.052	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.052	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0076	ug/l	
86-73-7	Fluorene	ND	0.10	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.021	ug/l	
90-12-0	1-Methylnaphthalene	0.049	2.1	0.013	ug/l	J
91-57-6	2-Methylnaphthalene	0.081	2.1	0.011	ug/l	J
85-01-8	Phenanthrene	0.041	0.052	0.011	ug/l	J
129-00-0	Pyrene	ND	0.10	0.0088	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	81%		26-121%
321-60-8	2-Fluorobiphenyl	69%		28-107%
1718-51-0	Terphenyl-d14	94%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW24-ROX-070915		
Lab Sample ID:	MC39947-12	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63843.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	37.3 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	100%		60-140%
460-00-4	Bromofluorobenzene (S)	111%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915		
Lab Sample ID:	MC39947-13	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92937.D	5000	07/21/15	MC	n/a	n/a	MSL4087
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	50000	10000	ug/l	UJ
107-02-8	Acrolein	ND	130000	55000	ug/l	UJ
107-13-1	Acrylonitrile	ND	25000	11000	ug/l	
71-43-2	Benzene	497000	2500	1400	ug/l	J
108-86-1	Bromobenzene	ND	25000	1300	ug/l	
74-97-5	Bromochloromethane	ND	25000	1800	ug/l	
75-27-4	Bromodichloromethane	ND	5000	890	ug/l	
75-25-2	Bromoform	ND	5000	2000	ug/l	
74-83-9	Bromomethane	ND	10000	3900	ug/l	
78-93-3	2-Butanone (MEK)	ND	25000	15000	ug/l	UJ
104-51-8	n-Butylbenzene	ND	25000	2500	ug/l	
135-98-8	sec-Butylbenzene	ND	25000	2500	ug/l	
98-06-6	tert-Butylbenzene	ND	25000	2900	ug/l	
75-15-0	Carbon disulfide	ND	25000	930	ug/l	
56-23-5	Carbon tetrachloride	ND	5000	1700	ug/l	
108-90-7	Chlorobenzene	ND	5000	1200	ug/l	
75-00-3	Chloroethane	ND	10000	2500	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	25000	6300	ug/l	UJ
67-66-3	Chloroform	ND	5000	2000	ug/l	
74-87-3	Chloromethane	ND	10000	2400	ug/l	
95-49-8	o-Chlorotoluene	ND	25000	3000	ug/l	
106-43-4	p-Chlorotoluene	ND	25000	2300	ug/l	
124-48-1	Dibromochloromethane	ND	5000	1100	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	5000	1200	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	5000	1200	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	5000	1900	ug/l	
75-71-8	Dichlorodifluoromethane	ND	10000	2700	ug/l	
75-34-3	1,1-Dichloroethane	ND	5000	1400	ug/l	
107-06-2	1,2-Dichloroethane	ND	5000	1500	ug/l	
75-35-4	1,1-Dichloroethene	ND	5000	1400	ug/l	UJ
156-59-2	cis-1,2-Dichloroethene	ND	5000	1600	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	5000	2400	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915		
Lab Sample ID:	MC39947-13	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	10000	1100	ug/l	
142-28-9	1,3-Dichloropropane	ND	25000	1400	ug/l	
594-20-7	2,2-Dichloropropane	ND	25000	8400	ug/l	
563-58-6	1,1-Dichloropropene	ND	25000	1200	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	2500	1300	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	2500	2200	ug/l	
123-91-1	1,4-Dioxane	ND	130000	100000	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	25000	2500	ug/l	
100-41-4	Ethylbenzene	ND	5000	1200	ug/l	
87-68-3	Hexachlorobutadiene	ND	25000	2300	ug/l	
591-78-6	2-Hexanone	ND	25000	13000	ug/l	
98-82-8	Isopropylbenzene	ND	25000	1300	ug/l	
99-87-6	p-Isopropyltoluene	ND	25000	1600	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	5000	1700	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	25000	3800	ug/l	
74-95-3	Methylene bromide	ND	25000	1500	ug/l	
75-09-2	Methylene chloride	ND	10000	1300	ug/l	
91-20-3	Naphthalene	ND	25000	3000	ug/l	
103-65-1	n-Propylbenzene	ND	25000	1500	ug/l	
100-42-5	Styrene	ND	25000	1400	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	5000	1200	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	2500	1500	ug/l	
127-18-4	Tetrachloroethene	ND	5000	1000	ug/l	
108-88-3	Toluene	ND	5000	1500	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	25000	3900	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	25000	3700	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	5000	2100	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	5000	1600	ug/l	
79-01-6	Trichloroethene	ND	5000	1200	ug/l	
75-69-4	Trichlorofluoromethane	ND	5000	2400	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	25000	2000	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	25000	1400	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	25000	1000	ug/l	
108-05-4	Vinyl Acetate	ND	25000	7200	ug/l	
75-01-4	Vinyl chloride	ND	5000	2300	ug/l	
	m,p-Xylene	ND	5000	2300	ug/l	
95-47-6	o-Xylene	ND	5000	1100	ug/l	
1330-20-7	Xylene (total)	ND	5000	1100	ug/l	

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RL = Reporting Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915		
Lab Sample ID:	MC39947-13	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	119%		72-133%
2037-26-5	Toluene-D8	97%		85-114%
460-00-4	4-Bromofluorobenzene	103%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915		
Lab Sample ID:	MC39947-13	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	R44808.D	1	07/22/15	MR	07/12/15	OP43772	MSR1653
Run #2							

	Initial Volume	Final Volume
Run #1	980 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.1	0.30	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.37	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.29	ug/l	
105-67-9	2,4-Dimethylphenol	0.90	10	0.51	ug/l	J
51-28-5	2,4-Dinitrophenol	ND	20	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	2.0	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.48	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.41	ug/l	
100-02-7	4-Nitrophenol	ND	20	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.30	ug/l	
108-95-2	Phenol	101	5.1	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.35	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.31	ug/l	
62-53-3	Aniline	ND	10	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.1	0.83	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.1	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.52	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.1	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.55	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.1	0.25	ug/l	
111-44-4	bis(2-Chloroethyl)ether	15.3	5.1	0.43	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.1	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.1	0.21	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.1	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.1	0.38	ug/l	
132-64-9	Dibenzofuran	ND	2.0	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.1	0.38	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.1	0.73	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915		
Lab Sample ID:	MC39947-13	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.1	0.58	ug/l	
131-11-3	Dimethyl phthalate	ND	5.1	0.27	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.0	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.1	0.78	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.1	0.29	ug/l	
78-59-1	Isophorone	ND	5.1	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.7	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.2	ug/l	
98-95-3	Nitrobenzene	ND	5.1	0.26	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.1	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.1	0.53	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.1	0.79	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	50%		10-80%
4165-62-2	Phenol-d5	29%		10-72%
118-79-6	2,4,6-Tribromophenol	104%		42-134%
4165-60-0	Nitrobenzene-d5	80%		25-117%
321-60-8	2-Fluorobiphenyl	87%		24-112%
1718-51-0	Terphenyl-d14	108%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915		
Lab Sample ID:	MC39947-13	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96889.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	980 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.10	0.0077	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0086	ug/l	
120-12-7	Anthracene	0.029	0.10	0.010	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.051	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.051	0.019	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	0.017	0.10	0.013	ug/l	J
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	0.035	0.10	0.0076	ug/l	J
86-73-7	Fluorene	0.031	0.10	0.015	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.021	ug/l	
90-12-0	1-Methylnaphthalene	0.041	2.0	0.013	ug/l	J
91-57-6	2-Methylnaphthalene	0.059	2.0	0.011	ug/l	J
85-01-8	Phenanthrene	0.054	0.051	0.011	ug/l	J
129-00-0	Pyrene	0.025	0.10	0.0087	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	81%		26-121%
321-60-8	2-Fluorobiphenyl	76%		28-107%
1718-51-0	Terphenyl-d14	99%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915		
Lab Sample ID:	MC39947-13	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63844.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	37.0 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	101%		60-140%
460-00-4	Bromofluorobenzene (S)	133%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915-DUP		
Lab Sample ID:	MC39947-14	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92984.D	2000	07/22/15	MC	n/a	n/a	MSL4089
Run #2	L92910.D	2000	07/21/15	MC	n/a	n/a	MSL4086

	Purge Volume
Run #1	5.0 ml
Run #2	5.0 ml

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	20000	4100	ug/l	UJ
107-02-8	Acrolein	ND [a]	50000	22000	ug/l	UJ
107-13-1	Acrylonitrile	ND	10000	4500	ug/l	
71-43-2	Benzene	371000 [a]	1000	540	ug/l	J
108-86-1	Bromobenzene	ND	10000	520	ug/l	
74-97-5	Bromochloromethane	ND	10000	730	ug/l	
75-27-4	Bromodichloromethane	ND	2000	360	ug/l	
75-25-2	Bromoform	ND	2000	790	ug/l	
74-83-9	Bromomethane	ND [a]	4000	1600	ug/l	
78-93-3	2-Butanone (MEK)	ND	10000	5900	ug/l	UJ
104-51-8	n-Butylbenzene	ND	10000	990	ug/l	
135-98-8	sec-Butylbenzene	ND	10000	1000	ug/l	
98-06-6	tert-Butylbenzene	ND	10000	1100	ug/l	
75-15-0	Carbon disulfide	ND [a]	10000	370	ug/l	
56-23-5	Carbon tetrachloride	ND [a]	2000	680	ug/l	
108-90-7	Chlorobenzene	ND	2000	470	ug/l	
75-00-3	Chloroethane	ND	4000	980	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND [a]	10000	2500	ug/l	UJ
67-66-3	Chloroform	ND	2000	810	ug/l	
74-87-3	Chloromethane	ND	4000	970	ug/l	
95-49-8	o-Chlorotoluene	ND	10000	1200	ug/l	
106-43-4	p-Chlorotoluene	ND	10000	920	ug/l	
124-48-1	Dibromochloromethane	ND	2000	450	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	2000	490	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	2000	480	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	2000	750	ug/l	
75-71-8	Dichlorodifluoromethane	ND	4000	1100	ug/l	
75-34-3	1,1-Dichloroethane	ND	2000	570	ug/l	
107-06-2	1,2-Dichloroethane	ND	2000	620	ug/l	
75-35-4	1,1-Dichloroethene	ND	2000	570	ug/l	UJ
156-59-2	cis-1,2-Dichloroethene	ND	2000	620	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	2000	960	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915-DUP		
Lab Sample ID:	MC39947-14	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	4000	430	ug/l	
142-28-9	1,3-Dichloropropane	ND	10000	580	ug/l	
594-20-7	2,2-Dichloropropane	ND	10000	3400	ug/l	
563-58-6	1,1-Dichloropropene	ND	10000	470	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1000	540	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1000	870	ug/l	
123-91-1	1,4-Dioxane	ND [a]	50000	40000	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	10000	1000	ug/l	
100-41-4	Ethylbenzene	ND	2000	480	ug/l	
87-68-3	Hexachlorobutadiene	ND	10000	900	ug/l	
591-78-6	2-Hexanone	ND	10000	5400	ug/l	
98-82-8	Isopropylbenzene	ND	10000	530	ug/l	
99-87-6	p-Isopropyltoluene	ND	10000	630	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	2000	700	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	10000	1500	ug/l	
74-95-3	Methylene bromide	ND	10000	590	ug/l	
75-09-2	Methylene chloride	ND	4000	540	ug/l	
91-20-3	Naphthalene	7010	10000	1200	ug/l	J
103-65-1	n-Propylbenzene	ND	10000	580	ug/l	
100-42-5	Styrene	ND	10000	560	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	2000	500	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1000	580	ug/l	
127-18-4	Tetrachloroethene	ND	2000	410	ug/l	
108-88-3	Toluene	ND	2000	590	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	10000	1600	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	10000	1500	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	2000	840	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	2000	650	ug/l	
79-01-6	Trichloroethene	ND	2000	500	ug/l	
75-69-4	Trichlorofluoromethane	ND	2000	940	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	10000	790	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	10000	570	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	10000	400	ug/l	
108-05-4	Vinyl Acetate	ND	10000	2900	ug/l	
75-01-4	Vinyl chloride	ND	2000	900	ug/l	
	m,p-Xylene	ND	2000	930	ug/l	
95-47-6	o-Xylene	ND	2000	430	ug/l	
1330-20-7	Xylene (total)	ND	2000	430	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915-DUP		
Lab Sample ID:	MC39947-14	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	125%	125%	72-133%
2037-26-5	Toluene-D8	96%	96%	85-114%
460-00-4	4-Bromofluorobenzene	106%	108%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

(a) Result is from Run# 2

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915-DUP		
Lab Sample ID:	MC39947-14	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	R44810.D	1	07/22/15	MR	07/12/15	OP43772	MSR1653
Run #2							

	Initial Volume	Final Volume
Run #1	980 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.1	0.30	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.37	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.29	ug/l	
105-67-9	2,4-Dimethylphenol	0.82	10	0.51	ug/l	J
51-28-5	2,4-Dinitrophenol	ND	20	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	2.0	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.48	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.41	ug/l	
100-02-7	4-Nitrophenol	ND	20	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.30	ug/l	
108-95-2	Phenol	90.9	5.1	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.35	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.31	ug/l	
62-53-3	Aniline	ND	10	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.1	0.83	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.1	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.52	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.1	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.55	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.1	0.25	ug/l	
111-44-4	bis(2-Chloroethyl)ether	14.2	5.1	0.43	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.1	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.1	0.21	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.1	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.1	0.38	ug/l	
132-64-9	Dibenzofuran	ND	2.0	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.1	0.38	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.1	0.73	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915-DUP		
Lab Sample ID:	MC39947-14	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.1	0.58	ug/l	
131-11-3	Dimethyl phthalate	ND	5.1	0.27	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.0	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.1	0.78	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.1	0.29	ug/l	
78-59-1	Isophorone	ND	5.1	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.7	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.2	ug/l	
98-95-3	Nitrobenzene	ND	5.1	0.26	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.1	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.1	0.53	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.1	0.79	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	49%		10-80%
4165-62-2	Phenol-d5	29%		10-72%
118-79-6	2,4,6-Tribromophenol	110%		42-134%
4165-60-0	Nitrobenzene-d5	77%		25-117%
321-60-8	2-Fluorobiphenyl	86%		24-112%
1718-51-0	Terphenyl-d14	106%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915-DUP		
Lab Sample ID:	MC39947-14	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96890.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	980 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.062	0.10	0.0077	ug/l	J
208-96-8	Acenaphthylene	0.040	0.10	0.0086	ug/l	J
120-12-7	Anthracene	0.041	0.10	0.010	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.051	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.051	0.019	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	0.016	0.10	0.013	ug/l	J
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	0.029	0.10	0.0076	ug/l	J
86-73-7	Fluorene	0.095	0.10	0.015	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.021	ug/l	
90-12-0	1-Methylnaphthalene	0.058	2.0	0.013	ug/l	J
91-57-6	2-Methylnaphthalene	0.077	2.0	0.011	ug/l	J
85-01-8	Phenanthrene	0.31	0.051	0.011	ug/l	J
129-00-0	Pyrene	ND	0.10	0.0087	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	77%		26-121%
321-60-8	2-Fluorobiphenyl	77%		28-107%
1718-51-0	Terphenyl-d14	100%		29-129%

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93B-ROX-070915-DUP		
Lab Sample ID:	MC39947-14	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63845.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	37.2 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	104%		60-140%
460-00-4	Bromofluorobenzene (S)	138%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P54-ROX-070915		
Lab Sample ID:	MC39947-15	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92982.D	1	07/22/15	MC	n/a	n/a	MSL4089
Run #2	L92899.D	1	07/21/15	MC	n/a	n/a	MSL4086

	Purge Volume
Run #1	5.0 ml
Run #2	5.0 ml

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	UJ
107-02-8	Acrolein	ND [a]	25	11	ug/l	UJ
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND [a]	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND [a]	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	UJ
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND [a]	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND [a]	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND [a]	5.0	1.3	ug/l	UJ
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	UJ
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P54-ROX-070915		
Lab Sample ID:	MC39947-15	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND [a]	25	20	ug/l	UJ
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	~~3.7~~ U	5.0	0.61	ug/l	J U
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	~~0.92~~ U	5.0	0.74	ug/l	J U
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	0.28	1.0	0.22	ug/l	J

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P54-ROX-070915		
Lab Sample ID:	MC39947-15	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	122%	124%	72-133%
2037-26-5	Toluene-D8	101%	102%	85-114%
460-00-4	4-Bromofluorobenzene	104%	106%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

(a) Result is from Run# 2

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P54-ROX-070915		
Lab Sample ID:	MC39947-15	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	R44811.D	1	07/22/15	MR	07/12/15	OP43772	MSR1653
Run #2							

	Initial Volume	Final Volume
Run #1	960 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.2	0.30	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.29	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.52	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	2.0	ug/l	
95-48-7	2-Methylphenol	ND	10	0.22	ug/l	
	3&4-Methylphenol	ND	10	0.49	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.42	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.31	ug/l	
108-95-2	Phenol	ND	5.2	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.31	ug/l	
62-53-3	Aniline	ND	10	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.2	0.85	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.2	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.2	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.56	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.2	0.25	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.2	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.2	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.2	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.2	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.2	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.2	0.39	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.2	0.75	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P54-ROX-070915		
Lab Sample ID:	MC39947-15	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.2	0.59	ug/l	
131-11-3	Dimethyl phthalate	ND	5.2	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.2	0.80	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.2	0.30	ug/l	
78-59-1	Isophorone	ND	5.2	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.2	ug/l	
98-95-3	Nitrobenzene	ND	5.2	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.2	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.2	0.54	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.2	0.81	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	38%		10-80%
4165-62-2	Phenol-d5	24%		10-72%
118-79-6	2,4,6-Tribromophenol	83%		42-134%
4165-60-0	Nitrobenzene-d5	71%		25-117%
321-60-8	2-Fluorobiphenyl	82%		24-112%
1718-51-0	Terphenyl-d14	102%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P54-ROX-070915		
Lab Sample ID:	MC39947-15	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96891.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
Run #2							

	Initial Volume	Final Volume
Run #1	960 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.10	0.0078	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0088	ug/l	
120-12-7	Anthracene	ND	0.10	0.010	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.052	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.052	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0077	ug/l	
86-73-7	Fluorene	0.019	0.10	0.016	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.021	ug/l	
90-12-0	1-Methylnaphthalene	0.089	2.1	0.013	ug/l	J
91-57-6	2-Methylnaphthalene	0.15	2.1	0.011	ug/l	J
85-01-8	Phenanthrene	0.041	0.052	0.011	ug/l	J
129-00-0	Pyrene	ND	0.10	0.0089	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	88%		26-121%
321-60-8	2-Fluorobiphenyl	87%		28-107%
1718-51-0	Terphenyl-d14	76%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P54-ROX-070915		
Lab Sample ID:	MC39947-15	Date Sampled:	07/09/15
Matrix:	AQ - Ground Water	Date Received:	07/10/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63846.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
Run #2							

	Initial Volume	Final Volume
Run #1	36.9 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	98%		60-140%
460-00-4	Bromofluorobenzene (S)	98%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

New England ACCUTEST LABORATORIES

Custody Documents and Other Forms

Includes the following where applicable:

- Chain of Custody
- Sample Tracking Chronicle
- Internal Chain of Custody

LAB (LOCATION)

☐ XENCO (_____)

☐ CALSCIENCE (_____)

☑ OTHER ☐ Lab vendor # (Accutest Labs; 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200))

☐ SPL (_____)

Lab Vendor #

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:

☑ ENV. SERVICES ☐ MOTIVA RETAIL ☐ SHELL RETAIL

☐ MOTIVA SC/BCM ☐ CONSULTANT ☐ LUBES

☐ SHELL PIPELINE ☐ OTHER

Print Bill To Contact Name: Bob Billman

PO #

INCIDENT # (ENV SERVICES): 9 7 2 1 6 6 4 0

SAP #: 3 4 0 0 6 1

☐ CHECK IF NO INCIDENT # APPLIES

DATE: 9 July 2015

PAGE: 1 of 2

COMPANY: AECOM

LOG CODE

SITE ADDRESS: Street and City: 900 South Central Ave; ROXANA

State: IL

GLOBAL ID NO.

ADDRESS: 1001 HIGHLANDS PLAZA DRIVE WEST - SUITE 300; ST. LOUIS, MO 63110

EDF DELIVERABLE TO (Name, Company, Office Location)

PHONE NO

E-MAIL

CONSULTANT PROJECT NO: Roxana Quarterly GW / 60400249-21563720.03003

PROJECT CONTACT (Hardcopy or PDF Report to): Elizabeth Kunkel, Bob Billman, Lindsay Rathnow

TELEPHONE: 314-429-0100

FAX: 314-429-0462

Bill To Contact E-MAIL: bob.billman@aecom.com; elizabeth.kunkel@aecom.com; lindsay.rathnow@aecom.com

SAMPLER NAME(S) Print: S. Fisher, C. Williams, E. Schumacher, D. Haxel

LAB USE ONLY: MC39947

TURNAROUND TIME (CALENDAR DAYS)

☑ STANDARD (10 DAY) ☐ 5 DAYS ☐ 3 DAYS ☐ 2 DAYS ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

DELIVERABLES: ☐ LEVEL 1 ☑ LEVEL 2 ☐ LEVEL 3 ☑ LEVEL 4 ☑ OTHER (SPECIFY) EDD

TEMPERATURE ON RECEIPT C°: Cooler #1 | Cooler #2 | Cooler #3

SPECIAL INSTRUCTIONS OR NOTES:
* Please include "J" values on Reports.
* Please provide sample receipt upon login.

☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMBURSEMENT RATE APPLIES
☐ EDD NOT NEEDED
☑ RECEIPT VERIFICATION REQUESTED
☐ PROVIDE LEDD DISK

REQUESTED ANALYSIS

FIELD NOTES:

TEMPERATURE ON RECEIPT C°

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
-1	TB-ROX-070915-HCL-A	7/9/15	0000	Water	2					2	X				0.0
-2	TB-ROX-070915-HCL-B		↓		2					2	X				
-3	TB-ROX-070915-ST-A								2	2		X			
-4	TB-ROX-070915-ST-B								2	2		X			
-5	MW11-ROX-070915		0915		2			2	2	6	X	X	X	X	
-6	MW10-ROX-070915		1015		2			2	2	6	X	X	X	X	
-7	MW14-ROX-070915		1030		2			2	2	6	X	X	X	X	
-7MS	MW14-ROX-070915-MS		↓		2			2	2	6	X	X	X	X	
-7SD	MW14-ROX-070915-MSD		↓		2			2	2	6	X	X	X	X	
-8	MW9-ROX-070915	↓	1105	↓	2			2	2	6	X	X	X	X	↓

Relinquished by: (Signature)	Received by: (Signature)	Date	Time
[signature]	FED EX # 8066 2853 5121	9 July 2015	
FX	[signature]	7/10/15	10:00

Custody seals: 07/09/2015 -01A -02A -03A -04A -01B -02B -03B -04B

1.4°, 0.1°, 1.2°, 1.1°

05/2008 Revision

MC39947: Chain of Custody
Page 1 of 3

LAB (LOCATION)

☐ XENCO (_____)

☐ CALSCIENCE (_____)

☑ OTHER Accutest Labs; 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200)

☐ SPL ☐ Lab Vendor # (_____)

Lab Vendor #

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:

☑ ENV. SERVICES ☐ MOTIVA RETAIL ☐ SHELL RETAIL

☐ MOTIVA SD&CM ☐ CONSULTANT ☐ LUBES

☐ SHELL PIPELINE ☐ OTHER _____

Print Bill To Contact Name: Bob Billman

PO #

INCIDENT # (ENV SERVICES): 9 7 2 1 5 6 4 0

SAP #: 3 4 0 0 6 1

☐ CHECK IF NO INCIDENT # APPLIES

DATE: 9 July 2015

PAGE: 2 of 2

SAMPLING COMPANY: AECOM

LOG CODE:

SITE ADDRESS: Street and City: 900 South Central Ave; ROXANA

State: IL

GLOBAL ID NO:

ADDRESS: 1001 HIGHLANDS PLAZA DRIVE WEST - SUITE 300; ST. LOUIS, MO 63110

EDF DELIVERABLE TO (Name, Company, Office Location):

PHONE NO:

E-MAIL:

CONSULTANT PROJECT NO: Roxana Quarterly GW / 60400249-21563720.03003

PROJECT CONTACT (Hard Copy or PDF Report to): Elizabeth Kunkel, Bob Billman, Lindsay Rathnow

SAMPLER NAME(S) (Print): E. Schumacher, C. Williams, S. Fisher, D. Haxel

LAB USE ONLY: MC39947

TELEPHONE: 314-429-0100

FAX: 314-429-0462

Bill To Contact E-MAIL: bob.billman@aecom.com; elizabeth.kunkel@aecom.com; lindsay.rathnow@aecom.com

TURNAROUND TIME (CALENDAR DAYS): ☑ STANDARD (10 DAY) ☐ 5 DAYS ☐ 3 DAYS ☐ 2 DAYS ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

DELIVERABLES: ☐ LEVEL 1 ☑ LEVEL 2 ☐ LEVEL 3 ☑ LEVEL 4 ☑ OTHER (SPECIFY) EDD

TEMPERATURE ON RECEIPT C°: Cooler #1 | Cooler #2 | Cooler #3

SPECIAL INSTRUCTIONS OR NOTES:
* Please include "J" values on Reports.
* Please provide sample receipt upon login.

☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMBURSEMENT RATE APPLIES
☐ EDD NOT NEEDED
☑ RECEIPT VERIFICATION REQUESTED
☐ PROVIDE EDD DISK

REQUESTED ANALYSIS

FIELD NOTES:

TEMPERATURE ON RECEIPT C°

Container PID Readings or Laboratory Notes

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
-9	MW16-ROX-070915	7/9/15	1320	Water	2			2	2	6	X	X	X	X	0.0
-10	MW16-ROX-070915-DUP		"		2			2	2	6	X	X	X	X	
-11	P93D-ROX-070915		1400		2			2	2	6	X	X	X	X	
-12	MW24-ROX-070915		1420		2			2	2	6	X	X	X	X	
-13	P93B-ROX-070915		1440		2			2	2	6	X	X	X	X	
-14	P93B-ROX-070915-DUP		"		2			2	2	6	X	X	X	X	
-15	P54-ROX-070915		1510		2			2	2	6	X	X	X	X	

9 July 2015

Relinquished by: (Signature)	Received by: (Signature)	Date	Time
	FED EX # 8066 2852 5121	9 July 2015	
FX		7/10/15	10:00
Relinquished by: (Signature)	Received by: (Signature)	Date	Time

05-2.06 Revision

MC39947: Chain of Custody
Page 2 of 3

Accutest Laboratories Sample Receipt Summary

Accutest Job Number: MC39947 **Client:** AECOM **Project:** 900 SOUTH CENTRAL AVE

Date / Time Received: 7/10/2015 10:00:00 AM **Delivery Method:** **Airbill #'s:**

Cooler Temps (Initial/Adjusted): #1: (1.2/1.2); #2: (1.4/1.4); #3: (0.1/0.1);

Cooler Security	Y	or	N		Y	or	N
1. Custody Seals Present:	☑		☐	3. COC Present:	☑		☐
2. Custody Seals Intact:	☑		☐	4. Smpl Dates/Time OK	☑		☐

Cooler Temperature	Y	or	N
1. Temp criteria achieved:	☑		☐
2. Thermometer ID:	G1;		
3. Cooler media:	Ice (Bag)		
4. No. Coolers:	3		

Quality Control Preservation	Y	or	N	N/A
1. Trip Blank present / cooler:	☑		☐	☐
2. Trip Blank listed on COC:	☑		☐	☐
3. Samples preserved properly:	☑		☐	
4. VOCs headspace free:	☑		☐	☐

Sample Integrity - Documentation	Y	or	N
1. Sample labels present on bottles:	☑		☐
2. Container labeling complete:	☑		☐
3. Sample container label / COC agree:	☑		☐

Sample Integrity - Condition	Y	or	N
1. Sample recvd within HT:	☑		☐
2. All containers accounted for:	☑		☐
3. Condition of sample:	Intact		

Sample Integrity - Instructions	Y	or	N	N/A
1. Analysis requested is clear:	☑		☐	
2. Bottles received for unspecified tests	☐		☑	
3. Sufficient volume recvd for analysis:	☑		☐	
4. Compositing instructions clear:	☐		☐	☑
5. Filtering instructions clear:	☐		☐	☑

Comments

Accutest Laboratories
V:(508) 481-6200

495 Technology Center West, Bldg One
F: (508) 481-7753

Marlborough, MA 01752
www/accutest.com

5.1

6

MC39947: Chain of Custody
Page 3 of 3

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC39947

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC39947-1 Collected: 09-JUL-15 00:00 By: SFCW Received: 10-JUL-15 By: TB-ROX-070915-HCL-A						
MC39947-1	SW846 8260C	20-JUL-15 12:14	MC			V8260SL+
MC39947-2 Collected: 09-JUL-15 00:00 By: SFCW Received: 10-JUL-15 By: TB-ROX-070915-HCL-B						
MC39947-2	SW846 8260C	20-JUL-15 12:45	MC			V8260SL+
MC39947-3 Collected: 09-JUL-15 00:00 By: SFCW Received: 10-JUL-15 By: TB-ROX-070915-ST-A						
MC39947-3	SW846 8011	21-JUL-15 14:37	NK	20-JUL-15	AW	V8011SL
MC39947-4 Collected: 09-JUL-15 00:00 By: SFCW Received: 10-JUL-15 By: TB-ROX-070915-ST-B						
MC39947-4	SW846 8011	21-JUL-15 15:05	NK	20-JUL-15	AW	V8011SL
MC39947-5 Collected: 09-JUL-15 09:15 By: SFCW Received: 10-JUL-15 By: MW11-ROX-070915						
MC39947-5	SW846 8260C	20-JUL-15 13:14	MC			V8260SL+
MC39947-5	SW846 8270D BY SIM	21-JUL-15 15:23	MR	12-JUL-15	AW	B8270SIMSL
MC39947-5	SW846 8011	21-JUL-15 15:33	NK	20-JUL-15	AW	V8011SL
MC39947-5	SW846 8270D	22-JUL-15 11:29	MR	12-JUL-15	AW	AB8270SL+
MC39947-6 Collected: 09-JUL-15 10:15 By: SFCW Received: 10-JUL-15 By: MW10-ROX-070915						
MC39947-6	SW846 8260C	20-JUL-15 14:14	MC			V8260SL+
MC39947-6	SW846 8270D BY SIM	21-JUL-15 15:47	MR	12-JUL-15	AW	B8270SIMSL
MC39947-6	SW846 8011	21-JUL-15 16:01	NK	20-JUL-15	AW	V8011SL
MC39947-6	SW846 8270D	22-JUL-15 11:54	MR	12-JUL-15	AW	AB8270SL+
MC39947-7 Collected: 09-JUL-15 10:30 By: SFCW Received: 10-JUL-15 By: MW14-ROX-070915						
MC39947-7	SW846 8260C	21-JUL-15 00:18	MC			V8260SL+

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC39947

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC39947-7	SW846 8270D BY SIM	21-JUL-15 12:17	MR	12-JUL-15	AW	B8270SIMSL
MC39947-7	SW846 8011	21-JUL-15 16:29	NK	20-JUL-15	AW	V8011SL
MC39947-7	SW846 8270D	21-JUL-15 20:34	KD	12-JUL-15	AW	AB8270SL+
MC39947-7	SW846 8260C	22-JUL-15 15:23	MC			V8260SL+
MC39947-8	Collected: 09-JUL-15 11:05 By: SFCW		Received: 10-JUL-15 By:			
MW9-ROX-070915						
MC39947-8	SW846 8260C	20-JUL-15 13:44	MC			V8260SL+
MC39947-8	SW846 8270D BY SIM	21-JUL-15 16:10	MR	12-JUL-15	AW	B8270SIMSL
MC39947-8	SW846 8011	21-JUL-15 16:57	NK	20-JUL-15	AW	V8011SL
MC39947-8	SW846 8270D	22-JUL-15 12:18	MR	12-JUL-15	AW	AB8270SL+
MC39947-9	Collected: 09-JUL-15 13:20 By: SFCW		Received: 10-JUL-15 By:			
MW16-ROX-070915						
MC39947-9	SW846 8260C	21-JUL-15 00:48	MC			V8260SL+
MC39947-9	SW846 8270D BY SIM	21-JUL-15 16:33	MR	12-JUL-15	AW	B8270SIMSL
MC39947-9	SW846 8011	21-JUL-15 17:54	NK	20-JUL-15	AW	V8011SL
MC39947-9	SW846 8270D	22-JUL-15 12:42	MR	12-JUL-15	AW	AB8270SL+
MC39947-9	SW846 8260C	22-JUL-15 16:54	MC			V8260SL+
MC39947-10	Collected: 09-JUL-15 13:20 By: SFCW		Received: 10-JUL-15 By:			
MW16-ROX-070915-DUP						
MC39947-10	SW846 8260C	21-JUL-15 01:17	MC			V8260SL+
MC39947-10	SW846 8270D BY SIM	21-JUL-15 16:56	MR	12-JUL-15	AW	B8270SIMSL
MC39947-10	SW846 8011	21-JUL-15 18:22	NK	20-JUL-15	AW	V8011SL
MC39947-10	SW846 8270D	22-JUL-15 13:07	MR	12-JUL-15	AW	AB8270SL+
MC39947-10	SW846 8260C	22-JUL-15 20:24	MC			V8260SL+
MC39947-11	Collected: 09-JUL-15 14:00 By: SFCW		Received: 10-JUL-15 By:			
P93D-ROX-070915						
MC39947-11	SW846 8260C	21-JUL-15 06:45	MC			V8260SL+
MC39947-11	SW846 8270D BY SIM	21-JUL-15 17:20	MR	12-JUL-15	AW	B8270SIMSL
MC39947-11	SW846 8011	21-JUL-15 18:50	NK	20-JUL-15	AW	V8011SL
MC39947-11	SW846 8270D	22-JUL-15 13:31	MR	12-JUL-15	AW	AB8270SL+
MC39947-11	SW846 8260C	22-JUL-15 22:23	MC			V8260SL+

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC39947

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC39947-12	Collected: 09-JUL-15 14:20 By: SFCW		Received: 10-JUL-15 By:			
MW24-ROX-070915						
MC39947-12	SW846 8260C	21-JUL-15 01:47	MC			V8260SL+
MC39947-12	SW846 8270D BY SIM	21-JUL-15 17:43	MR	12-JUL-15	AW	B8270SIMSL
MC39947-12	SW846 8011	21-JUL-15 19:18	NK	20-JUL-15	AW	V8011SL
MC39947-12	SW846 8270D	22-JUL-15 13:56	MR	12-JUL-15	AW	AB8270SL+
MC39947-12	SW846 8260C	22-JUL-15 21:23	MC			V8260SL+
MC39947-13	Collected: 09-JUL-15 14:40 By: SFCW		Received: 10-JUL-15 By:			
P93B-ROX-070915						
MC39947-13	SW846 8270D BY SIM	21-JUL-15 18:08	MR	12-JUL-15	AW	B8270SIMSL
MC39947-13	SW846 8011	21-JUL-15 19:46	NK	20-JUL-15	AW	V8011SL
MC39947-13	SW846 8260C	21-JUL-15 21:44	MC			V8260SL+
MC39947-13	SW846 8270D	22-JUL-15 14:20	MR	12-JUL-15	AW	AB8270SL+
MC39947-14	Collected: 09-JUL-15 14:40 By: SFCW		Received: 10-JUL-15 By:			
P93B-ROX-070915-DUP						
MC39947-14	SW846 8260C	21-JUL-15 07:44	MC			V8260SL+
MC39947-14	SW846 8270D BY SIM	21-JUL-15 18:32	MR	12-JUL-15	AW	B8270SIMSL
MC39947-14	SW846 8011	21-JUL-15 20:14	NK	20-JUL-15	AW	V8011SL
MC39947-14	SW846 8270D	22-JUL-15 15:09	MR	12-JUL-15	AW	AB8270SL+
MC39947-14	SW846 8260C	22-JUL-15 21:53	MC			V8260SL+
MC39947-15	Collected: 09-JUL-15 15:10 By: SFCW		Received: 10-JUL-15 By:			
P54-ROX-070915						
MC39947-15	SW846 8260C	21-JUL-15 02:17	MC			V8260SL+
MC39947-15	SW846 8270D BY SIM	21-JUL-15 18:55	MR	12-JUL-15	AW	B8270SIMSL
MC39947-15	SW846 8011	21-JUL-15 20:43	NK	20-JUL-15	AW	V8011SL
MC39947-15	SW846 8270D	22-JUL-15 15:34	MR	12-JUL-15	AW	AB8270SL+
MC39947-15	SW846 8260C	22-JUL-15 20:54	MC			V8260SL+

Accutest Internal Chain of Custody

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/10/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39947-1.2	VOC Ref #1	Megan Crichton	07/20/15 11:01	Retrieve from Storage
MC39947-1.2	Megan Crichton	VOC Ref #1	07/21/15 14:03	Return to Storage
MC39947-2.2	VOC Ref #1	Megan Crichton	07/20/15 11:01	Retrieve from Storage
MC39947-2.2	Megan Crichton	VOC Ref #1	07/21/15 14:03	Return to Storage
MC39947-3.1	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-3.1	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-3.2	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-3.2	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-4.1	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-4.1	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-4.2	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-4.2	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-5.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-5.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39947-5.3	VOC Ref #1	Megan Crichton	07/20/15 11:01	Retrieve from Storage
MC39947-5.3	Megan Crichton	VOC Ref #1	07/21/15 14:03	Return to Storage
MC39947-5.5	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-5.5	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-5.6	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-5.6	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-6.2	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-6.2	Forrest Thompson		07/15/15 21:43	Depleted
MC39947-6.4	VOC Ref #1	Megan Crichton	07/20/15 11:01	Retrieve from Storage
MC39947-6.4	Megan Crichton	VOC Ref #1	07/21/15 14:03	Return to Storage
MC39947-6.5	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-6.5	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-6.6	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-6.6	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-7.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-7.1	Forrest Thompson		07/15/15 21:43	Depleted

5.3

Accutest Internal Chain of Custody

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/10/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39947-7.3	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-7.3	Forrest Thompson		07/15/15 21:43	Depleted
MC39947-7.6	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-7.6	Forrest Thompson		07/15/15 21:43	Depleted
MC39947-7.7	VOC Ref #2	Andrew Delman	07/20/15 15:25	Retrieve from Storage
MC39947-7.7	Andrew Delman	GCMSL	07/20/15 15:25	Load on Instrument
MC39947-7.7	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-7.7	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-7.7	VOC Ref #2	Megan Crichton	07/23/15 16:15	Retrieve from Storage
MC39947-7.7	Megan Crichton		07/23/15 16:15	Depleted
MC39947-7.8	VOC Ref #2	Andrew Delman	07/20/15 15:25	Retrieve from Storage
MC39947-7.8	Andrew Delman	GCMSL	07/20/15 15:25	Load on Instrument
MC39947-7.8	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-7.8	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-7.8	VOC Ref #2	Megan Crichton	07/23/15 16:15	Retrieve from Storage
MC39947-7.8	Megan Crichton		07/23/15 16:15	Depleted
MC39947-7.9	VOC Ref #2	Megan Crichton	07/22/15 15:04	Retrieve from Storage
MC39947-7.9	Megan Crichton	GCMSL	07/22/15 15:04	Load on Instrument
MC39947-7.9	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-7.9	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-7.9	VOC Ref #2	Megan Crichton	07/23/15 16:15	Retrieve from Storage
MC39947-7.9	Megan Crichton		07/23/15 16:15	Depleted
MC39947-7.10	VOC Ref #2	Megan Crichton	07/22/15 15:04	Retrieve from Storage
MC39947-7.10	Megan Crichton	GCMSL	07/22/15 15:04	Load on Instrument
MC39947-7.10	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-7.10	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-7.11	VOC Ref #2	Andrew Delman	07/20/15 15:25	Retrieve from Storage
MC39947-7.11	Andrew Delman	GCMSL	07/20/15 15:25	Load on Instrument
MC39947-7.11	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-7.11	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-7.11	VOC Ref #2	Megan Crichton	07/23/15 16:15	Retrieve from Storage
MC39947-7.11	Megan Crichton		07/23/15 16:15	Depleted
MC39947-7.12	VOC Ref #2	Andrew Delman	07/20/15 15:25	Retrieve from Storage
MC39947-7.12	Andrew Delman	GCMSL	07/20/15 15:25	Load on Instrument
MC39947-7.12	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-7.12	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage

5.3

Accutest Internal Chain of Custody

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/10/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39947-7.12	VOC Ref #2	Megan Crichton	07/23/15 16:15	Retrieve from Storage
MC39947-7.12	Megan Crichton		07/23/15 16:15	Depleted
MC39947-7.13	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-7.13	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-7.14	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-7.14	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-7.15	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-7.15	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-7.16	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-7.16	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-7.17	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-7.17	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-7.18	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-7.18	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-8.2	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-8.2	Forrest Thompson		07/15/15 21:43	Depleted
MC39947-8.4	VOC Ref #1	Megan Crichton	07/20/15 11:01	Retrieve from Storage
MC39947-8.4	Megan Crichton	VOC Ref #1	07/21/15 14:03	Return to Storage
MC39947-8.5	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-8.5	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-8.6	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-8.6	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-9.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-9.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39947-9.3	VOC Ref #2	Megan Crichton	07/22/15 15:04	Retrieve from Storage
MC39947-9.3	Megan Crichton	GCMSL	07/22/15 15:04	Load on Instrument
MC39947-9.3	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-9.3	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-9.4	VOC Ref #2	Andrew Delman	07/20/15 15:25	Retrieve from Storage
MC39947-9.4	Andrew Delman	GCMSL	07/20/15 15:25	Load on Instrument
MC39947-9.4	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument

Accutest Internal Chain of Custody

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/10/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39947-9.4	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-9.5	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-9.5	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-9.6	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-9.6	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-10.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-10.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39947-10.3	VOC Ref #2	Andrew Delman	07/20/15 15:25	Retrieve from Storage
MC39947-10.3	Andrew Delman	GCMSL	07/20/15 15:25	Load on Instrument
MC39947-10.3	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-10.3	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-10.4	VOC Ref #2	Megan Crichton	07/22/15 15:48	Retrieve from Storage
MC39947-10.4	Megan Crichton	GCMSL	07/22/15 15:48	Load on Instrument
MC39947-10.4	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-10.4	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-10.5	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-10.5	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-10.6	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-10.6	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-11.2	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-11.2	Forrest Thompson		07/15/15 21:43	Depleted
MC39947-11.3	VOC Ref #2	Andrew Delman	07/20/15 15:25	Retrieve from Storage
MC39947-11.3	Andrew Delman	GCMSL	07/20/15 15:25	Load on Instrument
MC39947-11.3	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-11.3	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-11.4	VOC Ref #2	Megan Crichton	07/22/15 15:04	Retrieve from Storage
MC39947-11.4	Megan Crichton	GCMSL	07/22/15 15:04	Load on Instrument
MC39947-11.4	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-11.4	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-11.5	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-11.5	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-11.6	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage

Accutest Internal Chain of Custody

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/10/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39947-11.6	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-12.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-12.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39947-12.3	VOC Ref #2	Megan Crichton	07/22/15 16:02	Retrieve from Storage
MC39947-12.3	Megan Crichton	GCMSL	07/22/15 16:03	Load on Instrument
MC39947-12.3	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-12.3	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-12.4	VOC Ref #2	Andrew Delman	07/20/15 15:25	Retrieve from Storage
MC39947-12.4	Andrew Delman	GCMSL	07/20/15 15:25	Load on Instrument
MC39947-12.4	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-12.4	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-12.5	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-12.5	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-12.6	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-12.6	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-13.2	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-13.2	Forrest Thompson		07/15/15 21:43	Depleted
MC39947-13.3	VOC Ref #2	Andrew Delman	07/20/15 15:25	Retrieve from Storage
MC39947-13.3	Andrew Delman	GCMSL	07/20/15 15:25	Load on Instrument
MC39947-13.3	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-13.3	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-13.4	VOC Ref #2	Megan Crichton	07/21/15 14:10	Retrieve from Storage
MC39947-13.4	Megan Crichton	GCMSL	07/21/15 14:10	Load on Instrument
MC39947-13.4	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-13.4	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-13.5	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-13.5	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-13.6	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-13.6	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-14.1	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-14.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39947-14.3	VOC Ref #2	Megan Crichton	07/22/15 15:48	Retrieve from Storage

Accutest Internal Chain of Custody

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/10/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39947-14.3	Megan Crichton	GCMSL	07/22/15 15:48	Load on Instrument
MC39947-14.3	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-14.3	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-14.4	VOC Ref #2	Andrew Delman	07/20/15 15:25	Retrieve from Storage
MC39947-14.4	Andrew Delman	GCMSL	07/20/15 15:25	Load on Instrument
MC39947-14.4	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-14.4	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-14.5	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-14.5	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39947-14.6	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-14.6	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-15.2	Walk In Ref #22	Forrest Thompson	07/12/15 15:15	Retrieve from Storage
MC39947-15.2	Forrest Thompson		07/15/15 21:43	Depleted
MC39947-15.3	VOC Ref #2	Megan Crichton	07/22/15 15:48	Retrieve from Storage
MC39947-15.3	Megan Crichton	GCMSL	07/22/15 15:48	Load on Instrument
MC39947-15.3	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-15.3	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-15.4	VOC Ref #2	Andrew Delman	07/20/15 15:25	Retrieve from Storage
MC39947-15.4	Andrew Delman	GCMSL	07/20/15 15:25	Load on Instrument
MC39947-15.4	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39947-15.4	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39947-15.5	VOC Ref #2	Elizabeth Stefanik	07/20/15 18:47	Retrieve from Storage
MC39947-15.5	Elizabeth Stefanik		07/20/15 21:55	Depleted
MC39947-15.6	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39947-15.6	Elizabeth Stefanik		07/18/15 00:11	Depleted

5.3

New England ACCUTEST LABORATORIES

GC/MS Volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4085-MB	L92869.D	1	07/20/15	MC	n/a	n/a	MSL4085

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-1, MC39947-2, MC39947-5, MC39947-6, MC39947-8

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	0.43	5.0	0.19	ug/l	J
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4085-MB	L92869.D	1	07/20/15	MC	n/a	n/a	MSL4085

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-1, MC39947-2, MC39947-5, MC39947-6, MC39947-8

CAS No.	Compound	Result	RL	MDL	Units	Q
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	1.7	5.0	0.45	ug/l	J
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	3.6	5.0	0.61	ug/l	J
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	1.6	5.0	0.78	ug/l	J
120-82-1	1,2,4-Trichlorobenzene	1.4	5.0	0.74	ug/l	J
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4085-MB	L92869.D	1	07/20/15	MC	n/a	n/a	MSL4085

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-1, MC39947-2, MC39947-5, MC39947-6, MC39947-8

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	113%	72-133%
2037-26-5	Toluene-D8	98%	85-114%
460-00-4	4-Bromofluorobenzene	104%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4086-MB	L92893.D	1	07/20/15	MC	n/a	n/a	MSL4086

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-7, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-14, MC39947-15

CAS No.	Compound	Result	RL	MDL	Units	Q
107-02-8	Acrolein	ND	25	11	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
75-15-0	Carbon disulfide	0.40	5.0	0.19	ug/l	J
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	116%	72-133%
2037-26-5	Toluene-D8	99%	85-114%
460-00-4	4-Bromofluorobenzene	105%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-MB	L92918.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-13

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	0.59	5.0	0.19	ug/l	J
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	

6.1.3

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-MB	L92918.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-13

CAS No.	Compound	Result	RL	MDL	Units	Q
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	1.9	5.0	0.45	ug/l	J
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	1.5	5.0	0.74	ug/l	J
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

6.1.3
8

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-MB	L92918.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-13

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	114%	72-133%
2037-26-5	Toluene-D8	99%	85-114%
460-00-4	4-Bromofluorobenzene	104%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4089-MB	L92969.D	1	07/22/15	MC	n/a	n/a	MSL4089

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-14, MC39947-15

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	0.76	5.0	0.45	ug/l	J
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	

6.1.4

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4089-MB	L92969.D	1	07/22/15	MC	n/a	n/a	MSL4089

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-14, MC39947-15

CAS No.	Compound	Result	RL	MDL	Units	Q
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	3.7	5.0	0.61	ug/l	J
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	1.5	5.0	0.78	ug/l	J
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	116%	72-133%
2037-26-5	Toluene-D8	100%	85-114%
460-00-4	4-Bromofluorobenzene	105%	70-134%

6.1.4

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4089-MB	L92969.D	1	07/22/15	MC	n/a	n/a	MSL4089

The QC reported here applies to the following samples: Method:

MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-14, MC39947-15

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

6.1.4

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4086-MB1	L92969.D	1	07/22/15	MC	n/a	n/a	MSL4086

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-7

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
78-93-3	2-Butanone (MEK)	ND	10	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	0.76	5.0	0.45	ug/l	J
591-78-6	2-Hexanone	ND	10	2.7	ug/l	

6.1.5

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4086-MB1	L92969.D	1	07/22/15	MC	n/a	n/a	MSL4086

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-7

CAS No.	Compound	Result	RL	MDL	Units	Q
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	3.7	5.0	0.61	ug/l	J
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	1.5	5.0	0.78	ug/l	J
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	116%	72-133%
2037-26-5	Toluene-D8	100%	85-114%
460-00-4	4-Bromofluorobenzene	105%	70-134%

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4085-BS	L92866.D	1	07/20/15	MC	n/a	n/a	MSL4085
MSL4085-BSD	L92867.D	1	07/20/15	MC	n/a	n/a	MSL4085

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-1, MC39947-2, MC39947-5, MC39947-6, MC39947-8

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	142	284* a	80.8	162	55* a	14-172/25
107-02-8	Acrolein	250	220	88	260	104	17	10-168/25
107-13-1	Acrylonitrile	50	68.2	136	62.8	126	8	41-158/25
71-43-2	Benzene	50	47.8	96	45.2	90	6	68-127/25
108-86-1	Bromobenzene	50	48.7	97	46.6	93	4	74-124/25
74-97-5	Bromochloromethane	50	49.7	99	47.7	95	4	68-135/25
75-27-4	Bromodichloromethane	50	55.6	111	52.4	105	6	72-144/25
75-25-2	Bromoform	50	57.8	116	55.0	110	5	59-147/25
74-83-9	Bromomethane	50	54.2	108	52.4	105	3	34-175/25
78-93-3	2-Butanone (MEK)	50	76.7	153* a	74.5	149* a	3	43-147/25
104-51-8	n-Butylbenzene	50	56.7	113	53.6	107	6	77-136/25
135-98-8	sec-Butylbenzene	50	51.3	103	48.7	97	5	75-134/25
98-06-6	tert-Butylbenzene	50	49.4	99	46.9	94	5	74-132/25
75-15-0	Carbon disulfide	50	47.9	96	44.0	88	8	34-171/25
56-23-5	Carbon tetrachloride	50	55.2	110	51.0	102	8	55-153/25
108-90-7	Chlorobenzene	50	47.1	94	44.8	90	5	71-123/25
75-00-3	Chloroethane	50	54.7	109	52.5	105	4	58-175/25
110-75-8	2-Chloroethyl vinyl ether	50	52.3	105	47.8	96	9	44-169/25
67-66-3	Chloroform	50	52.7	105	49.8	100	6	67-136/25
74-87-3	Chloromethane	50	51.9	104	50.2	100	3	25-182/25
95-49-8	o-Chlorotoluene	50	48.9	98	46.8	94	4	72-130/25
106-43-4	p-Chlorotoluene	50	50.4	101	47.4	95	6	73-127/25
124-48-1	Dibromochloromethane	50	62.2	124	59.2	118	5	73-139/25
95-50-1	1,2-Dichlorobenzene	50	49.3	99	46.9	94	5	77-125/25
541-73-1	1,3-Dichlorobenzene	50	50.2	100	48.1	96	4	77-124/25
106-46-7	1,4-Dichlorobenzene	50	49.3	99	47.5	95	4	73-128/25
75-71-8	Dichlorodifluoromethane	50	31.9	64	30.6	61	4	23-157/25
75-34-3	1,1-Dichloroethane	50	50.2	100	47.8	96	5	63-145/25
107-06-2	1,2-Dichloroethane	50	51.0	102	48.2	96	6	58-145/25
75-35-4	1,1-Dichloroethene	50	59.7	119	55.7	111	7	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	49.1	98	47.2	94	4	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	48.5	97	46.9	94	3	66-136/25
78-87-5	1,2-Dichloropropane	50	49.7	99	47.7	95	4	75-133/25
142-28-9	1,3-Dichloropropane	50	49.2	98	47.8	96	3	70-127/25
594-20-7	2,2-Dichloropropane	50	66.5	133	61.8	124	7	52-163/25
563-58-6	1,1-Dichloropropene	50	48.6	97	46.1	92	5	77-140/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4085-BS	L92866.D	1	07/20/15	MC	n/a	n/a	MSL4085
MSL4085-BSD	L92867.D	1	07/20/15	MC	n/a	n/a	MSL4085

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-1, MC39947-2, MC39947-5, MC39947-6, MC39947-8

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	50	61.2	122	58.0	116	5	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	52.6	105	50.8	102	3	77-143/25
123-91-1	1,4-Dioxane	250	197	79	196	78	1	30-182/25
97-63-2	Ethyl methacrylate	50	49.8	100	48.5	97	3	64-131/25
100-41-4	Ethylbenzene	50	47.9	96	45.9	92	4	71-129/25
87-68-3	Hexachlorobutadiene	50	49.4	99	48.8	98	1	64-146/25
591-78-6	2-Hexanone	50	67.5	135	66.7	133	1	22-163/25
98-82-8	Isopropylbenzene	50	48.6	97	46.3	93	5	72-133/25
99-87-6	p-Isopropyltoluene	50	50.7	101	48.2	96	5	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	52.8	106	51.2	102	3	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	51.9	104	50.0	100	4	47-145/25
74-95-3	Methylene bromide	50	46.6	93	43.4	87	7	70-132/25
75-09-2	Methylene chloride	50	55.7	111	53.5	107	4	55-146/25
91-20-3	Naphthalene	50	42.5	85	41.6	83	2	39-176/25
103-65-1	n-Propylbenzene	50	50.9	102	48.4	97	5	74-134/25
100-42-5	Styrene	50	50.2	100	48.0	96	4	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	59.4	119	55.8	112	6	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	48.6	97	46.7	93	4	58-145/25
127-18-4	Tetrachloroethene	50	46.9	94	44.5	89	5	63-137/25
108-88-3	Toluene	50	49.1	98	47.4	95	4	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	46.4	93	44.1	88	5	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	46.8	94	45.6	91	3	40-176/25
71-55-6	1,1,1-Trichloroethane	50	50.4	101	47.5	95	6	68-144/25
79-00-5	1,1,2-Trichloroethane	50	49.5	99	47.5	95	4	72-133/25
79-01-6	Trichloroethene	50	49.3	99	45.5	91	8	73-126/25
75-69-4	Trichlorofluoromethane	50	51.3	103	49.8	100	3	43-152/25
96-18-4	1,2,3-Trichloropropane	50	50.5	101	48.8	98	3	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	50.1	100	47.5	95	5	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	49.6	99	47.1	94	5	71-127/25
108-05-4	Vinyl Acetate	50	70.1	140	69.4	139	1	10-170/25
75-01-4	Vinyl chloride	50	50.6	101	48.7	97	4	36-167/25
	m,p-Xylene	100	95.8	96	91.5	92	5	68-130/25
95-47-6	o-Xylene	50	48.7	97	46.1	92	5	69-126/25
1330-20-7	Xylene (total)	150	144	96	138	92	4	67-129/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4085-BS	L92866.D	1	07/20/15	MC	n/a	n/a	MSL4085
MSL4085-BSD	L92867.D	1	07/20/15	MC	n/a	n/a	MSL4085

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-1, MC39947-2, MC39947-5, MC39947-6, MC39947-8

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	108%	107%	72-133%
2037-26-5	Toluene-D8	98%	99%	85-114%
460-00-4	4-Bromofluorobenzene	97%	97%	70-134%

(a) Outside control limits. Associated samples are non-detect for this compound.

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4086-BS	L92890.D	1	07/20/15	MC	n/a	n/a	MSL4086
MSL4086-BSD	L92891.D	1	07/20/15	MC	n/a	n/a	MSL4086

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-7, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-14, MC39947-15

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
107-02-8	Acrolein	250	212	85	276	110	26* a	10-168/25
71-43-2	Benzene	50	43.8	88	42.9	86	2	68-127/25
74-83-9	Bromomethane	50	50.9	102	48.8	98	4	34-175/25
75-15-0	Carbon disulfide	50	45.3	91	43.1	86	5	34-171/25
56-23-5	Carbon tetrachloride	50	50.1	100	48.1	96	4	55-153/25
110-75-8	2-Chloroethyl vinyl ether	50	50.5	101	48.5	97	4	44-169/25
123-91-1	1,4-Dioxane	250	184	74	212	85	14	30-182/25

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	111%	110%	72-133%
2037-26-5	Toluene-D8	97%	99%	85-114%
460-00-4	4-Bromofluorobenzene	98%	98%	70-134%

(a) Outside control limits. Individual spike recoveries within acceptance limits.

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-BS	L92915.D	1	07/21/15	MC	n/a	n/a	MSL4087
MSL4087-BSD	L92916.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-13

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	71.3	143	61.1	122	15	14-172/25
107-02-8	Acrolein	250	280	112	246	98	13	10-168/25
107-13-1	Acrylonitrile	50	68.6	137	55.8	112	21	41-158/25
71-43-2	Benzene	50	48.1	96	46.4	93	4	68-127/25
108-86-1	Bromobenzene	50	47.9	96	47.9	96	0	74-124/25
74-97-5	Bromochloromethane	50	50.1	100	46.1	92	8	68-135/25
75-27-4	Bromodichloromethane	50	53.5	107	53.1	106	1	72-144/25
75-25-2	Bromoform	50	59.3	119	53.4	107	10	59-147/25
74-83-9	Bromomethane	50	57.2	114	59.1	118	3	34-175/25
78-93-3	2-Butanone (MEK)	50	83.6	167* a	63.1	126	28* a	43-147/25
104-51-8	n-Butylbenzene	50	57.2	114	55.7	111	3	77-136/25
135-98-8	sec-Butylbenzene	50	51.1	102	50.4	101	1	75-134/25
98-06-6	tert-Butylbenzene	50	49.7	99	49.3	99	1	74-132/25
75-15-0	Carbon disulfide	50	46.8	94	52.3	105	11	34-171/25
56-23-5	Carbon tetrachloride	50	50.5	101	55.4	111	9	55-153/25
108-90-7	Chlorobenzene	50	46.5	93	45.0	90	3	71-123/25
75-00-3	Chloroethane	50	54.9	110	54.8	110	0	58-175/25
110-75-8	2-Chloroethyl vinyl ether	50	45.7	91	48.2	96	5	44-169/25
67-66-3	Chloroform	50	52.9	106	50.6	101	4	67-136/25
74-87-3	Chloromethane	50	51.1	102	53.1	106	4	25-182/25
95-49-8	o-Chlorotoluene	50	48.6	97	48.3	97	1	72-130/25
106-43-4	p-Chlorotoluene	50	49.3	99	49.1	98	0	73-127/25
124-48-1	Dibromochloromethane	50	62.3	125	59.2	118	5	73-139/25
95-50-1	1,2-Dichlorobenzene	50	48.2	96	47.5	95	1	77-125/25
541-73-1	1,3-Dichlorobenzene	50	49.8	100	48.7	97	2	77-124/25
106-46-7	1,4-Dichlorobenzene	50	48.5	97	48.3	97	0	73-128/25
75-71-8	Dichlorodifluoromethane	50	32.2	64	31.2	62	3	23-157/25
75-34-3	1,1-Dichloroethane	50	51.1	102	49.6	99	3	63-145/25
107-06-2	1,2-Dichloroethane	50	52.4	105	50.1	100	4	58-145/25
75-35-4	1,1-Dichloroethene	50	58.6	117	57.3	115	2	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	49.9	100	48.0	96	4	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	49.9	100	48.7	97	2	66-136/25
78-87-5	1,2-Dichloropropane	50	49.7	99	49.8	100	0	75-133/25
142-28-9	1,3-Dichloropropane	50	50.0	100	46.5	93	7	70-127/25
594-20-7	2,2-Dichloropropane	50	65.4	131	67.4	135	3	52-163/25
563-58-6	1,1-Dichloropropene	50	49.3	99	48.4	97	2	77-140/25

* = Outside of Control Limits.

6.2.3

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-BS	L92915.D	1	07/21/15	MC	n/a	n/a	MSL4087
MSL4087-BSD	L92916.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-13

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	50	59.9	120	59.9	120	0	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	55.1	110	51.6	103	7	77-143/25
123-91-1	1,4-Dioxane	250	227	91	193	77	16	30-182/25
97-63-2	Ethyl methacrylate	50	53.9	108	46.9	94	14	64-131/25
100-41-4	Ethylbenzene	50	48.2	96	46.6	93	3	71-129/25
87-68-3	Hexachlorobutadiene	50	51.4	103	50.8	102	1	64-146/25
591-78-6	2-Hexanone	50	68.8	138	57.4	115	18	22-163/25
98-82-8	Isopropylbenzene	50	48.4	97	48.1	96	1	72-133/25
99-87-6	p-Isopropyltoluene	50	50.4	101	50.1	100	1	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	51.4	103	51.2	102	0	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	58.2	116	49.2	98	17	47-145/25
74-95-3	Methylene bromide	50	46.9	94	43.7	87	7	70-132/25
75-09-2	Methylene chloride	50	55.9	112	53.9	108	4	55-146/25
91-20-3	Naphthalene	50	44.1	88	39.7	79	11	39-176/25
103-65-1	n-Propylbenzene	50	50.7	101	50.3	101	1	74-134/25
100-42-5	Styrene	50	50.2	100	48.2	96	4	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	58.1	116	56.3	113	3	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	50.5	101	45.8	92	10	58-145/25
127-18-4	Tetrachloroethene	50	47.0	94	46.1	92	2	63-137/25
108-88-3	Toluene	50	49.4	99	48.2	96	2	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	47.1	94	44.8	90	5	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	47.4	95	46.5	93	2	40-176/25
71-55-6	1,1,1-Trichloroethane	50	50.1	100	50.3	101	0	68-144/25
79-00-5	1,1,2-Trichloroethane	50	50.4	101	47.7	95	6	72-133/25
79-01-6	Trichloroethene	50	50.0	100	49.0	98	2	73-126/25
75-69-4	Trichlorofluoromethane	50	52.6	105	51.6	103	2	43-152/25
96-18-4	1,2,3-Trichloropropane	50	53.0	106	47.6	95	11	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	49.7	99	49.1	98	1	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	48.8	98	48.6	97	0	71-127/25
108-05-4	Vinyl Acetate	50	76.2	152	70.8	142	7	10-170/25
75-01-4	Vinyl chloride	50	50.8	102	50.5	101	1	36-167/25
	m,p-Xylene	100	95.8	96	92.5	93	4	68-130/25
95-47-6	o-Xylene	50	48.2	96	46.7	93	3	69-126/25
1330-20-7	Xylene (total)	150	144	96	139	93	4	67-129/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-BS	L92915.D	1	07/21/15	MC	n/a	n/a	MSL4087
MSL4087-BSD	L92916.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-13

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	109%	108%	72-133%
2037-26-5	Toluene-D8	99%	98%	85-114%
460-00-4	4-Bromofluorobenzene	98%	100%	70-134%

(a) Outside control limits. Associated samples are non-detect for this compound.

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4086-BS1	L92966.D	1	07/22/15	MC	n/a	n/a	MSL4086
MSL4086-BSD1	L92967.D	1	07/22/15	MC	n/a	n/a	MSL4086

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-7

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	83.6	167	83.8	168	0	14-172/25
107-13-1	Acrylonitrile	50	58.7	117	65.1	130	10	41-158/25
108-86-1	Bromobenzene	50	44.9	90	45.4	91	1	74-124/25
74-97-5	Bromochloromethane	50	44.4	89	45.7	91	3	68-135/25
75-27-4	Bromodichloromethane	50	46.2	92	48.7	97	5	72-144/25
75-25-2	Bromoform	50	53.5	107	55.1	110	3	59-147/25
78-93-3	2-Butanone (MEK)	50	77.3	155*	65.3	131	17	43-147/25
104-51-8	n-Butylbenzene	50	55.0	110	56.1	112	2	77-136/25
135-98-8	sec-Butylbenzene	50	47.7	95	49.0	98	3	75-134/25
98-06-6	tert-Butylbenzene	50	46.5	93	48.0	96	3	74-132/25
108-90-7	Chlorobenzene	50	42.9	86	43.3	87	1	71-123/25
75-00-3	Chloroethane	50	51.1	102	51.6	103	1	58-175/25
67-66-3	Chloroform	50	49.9	100	49.9	100	0	67-136/25
74-87-3	Chloromethane	50	41.9	84	42.0	84	0	25-182/25
95-49-8	o-Chlorotoluene	50	45.2	90	46.0	92	2	72-130/25
106-43-4	p-Chlorotoluene	50	46.4	93	47.6	95	3	73-127/25
124-48-1	Dibromochloromethane	50	57.4	115	58.7	117	2	73-139/25
95-50-1	1,2-Dichlorobenzene	50	46.2	92	47.0	94	2	77-125/25
541-73-1	1,3-Dichlorobenzene	50	46.7	93	47.7	95	2	77-124/25
106-46-7	1,4-Dichlorobenzene	50	45.9	92	47.2	94	3	73-128/25
75-71-8	Dichlorodifluoromethane	50	29.4	59	29.1	58	1	23-157/25
75-34-3	1,1-Dichloroethane	50	49.4	99	49.4	99	0	63-145/25
107-06-2	1,2-Dichloroethane	50	52.1	104	52.2	104	0	58-145/25
75-35-4	1,1-Dichloroethene	50	54.3	109	55.4	111	2	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	46.2	92	46.8	94	1	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	44.2	88	45.4	91	3	66-136/25
78-87-5	1,2-Dichloropropane	50	47.8	96	48.9	98	2	75-133/25
142-28-9	1,3-Dichloropropane	50	46.4	93	47.4	95	2	70-127/25
594-20-7	2,2-Dichloropropane	50	64.1	128	63.8	128	0	52-163/25
563-58-6	1,1-Dichloropropene	50	45.8	92	47.2	94	3	77-140/25
10061-01-5	cis-1,3-Dichloropropene	50	57.1	114	58.7	117	3	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	52.5	105	53.2	106	1	77-143/25
97-63-2	Ethyl methacrylate	50	50.8	102	51.1	102	1	64-131/25
100-41-4	Ethylbenzene	50	44.7	89	45.0	90	1	71-129/25
87-68-3	Hexachlorobutadiene	50	50.8	102	51.0	102	0	64-146/25
591-78-6	2-Hexanone	50	62.5	125	65.5	131	5	22-163/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4086-BS1	L92966.D	1	07/22/15	MC	n/a	n/a	MSL4086
MSL4086-BSD1	L92967.D	1	07/22/15	MC	n/a	n/a	MSL4086

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-7

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
98-82-8	Isopropylbenzene	50	44.9	90	46.1	92	3	72-133/25
99-87-6	p-Isopropyltoluene	50	47.7	95	49.1	98	3	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	54.8	110	54.8	110	0	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	56.2	112	57.5	115	2	47-145/25
74-95-3	Methylene bromide	50	43.1	86	42.8	86	1	70-132/25
75-09-2	Methylene chloride	50	52.2	104	51.9	104	1	55-146/25
91-20-3	Naphthalene	50	48.5	97	48.5	97	0	39-176/25
103-65-1	n-Propylbenzene	50	47.4	95	48.6	97	3	74-134/25
100-42-5	Styrene	50	46.2	92	47.5	95	3	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	53.8	108	54.1	108	1	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	46.3	93	47.7	95	3	58-145/25
127-18-4	Tetrachloroethene	50	42.6	85	43.7	87	3	63-137/25
108-88-3	Toluene	50	46.1	92	46.7	93	1	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	47.9	96	48.9	98	2	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	47.9	96	48.5	97	1	40-176/25
71-55-6	1,1,1-Trichloroethane	50	44.9	90	45.8	92	2	68-144/25
79-00-5	1,1,2-Trichloroethane	50	47.7	95	48.4	97	1	72-133/25
79-01-6	Trichloroethene	50	46.2	92	46.9	94	2	73-126/25
75-69-4	Trichlorofluoromethane	50	48.3	97	48.4	97	0	43-152/25
96-18-4	1,2,3-Trichloropropane	50	49.5	99	50.9	102	3	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	46.3	93	47.4	95	2	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	45.5	91	46.9	94	3	71-127/25
108-05-4	Vinyl Acetate	50	80.2	160	81.1	162	1	10-170/25
75-01-4	Vinyl chloride	50	45.4	91	45.8	92	1	36-167/25
	m,p-Xylene	100	88.0	88	89.6	90	2	68-130/25
95-47-6	o-Xylene	50	43.9	88	45.1	90	3	69-126/25
1330-20-7	Xylene (total)	150	132	88	135	90	2	67-129/25

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	109%	109%	72-133%
2037-26-5	Toluene-D8	97%	99%	85-114%
460-00-4	4-Bromofluorobenzene	97%	98%	70-134%

* = Outside of Control Limits.

6.2.4

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4089-BS	L92966.D	1	07/22/15	MC	n/a	n/a	MSL4089
MSL4089-BSD	L92967.D	1	07/22/15	MC	n/a	n/a	MSL4089

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-14, MC39947-15

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	83.6	167	83.8	168	0	14-172/25
107-13-1	Acrylonitrile	50	58.7	117	65.1	130	10	41-158/25
108-86-1	Bromobenzene	50	44.9	90	45.4	91	1	74-124/25
74-97-5	Bromochloromethane	50	44.4	89	45.7	91	3	68-135/25
75-27-4	Bromodichloromethane	50	46.2	92	48.7	97	5	72-144/25
75-25-2	Bromoform	50	53.5	107	55.1	110	3	59-147/25
78-93-3	2-Butanone (MEK)	50	77.3	155* a	65.3	131	17	43-147/25
104-51-8	n-Butylbenzene	50	55.0	110	56.1	112	2	77-136/25
135-98-8	sec-Butylbenzene	50	47.7	95	49.0	98	3	75-134/25
98-06-6	tert-Butylbenzene	50	46.5	93	48.0	96	3	74-132/25
108-90-7	Chlorobenzene	50	42.9	86	43.3	87	1	71-123/25
75-00-3	Chloroethane	50	51.1	102	51.6	103	1	58-175/25
67-66-3	Chloroform	50	49.9	100	49.9	100	0	67-136/25
74-87-3	Chloromethane	50	41.9	84	42.0	84	0	25-182/25
95-49-8	o-Chlorotoluene	50	45.2	90	46.0	92	2	72-130/25
106-43-4	p-Chlorotoluene	50	46.4	93	47.6	95	3	73-127/25
124-48-1	Dibromochloromethane	50	57.4	115	58.7	117	2	73-139/25
95-50-1	1,2-Dichlorobenzene	50	46.2	92	47.0	94	2	77-125/25
541-73-1	1,3-Dichlorobenzene	50	46.7	93	47.7	95	2	77-124/25
106-46-7	1,4-Dichlorobenzene	50	45.9	92	47.2	94	3	73-128/25
75-71-8	Dichlorodifluoromethane	50	29.4	59	29.1	58	1	23-157/25
75-34-3	1,1-Dichloroethane	50	49.4	99	49.4	99	0	63-145/25
107-06-2	1,2-Dichloroethane	50	52.1	104	52.2	104	0	58-145/25
75-35-4	1,1-Dichloroethene	50	54.3	109	55.4	111	2	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	46.2	92	46.8	94	1	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	44.2	88	45.4	91	3	66-136/25
78-87-5	1,2-Dichloropropane	50	47.8	96	48.9	98	2	75-133/25
142-28-9	1,3-Dichloropropane	50	46.4	93	47.4	95	2	70-127/25
594-20-7	2,2-Dichloropropane	50	64.1	128	63.8	128	0	52-163/25
563-58-6	1,1-Dichloropropene	50	45.8	92	47.2	94	3	77-140/25
10061-01-5	cis-1,3-Dichloropropene	50	57.1	114	58.7	117	3	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	52.5	105	53.2	106	1	77-143/25
97-63-2	Ethyl methacrylate	50	50.8	102	51.1	102	1	64-131/25
100-41-4	Ethylbenzene	50	44.7	89	45.0	90	1	71-129/25
87-68-3	Hexachlorobutadiene	50	50.8	102	51.0	102	0	64-146/25
591-78-6	2-Hexanone	50	62.5	125	65.5	131	5	22-163/25

* = Outside of Control Limits.

6.2.5

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4089-BS	L92966.D	1	07/22/15	MC	n/a	n/a	MSL4089
MSL4089-BSD	L92967.D	1	07/22/15	MC	n/a	n/a	MSL4089

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-14, MC39947-15

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
98-82-8	Isopropylbenzene	50	44.9	90	46.1	92	3	72-133/25
99-87-6	p-Isopropyltoluene	50	47.7	95	49.1	98	3	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	54.8	110	54.8	110	0	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	56.2	112	57.5	115	2	47-145/25
74-95-3	Methylene bromide	50	43.1	86	42.8	86	1	70-132/25
75-09-2	Methylene chloride	50	52.2	104	51.9	104	1	55-146/25
91-20-3	Naphthalene	50	48.5	97	48.5	97	0	39-176/25
103-65-1	n-Propylbenzene	50	47.4	95	48.6	97	3	74-134/25
100-42-5	Styrene	50	46.2	92	47.5	95	3	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	53.8	108	54.1	108	1	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	46.3	93	47.7	95	3	58-145/25
127-18-4	Tetrachloroethene	50	42.6	85	43.7	87	3	63-137/25
108-88-3	Toluene	50	46.1	92	46.7	93	1	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	47.9	96	48.9	98	2	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	47.9	96	48.5	97	1	40-176/25
71-55-6	1,1,1-Trichloroethane	50	44.9	90	45.8	92	2	68-144/25
79-00-5	1,1,2-Trichloroethane	50	47.7	95	48.4	97	1	72-133/25
79-01-6	Trichloroethene	50	46.2	92	46.9	94	2	73-126/25
75-69-4	Trichlorofluoromethane	50	48.3	97	48.4	97	0	43-152/25
96-18-4	1,2,3-Trichloropropane	50	49.5	99	50.9	102	3	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	46.3	93	47.4	95	2	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	45.5	91	46.9	94	3	71-127/25
108-05-4	Vinyl Acetate	50	80.2	160	81.1	162	1	10-170/25
75-01-4	Vinyl chloride	50	45.4	91	45.8	92	1	36-167/25
	m,p-Xylene	100	88.0	88	89.6	90	2	68-130/25
95-47-6	o-Xylene	50	43.9	88	45.1	90	3	69-126/25
1330-20-7	Xylene (total)	150	132	88	135	90	2	67-129/25

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	109%	109%	72-133%
2037-26-5	Toluene-D8	97%	99%	85-114%
460-00-4	4-Bromofluorobenzene	97%	98%	70-134%

(a) Outside control limits. Associated samples are non-detect for this compound.

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MC39947-7MS	L92912.D	1	07/21/15	MC	n/a	n/a	MSL4086
MC39947-7MSD	L92913.D	1	07/21/15	MC	n/a	n/a	MSL4086
MC39947-7	L92895.D	1	07/21/15	MC	n/a	n/a	MSL4086
MC39947-7	L92971.D	1	07/22/15	MC	n/a	n/a	MSL4086

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-7, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-14, MC39947-15

CAS No.	Compound	MC39947-7 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	ND [a]		50	56.4	113	50	48.7	97	15	10-135/30
107-02-8	Acrolein	ND		250	182	73	250	229	92	23	10-175/30
107-13-1	Acrylonitrile	ND [a]		50	59.0	118	50	56.3	113	5	37-163/30
71-43-2	Benzene	ND		50	45.0	90	50	45.1	90	0	61-138/30
108-86-1	Bromobenzene	ND [a]		50	42.0	84	50	44.5	89	6	71-126/30
74-97-5	Bromochloromethane	ND [a]		50	48.0	96	50	45.5	91	5	70-136/30
75-27-4	Bromodichloromethane	ND [a]		50	50.6	101	50	50.6	101	0	73-146/30
75-25-2	Bromoform	ND [a]		50	50.7	101	50	50.5	101	0	54-147/30
74-83-9	Bromomethane	ND		50	48.7	97	50	56.9	114	16	20-171/30
78-93-3	2-Butanone (MEK)	ND [a]		50	49.2	98	50	50.4	101	2	33-127/30
104-51-8	n-Butylbenzene	ND [a]		50	47.1	94	50	49.8	100	6	69-138/30
135-98-8	sec-Butylbenzene	ND [a]		50	44.3	89	50	46.4	93	5	71-137/30
98-06-6	tert-Butylbenzene	ND [a]		50	43.7	87	50	45.4	91	4	68-137/30
75-15-0	Carbon disulfide	0.81	JB	50	45.9	90	50	52.9	104	14	29-178/30
56-23-5	Carbon tetrachloride	ND		50	48.2	96	50	53.0	106	9	57-155/30
108-90-7	Chlorobenzene	ND [a]		50	42.0	84	50	43.7	87	4	69-126/30
75-00-3	Chloroethane	ND [a]		50	52.9	106	50	55.5	111	5	57-182/30
110-75-8	2-Chloroethyl vinyl ether	ND		50	38.8	78	50	38.0	76	2	10-200/30
67-66-3	Chloroform	ND [a]		50	51.7	103	50	50.3	101	3	66-142/30
74-87-3	Chloromethane	ND [a]		50	44.5	89	50	49.8	100	11	18-182/30
95-49-8	o-Chlorotoluene	ND [a]		50	42.8	86	50	45.0	90	5	60-145/30
106-43-4	p-Chlorotoluene	ND [a]		50	43.2	86	50	45.4	91	5	64-138/30
124-48-1	Dibromochloromethane	ND [a]		50	55.3	111	50	56.0	112	1	71-138/30
95-50-1	1,2-Dichlorobenzene	ND [a]		50	42.8	86	50	44.8	90	5	75-125/30
541-73-1	1,3-Dichlorobenzene	ND [a]		50	43.6	87	50	45.6	91	4	74-125/30
106-46-7	1,4-Dichlorobenzene	ND [a]		50	42.7	85	50	45.0	90	5	72-128/30
75-71-8	Dichlorodifluoromethane	ND [a]		50	30.1	60	50	28.8	58	4	23-159/30
75-34-3	1,1-Dichloroethane	ND [a]		50	48.3	97	50	48.6	97	1	63-150/30
107-06-2	1,2-Dichloroethane	ND [a]		50	49.0	98	50	48.6	97	1	57-150/30
75-35-4	1,1-Dichloroethene	ND [a]		50	55.3	111	50	56.2	112	2	53-165/30
156-59-2	cis-1,2-Dichloroethene	ND [a]		50	47.7	95	50	47.3	95	1	66-138/30
156-60-5	trans-1,2-Dichloroethene	ND [a]		50	45.4	91	50	46.6	93	3	65-141/30
78-87-5	1,2-Dichloropropane	ND [a]		50	46.9	94	50	46.9	94	0	76-136/30
142-28-9	1,3-Dichloropropane	ND [a]		50	45.0	90	50	45.2	90	0	71-127/30
594-20-7	2,2-Dichloropropane	ND [a]		50	46.2	92	50	49.1	98	6	33-175/30
563-58-6	1,1-Dichloropropene	ND [a]		50	43.6	87	50	45.2	90	4	76-145/30

* = Outside of Control Limits.

6.3.1

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MC39947-7MS	L92912.D	1	07/21/15	MC	n/a	n/a	MSL4086
MC39947-7MSD	L92913.D	1	07/21/15	MC	n/a	n/a	MSL4086
MC39947-7	L92895.D	1	07/21/15	MC	n/a	n/a	MSL4086
MC39947-7	L92971.D	1	07/22/15	MC	n/a	n/a	MSL4086

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-7, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-14, MC39947-15

CAS No.	Compound	MC39947-7 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	ND [a]		50	52.3	105	50	53.5	107	2	75-137/30
10061-02-6	trans-1,3-Dichloropropene	ND [a]		50	44.7	89	50	45.3	91	1	77-139/30
123-91-1	1,4-Dioxane	ND		250	168	67	250	176	70	5	29-167/30
97-63-2	Ethyl methacrylate	ND [a]		50	46.7	93	50	45.9	92	2	60-135/30
100-41-4	Ethylbenzene	ND [a]		50	42.7	85	50	44.3	89	4	61-137/30
87-68-3	Hexachlorobutadiene	ND [a]		50	41.6	82	50	42.9	84	3	59-141/30
591-78-6	2-Hexanone	ND [a]		50	40.4	81	50	39.7	79	2	12-141/30
98-82-8	Isopropylbenzene	ND [a]		50	42.3	85	50	44.7	89	6	64-141/30
99-87-6	p-Isopropyltoluene	ND [a]		50	43.3	87	50	45.7	91	5	73-135/30
1634-04-4	Methyl Tert Butyl Ether	ND [a]		50	44.2	88	50	48.7	97	10	34-160/30
108-10-1	4-Methyl-2-pentanone (MIBK)	ND [a]		50	47.7	95	50	45.8	92	4	47-143/30
74-95-3	Methylene bromide	ND [a]		50	44.0	88	50	42.5	85	3	73-132/30
75-09-2	Methylene chloride	ND [a]		50	52.4	105	50	52.4	105	0	52-154/30
91-20-3	Naphthalene	ND [a]		50	35.1	63	50	37.6	68	7	21-185/30
103-65-1	n-Propylbenzene	ND [a]		50	44.1	88	50	46.2	92	5	66-141/30
100-42-5	Styrene	ND [a]		50	43.2	86	50	45.4	91	5	60-142/30
630-20-6	1,1,1,2-Tetrachloroethane	ND [a]		50	53.7	107	50	54.1	108	1	69-138/30
79-34-5	1,1,2,2-Tetrachloroethane	ND [a]		50	44.1	88	50	43.4	87	2	58-147/30
127-18-4	Tetrachloroethene	ND [a]		50	41.3	83	50	42.7	85	3	60-140/30
108-88-3	Toluene	ND [a]		50	46.1	92	50	46.1	92	0	74-131/30
87-61-6	1,2,3-Trichlorobenzene	ND [a]		50	38.1	74	50	40.4	78	6	12-184/30
120-82-1	1,2,4-Trichlorobenzene	1.1 [a]	J	50	37.9	74	50	40.8	79	7	30-175/30
71-55-6	1,1,1-Trichloroethane	ND [a]		50	48.5	97	50	49.6	99	2	67-151/30
79-00-5	1,1,2-Trichloroethane	ND [a]		50	47.2	94	50	45.4	91	4	73-134/30
79-01-6	Trichloroethene	ND [a]		50	46.0	92	50	46.4	93	1	68-133/30
75-69-4	Trichlorofluoromethane	ND [a]		50	51.3	103	50	50.4	101	2	40-159/30
96-18-4	1,2,3-Trichloropropane	ND [a]		50	43.7	87	50	43.9	88	0	54-141/30
95-63-6	1,2,4-Trimethylbenzene	ND [a]		50	43.2	86	50	45.4	91	5	62-142/30
108-67-8	1,3,5-Trimethylbenzene	ND [a]		50	42.8	86	50	45.2	90	5	62-133/30
108-05-4	Vinyl Acetate	ND [a]		50	49.8	100	50	54.7	109	9	10-169/30
75-01-4	Vinyl chloride	ND [a]		50	48.0	96	50	50.6	101	5	29-176/30
	m,p-Xylene	ND [a]		100	86.3	86	100	89.3	89	3	58-139/30
95-47-6	o-Xylene	ND [a]		50	43.6	87	50	44.8	90	3	61-135/30
1330-20-7	Xylene (total)	ND [a]		150	130	87	150	134	89	3	60-136/30

* = Outside of Control Limits.

6.3.1

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MC39947-7MS	L92912.D	1	07/21/15	MC	n/a	n/a	MSL4086
MC39947-7MSD	L92913.D	1	07/21/15	MC	n/a	n/a	MSL4086
MC39947-7	L92895.D	1	07/21/15	MC	n/a	n/a	MSL4086
MC39947-7	L92971.D	1	07/22/15	MC	n/a	n/a	MSL4086

The QC reported here applies to the following samples: Method: SW846 8260C

MC39947-7, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-14, MC39947-15

CAS No.	Surrogate Recoveries	MS	MSD	MC39947-7	MC39947-7	Limits
1868-53-7	Dibromofluoromethane	114%	110%	119%	118%	72-133%
2037-26-5	Toluene-D8	100%	99%	101%	102%	85-114%
460-00-4	4-Bromofluorobenzene	95%	98%	106%	103%	70-134%

(a) Result is from Run #2.

* = Outside of Control Limits.

Volatile Internal Standard Area Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSL4085-CC4070	Injection Date:	07/20/15
Lab File ID:	L92866.D	Injection Time:	09:36
Instrument ID:	GCMSL	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	1679276	8.10	2629031	8.91	1448431	12.10	1214204	14.65	173574	5.89
Upper Limit [a]	3358552	8.60	5258062	9.41	2896862	12.60	2428408	15.15	347148	6.39
Lower Limit [b]	839638	7.60	1314516	8.41	724216	11.60	607102	14.15	86787	5.39

Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSL4085-BS	1679276	8.10	2629031	8.91	1448431	12.10	1214204	14.65	173574	5.89
MSL4085-BSD	1650930	8.10	2584209	8.91	1427511	12.10	1196214	14.65	166771	5.88
MSL4085-MB	1491645	8.10	2329993	8.92	1189592	12.11	872441	14.65	210170	5.98
ZZZZZZ	1421419	8.10	2284273	8.92	1170972	12.11	853672	14.65	175541	5.96
MC39947-1	1405197	8.10	2233798	8.92	1159703	12.11	858956	14.65	207807	5.95
MC39947-2	1455978	8.10	2342941	8.92	1195906	12.11	866295	14.65	216620	5.94
MC39947-5	1403055	8.10	2249922	8.92	1158301	12.11	843712	14.65	192668	5.95
MC39947-8	1379601	8.10	2235018	8.92	1163398	12.11	827127	14.65	176741	5.96
MC39947-6	1438501	8.10	2289944	8.92	1178325	12.11	847201	14.65	185868	5.94
ZZZZZZ	1599889	8.10	2570299	8.92	1358632	12.11	1134088	14.65	195373	5.94
ZZZZZZ	1398689	8.10	2297434	8.92	1178814	12.11	865034	14.65	180561	5.96
ZZZZZZ	1438962	8.10	2374814	8.92	1199246	12.11	972190	14.65	182932	5.96
ZZZZZZ	1558438	8.10	2541013	8.92	1295262	12.11	1088469	14.65	212620	5.94
ZZZZZZ	1458524	8.10	2309393	8.92	1191011	12.11	880970	14.65	230045	5.95
ZZZZZZ	1399674	8.10	2276779	8.92	1184629	12.11	982932	14.65	198634	5.94
ZZZZZZ	1626247	8.10	2617183	8.92	1327314	12.11	976926	14.65	211126	5.95
ZZZZZZ	1374782	8.10	2213585	8.92	1158758	12.11	831082	14.65	179933	5.96
ZZZZZZ	1354638	8.10	2178209	8.92	1135914	12.11	829619	14.65	194684	5.96
ZZZZZZ	1582980	8.10	2584407	8.92	1351537	12.11	973847	14.65	192396	5.96
ZZZZZZ	1565103	8.10	2560538	8.92	1326446	12.11	965362	14.65	209553	5.95

IS 1 = Pentafluorobenzene
IS 2 = 1,4-Difluorobenzene
IS 3 = Chlorobenzene-D5
IS 4 = 1,4-Dichlorobenzene-d4
IS 5 = Tert Butyl Alcohol-D9

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

6.4.1

Volatile Internal Standard Area Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSL4086-CC4070	Injection Date:	07/20/15
Lab File ID:	L92890.D	Injection Time:	21:49
Instrument ID:	GCMSL	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	1619472	8.10	2559951	8.91	1438395	12.10	1210365	14.64	176284	5.88
Upper Limit [a]	3238944	8.60	5119902	9.41	2876790	12.60	2420730	15.14	352568	6.38
Lower Limit [b]	809736	7.60	1279976	8.41	719198	11.60	605183	14.14	88142	5.38
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSL4086-BS	1619472	8.10	2559951	8.91	1438395	12.10	1210365	14.64	176284	5.88
MSL4086-BSD	1671205	8.10	2622719	8.91	1467082	12.10	1220628	14.64	235394	5.89
MSL4086-MB	1452309	8.10	2291888	8.92	1178462	12.11	840505	14.65	181649	5.97
ZZZZZZ	1372134	8.10	2234071	8.92	1156814	12.11	850215	14.65	196442	5.96
MC39947-7	1385746	8.10	2275331	8.92	1190295	12.11	875547	14.65	171673	5.96
MC39947-9	1444830	8.10	2311771	8.92	1206147	12.11	877332	14.65	234829	5.96
MC39947-10	1381844	8.10	2241648	8.92	1161303	12.11	839726	14.65	178344	5.96
MC39947-12	1340042	8.10	2189132	8.92	1132643	12.11	822213	14.65	189063	5.96
MC39947-15	1313345	8.10	2150902	8.92	1135216	12.11	794180	14.65	144851	5.96
ZZZZZZ	1299487	8.10	2159655	8.92	1129348	12.11	811300	14.65	194594	5.95
ZZZZZZ	1325652	8.10	2161031	8.92	1133706	12.11	796904	14.65	171850	5.97
ZZZZZZ	1333261	8.10	2169058	8.92	1141160	12.11	812373	14.65	200379	5.94
ZZZZZZ	1543326	8.10	2513406	8.92	1312496	12.11	940855	14.65	214614	5.95
ZZZZZZ	1356278	8.10	2151438	8.92	1123506	12.11	801391	14.65	179521	5.95
ZZZZZZ	1473464	8.10	2132529	8.92	1140227	12.11	811049	14.65	195098	5.96
ZZZZZZ	1430982	8.10	2206731	8.92	1151759	12.11	808646	14.65	173863	5.98
ZZZZZZ	1333552	8.10	2175420	8.92	1142005	12.11	819570	14.65	188622	5.94
MC39947-11	1306206	8.10	2258517	8.92	1139600	12.11	793884	14.65	164160	5.95
MC39947-14	1296491	8.10	2302595	8.92	1131493	12.11	789821	14.65	160967	5.96
ZZZZZZ	1697567	8.10	2537755	8.92	1319456	12.11	967862	14.65	186916	5.96
MC39947-7MS	1550116	8.10	2502864	8.91	1433055	12.10	1230304	14.65	157065	5.88
MC39947-7MSD	1613737	8.10	2559665	8.91	1415566	12.10	1189518	14.65	163079	5.89

IS 1 = Pentafluorobenzene
IS 2 = 1,4-Difluorobenzene
IS 3 = Chlorobenzene-D5
IS 4 = 1,4-Dichlorobenzene-d4
IS 5 = Tert Butyl Alcohol-D9

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

6.4.2

Volatile Internal Standard Area Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSL4087-CC4070	Injection Date:	07/21/15
Lab File ID:	L92915.D	Injection Time:	10:27
Instrument ID:	GCMSL	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	1748749	8.11	2755107	8.92	1529077	12.11	1291392	14.65	220816	5.91
Upper Limit [a]	3497498	8.61	5510214	9.42	3058154	12.61	2582784	15.15	441632	6.41
Lower Limit [b]	874375	7.61	1377554	8.42	764539	11.61	645696	14.15	110408	5.41

Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSL4087-BS	1748749	8.11	2755107	8.92	1529077	12.11	1291392	14.65	220816	5.91
MSL4087-BSD	1651102	8.10	2572560	8.91	1420376	12.10	1165806	14.65	166750	5.91
MSL4087-MB	1498617	8.11	2348488	8.92	1206329	12.11	888824	14.65	209174	5.97
ZZZZZZ	1429105	8.11	2263296	8.92	1174956	12.11	844824	14.65	197626	5.96
ZZZZZZ	1620337	8.11	2592706	8.92	1346697	12.11	971663	14.65	206471	5.95
ZZZZZZ	1373034	8.11	2210630	8.92	1165620	12.11	828527	14.65	187041	5.97
ZZZZZZ	1470001	8.11	2451404	8.92	1301822	12.11	1083692	14.65	218503	5.92
ZZZZZZ	1492024	8.10	2367899	8.92	1234852	12.11	1016909	14.65	238797	5.94
ZZZZZZ	1469159	8.10	2486931	8.92	1258309	12.11	969568	14.65	202311	5.98
ZZZZZZ	1452841	8.10	2356598	8.92	1230563	12.11	1034419	14.65	249168	5.95
ZZZZZZ	1468029	8.11	2324995	8.92	1215065	12.11	921161	14.65	208327	5.96
ZZZZZZ	1444466	8.10	2306227	8.92	1244468	12.11	936415	14.65	214222	5.94
ZZZZZZ	1533605	8.10	2450063	8.92	1316694	12.11	1030140	14.65	204102	5.93
ZZZZZZ	1708554	8.10	2645159	8.92	1368000	12.11	1187962	14.65	242901	5.93
ZZZZZZ	1526475	8.10	2437698	8.92	1253087	12.11	952213	14.65	212913	5.95
ZZZZZZ	1397887	8.10	2319301	8.91	1193992	12.11	888270	14.65	218141	5.94
ZZZZZZ	1406408	8.10	2336072	8.92	1235202	12.11	1040075	14.65	232844	5.94
ZZZZZZ	1438589	8.10	2634333	8.91	1252250	12.11	942918	14.65	189221	5.95
MC39947-13	1374624	8.10	2355216	8.91	1184748	12.11	864585	14.65	205240	5.93

IS 1 = Pentafluorobenzene
IS 2 = 1,4-Difluorobenzene
IS 3 = Chlorobenzene-D5
IS 4 = 1,4-Dichlorobenzene-d4
IS 5 = Tert Butyl Alcohol-D9

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

6.4.3

Volatile Internal Standard Area Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSL4089-CC4070	Injection Date:	07/22/15
Lab File ID:	L92965.D	Injection Time:	11:35
Instrument ID:	GCMSL	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	1531688	8.10	2435999	8.91	1392294	12.10	1201444	14.64	178832	5.86
Upper Limit [a]	3063376	8.60	4871998	9.41	2784588	12.60	2402888	15.14	357664	6.36
Lower Limit [b]	765844	7.60	1218000	8.41	696147	11.60	600722	14.14	89416	5.36
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSL4086-BS1	1570390	8.10	2499197	8.91	1414286	12.10	1191951	14.64	215957	5.87
MSL4089-BS	1570390	8.10	2499197	8.91	1414286	12.10	1191951	14.64	215957	5.87
MSL4086-BSD1	1541615	8.10	2423820	8.91	1371238	12.10	1149953	14.64	186072	5.87
MSL4089-BSD	1541615	8.10	2423820	8.91	1371238	12.10	1149953	14.64	186072	5.87
MSL4089-MB	1364988	8.10	2186477	8.92	1158719	12.11	875331	14.65	202910	5.96
MSL4086-MB1	1364988	8.10	2186477	8.92	1158719	12.11	875331	14.65	202910	5.96
MC39947-7	1390627	8.11	2251108	8.92	1230281	12.11	952230	14.65	200943	5.95
ZZZZZZ	1336978	8.10	2157063	8.92	1163125	12.11	872649	14.65	193605	5.94
ZZZZZZ	1285437	8.10	2086944	8.92	1129348	12.11	840069	14.65	209874	5.96
MC39947-9	1290130	8.10	2106160	8.92	1130835	12.11	841400	14.65	193516	5.97
ZZZZZZ	1256142	8.10	2040971	8.91	1109440	12.11	815750	14.65	180731	5.94
ZZZZZZ	1266304	8.10	2071251	8.92	1111748	12.11	818571	14.65	183389	5.95
ZZZZZZ	1299650	8.10	2117781	8.92	1128189	12.11	829749	14.65	178685	5.95
MC39947-10	1342856	8.10	2148936	8.92	1137520	12.11	858563	14.65	212735	5.95
MC39947-15	1276896	8.10	2074297	8.91	1095898	12.11	820427	14.65	220167	5.92
MC39947-12	1236713	8.10	2043237	8.92	1094648	12.11	802774	14.65	206594	5.94
MC39947-14	1227573	8.10	2195177	8.91	1124195	12.11	808404	14.65	199851	5.94
MC39947-11	1295998	8.10	2248580	8.91	1169628	12.11	862399	14.65	176782	5.94

IS 1 = Pentafluorobenzene
IS 2 = 1,4-Difluorobenzene
IS 3 = Chlorobenzene-D5
IS 4 = 1,4-Dichlorobenzene-d4
IS 5 = Tert Butyl Alcohol-D9

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

Volatile Surrogate Recovery Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8260C Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC39947-1	L92871.D	119	103	104
MC39947-2	L92872.D	117	99	105
MC39947-5	L92873.D	119	103	104
MC39947-6	L92875.D	115	101	105
MC39947-7	L92971.D	118	102	103
MC39947-7	L92895.D	119	101	106
MC39947-8	L92874.D	121	101	104
MC39947-9	L92974.D	122	103	104
MC39947-9	L92896.D	118	101	105
MC39947-10	L92981.D	115	99	104
MC39947-10	L92897.D	120	100	104
MC39947-11	L92985.D	124	98	102
MC39947-11	L92908.D	126	99	107
MC39947-12	L92983.D	126	102	105
MC39947-12	L92898.D	121	101	103
MC39947-13	L92937.D	119	97	103
MC39947-14	L92984.D	125	96	106
MC39947-14	L92910.D	125	96	108
MC39947-15	L92982.D	122	101	104
MC39947-15	L92899.D	124	102	106
MC39947-7MS	L92912.D	114	100	95
MC39947-7MSD	L92913.D	110	99	98
MSL4085-BS	L92866.D	108	98	97
MSL4085-BSD	L92867.D	107	99	97
MSL4085-MB	L92869.D	113	98	104
MSL4086-BS	L92890.D	111	97	98
MSL4086-BS1	L92966.D	109	97	97
MSL4086-BSD	L92891.D	110	99	98
MSL4086-BSD1	L92967.D	109	99	98
MSL4086-MB	L92893.D	116	99	105
MSL4086-MB1	L92969.D	116	100	105
MSL4087-BS	L92915.D	109	99	98
MSL4087-BSD	L92916.D	108	98	100
MSL4087-MB	L92918.D	114	99	104
MSL4089-BS	L92966.D	109	97	97
MSL4089-BSD	L92967.D	109	99	98
MSL4089-MB	L92969.D	116	100	105

Volatile Surrogate Recovery Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8260C	Matrix: AQ

Samples and QC shown here apply to the above method

Surrogate Compounds	Recovery Limits

Surrogate Compounds	Recovery Limits
S1 = Dibromofluoromethane	72-133%
S2 = Toluene-D8	85-114%
S3 = 4-Bromofluorobenzene	70-134%

New England ACCUTEST LABORATORIES

GC/MS Semi-volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43772-MB	X06426.D	1	07/21/15	KD	07/12/15	OP43772	MSX202

The QC reported here applies to the following samples: Method: SW846 8270D

MC39947-5, MC39947-6, MC39947-7, MC39947-8, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-13, MC39947-14, MC39947-15

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.5	ug/l	
95-57-8	2-Chlorophenol	ND	5.0	0.29	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.37	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.28	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.50	ug/l	
51-28-5	2,4-Dinitrophenol	ND	20	2.5	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	1.9	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.47	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.41	ug/l	
100-02-7	4-Nitrophenol	ND	20	2.5	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.30	ug/l	
108-95-2	Phenol	ND	5.0	0.25	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.34	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.30	ug/l	
62-53-3	Aniline	ND	10	2.5	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.0	0.82	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.0	0.21	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.51	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.0	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.54	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.0	0.24	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.0	0.42	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.0	0.24	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.0	0.21	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.0	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.0	0.37	ug/l	
132-64-9	Dibenzofuran	ND	2.0	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.0	0.37	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.0	0.72	ug/l	
84-66-2	Diethyl phthalate	ND	5.0	0.57	ug/l	
131-11-3	Dimethyl phthalate	ND	5.0	0.27	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.0	0.30	ug/l	
118-74-1	Hexachlorobenzene	ND	5.0	0.77	ug/l	

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43772-MB	X06426.D	1	07/21/15	KD	07/12/15	OP43772	MSX202

The QC reported here applies to the following samples: Method: SW846 8270D

MC39947-5, MC39947-6, MC39947-7, MC39947-8, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-13, MC39947-14, MC39947-15

CAS No.	Compound	Result	RL	MDL	Units	Q
77-47-4	Hexachlorocyclopentadiene	ND	10	1.3	ug/l	
67-72-1	Hexachloroethane	ND	5.0	0.29	ug/l	
78-59-1	Isophorone	ND	5.0	0.23	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.6	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.1	ug/l	
98-95-3	Nitrobenzene	ND	5.0	0.26	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.0	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.0	0.52	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.0	0.77	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries		Limits
367-12-4	2-Fluorophenol	48%	10-80%
4165-62-2	Phenol-d5	40%	10-72%
118-79-6	2,4,6-Tribromophenol	109%	42-134%
4165-60-0	Nitrobenzene-d5	87%	25-117%
321-60-8	2-Fluorobiphenyl	82%	24-112%
1718-51-0	Terphenyl-d14	109%	48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43773-MB	I96866.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC39947-5, MC39947-6, MC39947-7, MC39947-8, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-13, MC39947-14, MC39947-15

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.10	0.0075	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0084	ug/l	
120-12-7	Anthracene	ND	0.10	0.0098	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.050	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.015	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.050	0.019	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.013	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0074	ug/l	
86-73-7	Fluorene	ND	0.10	0.015	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.020	ug/l	
90-12-0	1-Methylnaphthalene	ND	2.0	0.012	ug/l	
91-57-6	2-Methylnaphthalene	ND	2.0	0.011	ug/l	
85-01-8	Phenanthrene	ND	0.050	0.011	ug/l	
129-00-0	Pyrene	ND	0.10	0.0085	ug/l	

CAS No.	Surrogate Recoveries		Limits
4165-60-0	Nitrobenzene-d5	80%	26-121%
321-60-8	2-Fluorobiphenyl	78%	28-107%
1718-51-0	Terphenyl-d14	105%	29-129%

Blank Spike Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43772-BS	X06427.D	1	07/21/15	KD	07/12/15	OP43772	MSX202

The QC reported here applies to the following samples: Method: SW846 8270D

MC39947-5, MC39947-6, MC39947-7, MC39947-8, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-13, MC39947-14, MC39947-15

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	Limits
65-85-0	Benzoic Acid	50	22.8	46	10-70
95-57-8	2-Chlorophenol	50	35.8	72	39-100
59-50-7	4-Chloro-3-methyl phenol	50	40.2	80	43-112
120-83-2	2,4-Dichlorophenol	50	40.6	81	44-113
105-67-9	2,4-Dimethylphenol	50	28.3	57	21-108
51-28-5	2,4-Dinitrophenol	50	36.9	74	22-128
534-52-1	4,6-Dinitro-o-cresol	50	49.0	98	42-132
95-48-7	2-Methylphenol	50	31.9	64	34-91
	3&4-Methylphenol	100	61.3	61	31-90
88-75-5	2-Nitrophenol	50	45.0	90	40-118
100-02-7	4-Nitrophenol	50	18.1	36	10-71
87-86-5	Pentachlorophenol	50	46.0	92	33-123
108-95-2	Phenol	50	19.5	39	11-57
95-95-4	2,4,5-Trichlorophenol	50	43.6	87	50-122
88-06-2	2,4,6-Trichlorophenol	50	42.5	85	48-118
62-53-3	Aniline	50	35.1	70	18-90
101-55-3	4-Bromophenyl phenyl ether	50	47.4	95	55-126
85-68-7	Butyl benzyl phthalate	50	42.6	85	56-124
100-51-6	Benzyl Alcohol	50	38.3	77	13-106
91-58-7	2-Chloronaphthalene	50	43.5	87	45-123
106-47-8	4-Chloroaniline	50	43.0	86	35-111
111-91-1	bis(2-Chloroethoxy)methane	50	42.8	86	41-117
111-44-4	bis(2-Chloroethyl)ether	50	39.8	80	31-114
108-60-1	bis(2-Chloroisopropyl)ether	50	43.4	87	33-135
7005-72-3	4-Chlorophenyl phenyl ether	50	47.6	95	52-124
122-66-7	1,2-Diphenylhydrazine	50	44.5	89	45-119
121-14-2	2,4-Dinitrotoluene	50	47.8	96	52-128
606-20-2	2,6-Dinitrotoluene	50	49.3	99	50-126
91-94-1	3,3'-Dichlorobenzidine	50	46.4	93	46-134
132-64-9	Dibenzofuran	50	43.1	86	51-118
84-74-2	Di-n-butyl phthalate	50	45.0	90	57-120
117-84-0	Di-n-octyl phthalate	50	43.4	87	58-125
84-66-2	Diethyl phthalate	50	44.1	88	40-125
131-11-3	Dimethyl phthalate	50	44.0	88	10-145
117-81-7	bis(2-Ethylhexyl)phthalate	50	44.4	89	60-126
118-74-1	Hexachlorobenzene	50	48.7	97	53-127

* = Outside of Control Limits.

Blank Spike Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43772-BS	X06427.D	1	07/21/15	KD	07/12/15	OP43772	MSX202

The QC reported here applies to the following samples: Method: SW846 8270D

MC39947-5, MC39947-6, MC39947-7, MC39947-8, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-13, MC39947-14, MC39947-15

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	Limits
77-47-4	Hexachlorocyclopentadiene	50	15.8	32	10-75
67-72-1	Hexachloroethane	50	35.6	71	15-98
78-59-1	Isophorone	50	41.7	83	36-106
88-74-4	2-Nitroaniline	50	48.2	96	52-130
99-09-2	3-Nitroaniline	50	46.5	93	47-120
100-01-6	4-Nitroaniline	50	46.4	93	51-121
98-95-3	Nitrobenzene	50	40.8	82	27-120
62-75-9	n-Nitrosodimethylamine	50	30.4	61	10-87
621-64-7	N-Nitroso-di-n-propylamine	50	40.2	80	37-123
86-30-6	N-Nitrosodiphenylamine	50	43.2	86	50-112
110-86-1	Pyridine	50	23.4	47	10-72

CAS No.	Surrogate Recoveries	BSP	Limits
367-12-4	2-Fluorophenol	51%	10-80%
4165-62-2	Phenol-d5	41%	10-72%
118-79-6	2,4,6-Tribromophenol	116%	42-134%
4165-60-0	Nitrobenzene-d5	90%	25-117%
321-60-8	2-Fluorobiphenyl	72%	24-112%
1718-51-0	Terphenyl-d14	103%	48-133%

* = Outside of Control Limits.

Blank Spike Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43773-BS	I96867.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC39947-5, MC39947-6, MC39947-7, MC39947-8, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-13, MC39947-14, MC39947-15

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	Limits
83-32-9	Acenaphthene	50	39.1	78	45-116
208-96-8	Acenaphthylene	50	37.5	75	34-110
120-12-7	Anthracene	50	41.1	82	50-117
56-55-3	Benzo(a)anthracene	50	41.0	82	55-139
50-32-8	Benzo(a)pyrene	50	48.4	97	48-131
205-99-2	Benzo(b)fluoranthene	50	44.8	90	49-141
191-24-2	Benzo(g,h,i)perylene	50	46.2	92	60-130
207-08-9	Benzo(k)fluoranthene	50	47.3	95	49-133
218-01-9	Chrysene	50	40.2	80	52-128
53-70-3	Dibenzo(a,h)anthracene	50	47.2	94	60-136
206-44-0	Fluoranthene	50	42.2	84	46-132
86-73-7	Fluorene	50	41.0	82	53-120
193-39-5	Indeno(1,2,3-cd)pyrene	50	46.1	92	57-134
90-12-0	1-Methylnaphthalene	50	35.4	71	41-105
91-57-6	2-Methylnaphthalene	50	38.2	76	36-111
85-01-8	Phenanthrene	50	38.3	77	50-120
129-00-0	Pyrene	50	41.3	83	48-127

CAS No.	Surrogate Recoveries	BSP	Limits
4165-60-0	Nitrobenzene-d5	84%	26-121%
321-60-8	2-Fluorobiphenyl	68%	28-107%
1718-51-0	Terphenyl-d14	103%	29-129%

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43772-MS1	X06430.D	1	07/21/15	KD	07/12/15	OP43772	MSX202
OP43772-MSD1	X06431.D	1	07/21/15	KD	07/20/15	OP43772	MSX202
MC39947-7	X06432A.D	1	07/21/15	KD	07/12/15	OP43772	MSX202

The QC reported here applies to the following samples: Method: SW846 8270D

MC39947-5, MC39947-6, MC39947-7, MC39947-8, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-13, MC39947-14, MC39947-15

7.3.1

7

CAS No.	Compound	MC39947-7 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
65-85-0	Benzoic Acid	ND		52.6	28.1	53	51.5	27.1	53	4	10-69/20
95-57-8	2-Chlorophenol	ND		52.6	35.1	67	51.5	35.1	68	0	35-104/20
59-50-7	4-Chloro-3-methyl phenol	ND		52.6	40.7	77	51.5	40.6	79	0	43-115/20
120-83-2	2,4-Dichlorophenol	ND		52.6	41.7	79	51.5	42.1	82	1	42-116/20
105-67-9	2,4-Dimethylphenol	ND		52.6	38.1	72	51.5	39.5	77	4	26-109/20
51-28-5	2,4-Dinitrophenol	ND		52.6	49.7	94	51.5	51.5	100	4	19-140/20
534-52-1	4,6-Dinitro-o-cresol	ND		52.6	58.7	112	51.5	60.7	118	3	45-136/20
95-48-7	2-Methylphenol	ND		52.6	31.4	60	51.5	31.2	61	1	31-94/20
	3&4-Methylphenol	ND		105	60.2	57	103	60.0	58	0	30-91/20
88-75-5	2-Nitrophenol	ND		52.6	46.1	88	51.5	46.9	91	2	38-121/20
100-02-7	4-Nitrophenol	ND		52.6	19.5	37	51.5	19.3	37	1	18-57/20
87-86-5	Pentachlorophenol	ND		52.6	52.5	100	51.5	52.6	102	0	41-126/20
108-95-2	Phenol	ND		52.6	17.8	34	51.5	16.7	32	6	16-51/20
95-95-4	2,4,5-Trichlorophenol	ND		52.6	45.3	86	51.5	45.6	88	1	50-124/20
88-06-2	2,4,6-Trichlorophenol	ND		52.6	44.9	85	51.5	44.9	87	0	43-123/20
62-53-3	Aniline	ND		52.6	33.7	64	51.5	24.1	47	33* a	17-89/20
101-55-3	4-Bromophenyl phenyl ether	ND		52.6	48.5	92	51.5	47.9	93	1	54-128/20
85-68-7	Butyl benzyl phthalate	ND		52.6	41.5	79	51.5	41.8	81	1	55-125/20
100-51-6	Benzyl Alcohol	ND		52.6	36.0	68	51.5	36.3	70	1	13-106/20
91-58-7	2-Chloronaphthalene	ND		52.6	44.4	84	51.5	43.8	85	1	40-126/20
106-47-8	4-Chloroaniline	ND		52.6	42.4	81	51.5	42.0	81	1	32-109/20
111-91-1	bis(2-Chloroethoxy)methane	ND		52.6	42.7	81	51.5	42.9	83	0	40-117/20
111-44-4	bis(2-Chloroethyl)ether	ND		52.6	39.3	75	51.5	39.1	76	1	34-111/20
108-60-1	bis(2-Chloroisopropyl)ether	ND		52.6	42.4	81	51.5	42.3	82	0	33-133/20
7005-72-3	4-Chlorophenyl phenyl ether	ND		52.6	48.8	93	51.5	48.0	93	2	48-128/20
122-66-7	1,2-Diphenylhydrazine	ND		52.6	44.4	84	51.5	43.5	84	2	46-116/20
121-14-2	2,4-Dinitrotoluene	ND		52.6	49.6	94	51.5	50.0	97	1	53-130/20
606-20-2	2,6-Dinitrotoluene	ND		52.6	51.3	97	51.5	50.7	98	1	41-134/20
91-94-1	3,3'-Dichlorobenzidine	ND		52.6	32.9	63	51.5	23.3	45	34* a	29-140/20
132-64-9	Dibenzofuran	ND		52.6	43.9	83	51.5	43.4	84	1	48-121/20
84-74-2	Di-n-butyl phthalate	0.44	J	52.6	45.6	86	51.5	45.1	87	1	55-121/20
117-84-0	Di-n-octyl phthalate	ND		52.6	43.0	82	51.5	43.3	84	1	56-126/20
84-66-2	Diethyl phthalate	ND		52.6	45.2	86	51.5	44.7	87	1	42-125/20
131-11-3	Dimethyl phthalate	ND		52.6	44.7	85	51.5	44.6	87	0	11-144/20
117-81-7	bis(2-Ethylhexyl)phthalate	0.51	J	52.6	43.8	82	51.5	44.4	85	1	55-130/20
118-74-1	Hexachlorobenzene	ND		52.6	48.8	93	51.5	48.4	94	1	53-129/20

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43772-MS1	X06430.D	1	07/21/15	KD	07/12/15	OP43772	MSX202
OP43772-MSD1	X06431.D	1	07/21/15	KD	07/20/15	OP43772	MSX202
MC39947-7	X06432A.D	1	07/21/15	KD	07/12/15	OP43772	MSX202

The QC reported here applies to the following samples: Method: SW846 8270D

MC39947-5, MC39947-6, MC39947-7, MC39947-8, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-13, MC39947-14, MC39947-15

7.3.1

7

CAS No.	Compound	MC39947-7 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
77-47-4	Hexachlorocyclopentadiene	ND		52.6	18.4	35	51.5	18.2	35	1	10-75/20
67-72-1	Hexachloroethane	ND		52.6	36.3	69	51.5	35.6	69	2	10-104/20
78-59-1	Isophorone	ND		52.6	41.7	79	51.5	41.4	80	1	35-106/20
88-74-4	2-Nitroaniline	ND		52.6	50.4	96	51.5	49.8	97	1	50-132/20
99-09-2	3-Nitroaniline	ND		52.6	46.4	88	51.5	46.2	90	0	43-121/20
100-01-6	4-Nitroaniline	ND		52.6	47.7	91	51.5	47.7	93	0	41-129/20
98-95-3	Nitrobenzene	ND		52.6	40.7	77	51.5	41.0	80	1	25-122/20
62-75-9	n-Nitrosodimethylamine	ND		52.6	29.2	55	51.5	28.4	55	3	10-88/20
621-64-7	N-Nitroso-di-n-propylamine	ND		52.6	39.7	75	51.5	39.9	77	1	36-120/20
86-30-6	N-Nitrosodiphenylamine	ND		52.6	43.5	83	51.5	43.2	84	1	50-113/20
110-86-1	Pyridine	ND		52.6	22.0	42	51.5	9.4	18	80* [a]	10-73/20

CAS No.	Surrogate Recoveries	MS	MSD	MC39947-7	Limits
367-12-4	2-Fluorophenol	45%	45%	46%	10-80%
4165-62-2	Phenol-d5	35%	35%	37%	10-72%
118-79-6	2,4,6-Tribromophenol	118%	121%	125%	42-134%
4165-60-0	Nitrobenzene-d5	87%	89%	90%	25-117%
321-60-8	2-Fluorobiphenyl	85%	86%	88%	24-112%
1718-51-0	Terphenyl-d14	99%	101%	105%	48-133%

(a) High RPD due to possible matrix interference and/or sample non-homogeneity.

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43773-MS1	I96871.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
OP43773-MSD1	I96872.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624
MC39947-7	I96874.D	1	07/21/15	MR	07/12/15	OP43773	MSI3624

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC39947-5, MC39947-6, MC39947-7, MC39947-8, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-13, MC39947-14, MC39947-15

CAS No.	Compound	MC39947-7 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
83-32-9	Acenaphthene	0.20		52.6	40.6	77	51.5	40.9	79	1	36-124/20
208-96-8	Acenaphthylene	0.051	J	52.6	37.8	72	51.5	38.6	75	2	25-116/20
120-12-7	Anthracene	0.027	J	52.6	41.8	79	51.5	41.2	80	1	42-122/20
56-55-3	Benzo(a)anthracene	ND		52.6	42.5	81	51.5	41.4	80	3	45-145/20
50-32-8	Benzo(a)pyrene	ND		52.6	48.6	92	51.5	48.6	94	0	40-136/20
205-99-2	Benzo(b)fluoranthene	ND		52.6	47.6	90	51.5	47.8	93	0	41-148/20
191-24-2	Benzo(g,h,i)perylene	ND		52.6	45.5	86	51.5	46.4	90	2	48-140/20
207-08-9	Benzo(k)fluoranthene	ND		52.6	40.6	77	51.5	43.3	84	6	45-131/20
218-01-9	Chrysene	ND		52.6	40.0	76	51.5	40.0	78	0	41-135/20
53-70-3	Dibenzo(a,h)anthracene	ND		52.6	46.4	88	51.5	43.1	84	7	49-144/20
206-44-0	Fluoranthene	0.016	J	52.6	41.9	80	51.5	40.4	78	4	38-136/20
86-73-7	Fluorene	0.17		52.6	37.6	71	51.5	39.9	77	6	43-127/20
193-39-5	Indeno(1,2,3-cd)pyrene	ND		52.6	45.1	86	51.5	43.0	83	5	45-142/20
90-12-0	1-Methylnaphthalene	0.19	J	52.6	37.2	70	51.5	37.3	72	0	29-116/20
91-57-6	2-Methylnaphthalene	0.12	J	52.6	41.3	78	51.5	40.9	79	1	27-117/20
85-01-8	Phenanthrene	0.062		52.6	39.0	74	51.5	39.2	76	1	41-126/20
129-00-0	Pyrene	0.017	J	52.6	44.0	84	51.5	37.3	72	16	41-131/20

CAS No.	Surrogate Recoveries	MS	MSD	MC39947-7	Limits
4165-60-0	Nitrobenzene-d5	83%	85%	89%	26-121%
321-60-8	2-Fluorobiphenyl	77%	79%	77%	28-107%
1718-51-0	Terphenyl-d14	105%	96%	109%	29-129%

* = Outside of Control Limits.

Semivolatile Internal Standard Area Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSI3624-CC3621	Injection Date:	07/21/15
Lab File ID:	I96865.D	Injection Time:	08:19
Instrument ID:	GCMSI	Method:	SW846 8270D BY SIM

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
Check Std	371419	3.70	783967	4.74	384262	6.26	634062	7.59	614288	10.58	1746365	12.25
Upper Limit [a]	742838	4.20	1567934	5.24	768524	6.76	1268124	8.09	1228576	11.08	3492730	12.75
Lower Limit [b]	185710	3.20	391984	4.24	192131	5.76	317031	7.09	307144	10.08	873183	11.75
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43773-MB	406798	3.70	875757	4.74	390171	6.26	641110	7.59	709791	10.58	1800763	12.25
OP43773-BS	385728	3.70	818989	4.75	376642	6.27	677425	7.60	685190	10.59	1777697	12.25
OP43773-MS	463591	3.70	952594	4.75	420944	6.27	658274	7.60	689841	10.59	1815595	12.25
ZZZZZZ	392683	3.70	764701	4.75	375282	6.27	592257	7.61	666433	10.59	1738178	12.25
OP43773-MSD	389060	3.70	774099	4.75	377960	6.27	601333	7.60	658872	10.59	1705550	12.25
OP43773-MS1	425070	3.69	872974	4.74	399192	6.27	676342	7.60	676075	10.59	1837948	12.25
OP43773-MSD1	405954	3.70	835054	4.75	384349	6.27	682469	7.60	710005	10.60	1821387	12.26
MC39909-1	416093	3.70	822661	4.74	385249	6.26	612034	7.59	647211	10.58	1699865	12.25
MC39947-7	376391	3.70	803397	4.74	398127	6.26	629985	7.59	630447	10.58	1629727	12.25
ZZZZZZ	389286	3.70	804415	4.75	385700	6.27	655444	7.60	669647	10.59	1717571	12.26
ZZZZZZ	397532	3.70	812069	4.75	396344	6.27	609027	7.59	672390	10.59	1623155	12.25
ZZZZZZ	398863	3.70	818610	4.74	382846	6.26	606093	7.59	604613	10.58	1642581	12.25
ZZZZZZ	359005	3.70	829576	4.75	396713	6.27	600916	7.59	631232	10.58	1677828	12.25
ZZZZZZ	381476	3.70	776187	4.75	363980	6.27	622149	7.60	652914	10.59	1600972	12.25
ZZZZZZ	357244	3.70	770837	4.75	358603	6.27	596064	7.60	635875	10.59	1538060	12.25
ZZZZZZ	389512	3.70	796811	4.75	373670	6.27	582877	7.59	641512	10.58	1654581	12.25
MC39947-5	372806	3.70	814299	4.75	390080	6.26	578164	7.59	666572	10.59	1809377	12.25
MC39947-6	314588	3.70	671700	4.74	315111	6.26	482662	7.59	565588	10.58	1489811	12.25
MC39947-8	346810	3.70	716216	4.75	342894	6.26	534204	7.59	570161	10.58	1477874	12.25
MC39947-9	316381	3.70	689039	4.74	326263	6.26	519357	7.59	547287	10.58	1394941	12.25
MC39947-10	287106	3.70	706111	4.74	320250	6.26	554247	7.59	595270	10.58	1582995	12.25
MC39947-11	332813	3.70	708973	4.74	328372	6.26	512859	7.59	560472	10.58	1509720	12.25
MC39947-12	377970	3.69	814330	4.74	383076	6.26	606129	7.59	609385	10.58	1618879	12.25
MC39947-13	346618	3.70	745010	4.75	346366	6.26	548365	7.59	594702	10.59	1414461	12.25
MC39947-14	354616	3.70	817755	4.75	361898	6.27	556034	7.59	583431	10.59	1411858	12.25
MC39947-15	349311	3.70	646304	4.74	301504	6.26	572827	7.59	608298	10.58	1587515	12.25

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.

7.4.1

7

Semivolatile Internal Standard Area Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSI3624-CC3621	Injection Date:	07/21/15
Lab File ID:	I96865.D	Injection Time:	08:19
Instrument ID:	GCMSI	Method:	SW846 8270D BY SIM

Lab	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
Sample ID	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT

(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

7.4.1

7

Semivolatile Internal Standard Area Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSR1653-CC1649	Injection Date:	07/22/15
Lab File ID:	R44796.D	Injection Time:	09:24
Instrument ID:	GCMSR	Method:	SW846 8270D

	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT
Check Std	475812	3.82	1759124	4.95	1081713	6.45	1751318	7.70	1724496	9.97	1568048	11.33
Upper Limit [a]	951624	4.32	3518248	5.45	2163426	6.95	3502636	8.20	3448992	10.47	3136096	11.83
Lower Limit [b]	237906	3.32	879562	4.45	540857	5.95	875659	7.20	862248	9.47	784024	10.83
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43841-MB	540073	3.82	2017500	4.94	1262489	6.45	2073394	7.69	1996660	9.96	1792795	11.32
OP43841-BS	609067	3.82	2292018	4.94	1378507	6.45	2233691	7.70	2112145	9.97	1867223	11.32
OP43841-BSD	617010	3.82	2310781	4.94	1396420	6.45	2235905	7.70	2148160	9.97	1903335	11.33
ZZZZZZ	593841	3.82	2302194	4.94	1454149	6.45	2441486	7.69	2490586	9.96	2253620	11.32
MC39947-5	635266	3.82	2354237	4.94	1445107	6.45	2412750	7.69	2281289	9.96	2038894	11.32
MC39947-6	498965	3.82	1889393	4.94	1189548	6.45	2006008	7.69	1992469	9.96	1834567	11.31
MC39947-8	580244	3.82	2154997	4.94	1340283	6.45	2243948	7.69	2087913	9.96	1778065	11.31
MC39947-9	516706	3.82	1914468	4.94	1170357	6.45	1903971	7.69	1791493	9.96	1606418	11.31
MC39947-10	560378	3.82	2062384	4.94	1266766	6.45	2104825	7.69	1987239	9.96	1777076	11.31
MC39947-11	561754	3.82	2080984	4.94	1283861	6.45	2114481	7.69	1970415	9.96	1775731	11.31
MC39947-12	588746	3.82	2199578	4.94	1350579	6.45	2219745	7.69	2092983	9.96	1867697	11.31
MC39947-13	597900	3.82	2196144	4.94	1318768	6.45	2178775	7.69	2025909	9.96	1711750	11.31
ZZZZZZ	513226	3.82	1986196	4.94	1254064	6.45	2136302	7.69	2223976	9.96	2062505	11.31
MC39947-14	651065	3.82	2378309	4.94	1458157	6.45	2274728	7.69	2211958	9.96	1979835	11.32
MC39947-15	578382	3.82	2150722	4.94	1302153	6.44	2177677	7.69	2087779	9.96	1847625	11.31
ZZZZZZ	625803	3.82	2329158	4.94	1424600	6.44	2344829	7.69	2188232	9.96	1921979	11.31

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

Semivolatile Internal Standard Area Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSX202-CC194	Injection Date:	07/21/15
Lab File ID:	X06402.D	Injection Time:	09:41
Instrument ID:	GCMSX	Method:	SW846 8270D

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
Check Std	313255	3.63	1097744	4.68	607000	6.19	1082369	7.47	1079645	9.91	883922	11.52
Upper Limit [a]	626510	4.13	2195488	5.18	1214000	6.69	2164738	7.97	2159290	10.41	1767844	12.02
Lower Limit [b]	156628	3.13	548872	4.18	303500	5.69	541185	6.97	539823	9.41	441961	11.02
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43848-MB	439462	3.63	1547586	4.67	848012	6.19	1378482	7.46	1251081	9.90	1054010	11.51
OP43848-BS	428942	3.63	1473477	4.67	791768	6.19	1354278	7.46	1329964	9.91	1164057	11.51
OP43848-MS	362841	3.63	1025726	4.68	718711	6.19	1241475	7.46	1189020	9.91	1056570	11.51
OP43848-MSD	330521	3.63	934719	4.68	647420	6.19	1122096	7.46	1052715	9.90	946176	11.51
MC40043-1	368122	3.63	1063821	4.68	717279	6.19	1218816	7.46	1155734	9.90	1010652	11.51
ZZZZZZ	336521	3.65	622203	4.70	622303	6.23	1256358	7.47	1225103	9.90	1123273	11.51
ZZZZZZ	330601	3.64	577592	4.71	538387	6.24	1237289	7.47	1189853	9.90	1076336	11.51
ZZZZZZ	340557	3.63	917277	4.68	704393	6.20	1172467	7.46	1129072	9.90	1027124	11.51
ZZZZZZ	344360	3.63	928462	4.68	715720	6.20	1197980	7.46	1179327	9.90	1054092	11.51
ZZZZZZ	389455	3.63	1239102	4.67	707047	6.19	1216313	7.46	1156448	9.90	1003985	11.51
ZZZZZZ	591522	3.63	2040051	4.67	1088794	6.19	1698974	7.46	1420925	9.90	1168502	11.51
ZZZZZZ	485932	3.63	1705633	4.67	940963	6.19	1523240	7.46	1300974	9.90	1095500	11.51
ZZZZZZ	433145	3.63	1530277	4.67	845085	6.19	1406146	7.46	1303917	9.90	1183188	11.51
ZZZZZZ	415217	3.63	1457157	4.67	795265	6.19	1326065	7.46	1293792	9.91	1248705	11.52
ZZZZZZ	382570	3.63	1335534	4.67	725153	6.19	1200792	7.46	1130701	9.90	1074592	11.51
ZZZZZZ	385235	3.63	1362195	4.67	737183	6.19	1207480	7.46	1151283	9.91	1162319	11.51
ZZZZZZ	389101	3.63	1376562	4.68	749200	6.19	1230915	7.47	1138455	9.91	1137206	11.52
ZZZZZZ	370889	3.63	1299503	4.67	709282	6.19	1179865	7.46	1078860	9.91	1040540	11.52
ZZZZZZ	365704	3.63	1249294	4.67	662610	6.19	1113251	7.46	1056506	9.90	1018029	11.51
ZZZZZZ	489476	3.63	1688053	4.67	885720	6.19	1392074	7.46	1127099	9.90	976965	11.51
ZZZZZZ	364200	3.63	1297676	4.67	706426	6.19	1176511	7.46	1090469	9.90	994352	11.51
ZZZZZZ	373099	3.63	1228024	4.67	684629	6.19	1153819	7.46	1073314	9.90	997690	11.51
OP43772-MB	354929	3.63	1267535	4.67	700732	6.19	1173141	7.46	1098648	9.90	982055	11.51
OP43772-BS	335638	3.63	1163442	4.68	635723	6.19	1090812	7.46	1056275	9.91	953692	11.51
OP43772-MS	350224	3.63	1214880	4.68	671150	6.19	1183375	7.46	1158513	9.91	1036168	11.51
OP43772-MSD	321961	3.63	1115242	4.68	606633	6.19	1064256	7.46	1044600	9.91	914924	11.51
OP43772-MS1	356250	3.63	1225109	4.68	670125	6.19	1163868	7.46	1164071	9.91	1041381	11.52
OP43772-MSD1	344974	3.63	1183496	4.68	649128	6.19	1135084	7.46	1127083	9.91	1010215	11.51
MC39909-1	319571	3.63	1147470	4.67	636132	6.19	1065103	7.46	1007703	9.90	884612	11.51
MC39947-7	321756	3.63	1141557	4.67	625023	6.19	1036691	7.46	1002554	9.90	898304	11.51
ZZZZZZ	339430	3.63	1187502	4.67	639712	6.19	1083312	7.46	1118800	9.91	1039186	11.52

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10

Semivolatile Internal Standard Area Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSX202-CC194	Injection Date:	07/21/15
Lab File ID:	X06402.D	Injection Time:	09:41
Instrument ID:	GCMSX	Method:	SW846 8270D

Lab Sample ID	IS 1 AREA	IS 1 RT	IS 2 AREA	IS 2 RT	IS 3 AREA	IS 3 RT	IS 4 AREA	IS 4 RT	IS 5 AREA	IS 5 RT	IS 6 AREA	IS 6 RT

IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

7.4.3

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Semivolatile Surrogate Recovery Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3	S4	S5	S6
MC39947-5	R44801.D	43	25	92	71	77	104
MC39947-6	R44802.D	50	30	103	76	85	107
MC39947-7	X06432A.D	46	37	125	90	88	105
MC39947-8	R44803.D	48	26	98	71	78	104
MC39947-9	R44804.D	54	31	102	79	84	110
MC39947-10	R44805.D	43	25	93	68	76	99
MC39947-11	R44806.D	50	23	106	80	83	112
MC39947-12	R44807.D	45	26	98	73	76	105
MC39947-13	R44808.D	50	29	104	80	87	108
MC39947-14	R44810.D	49	29	110	77	86	106
MC39947-15	R44811.D	38	24	83	71	82	102
OP43772-BS	X06427.D	51	41	116	90	72	103
OP43772-MB	X06426.D	48	40	109	87	82	109
OP43772-MS1	X06430.D	45	35	118	87	85	99
OP43772-MSD1	X06431.D	45	35	121	89	86	101

Surrogate Compounds	Recovery Limits
S1 = 2-Fluorophenol	10-80%
S2 = Phenol-d5	10-72%
S3 = 2,4,6-Tribromophenol	42-134%
S4 = Nitrobenzene-d5	25-117%
S5 = 2-Fluorobiphenyl	24-112%
S6 = Terphenyl-d14	48-133%

Semivolatile Surrogate Recovery Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D BY SIM Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC39947-5	I96882.D	75	67	90
MC39947-6	I96883.D	81	75	93
MC39947-7	I96874.D	89	77	109
MC39947-8	I96884.D	78	66	94
MC39947-9	I96885.D	80	72	94
MC39947-10	I96886.D	79	71	87
MC39947-11	I96887.D	87	72	95
MC39947-12	I96888.D	81	69	94
MC39947-13	I96889.D	81	76	99
MC39947-14	I96890.D	77	77	100
MC39947-15	I96891.D	88	87	76
OP43773-BS	I96867.D	84	68	103
OP43773-MB	I96866.D	80	78	105
OP43773-MS1	I96871.D	83	77	105
OP43773-MSD1	I96872.D	85	79	96

Surrogate Compounds	Recovery Limits
S1 = Nitrobenzene-d5	26-121%
S2 = 2-Fluorobiphenyl	28-107%
S3 = Terphenyl-d14	29-129%

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QC Data Summaries

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Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Surrogate Recovery Summaries
- GC Surrogate Retention Time Summaries

Method Blank Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43891-MB	BB63829.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460

The QC reported here applies to the following samples: Method: SW846 8011

MC39947-3, MC39947-4, MC39947-5, MC39947-6, MC39947-7, MC39947-8, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-13, MC39947-14, MC39947-15

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.015	0.0061	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.015	0.0061	ug/l	

CAS No.	Surrogate Recoveries		Limits
460-00-4	Bromofluorobenzene (S)	106%	60-140%
460-00-4	Bromofluorobenzene (S)	107%	60-140%

8.1.1 8

Blank Spike Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43891-BS	BB63830.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460

The QC reported here applies to the following samples: Method: SW846 8011

MC39947-3, MC39947-4, MC39947-5, MC39947-6, MC39947-7, MC39947-8, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-13, MC39947-14, MC39947-15

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	Limits
96-12-8	1,2-Dibromo-3-chloropropane	0.071	0.069	97	45-149
106-93-4	1,2-Dibromoethane	0.071	0.065	92	51-149

CAS No.	Surrogate Recoveries	BSP	Limits
460-00-4	Bromofluorobenzene (S)	105%	60-140%
460-00-4	Bromofluorobenzene (S)	99%	60-140%

8.2.1 8

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43891-MS	BB63831.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
OP43891-MSD	BB63832.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460
MC39947-7	BB63837.D	1	07/21/15	NK	07/20/15	OP43891	GBB3460

The QC reported here applies to the following samples: Method: SW846 8011

MC39947-3, MC39947-4, MC39947-5, MC39947-6, MC39947-7, MC39947-8, MC39947-9, MC39947-10, MC39947-11, MC39947-12, MC39947-13, MC39947-14, MC39947-15

CAS No.	Compound	MC39947-7 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
96-12-8	1,2-Dibromo-3-chloropropane	ND		0.0664	0.074	111	0.0674	0.082	122	10	31-169/30
106-93-4	1,2-Dibromoethane	ND		0.0664	0.064	96	0.0674	0.074	110	14	34-175/30

CAS No.	Surrogate Recoveries	MS	MSD	MC39947-7	Limits
460-00-4	Bromofluorobenzene (S)	100%	98%	100%	60-140%
460-00-4	Bromofluorobenzene (S)	109%	107%	107%	60-140%

8.3.1

8

* = Outside of Control Limits.

Volatile Surrogate Recovery Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8011 Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1 [a]	S1 [b]
MC39947-3	BB63833.D	104	110
MC39947-4	BB63834.D	106	114
MC39947-5	BB63835.D	99	104
MC39947-6	BB63836.D	103	106
MC39947-7	BB63837.D	100	107
MC39947-8	BB63838.D	107	107
MC39947-9	BB63840.D	108	118
MC39947-10	BB63841.D	106	112
MC39947-11	BB63842.D	103	119
MC39947-12	BB63843.D	100	111
MC39947-13	BB63844.D	101	133
MC39947-14	BB63845.D	104	138
MC39947-15	BB63846.D	98	98
OP43891-BS	BB63830.D	105	99
OP43891-MB	BB63829.D	106	107
OP43891-MS	BB63831.D	100	109
OP43891-MSD	BB63832.D	98	107

Surrogate Compounds	Recovery Limits
S1 = Bromofluorobenzene (S)	60-140%

(a) Recovery from GC signal #2
(b) Recovery from GC signal #1

8.4.1

GC Surrogate Retention Time Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3460-ICC3460	Injection Date:	07/21/15
Lab File ID:	BB63825.D	Injection Time:	10:53
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	6.62	7.76

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
OP43891-MB	BB63829.D	07/21/15	12:45	6.65	7.80
OP43891-BS	BB63830.D	07/21/15	13:12	6.66	7.81
OP43891-MS	BB63831.D	07/21/15	13:41	6.67	7.81
OP43891-MSD	BB63832.D	07/21/15	14:09	6.68	7.83
MC39947-3	BB63833.D	07/21/15	14:37	6.69	7.84
MC39947-4	BB63834.D	07/21/15	15:05	6.70	7.85
MC39947-5	BB63835.D	07/21/15	15:33	6.71	7.86
MC39947-6	BB63836.D	07/21/15	16:01	6.73	7.88
MC39947-7	BB63837.D	07/21/15	16:29	6.74	7.90
MC39947-8	BB63838.D	07/21/15	16:57	6.76	7.92

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

GC Surrogate Retention Time Summary

Job Number: MC39947
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3460-CC3460	Injection Date:	07/21/15
Lab File ID:	BB63839.D	Injection Time:	17:26
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	6.78	7.94

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
MC39947-9	BB63840.D	07/21/15	17:54	6.65	7.79
MC39947-10	BB63841.D	07/21/15	18:22	6.78	7.94
MC39947-11	BB63842.D	07/21/15	18:50	6.80	7.96
MC39947-12	BB63843.D	07/21/15	19:18	6.82	8.00
MC39947-13	BB63844.D	07/21/15	19:46	6.84	8.01
MC39947-14	BB63845.D	07/21/15	20:14	6.87	8.04
MC39947-15	BB63846.D	07/21/15	20:43	6.89	8.06
GBB3460-ECC3460	BB63847.D	07/21/15	21:11	6.91	8.09

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

8.5.2

Roxana Groundwater Quarterly – 3rd Quarter 2015 Data Review

Laboratory SDG: MC39970

Data Reviewer: Melissa Mansker

Peer Reviewer: Elizabeth Kunkel

Date Reviewed: 8/11/2015

Guidance: USEPA National Functional Guidelines for Superfund Organic Methods Data Review 2014

Sample Identification	Sample Identification
TB-ROX-071015-HCL-A	TB-ROX-071015-ST-A
MW3-ROX-071015	MW27-ROX-071015-EB
MW27-ROX-071015	TB-ROX-071015-HCL-B
TB-ROX-071015-ST-B	P74-ROX-071015
P56-ROX-071015-EB	P56-ROX-071015
T12-ROX-071015	

1.0 Data Package Completeness

Were all items delivered as specified in the QAPP and COC as appropriate?

Yes

2.0 Laboratory Case Narrative \ Cooler Receipt Form

Were problems noted in the laboratory case narrative or cooler receipt form?

Yes, the laboratory case narrative indicated PAHs were detected in the method blank, and although not indicated in the laboratory case narrative, VOCs and PAHs were detected in the equipment blanks. VOC LCS/LCSD RPDs were outside evaluation criteria. The surrogate recovery for terphenyl-d_{14} was outside evaluation criteria in equipment blank MW27-ROX-071015-EB. Tert butyl alcohol-d_9 internal standard area recovery was outside criteria in sample P56-ROX-071015. Sample T12-ROX-071015 was diluted due to high levels of target analytes. These issues are addressed further in the appropriate sections below.

Additionally, the initial calibration verifications for acetone, acrolein, carbon disulfide, 2-butanone, and 2-hexanone exceeded 30 percent difference (%D). Continuing calibration verifications for acrolein, 1,1-dichloroethene, carbon disulfide exceeded 40%D.

The cooler receipt form indicated one of two coolers was received by the laboratory at a temperature of 1.8°C, which is outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

3.0 Holding Times

Were samples extracted/analyzed within applicable limits?

Yes

4.0 Blank Contamination

Were any analytes detected in the Method Blanks, Field Blanks or Trip Blanks?

Yes

Blank ID	Parameter	Analyte	Concentration/ Amount
MW27-ROX-071015-EB	VOCs	Chloroform	0.47 µg/L
MW27-ROX-071015-EB	PAHs	2-Methylnaphthalene	0.021 µg/L
P56-ROX-071015-EB	VOCs	Chloroform	0.49 µg/L
P56-ROX-071015-EB	PAHs	1-Methylnaphthalene	0.020 µg/L
P56-ROX-071015-EB	PAHs	2-Methylnaphthalene	0.028 µg/L
OP43790-MB	PAHs	1-Methylnaphthalene	0.018 µg/L
OP43790-MB	PAHs	2-Methylnaphthalene	0.032 µg/L

Analytical data that were reported non-detect or at concentrations greater than five times (5X) the associated blank concentration did not require qualification. Please see section 12.0 of this review for additional qualifications regarding samples associated with 1-methylnaphthalene and 2-methylnaphthalene in method blank OP-43790-MB.

5.0 Laboratory Control Sample

Were LCS recoveries within evaluation criteria?

No

LCS/LCSD ID	Parameter	Analyte	LCS/LCSD Recovery	RPD	LCS/LCSD/ RPD Criteria
MSV1487-BS/BSD	VOCs	Acetone	109/142	**26**	14-172/25
MSV1487-BS/BSD	VOCs	2-Hexanone	106/140	**28**	22-163/25

Analytical data reported as non-detect and associated with LCS recoveries above evaluation criteria, indicating a possible high bias, did not require qualification. No qualification of data was required.

6.0 Surrogate Recoveries

Were surrogate recoveries within evaluation criteria?

No

Sample ID	Parameter	Surrogate	Recovery (%)	Criteria (%)
MW27-ROX-071015-EB	SVOCs	Terphenyl-d_{14}	**134**	48-133

Analytical data reported as non-detect and associated with surrogate recoveries above evaluation criteria, indicating a possible high bias, did not require qualification. No qualification of data was required.

7.0 Matrix Spike and Matrix Spike Duplicate Recoveries

Were MS/MSD samples analyzed as part of this SDG?

No

8.0 Internal Standard (IS) Recoveries

Were internal standard area recoveries within evaluation criteria?

No

Sample ID	Parameter	Analyte	IS Area Recovery	IS Criteria
P56-ROX-071015	VOCs	Tert butyl alcohol-d_9	**230149**	42686-170742

There were no target analytes associated with tert butyl alcohol-d_9; therefore, no qualification of data was required based on tert butyl alcohol-d_9.

9.0 Laboratory Duplicate Results

Were laboratory duplicate samples analyzed as part of this SDG?

No

10.0 Field Duplicate Results

Were field duplicate samples collected as part of this SDG?

No

11.0 Sample Dilutions

For samples that were diluted and nondetect, were undiluted results also reported?

Not applicable; analytes were detected in samples that were diluted.

12.0 Additional Qualifications

Were additional qualifications applied?

Yes, professional judgment was also used to qualify as estimated, however not reject, data that was associated with 1-methylnaphthalene and 2-methylnaphthalene in method blank OP-43790-MB, due to comparable historical detections.

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
MW27-ROX-071015	PAHs	1-Methylnaphthalene	-	**J**
MW27-ROX-071015	PAHs	2-Methylnaphthalene	-	**J**
P74-ROX-071015	PAHs	1-Methylnaphthalene	-	**J**
P74-ROX-071015	PAHs	2-Methylnaphthalene	-	**J**

New England ACCUTEST LABORATORIES

07/29/15



Technical Report for

Shell Oil

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, 60400249

Accutest Job Number: MC39970

Sampling Date: 07/10/15

Report to:

AECOM, INC.

elizabeth.kunkel@URS.com

ATTN: Elizabeth Kunkel

Total number of pages in report: **108**

NELAP ACCREDITED TNI LABORATORY

Test results contained within this data package meet the requirements of the National Environmental Laboratory Accreditation Program and/or state specific certification programs as applicable.

Reviewed 8/11/15

Reza Tand
Lab Director

Client Service contact: Jeremy Vienneau 508-481-6200

Certifications: MA (M-MA136,SW846 NELAC) CT (PH-0109) NH (250210) RI (00071) ME (MA00136) FL (E87579) NY (11791) NJ (MA926) PA (6801121) ND (R-188) CO MN (11546AA) NC (653) IL (002337) WI (399080220) DoD ELAP (L-A-B L2235)

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Sample Summary

Shell Oil

Job No: MC39970

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Collected Date	Time	By	Received	Matrix Code	Type	Client Sample ID
MC39970-1	07/10/15	00:00	SFDH	07/11/15	AQ	Trip Blank Water	TB-ROX-071015-HCL-A
MC39970-2	07/10/15	00:00	SFDH	07/11/15	AQ	Trip Blank Water	TB-ROX-071015-ST-A
MC39970-3	07/10/15	11:00	SFDH	07/11/15	AQ	Ground Water	MW3-ROX-071015
MC39970-4	07/10/15	12:25	SFDH	07/11/15	AQ	Equipment Blank	MW27-ROX-071015-EB
MC39970-5	07/10/15	13:55	SFDH	07/11/15	AQ	Ground Water	MW27-ROX-071015
MC39970-6	07/10/15	00:00	SFDH	07/11/15	AQ	Trip Blank Water	TB-ROX-071015-HCL-B
MC39970-7	07/10/15	00:00	SFDH	07/11/15	AQ	Trip Blank Water	TB-ROX-071015-ST-B
MC39970-8	07/10/15	10:35	SFDH	07/11/15	AQ	Ground Water	P74-ROX-071015
MC39970-9	07/10/15	12:35	SFDH	07/11/15	AQ	Equipment Blank	P56-ROX-071015-EB
MC39970-10	07/10/15	13:40	SFDH	07/11/15	AQ	Ground Water	P56-ROX-071015
MC39970-11	07/10/15	14:30	SFDH	07/11/15	AQ	Ground Water	T12-ROX-071015

ACCUTEST LABORATORIES

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SAMPLE DELIVERY GROUP CASE NARRATIVE

Client: Shell Oil **Job No** MC39970

Site: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Centra **Report Date** 7/27/2015 9:09:18 AM

7 Sample(s) and 4 Trip Blank(s) were collected on 07/10/2015 and were received at Accutest on 07/11/2015 properly preserved, at 2.4 Deg. C and intact. These Samples received an Accutest job number of MC39970. A listing of the Laboratory Sample ID, Client Sample ID and dates of collection are presented in the Results Summary Section of this report. 1-Chlorohexane, Benzenethiol, Dibenz(a,h)acridine, Indene, and Quinoline were searched in the library search and reported only if detections were found.

Except as noted below, all method specified calibrations and quality control performance criteria were met for this job. For more information, please refer to QC summary pages.

Volatiles by GCMS By Method SW846 8260C

Matrix: AQ **Batch ID:** MSV1487

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- Initial calibration verification standard MSV1479-ICV1479 for acetone exceed 30% Difference.
- Initial calibration verification standard MSV1479-ICV1479 for acrolein, carbon disulfide, 2-butanone, 2-hexanone exceed 30% Difference (response bias high). Associated samples are non-detect for this compound.
- RPD of MSV1487-BSD for Acetone, 2-Hexanone: Outside control limits. Individual spike recoveries within acceptance limits.
- Continuing calibration check standard MSV1487-CC1479 for acrolein, 1,1-dichloroethene, carbon disulfide exceed 40% Difference (response bias high). Associated samples are non-detect for this compound.

Matrix: AQ **Batch ID:** MSV1488

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- Continuing calibration check standard MSV1488-CC1479 for acrolein exceed 40% Difference (response bias high). Associated samples are non-detect for this compound.

Extractables by GCMS By Method SW846 8270D

Matrix: AQ **Batch ID:** OP43789

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- MC39970-4 for Terphenyl-d14: Outside control limits. Associated target analytes are non-detect.

Extractables by GCMS By Method SW846 8270D BY SIM

Matrix: AQ **Batch ID:** OP43790

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- Sample(s) MC39970-3, MC39970-4, MC39970-5, MC39970-8, MC39970-9 have compound(s) reported with a "B" qualifier, indicating analyte is found in the associated method blank.

Volatiles by GC By Method SW846 8011

Matrix: AQ	Batch ID: OP43898

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.

The Accutest Laboratories of New England certifies that all analysis were performed within method specification. It is further recommended that this report to be used in its entirety.The Accutest Laboratories of NE, Laboratory Director or assignee as verified by the signature on the cover page has authorized the release of this report(MC39970).

Summary of Hits

Job Number: MC39970
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/10/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual		RL	MDL	Units	Method
MC39970-1	TB-ROX-071015-HCL-A						
No hits reported in this sample.							
MC39970-2	TB-ROX-071015-ST-A						
No hits reported in this sample.							
MC39970-3	MW3-ROX-071015						
Ethylbenzene		0.39 J		1.0	0.24	ug/l	SW846 8260C
n-Propylbenzene		0.62 J		5.0	0.29	ug/l	SW846 8260C
Toluene		1.4		1.0	0.29	ug/l	SW846 8260C
m,p-Xylene		0.87 J		1.0	0.47	ug/l	SW846 8260C
Xylene (total)		0.87 J		1.0	0.22	ug/l	SW846 8260C
Anthracene		0.020 J		0.11	0.011	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.28 JB		2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.26 JB		2.2	0.012	ug/l	SW846 8270D BY SIM
MC39970-4	MW27-ROX-071015-EB						
Chloroform		0.47 J		1.0	0.17	ug/l	SW846 8260C
2-Methylnaphthalene		0.021 JB		2.2	0.012	ug/l	SW846 8270D BY SIM
MC39970-5	MW27-ROX-071015						
1-Methylnaphthalene		0.050 JB	J	2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.086 JB	J	2.2	0.012	ug/l	SW846 8270D BY SIM
MC39970-6	TB-ROX-071015-HCL-B						
No hits reported in this sample.							
MC39970-7	TB-ROX-071015-ST-B						
No hits reported in this sample.							
MC39970-8	P74-ROX-071015						
Acetone		11.0		10	2.0	ug/l	SW846 8260C
Fluoranthene		0.019 J		0.11	0.0080	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.020 JB	J	2.2	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.029 JB	J	2.2	0.012	ug/l	SW846 8270D BY SIM

Summary of Hits

Job Number: MC39970
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/10/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
MC39970-9	P56-ROX-071015-EB					
Chloroform		0.49 J	1.0	0.17	ug/l	SW846 8260C
1-Methylnaphthalene		0.020 JB	2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.028 JB	2.2	0.012	ug/l	SW846 8270D BY SIM
MC39970-10	P56-ROX-071015					
Benzene		68.3	0.50	0.27	ug/l	SW846 8260C
sec-Butylbenzene		3.4 J	5.0	0.50	ug/l	SW846 8260C
tert-Butylbenzene		0.68 J	5.0	0.57	ug/l	SW846 8260C
Ethylbenzene		29.7	1.0	0.24	ug/l	SW846 8260C
Isopropylbenzene		57.0	5.0	0.27	ug/l	SW846 8260C
p-Isopropyltoluene		2.7 J	5.0	0.32	ug/l	SW846 8260C
Naphthalene		15.8	5.0	0.61	ug/l	SW846 8260C
n-Propylbenzene		59.4	5.0	0.29	ug/l	SW846 8260C
Toluene		5.0	1.0	0.29	ug/l	SW846 8260C
1,2,4-Trimethylbenzene		6.3	5.0	0.29	ug/l	SW846 8260C
1,3,5-Trimethylbenzene		4.1 J	5.0	0.20	ug/l	SW846 8260C
m,p-Xylene		70.2	1.0	0.47	ug/l	SW846 8260C
o-Xylene		3.5	1.0	0.22	ug/l	SW846 8260C
Xylene (total)		73.7	1.0	0.22	ug/l	SW846 8260C
Acenaphthene		0.65	0.11	0.0079	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.095 J	0.11	0.0088	ug/l	SW846 8270D BY SIM
Fluorene		0.33	0.11	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		26.2	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		11.9	2.1	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		1.4	0.053	0.011	ug/l	SW846 8270D BY SIM
Pyrene		0.029 J	0.11	0.0089	ug/l	SW846 8270D BY SIM
MC39970-11	T12-ROX-071015					
Benzene		2300	5.0	2.7	ug/l	SW846 8260C
Ethylbenzene		197	10	2.4	ug/l	SW846 8260C
Isopropylbenzene		22.2 J	50	2.7	ug/l	SW846 8260C
Naphthalene		79.8	50	6.1	ug/l	SW846 8260C
n-Propylbenzene		45.5 J	50	2.9	ug/l	SW846 8260C
Toluene		78.2	10	2.9	ug/l	SW846 8260C
1,2,4-Trimethylbenzene		185	50	2.9	ug/l	SW846 8260C
1,3,5-Trimethylbenzene		17.3 J	50	2.0	ug/l	SW846 8260C
m,p-Xylene		594	10	4.7	ug/l	SW846 8260C
o-Xylene		9.7 J	10	2.2	ug/l	SW846 8260C
Xylene (total)		603	10	2.2	ug/l	SW846 8260C
2,4-Dimethylphenol		4.1 J	11	0.54	ug/l	SW846 8270D
Phenol		22.1	5.4	0.27	ug/l	SW846 8270D

Summary of Hits

Job Number: MC39970
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/10/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
Acenaphthene		0.34	0.11	0.0082	ug/l	SW846 8270D BY SIM
Anthracene		0.15	0.11	0.011	ug/l	SW846 8270D BY SIM
Fluoranthene		0.027 J	0.11	0.0080	ug/l	SW846 8270D BY SIM
Fluorene		0.29	0.11	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		17.8	2.2	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		30.1	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.83	0.054	0.012	ug/l	SW846 8270D BY SIM
Pyrene		0.053 J	0.11	0.0092	ug/l	SW846 8270D BY SIM

New England ACCUTEST LABORATORIES

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Sample Results

Report of Analysis

Report of Analysis

Client Sample ID:	TB-ROX-071015-HCL-A		
Lab Sample ID:	MC39970-1	Date Sampled:	07/10/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41205.D	1	07/20/15	JB	n/a	n/a	MSV1487
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071015-HCL-A		
Lab Sample ID:	MC39970-1	Date Sampled:	07/10/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071015-HCL-A		
Lab Sample ID:	MC39970-1	Date Sampled:	07/10/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	103%		72-133%
2037-26-5	Toluene-D8	99%		85-114%
460-00-4	4-Bromofluorobenzene	98%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071015-ST-A		
Lab Sample ID:	MC39970-2	Date Sampled:	07/10/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/11/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63853.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
Run #2							

	Initial Volume	Final Volume
Run #1	36.9 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	99%		60-140%
460-00-4	Bromofluorobenzene (S)	95%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW3-ROX-071015		
Lab Sample ID:	MC39970-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41215.D	1	07/21/15	JB	n/a	n/a	MSV1487
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW3-ROX-071015		
Lab Sample ID:	MC39970-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	0.39	1.0	0.24	ug/l	J
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	0.62	5.0	0.29	ug/l	J
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	1.4	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	0.87	1.0	0.47	ug/l	J
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	0.87	1.0	0.22	ug/l	J

ND = Not detected MDL = Method Detection Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW3-ROX-071015		
Lab Sample ID:	MC39970-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	95%		72-133%
2037-26-5	Toluene-D8	104%		85-114%
460-00-4	4-Bromofluorobenzene	102%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW3-ROX-071015		
Lab Sample ID:	MC39970-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81773.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.8	ug/l	
95-57-8	2-Chlorophenol	ND	5.6	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.41	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.56	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.8	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.52	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.45	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.8	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.33	ug/l	
108-95-2	Phenol	ND	5.6	0.28	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.38	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.8	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.6	0.91	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.6	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.56	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.6	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.60	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.6	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.6	0.46	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.6	0.27	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.6	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.6	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.7	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.6	0.42	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.6	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.6	0.80	ug/l	

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Report of Analysis

Client Sample ID:	MW3-ROX-071015		
Lab Sample ID:	MC39970-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.6	0.63	ug/l	
131-11-3	Dimethyl phthalate	ND	5.6	0.30	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.6	0.85	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.6	0.32	ug/l	
78-59-1	Isophorone	ND	5.6	0.26	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.1	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.5	ug/l	
98-95-3	Nitrobenzene	ND	5.6	0.29	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.6	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.6	0.58	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.6	0.86	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	55%		10-80%
4165-62-2	Phenol-d5	37%		10-72%
118-79-6	2,4,6-Tribromophenol	103%		42-134%
4165-60-0	Nitrobenzene-d5	102%		25-117%
321-60-8	2-Fluorobiphenyl	100%		24-112%
1718-51-0	Terphenyl-d14	123%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW3-ROX-071015		
Lab Sample ID:	MC39970-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96927.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0083	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0093	ug/l	
120-12-7	Anthracene	0.020	0.11	0.011	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.056	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.056	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.017	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0082	ug/l	
86-73-7	Fluorene	ND	0.11	0.017	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.023	ug/l	
90-12-0	1-Methylnaphthalene	0.28	2.2	0.014	ug/l	JB
91-57-6	2-Methylnaphthalene	0.26	2.2	0.012	ug/l	JB
85-01-8	Phenanthrene	ND	0.056	0.012	ug/l	
129-00-0	Pyrene	ND	0.11	0.0094	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	94%		26-121%
321-60-8	2-Fluorobiphenyl	87%		28-107%
1718-51-0	Terphenyl-d14	114%		29-129%

ND = Not detected MDL = Method Detection Limit
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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW3-ROX-071015		
Lab Sample ID:	MC39970-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63854.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
Run #2							

	Initial Volume	Final Volume
Run #1	37.0 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	95%		60-140%
460-00-4	Bromofluorobenzene (S)	98%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015-EB		
Lab Sample ID:	MC39970-4	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41206.D	1	07/21/15	JB	n/a	n/a	MSV1487
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	0.47	1.0	0.17	ug/l	J
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015-EB		
Lab Sample ID:	MC39970-4	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015-EB		
Lab Sample ID:	MC39970-4	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	105%		72-133%
2037-26-5	Toluene-D8	99%		85-114%
460-00-4	4-Bromofluorobenzene	97%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015-EB		
Lab Sample ID:	MC39970-4	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81774.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541
Run #2							

	Initial Volume	Final Volume
Run #1	920 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.4	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.40	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.54	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.51	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.44	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.32	ug/l	
108-95-2	Phenol	ND	5.4	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.37	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.4	0.89	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.4	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.55	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.4	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.59	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.4	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.4	0.45	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.4	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.4	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.4	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.4	0.41	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.4	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.4	0.78	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015-EB		
Lab Sample ID:	MC39970-4	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.4	0.62	ug/l	
131-11-3	Dimethyl phthalate	ND	5.4	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.4	0.84	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.4	0.31	ug/l	
78-59-1	Isophorone	ND	5.4	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.0	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.4	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.4	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.4	0.56	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.4	0.84	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	52%		10-80%
4165-62-2	Phenol-d5	35%		10-72%
118-79-6	2,4,6-Tribromophenol	106%		42-134%
4165-60-0	Nitrobenzene-d5	103%		25-117%
321-60-8	2-Fluorobiphenyl	102%		24-112%
1718-51-0	Terphenyl-d14	134% [a]		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

(a) Outside control limits. Associated target analytes are non-detect.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015-EB		
Lab Sample ID:	MC39970-4	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96928.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626
Run #2							

	Initial Volume	Final Volume
Run #1	920 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0082	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0091	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.054	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.054	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0080	ug/l	
86-73-7	Fluorene	ND	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	ND	2.2	0.013	ug/l	
91-57-6	2-Methylnaphthalene	0.021	2.2	0.012	ug/l	JB
85-01-8	Phenanthrene	ND	0.054	0.012	ug/l	
129-00-0	Pyrene	ND	0.11	0.0092	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	94%		26-121%
321-60-8	2-Fluorobiphenyl	101%		28-107%
1718-51-0	Terphenyl-d14	97%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015-EB		
Lab Sample ID:	MC39970-4	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63855.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
Run #2							

	Initial Volume	Final Volume
Run #1	37.0 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	95%		60-140%
460-00-4	Bromofluorobenzene (S)	95%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015		
Lab Sample ID:	MC39970-5	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41216.D	1	07/21/15	JB	n/a	n/a	MSV1487
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015		
Lab Sample ID:	MC39970-5	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015		
Lab Sample ID:	MC39970-5	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	110%		72-133%
2037-26-5	Toluene-D8	101%		85-114%
460-00-4	4-Bromofluorobenzene	98%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015		
Lab Sample ID:	MC39970-5	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81775.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.8	ug/l	
95-57-8	2-Chlorophenol	ND	5.6	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.41	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.56	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.8	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.52	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.45	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.8	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.33	ug/l	
108-95-2	Phenol	ND	5.6	0.28	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.38	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.8	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.6	0.91	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.6	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.56	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.6	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.60	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.6	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.6	0.46	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.6	0.27	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.6	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.6	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.7	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.6	0.42	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.6	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.6	0.80	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015		
Lab Sample ID:	MC39970-5	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.6	0.63	ug/l	
131-11-3	Dimethyl phthalate	ND	5.6	0.30	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.6	0.85	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.6	0.32	ug/l	
78-59-1	Isophorone	ND	5.6	0.26	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.1	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.5	ug/l	
98-95-3	Nitrobenzene	ND	5.6	0.29	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.6	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.6	0.58	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.6	0.86	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	46%		10-80%
4165-62-2	Phenol-d5	31%		10-72%
118-79-6	2,4,6-Tribromophenol	93%		42-134%
4165-60-0	Nitrobenzene-d5	97%		25-117%
321-60-8	2-Fluorobiphenyl	95%		24-112%
1718-51-0	Terphenyl-d14	125%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015		
Lab Sample ID:	MC39970-5	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96929.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0083	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0093	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.056	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.056	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.017	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0082	ug/l	
86-73-7	Fluorene	ND	0.11	0.017	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.023	ug/l	
90-12-0	1-Methylnaphthalene	0.050	2.2	0.014	ug/l	JB J
91-57-6	2-Methylnaphthalene	0.086	2.2	0.012	ug/l	JB J
85-01-8	Phenanthrene	ND	0.056	0.012	ug/l	
129-00-0	Pyrene	ND	0.11	0.0094	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	90%		26-121%
321-60-8	2-Fluorobiphenyl	87%		28-107%
1718-51-0	Terphenyl-d14	116%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW27-ROX-071015		
Lab Sample ID:	MC39970-5	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63856.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
Run #2							

	Initial Volume	Final Volume
Run #1	36.8 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	104%		60-140%
460-00-4	Bromofluorobenzene (S)	101%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071015-HCL-B		
Lab Sample ID:	MC39970-6	Date Sampled:	07/10/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41207.D	1	07/21/15	JB	n/a	n/a	MSV1487
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071015-HCL-B		
Lab Sample ID:	MC39970-6	Date Sampled:	07/10/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071015-HCL-B		
Lab Sample ID:	MC39970-6	Date Sampled:	07/10/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	106%		72-133%
2037-26-5	Toluene-D8	100%		85-114%
460-00-4	4-Bromofluorobenzene	98%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071015-ST-B		
Lab Sample ID:	MC39970-7	Date Sampled:	07/10/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/11/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63857.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
Run #2							

	Initial Volume	Final Volume
Run #1	36.8 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	94%		60-140%
460-00-4	Bromofluorobenzene (S)	98%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P74-ROX-071015		
Lab Sample ID:	MC39970-8	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41217.D	1	07/21/15	JB	n/a	n/a	MSV1487
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	11.0	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P74-ROX-071015		
Lab Sample ID:	MC39970-8	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P74-ROX-071015		
Lab Sample ID:	MC39970-8	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	110%		72-133%
2037-26-5	Toluene-D8	103%		85-114%
460-00-4	4-Bromofluorobenzene	97%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P74-ROX-071015		
Lab Sample ID:	MC39970-8	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81776.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541
Run #2							

	Initial Volume	Final Volume
Run #1	920 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.4	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.40	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.54	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.51	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.44	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.32	ug/l	
108-95-2	Phenol	ND	5.4	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.37	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.4	0.89	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.4	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.55	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.4	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.59	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.4	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.4	0.45	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.4	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.4	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.4	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.4	0.41	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.4	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.4	0.78	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P74-ROX-071015		
Lab Sample ID:	MC39970-8	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.4	0.62	ug/l	
131-11-3	Dimethyl phthalate	ND	5.4	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.4	0.84	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.4	0.31	ug/l	
78-59-1	Isophorone	ND	5.4	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.0	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.4	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.4	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.4	0.56	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.4	0.84	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	46%		10-80%
4165-62-2	Phenol-d5	32%		10-72%
118-79-6	2,4,6-Tribromophenol	93%		42-134%
4165-60-0	Nitrobenzene-d5	103%		25-117%
321-60-8	2-Fluorobiphenyl	102%		24-112%
1718-51-0	Terphenyl-d14	121%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P74-ROX-071015		
Lab Sample ID:	MC39970-8	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96930.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626
Run #2							

	Initial Volume	Final Volume
Run #1	920 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0082	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0091	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.054	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.054	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	0.019	0.11	0.0080	ug/l	J
86-73-7	Fluorene	ND	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	0.020	2.2	0.013	ug/l	JB J
91-57-6	2-Methylnaphthalene	0.029	2.2	0.012	ug/l	JB J
85-01-8	Phenanthrene	ND	0.054	0.012	ug/l	
129-00-0	Pyrene	ND	0.11	0.0092	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	83%		26-121%
321-60-8	2-Fluorobiphenyl	89%		28-107%
1718-51-0	Terphenyl-d14	116%		29-129%

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P74-ROX-071015		
Lab Sample ID:	MC39970-8	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63858.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
Run #2							

	Initial Volume	Final Volume
Run #1	37.0 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	94%		60-140%
460-00-4	Bromofluorobenzene (S)	101%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015-EB		
Lab Sample ID:	MC39970-9	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41208.D	1	07/21/15	JB	n/a	n/a	MSV1487
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	0.49	1.0	0.17	ug/l	J
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015-EB		
Lab Sample ID:	MC39970-9	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015-EB		
Lab Sample ID:	MC39970-9	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	108%		72-133%
2037-26-5	Toluene-D8	100%		85-114%
460-00-4	4-Bromofluorobenzene	99%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015-EB		
Lab Sample ID:	MC39970-9	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81777.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.8	ug/l	
95-57-8	2-Chlorophenol	ND	5.6	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.41	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.56	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.8	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.52	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.45	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.8	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.33	ug/l	
108-95-2	Phenol	ND	5.6	0.28	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.38	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.8	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.6	0.91	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.6	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.56	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.6	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.60	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.6	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.6	0.46	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.6	0.27	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.6	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.6	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.7	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.6	0.42	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.6	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.6	0.80	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015-EB		
Lab Sample ID:	MC39970-9	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.6	0.63	ug/l	
131-11-3	Dimethyl phthalate	ND	5.6	0.30	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.6	0.85	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.6	0.32	ug/l	
78-59-1	Isophorone	ND	5.6	0.26	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.1	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.5	ug/l	
98-95-3	Nitrobenzene	ND	5.6	0.29	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.6	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.6	0.58	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.6	0.86	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	55%		10-80%
4165-62-2	Phenol-d5	37%		10-72%
118-79-6	2,4,6-Tribromophenol	107%		42-134%
4165-60-0	Nitrobenzene-d5	112%		25-117%
321-60-8	2-Fluorobiphenyl	101%		24-112%
1718-51-0	Terphenyl-d14	125%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015-EB		
Lab Sample ID:	MC39970-9	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96931.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0083	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0093	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.056	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.056	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.017	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0082	ug/l	
86-73-7	Fluorene	ND	0.11	0.017	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.023	ug/l	
90-12-0	1-Methylnaphthalene	0.020	2.2	0.014	ug/l	JB
91-57-6	2-Methylnaphthalene	0.028	2.2	0.012	ug/l	JB
85-01-8	Phenanthrene	ND	0.056	0.012	ug/l	
129-00-0	Pyrene	ND	0.11	0.0094	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	105%		26-121%
321-60-8	2-Fluorobiphenyl	86%		28-107%
1718-51-0	Terphenyl-d14	117%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015-EB		
Lab Sample ID:	MC39970-9	Date Sampled:	07/10/15
Matrix:	AQ - Equipment Blank	Date Received:	07/11/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63859.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
Run #2							

	Initial Volume	Final Volume
Run #1	36.7 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	93%		60-140%
460-00-4	Bromofluorobenzene (S)	93%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015		
Lab Sample ID:	MC39970-10	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41241.D	1	07/21/15	JB	n/a	n/a	MSV1488
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	68.3	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	3.4	5.0	0.50	ug/l	J
98-06-6	tert-Butylbenzene	0.68	5.0	0.57	ug/l	J
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015		
Lab Sample ID:	MC39970-10	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	29.7	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	57.0	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	2.7	5.0	0.32	ug/l	J
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	15.8	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	59.4	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	5.0	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	6.3	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	4.1	5.0	0.20	ug/l	J
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	70.2	1.0	0.47	ug/l	
95-47-6	o-Xylene	3.5	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	73.7	1.0	0.22	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015		
Lab Sample ID:	MC39970-10	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	97%		72-133%
2037-26-5	Toluene-D8	102%		85-114%
460-00-4	4-Bromofluorobenzene	102%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015		
Lab Sample ID:	MC39970-10	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81778.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.3	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.53	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.0	ug/l	
95-48-7	2-Methylphenol	ND	11	0.22	ug/l	
	3&4-Methylphenol	ND	11	0.49	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.43	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.31	ug/l	
108-95-2	Phenol	ND	5.3	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.31	ug/l	
62-53-3	Aniline	ND	11	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.3	0.86	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.3	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.3	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.57	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.3	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.3	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.3	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.3	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.3	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.3	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.3	0.39	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.3	0.76	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015		
Lab Sample ID:	MC39970-10	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.3	0.60	ug/l	
131-11-3	Dimethyl phthalate	ND	5.3	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.3	0.81	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.3	0.30	ug/l	
78-59-1	Isophorone	ND	5.3	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.3	ug/l	
98-95-3	Nitrobenzene	ND	5.3	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.3	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.3	0.55	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.3	0.81	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	49%		10-80%
4165-62-2	Phenol-d5	33%		10-72%
118-79-6	2,4,6-Tribromophenol	99%		42-134%
4165-60-0	Nitrobenzene-d5	97%		25-117%
321-60-8	2-Fluorobiphenyl	90%		24-112%
1718-51-0	Terphenyl-d14	111%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015		
Lab Sample ID:	MC39970-10	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96932.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.65	0.11	0.0079	ug/l	
208-96-8	Acenaphthylene	0.095	0.11	0.0088	ug/l	J
120-12-7	Anthracene	ND	0.11	0.010	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.053	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.053	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0078	ug/l	
86-73-7	Fluorene	0.33	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.021	ug/l	
90-12-0	1-Methylnaphthalene	26.2	2.1	0.013	ug/l	
91-57-6	2-Methylnaphthalene	11.9	2.1	0.012	ug/l	
85-01-8	Phenanthrene	1.4	0.053	0.011	ug/l	
129-00-0	Pyrene	0.029	0.11	0.0089	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	81%		26-121%
321-60-8	2-Fluorobiphenyl	86%		28-107%
1718-51-0	Terphenyl-d14	109%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P56-ROX-071015		
Lab Sample ID:	MC39970-10	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63861.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
Run #2							

	Initial Volume	Final Volume
Run #1	37.1 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	93%		60-140%
460-00-4	Bromofluorobenzene (S)	114%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	T12-ROX-071015		
Lab Sample ID:	MC39970-11	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41220.D	10	07/21/15	JB	n/a	n/a	MSV1487
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	100	20	ug/l	
107-02-8	Acrolein	ND	250	110	ug/l	
107-13-1	Acrylonitrile	ND	50	23	ug/l	
71-43-2	Benzene	2300	5.0	2.7	ug/l	
108-86-1	Bromobenzene	ND	50	2.6	ug/l	
74-97-5	Bromochloromethane	ND	50	3.7	ug/l	
75-27-4	Bromodichloromethane	ND	10	1.8	ug/l	
75-25-2	Bromoform	ND	10	3.9	ug/l	
74-83-9	Bromomethane	ND	20	7.9	ug/l	
78-93-3	2-Butanone (MEK)	ND	50	30	ug/l	
104-51-8	n-Butylbenzene	ND	50	5.0	ug/l	
135-98-8	sec-Butylbenzene	ND	50	5.0	ug/l	
98-06-6	tert-Butylbenzene	ND	50	5.7	ug/l	
75-15-0	Carbon disulfide	ND	50	1.9	ug/l	
56-23-5	Carbon tetrachloride	ND	10	3.4	ug/l	
108-90-7	Chlorobenzene	ND	10	2.4	ug/l	
75-00-3	Chloroethane	ND	20	4.9	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	50	13	ug/l	
67-66-3	Chloroform	ND	10	1.7	ug/l	
74-87-3	Chloromethane	ND	20	4.9	ug/l	
95-49-8	o-Chlorotoluene	ND	50	6.0	ug/l	
106-43-4	p-Chlorotoluene	ND	50	4.6	ug/l	
124-48-1	Dibromochloromethane	ND	10	2.2	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	10	2.4	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	10	2.4	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	10	3.7	ug/l	
75-71-8	Dichlorodifluoromethane	ND	20	5.3	ug/l	
75-34-3	1,1-Dichloroethane	ND	10	2.8	ug/l	
107-06-2	1,2-Dichloroethane	ND	10	3.1	ug/l	
75-35-4	1,1-Dichloroethene	ND	10	2.8	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	10	3.1	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	10	4.8	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	T12-ROX-071015		
Lab Sample ID:	MC39970-11	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	20	2.1	ug/l	
142-28-9	1,3-Dichloropropane	ND	50	2.9	ug/l	
594-20-7	2,2-Dichloropropane	ND	50	17	ug/l	
563-58-6	1,1-Dichloropropene	ND	50	2.3	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	5.0	2.7	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	5.0	4.3	ug/l	
123-91-1	1,4-Dioxane	ND	250	200	ug/l	
97-63-2	Ethyl methacrylate	ND	50	5.0	ug/l	
100-41-4	Ethylbenzene	197	10	2.4	ug/l	
87-68-3	Hexachlorobutadiene	ND	50	4.5	ug/l	
591-78-6	2-Hexanone	ND	50	27	ug/l	
98-82-8	Isopropylbenzene	22.2	50	2.7	ug/l	J
99-87-6	p-Isopropyltoluene	ND	50	3.2	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	10	3.5	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	50	7.7	ug/l	
74-95-3	Methylene bromide	ND	50	3.0	ug/l	
75-09-2	Methylene chloride	ND	20	2.7	ug/l	
91-20-3	Naphthalene	79.8	50	6.1	ug/l	
103-65-1	n-Propylbenzene	45.5	50	2.9	ug/l	J
100-42-5	Styrene	ND	50	2.8	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	10	2.5	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	5.0	2.9	ug/l	
127-18-4	Tetrachloroethene	ND	10	2.1	ug/l	
108-88-3	Toluene	78.2	10	2.9	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	50	7.8	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	50	7.4	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	10	4.2	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	10	3.2	ug/l	
79-01-6	Trichloroethene	ND	10	2.5	ug/l	
75-69-4	Trichlorofluoromethane	ND	10	4.7	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	50	3.9	ug/l	
95-63-6	1,2,4-Trimethylbenzene	185	50	2.9	ug/l	
108-67-8	1,3,5-Trimethylbenzene	17.3	50	2.0	ug/l	J
108-05-4	Vinyl Acetate	ND	50	14	ug/l	
75-01-4	Vinyl chloride	ND	10	4.5	ug/l	
	m,p-Xylene	594	10	4.7	ug/l	
95-47-6	o-Xylene	9.7	10	2.2	ug/l	J
1330-20-7	Xylene (total)	603	10	2.2	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	T12-ROX-071015		
Lab Sample ID:	MC39970-11	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	99%		72-133%
2037-26-5	Toluene-D8	100%		85-114%
460-00-4	4-Bromofluorobenzene	101%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	T12-ROX-071015		
Lab Sample ID:	MC39970-11	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81779.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541
Run #2							

	Initial Volume	Final Volume
Run #1	920 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.4	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.40	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	4.1	11	0.54	ug/l	J
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.51	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.44	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.32	ug/l	
108-95-2	Phenol	22.1	5.4	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.37	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.4	0.89	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.4	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.55	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.4	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.59	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.4	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.4	0.45	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.4	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.4	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.4	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.4	0.41	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.4	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.4	0.78	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	T12-ROX-071015		
Lab Sample ID:	MC39970-11	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.4	0.62	ug/l	
131-11-3	Dimethyl phthalate	ND	5.4	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.4	0.84	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.4	0.31	ug/l	
78-59-1	Isophorone	ND	5.4	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.0	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.4	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.4	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.4	0.56	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.4	0.84	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	53%		10-80%
4165-62-2	Phenol-d5	35%		10-72%
118-79-6	2,4,6-Tribromophenol	105%		42-134%
4165-60-0	Nitrobenzene-d5	104%		25-117%
321-60-8	2-Fluorobiphenyl	97%		24-112%
1718-51-0	Terphenyl-d14	118%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	T12-ROX-071015		
Lab Sample ID:	MC39970-11	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96933.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626
Run #2							

	Initial Volume	Final Volume
Run #1	920 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.34	0.11	0.0082	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0091	ug/l	
120-12-7	Anthracene	0.15	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.054	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.054	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	0.027	0.11	0.0080	ug/l	J
86-73-7	Fluorene	0.29	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	17.8	2.2	0.013	ug/l	
91-57-6	2-Methylnaphthalene	30.1	2.2	0.012	ug/l	
85-01-8	Phenanthrene	0.83	0.054	0.012	ug/l	
129-00-0	Pyrene	0.053	0.11	0.0092	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	89%		26-121%
321-60-8	2-Fluorobiphenyl	76%		28-107%
1718-51-0	Terphenyl-d14	115%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	T12-ROX-071015		
Lab Sample ID:	MC39970-11	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63862.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
Run #2							

	Initial Volume	Final Volume
Run #1	37.5 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	85%		60-140%
460-00-4	Bromofluorobenzene (S)	112%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

New England ACCUTEST LABORATORIES

Misc. Forms

Custody Documents and Other Forms

Includes the following where applicable:

- Chain of Custody
- Sample Tracking Chronicle
- Internal Chain of Custody

LAB (LOCATION)

☐ XENCO (_____)

☐ CALSCIENCE (_____)

☑ OTHER Accutest Labs; 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200) ☐ Lab Vendor # (_____)

☐ SPL (_____)

Lab Vendor #

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:

☑ ENV. SERVICES	☐ MOTIVA RETAIL	☐ SHELL RETAIL
☐ MOTIVA SD&CM	☐ CONSULTANT	☐ LUBES
☐ SHELL PIPELINE	☐ OTHER _____	

Print Bill To Contact Name: Bob Billman

PO #

INCIDENT # (ENV SERVICES): 9 7 2 1 8 6 4 0

SAP #: 3 4 0 0 6 1

☐ CHECK IF NO INCIDENT # APPLIES

DATE: 10 July 2015

PAGE: 1 of 2

SAMPLING COMPANY: AECOM

LOG CODE:

SITE ADDRESS: Street and City: 900 South Central Ave; ROXANA

State: IL

GLOBAL ID NO:

ADDRESS: 1001 HIGHLANDS PLAZA DRIVE WEST - SUITE 300; ST. LOUIS, MO 63110

EDF DELIVERABLE TO (Name, Company, Office Location):

PHONE NO:

E-MAIL:

CONSULTANT PROJECT NO: Roxana Quarterly GW / 60400249-21563720.03003

PROJECT CONTACT (hardcopy or PDF Report to): Elizabeth Kunkel, Bob Billman, Lindsay Rathnow

SAMPLER NAME(S) (PRINT): S. Fisher / D. Haxel / C. Williams / E. Schumacher

LAB USE ONLY: MC39970

TELEPHONE: 314-429-0100

FAX: 314-429-0462

Bill To Contact E-MAIL: Bobby.billman@aecom.com, elizabeth.kunkel@aecom.com, lindsay.rathnow@aecom.com

TURNAROUND TIME (CALENDAR DAYS):
☑ STANDARD (10 DAY) ☐ 5 DAYS ☐ 3 DAYS ☐ 2 DAYS ☐ 24 HOURS ☐ RESULTS NEEDED ☐ WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

DELIVERABLES: ☐ LEVEL 1 ☑ LEVEL 2 ☐ LEVEL 3 ☑ LEVEL 4 ☑ OTHER (SPECIFY) EDD

TEMPERATURE ON RECEIPT C° Cooler #1 | Cooler #2 | Cooler #3

SPECIAL INSTRUCTIONS OR NOTES:
* Please include "J" values on Reports.
* Please provide sample receipt upon login.

☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMBURSEMENT RATE APPLIES
☐ EDD NOT NEEDED
☑ RECEIPT VERIFICATION REQUESTED
☐ PROVIDE EDD DISK

REQUESTED ANALYSIS

FIELD NOTES:

TEMPERATURE ON RECEIPT C°: 2.4°C, 1.8°C

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
-1	TB-ROX-071015-HCL-A	7/10/15	0000	water	2				2	2	X				0.0
-2	TB-ROX-071015-ST-A		11						2	2		X			
-3	MW3-ROX-071015		1100		2			2	2	6	X	X	X	X	
-4	MW27-ROX-071015-EB		1225		2			2	2	6	X	X	X	X	
-5	MW27-ROX-071015		1355		2			2	2	6	X	X	X	X	
-6	TB-ROX-071015-HCL-B	7/10/15	0000	water	2			2 DUP	2	6 2	X				
-7	TB-ROX-071015-ST-B		11						2	2		X			19C, 2C3
-8	P74-ROX-071015		1035		2			2	2	6	X	X	X	X	
-9	P56-ROX-071015-EB		1235		2			2	2	6	X	X	X	X	
-10	P56-ROX-071015		1340		2			2	2	6	X	X	X	X	

Relinquished by (Signature)	Received by (Signature)	Date	Time
[signature]	FED EX # 8079 3189 1870	10 July 2015	
FX	[signature]	7/11/15	10:10

05.2.06 Revision

Custody seals 10 July 2015 -02A -03A -02B -03B

MC39970: Chain of Custody
Page 1 of 3

LAB (LOCATION)

- [ ] XENCO ( )
- [ ] CALSCIENCE ( )
- [x] OTHER Accutest Labs, 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200)
- [ ] SPL ( )

Lab Vendor # ( )

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:

- [x] ENV. SERVICES
- [ ] MOTIVA RETAIL
- [ ] SHELL RETAIL
- [ ] MOTIVA SD&CM
- [ ] CONSULTANT
- [ ] LUBES
- [ ] SHELL PIPELINE
- [ ] OTHER

Print Bill To Contact Name: Bob Billman

PO #

INCIDENT # (ENV SERVICES): 9 7 2 1 6 6 4 0

SAP #: 3 4 0 0 6 1

- [ ] CHECK IF NO INCIDENT # APPLIES

DATE: 10 July 2015

PAGE: 2 of 2

SAMPLING COMPANY: AECOM

LOG CODE:

SITE ADDRESS: Street and City: 900 South Central Ave: ROXANA

State: IL

GLOBAL ID NO.:

ACCRE #: 1001 HIGHLANDS PLAZA DRIVE WEST - SUITE 300; ST. LOUIS, MO 63110

EDF DELIVERABLE TO (Name, Company, Office Location):

PHONE NO:

EMAIL:

CONSULTANT PROJECT NO: Roxana Quarterly GW / 60400249-21563720.03003

PROJECT CONTACT (Handicap or PDF Report to): Elizabeth Kunkel, Bob Billman, Lindsay Rathnow

TELEPHONE: 314-429-0100

FAX: 314-429-0462

Bill To Contact E-MAIL: bob.billman@aecom.com, elizabeth.kunkel@aecom.com, lindsay.rathnow@aecom.com

SAMPLER NAME(S) (Print): S. Fisher / D. HAXEL / C. Williams / E. Schumacher

LAB USE ONLY: MC39970

TURNAROUND TIME (CALENDAR DAYS):

- [x] STANDARD (10 DAY)
- [ ] 5 DAYS
- [ ] 3 DAYS
- [ ] 2 DAYS
- [ ] 24 HOURS
- [ ] RESULTS NEEDED ON WEEKEND

- [ ] LA - RWQCB REPORT FORMAT
- [ ] UST AGENCY:

DELIVERABLES: [ ] LEVEL 1 [x] LEVEL 2 [ ] LEVEL 3 [x] LEVEL 4 [x] OTHER (SPECIFY) EDD

TEMPERATURE ON RECEIPT C°: Cooler #1 | Cooler #2 | Cooler #3

SPECIAL INSTRUCTIONS OR NOTES:

- Please include "J" values on Reports.
- Please provide sample receipt upon login.

- [x] SHELL CONTRACT RATE APPLIES
- [ ] STATE REIMBURSEMENT RATE APPLIES
- [ ] EDD NOT NEEDED
- [x] RECEIPT VERIFICATION REQUESTED
- [ ] PROVIDE LEDO DISK

REQUESTED ANALYSIS

FIELD NOTES:

TEMPERATURE ON RECEIPT C°

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
-11	T12-ROX-071015	7/10/15	1430	water	2			2	2	6	X	X	X	X	0.0

10 July 2015

Relinquished by (Signature)	Received by (Signature)	Date	Time
[signature]	FED EX # 8079 3189 1810	10 July 2015	
FX	[signature]	7/11/15	10:10

05/2/08 Revision

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MC39970: Chain of Custody
Page 2 of 3

Accutest Laboratories Sample Receipt Summary

Accutest Job Number: MC39970 **Client:** AECOM **Project:** 900 SOUTH CENTRAL AVE

Date / Time Received: 7/11/2015 10:10:00 AM **Delivery Method:** **Airbill #'s:**

Cooler Temps (Initial/Adjusted): #1: (2.4/2.4); #2: (1.8/1.8);

Cooler Security	Y or N		Y or N
1. Custody Seals Present:	☑ ☐	3. COC Present:	☑ ☐
2. Custody Seals Intact:	☑ ☐	4. Smpl Dates/Time OK	☑ ☐

Cooler Temperature	Y or N
1. Temp criteria achieved:	☑ ☐
2. Thermometer ID:	G1;
3. Cooler media:	Ice (Bag)
4. No. Coolers:	2

Quality Control Preservation	Y or N	N/A
1. Trip Blank present / cooler:	☑ ☐	☐
2. Trip Blank listed on COC:	☑ ☐	☐
3. Samples preserved properly:	☑ ☐	
4. VOCs headspace free:	☑ ☐	☐

Sample Integrity - Documentation	Y or N
1. Sample labels present on bottles:	☑ ☐
2. Container labeling complete:	☑ ☐
3. Sample container label / COC agree:	☑ ☐

Sample Integrity - Condition	Y or N
1. Sample recvd within HT:	☑ ☐
2. All containers accounted for:	☑ ☐
3. Condition of sample:	Intact

Sample Integrity - Instructions	Y or N	N/A
1. Analysis requested is clear:	☑ ☐	
2. Bottles received for unspecified tests	☐ ☑	
3. Sufficient volume recvd for analysis:	☑ ☐	
4. Compositing instructions clear:	☐ ☐	☑
5. Filtering instructions clear:	☐ ☐	☑

Comments

Accutest Laboratories
V:(508) 481-6200

495 Technology Center West, Bldg One
F: (508) 481-7753

Marlborough, MA 01752
www/accutest.com

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MC39970: Chain of Custody
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Internal Sample Tracking Chronicle

Shell Oil

Job No: MC39970

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC39970-1 Collected: 10-JUL-15 00:00 By: SFDH Received: 11-JUL-15 By: TB-ROX-071015-HCL-A						
MC39970-1	SW846 8260C	20-JUL-15 23:58	JB			V8260SL+
MC39970-2 Collected: 10-JUL-15 00:00 By: SFDH Received: 11-JUL-15 By: TB-ROX-071015-ST-A						
MC39970-2	SW846 8011	22-JUL-15 10:53	NK	21-JUL-15	MD	V8011SL
MC39970-3 Collected: 10-JUL-15 11:00 By: SFDH Received: 11-JUL-15 By: MW3-ROX-071015						
MC39970-3	SW846 8260C	21-JUL-15 04:43	JB			V8260SL+
MC39970-3	SW846 8011	22-JUL-15 11:21	NK	21-JUL-15	MD	V8011SL
MC39970-3	SW846 8270D BY SIM	23-JUL-15 17:27	MR	13-JUL-15	AJ	B8270SIMSL
MC39970-3	SW846 8270D	24-JUL-15 09:59	MR	13-JUL-15	AJ	AB8270SL+
MC39970-4 Collected: 10-JUL-15 12:25 By: SFDH Received: 11-JUL-15 By: MW27-ROX-071015-EB						
MC39970-4	SW846 8260C	21-JUL-15 00:27	JB			V8260SL+
MC39970-4	SW846 8011	22-JUL-15 11:49	NK	21-JUL-15	MD	V8011SL
MC39970-4	SW846 8270D BY SIM	23-JUL-15 17:50	MR	13-JUL-15	AJ	B8270SIMSL
MC39970-4	SW846 8270D	24-JUL-15 10:22	MR	13-JUL-15	AJ	AB8270SL+
MC39970-5 Collected: 10-JUL-15 13:55 By: SFDH Received: 11-JUL-15 By: MW27-ROX-071015						
MC39970-5	SW846 8260C	21-JUL-15 05:11	JB			V8260SL+
MC39970-5	SW846 8011	22-JUL-15 12:17	NK	21-JUL-15	MD	V8011SL
MC39970-5	SW846 8270D BY SIM	23-JUL-15 18:13	MR	13-JUL-15	AJ	B8270SIMSL
MC39970-5	SW846 8270D	24-JUL-15 10:45	MR	13-JUL-15	AJ	AB8270SL+
MC39970-6 Collected: 10-JUL-15 00:00 By: SFDH Received: 11-JUL-15 By: TB-ROX-071015-HCL-B						
MC39970-6	SW846 8260C	21-JUL-15 00:55	JB			V8260SL+

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC39970

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC39970-7 Collected: 10-JUL-15 00:00 By: SFDH Received: 11-JUL-15 By: TB-ROX-071015-ST-B						
MC39970-7	SW846 8011	22-JUL-15 12:45	NK	21-JUL-15	MD	V8011SL
MC39970-8 Collected: 10-JUL-15 10:35 By: SFDH Received: 11-JUL-15 By: P74-ROX-071015						
MC39970-8	SW846 8260C	21-JUL-15 05:40	JB			V8260SL+
MC39970-8	SW846 8011	22-JUL-15 13:13	NK	21-JUL-15	MD	V8011SL
MC39970-8	SW846 8270D BY SIM	23-JUL-15 18:36	MR	13-JUL-15	AJ	B8270SIMSL
MC39970-8	SW846 8270D	24-JUL-15 11:09	MR	13-JUL-15	AJ	AB8270SL+
MC39970-9 Collected: 10-JUL-15 12:35 By: SFDH Received: 11-JUL-15 By: P56-ROX-071015-EB						
MC39970-9	SW846 8260C	21-JUL-15 01:24	JB			V8260SL+
MC39970-9	SW846 8011	22-JUL-15 13:41	NK	21-JUL-15	MD	V8011SL
MC39970-9	SW846 8270D BY SIM	23-JUL-15 18:59	MR	13-JUL-15	AJ	B8270SIMSL
MC39970-9	SW846 8270D	24-JUL-15 11:32	MR	13-JUL-15	AJ	AB8270SL+
MC39970-10 Collected: 10-JUL-15 13:40 By: SFDH Received: 11-JUL-15 By: P56-ROX-071015						
MC39970-10	SW846 8260C	21-JUL-15 17:10	JB			V8260SL+
MC39970-10	SW846 8011	22-JUL-15 14:37	NK	21-JUL-15	MD	V8011SL
MC39970-10	SW846 8270D BY SIM	23-JUL-15 19:22	MR	13-JUL-15	AJ	B8270SIMSL
MC39970-10	SW846 8270D	24-JUL-15 11:55	MR	13-JUL-15	AJ	AB8270SL+
MC39970-11 Collected: 10-JUL-15 14:30 By: SFDH Received: 11-JUL-15 By: T12-ROX-071015						
MC39970-11	SW846 8260C	21-JUL-15 07:05	JB			V8260SL+
MC39970-11	SW846 8011	22-JUL-15 15:05	NK	21-JUL-15	MD	V8011SL
MC39970-11	SW846 8270D BY SIM	23-JUL-15 19:45	MR	13-JUL-15	AJ	B8270SIMSL
MC39970-11	SW846 8270D	24-JUL-15 12:19	MR	13-JUL-15	AJ	AB8270SL+

Accutest Internal Chain of Custody

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/11/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39970-1.2	VOC Ref #2	Jaclyn Bergeron	07/20/15 15:03	Retrieve from Storage
MC39970-1.2	Jaclyn Bergeron	GCMSV	07/20/15 15:03	Load on Instrument
MC39970-1.2	GCMSV	Jaclyn Bergeron	07/21/15 09:42	Unload from Instrument
MC39970-1.2	Jaclyn Bergeron	VOC Ref #2	07/21/15 09:42	Return to Storage
MC39970-2.1	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39970-2.1	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39970-2.2	VOC Ref #2	Elizabeth Stefanik	07/21/15 14:28	Retrieve from Storage
MC39970-2.2	Elizabeth Stefanik		07/21/15 18:29	Depleted
MC39970-3.1	Walk In Ref #22	Forrest Thompson	07/13/15 14:25	Retrieve from Storage
MC39970-3.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39970-3.3	VOC Ref #2	Elizabeth Stefanik	07/21/15 14:28	Retrieve from Storage
MC39970-3.3	Elizabeth Stefanik		07/21/15 18:29	Depleted
MC39970-3.4	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39970-3.4	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39970-3.6	VOC Ref #2	Jaclyn Bergeron	07/20/15 15:03	Retrieve from Storage
MC39970-3.6	Jaclyn Bergeron	GCMSV	07/20/15 15:03	Load on Instrument
MC39970-3.6	GCMSV	Jaclyn Bergeron	07/21/15 09:42	Unload from Instrument
MC39970-3.6	Jaclyn Bergeron	VOC Ref #2	07/21/15 09:42	Return to Storage
MC39970-4.2	Walk In Ref #22	James Marsden	07/13/15 15:01	Retrieve from Storage
MC39970-4.2	James Marsden		07/16/15 00:15	Depleted
MC39970-4.3	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39970-4.3	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39970-4.4	VOC Ref #2	Elizabeth Stefanik	07/21/15 14:28	Retrieve from Storage
MC39970-4.4	Elizabeth Stefanik		07/21/15 18:29	Depleted
MC39970-4.5	VOC Ref #2	Jaclyn Bergeron	07/20/15 15:03	Retrieve from Storage
MC39970-4.5	Jaclyn Bergeron	GCMSV	07/20/15 15:03	Load on Instrument
MC39970-4.5	GCMSV	Jaclyn Bergeron	07/21/15 09:42	Unload from Instrument
MC39970-4.5	Jaclyn Bergeron	VOC Ref #2	07/21/15 09:42	Return to Storage
MC39970-5.2	Walk In Ref #22	Forrest Thompson	07/13/15 14:25	Retrieve from Storage
MC39970-5.2	Forrest Thompson		07/15/15 21:43	Depleted
MC39970-5.3	VOC Ref #2	Elizabeth Stefanik	07/21/15 14:28	Retrieve from Storage
MC39970-5.3	Elizabeth Stefanik		07/21/15 18:29	Depleted

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Accutest Internal Chain of Custody

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/11/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39970-5.4	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39970-5.4	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39970-5.5	VOC Ref #2	Jaclyn Bergeron	07/20/15 15:03	Retrieve from Storage
MC39970-5.5	Jaclyn Bergeron	GCMSV	07/20/15 15:03	Load on Instrument
MC39970-5.5	GCMSV	Jaclyn Bergeron	07/21/15 09:42	Unload from Instrument
MC39970-5.5	Jaclyn Bergeron	VOC Ref #2	07/21/15 09:42	Return to Storage
MC39970-6.2	VOC Ref #2	Jaclyn Bergeron	07/20/15 15:03	Retrieve from Storage
MC39970-6.2	Jaclyn Bergeron	GCMSV	07/20/15 15:03	Load on Instrument
MC39970-6.2	GCMSV	Jaclyn Bergeron	07/21/15 09:42	Unload from Instrument
MC39970-6.2	Jaclyn Bergeron	VOC Ref #2	07/21/15 09:42	Return to Storage
MC39970-7.1	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39970-7.1	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39970-7.2	VOC Ref #2	Elizabeth Stefanik	07/21/15 14:28	Retrieve from Storage
MC39970-7.2	Elizabeth Stefanik		07/21/15 18:29	Depleted
MC39970-8.2	Walk In Ref #22	Forrest Thompson	07/13/15 14:25	Retrieve from Storage
MC39970-8.2	Forrest Thompson		07/15/15 21:43	Depleted
MC39970-8.3	VOC Ref #2	Elizabeth Stefanik	07/21/15 14:28	Retrieve from Storage
MC39970-8.3	Elizabeth Stefanik		07/21/15 18:29	Depleted
MC39970-8.4	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39970-8.4	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39970-8.6	VOC Ref #2	Jaclyn Bergeron	07/20/15 15:03	Retrieve from Storage
MC39970-8.6	Jaclyn Bergeron	GCMSV	07/20/15 15:03	Load on Instrument
MC39970-8.6	GCMSV	Jaclyn Bergeron	07/21/15 09:42	Unload from Instrument
MC39970-8.6	Jaclyn Bergeron	VOC Ref #2	07/21/15 09:42	Return to Storage
MC39970-9.1	Walk In Ref #22	Forrest Thompson	07/13/15 14:25	Retrieve from Storage
MC39970-9.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39970-9.3	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39970-9.3	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39970-9.4	VOC Ref #2	Elizabeth Stefanik	07/21/15 14:28	Retrieve from Storage
MC39970-9.4	Elizabeth Stefanik		07/21/15 18:29	Depleted
MC39970-9.6	VOC Ref #2	Jaclyn Bergeron	07/20/15 15:03	Retrieve from Storage

Accutest Internal Chain of Custody

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/11/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39970-9.6	Jaclyn Bergeron	GCMSV	07/20/15 15:03	Load on Instrument
MC39970-9.6	GCMSV	Jaclyn Bergeron	07/21/15 09:42	Unload from Instrument
MC39970-9.6	Jaclyn Bergeron	VOC Ref #2	07/21/15 09:42	Return to Storage
MC39970-10.1	Walk In Ref #22	Forrest Thompson	07/13/15 14:25	Retrieve from Storage
MC39970-10.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39970-10.3	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39970-10.3	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39970-10.4	VOC Ref #2	Elizabeth Stefanik	07/21/15 14:28	Retrieve from Storage
MC39970-10.4	Elizabeth Stefanik		07/21/15 18:29	Depleted
MC39970-10.5	VOC Ref #2	Jaclyn Bergeron	07/21/15 09:51	Retrieve from Storage
MC39970-10.5	Jaclyn Bergeron	GCMSV	07/21/15 09:51	Load on Instrument
MC39970-10.5	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC39970-10.5	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC39970-10.6	VOC Ref #2	Jaclyn Bergeron	07/20/15 15:03	Retrieve from Storage
MC39970-10.6	Jaclyn Bergeron	GCMSV	07/20/15 15:03	Load on Instrument
MC39970-10.6	GCMSV	Jaclyn Bergeron	07/21/15 09:42	Unload from Instrument
MC39970-10.6	Jaclyn Bergeron	VOC Ref #2	07/21/15 09:42	Return to Storage
MC39970-11.1	Walk In Ref #22	Forrest Thompson	07/13/15 14:25	Retrieve from Storage
MC39970-11.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39970-11.3	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39970-11.3	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39970-11.4	VOC Ref #2	Elizabeth Stefanik	07/21/15 14:28	Retrieve from Storage
MC39970-11.4	Elizabeth Stefanik		07/21/15 18:29	Depleted
MC39970-11.6	VOC Ref #2	Jaclyn Bergeron	07/20/15 15:03	Retrieve from Storage
MC39970-11.6	Jaclyn Bergeron	GCMSV	07/20/15 15:03	Load on Instrument
MC39970-11.6	GCMSV	Jaclyn Bergeron	07/21/15 09:42	Unload from Instrument
MC39970-11.6	Jaclyn Bergeron	VOC Ref #2	07/21/15 09:42	Return to Storage

5.3

New England ACCUTEST LABORATORIES

GC/MS Volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1487-MB	V41204.D	1	07/20/15	JB	n/a	n/a	MSV1487

The QC reported here applies to the following samples: Method: SW846 8260C

MC39970-1, MC39970-3, MC39970-4, MC39970-5, MC39970-6, MC39970-8, MC39970-9, MC39970-11

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	

Method Blank Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1487-MB	V41204.D	1	07/20/15	JB	n/a	n/a	MSV1487

The QC reported here applies to the following samples: Method: SW846 8260C

MC39970-1, MC39970-3, MC39970-4, MC39970-5, MC39970-6, MC39970-8, MC39970-9, MC39970-11

CAS No.	Compound	Result	RL	MDL	Units	Q
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

Method Blank Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1487-MB	V41204.D	1	07/20/15	JB	n/a	n/a	MSV1487

The QC reported here applies to the following samples: Method: SW846 8260C

MC39970-1, MC39970-3, MC39970-4, MC39970-5, MC39970-6, MC39970-8, MC39970-9, MC39970-11

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	100%	72-133%
2037-26-5	Toluene-D8	100%	85-114%
460-00-4	4-Bromofluorobenzene	98%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

Method Blank Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1488-MB	V41227.D	1	07/21/15	JB	n/a	n/a	MSV1488

The QC reported here applies to the following samples: Method: SW846 8260C

MC39970-10

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	

Method Blank Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1488-MB	V41227.D	1	07/21/15	JB	n/a	n/a	MSV1488

The QC reported here applies to the following samples: Method: SW846 8260C

MC39970-10

CAS No.	Compound	Result	RL	MDL	Units	Q
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

Method Blank Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1488-MB	V41227.D	1	07/21/15	JB	n/a	n/a	MSV1488

6.1.2

The QC reported here applies to the following samples: Method: SW846 8260C

MC39970-10

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	104%	72-133%
2037-26-5	Toluene-D8	98%	85-114%
460-00-4	4-Bromofluorobenzene	98%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1487-BS	V41201.D	1	07/20/15	JB	n/a	n/a	MSV1487
MSV1487-BSD	V41202.D	1	07/20/15	JB	n/a	n/a	MSV1487

The QC reported here applies to the following samples: Method: SW846 8260C

MC39970-1, MC39970-3, MC39970-4, MC39970-5, MC39970-6, MC39970-8, MC39970-9, MC39970-11

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	54.5	109	70.9	142	26* a	14-172/25
107-02-8	Acrolein	250	376	150	362	145	4	10-168/25
107-13-1	Acrylonitrile	50	56.8	114	55.4	111	2	41-158/25
71-43-2	Benzene	50	54.4	109	56.2	112	3	68-127/25
108-86-1	Bromobenzene	50	53.5	107	52.9	106	1	74-124/25
74-97-5	Bromochloromethane	50	53.6	107	53.1	106	1	68-135/25
75-27-4	Bromodichloromethane	50	48.7	97	48.2	96	1	72-144/25
75-25-2	Bromoform	50	49.0	98	47.9	96	2	59-147/25
74-83-9	Bromomethane	50	56.9	114	54.9	110	4	34-175/25
78-93-3	2-Butanone (MEK)	50	55.5	111	65.2	130	16	43-147/25
104-51-8	n-Butylbenzene	50	59.2	118	60.2	120	2	77-136/25
135-98-8	sec-Butylbenzene	50	57.1	114	57.0	114	0	75-134/25
98-06-6	tert-Butylbenzene	50	60.4	121	58.9	118	3	74-132/25
75-15-0	Carbon disulfide	50	76.8	154	69.2	138	10	34-171/25
56-23-5	Carbon tetrachloride	50	59.7	119	60.9	122	2	55-153/25
108-90-7	Chlorobenzene	50	51.1	102	52.0	104	2	71-123/25
75-00-3	Chloroethane	50	58.3	117	55.7	111	5	58-175/25
110-75-8	2-Chloroethyl vinyl ether	50	46.2	92	47.1	94	2	44-169/25
67-66-3	Chloroform	50	50.2	100	51.1	102	2	67-136/25
74-87-3	Chloromethane	50	55.0	110	54.1	108	2	25-182/25
95-49-8	o-Chlorotoluene	50	55.8	112	56.9	114	2	72-130/25
106-43-4	p-Chlorotoluene	50	55.2	110	56.0	112	1	73-127/25
124-48-1	Dibromochloromethane	50	49.6	99	47.9	96	3	73-139/25
95-50-1	1,2-Dichlorobenzene	50	51.6	103	51.4	103	0	77-125/25
541-73-1	1,3-Dichlorobenzene	50	52.0	104	52.6	105	1	77-124/25
106-46-7	1,4-Dichlorobenzene	50	49.9	100	50.4	101	1	73-128/25
75-71-8	Dichlorodifluoromethane	50	45.2	90	46.5	93	3	23-157/25
75-34-3	1,1-Dichloroethane	50	53.7	107	54.4	109	1	63-145/25
107-06-2	1,2-Dichloroethane	50	51.3	103	50.3	101	2	58-145/25
75-35-4	1,1-Dichloroethene	50	70.6	141	63.6	127	10	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	57.7	115	60.0	120	4	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	55.7	111	57.4	115	3	66-136/25
78-87-5	1,2-Dichloropropane	50	50.4	101	51.5	103	2	75-133/25
142-28-9	1,3-Dichloropropane	50	52.8	106	51.9	104	2	70-127/25
594-20-7	2,2-Dichloropropane	50	53.0	106	51.8	104	2	52-163/25
563-58-6	1,1-Dichloropropene	50	52.7	105	54.4	109	3	77-140/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1487-BS	V41201.D	1	07/20/15	JB	n/a	n/a	MSV1487
MSV1487-BSD	V41202.D	1	07/20/15	JB	n/a	n/a	MSV1487

The QC reported here applies to the following samples: Method: SW846 8260C

MC39970-1, MC39970-3, MC39970-4, MC39970-5, MC39970-6, MC39970-8, MC39970-9, MC39970-11

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	50	61.9	124	61.1	122	1	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	53.0	106	52.2	104	2	77-143/25
123-91-1	1,4-Dioxane	250	213	85	227	91	6	30-182/25
97-63-2	Ethyl methacrylate	50	53.9	108	54.2	108	1	64-131/25
100-41-4	Ethylbenzene	50	53.9	108	55.6	111	3	71-129/25
87-68-3	Hexachlorobutadiene	50	47.6	95	47.7	95	0	64-146/25
591-78-6	2-Hexanone	50	52.8	106	70.2	140	28* a	22-163/25
98-82-8	Isopropylbenzene	50	59.6	119	59.9	120	1	72-133/25
99-87-6	p-Isopropyltoluene	50	59.6	119	60.2	120	1	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	58.2	116	54.6	109	6	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	55.0	110	56.3	113	2	47-145/25
74-95-3	Methylene bromide	50	50.4	101	49.1	98	3	70-132/25
75-09-2	Methylene chloride	50	56.7	113	52.1	104	8	55-146/25
91-20-3	Naphthalene	50	40.5	81	37.2	74	8	39-176/25
103-65-1	n-Propylbenzene	50	56.5	113	57.8	116	2	74-134/25
100-42-5	Styrene	50	59.6	119	60.9	122	2	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	51.3	103	50.9	102	1	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	49.5	99	47.4	95	4	58-145/25
127-18-4	Tetrachloroethene	50	50.4	101	51.8	104	3	63-137/25
108-88-3	Toluene	50	51.5	103	53.0	106	3	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	50.8	102	48.0	96	6	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	47.4	95	44.9	90	5	40-176/25
71-55-6	1,1,1-Trichloroethane	50	54.6	109	53.6	107	2	68-144/25
79-00-5	1,1,2-Trichloroethane	50	50.8	102	50.3	101	1	72-133/25
79-01-6	Trichloroethene	50	51.6	103	52.7	105	2	73-126/25
75-69-4	Trichlorofluoromethane	50	51.7	103	50.2	100	3	43-152/25
96-18-4	1,2,3-Trichloropropane	50	53.5	107	52.1	104	3	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	59.2	118	59.7	119	1	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	60.4	121	60.5	121	0	71-127/25
108-05-4	Vinyl Acetate	50	56.9	114	54.2	108	5	10-170/25
75-01-4	Vinyl chloride	50	56.1	112	53.3	107	5	36-167/25
	m,p-Xylene	100	112	112	115	115	3	68-130/25
95-47-6	o-Xylene	50	56.7	113	58.7	117	3	69-126/25
1330-20-7	Xylene (total)	150	168	112	174	116	4	67-129/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1487-BS	V41201.D	1	07/20/15	JB	n/a	n/a	MSV1487
MSV1487-BSD	V41202.D	1	07/20/15	JB	n/a	n/a	MSV1487

The QC reported here applies to the following samples: Method: SW846 8260C

MC39970-1, MC39970-3, MC39970-4, MC39970-5, MC39970-6, MC39970-8, MC39970-9, MC39970-11

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	98%	95%	72-133%
2037-26-5	Toluene-D8	102%	102%	85-114%
460-00-4	4-Bromofluorobenzene	103%	102%	70-134%

(a) Outside control limits. Individual spike recoveries within acceptance limits.

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1488-BS	V41224.D	1	07/21/15	JB	n/a	n/a	MSV1488
MSV1488-BSD	V41225.D	1	07/21/15	JB	n/a	n/a	MSV1488

The QC reported here applies to the following samples: Method: SW846 8260C

MC39970-10

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	61.4	123	60.1	120	2	14-172/25
107-02-8	Acrolein	250	371	148	388	155	4	10-168/25
107-13-1	Acrylonitrile	50	53.5	107	53.1	106	1	41-158/25
71-43-2	Benzene	50	53.0	106	51.9	104	2	68-127/25
108-86-1	Bromobenzene	50	49.8	100	49.6	99	0	74-124/25
74-97-5	Bromochloromethane	50	50.4	101	50.4	101	0	68-135/25
75-27-4	Bromodichloromethane	50	46.3	93	46.2	92	0	72-144/25
75-25-2	Bromoform	50	44.3	89	44.6	89	1	59-147/25
74-83-9	Bromomethane	50	56.2	112	55.5	111	1	34-175/25
78-93-3	2-Butanone (MEK)	50	59.2	118	60.0	120	1	43-147/25
104-51-8	n-Butylbenzene	50	58.8	118	56.5	113	4	77-136/25
135-98-8	sec-Butylbenzene	50	55.1	110	53.7	107	3	75-134/25
98-06-6	tert-Butylbenzene	50	55.9	112	54.8	110	2	74-132/25
75-15-0	Carbon disulfide	50	65.4	131	70.1	140	7	34-171/25
56-23-5	Carbon tetrachloride	50	59.3	119	57.8	116	3	55-153/25
108-90-7	Chlorobenzene	50	48.9	98	47.8	96	2	71-123/25
75-00-3	Chloroethane	50	57.5	115	57.6	115	0	58-175/25
110-75-8	2-Chloroethyl vinyl ether	50	46.1	92	47.8	96	4	44-169/25
67-66-3	Chloroform	50	49.2	98	48.7	97	1	67-136/25
74-87-3	Chloromethane	50	56.8	114	54.4	109	4	25-182/25
95-49-8	o-Chlorotoluene	50	53.7	107	52.6	105	2	72-130/25
106-43-4	p-Chlorotoluene	50	53.1	106	52.0	104	2	73-127/25
124-48-1	Dibromochloromethane	50	45.3	91	45.0	90	1	73-139/25
95-50-1	1,2-Dichlorobenzene	50	48.7	97	48.0	96	1	77-125/25
541-73-1	1,3-Dichlorobenzene	50	49.6	99	49.4	99	0	77-124/25
106-46-7	1,4-Dichlorobenzene	50	47.6	95	46.8	94	2	73-128/25
75-71-8	Dichlorodifluoromethane	50	51.5	103	50.7	101	2	23-157/25
75-34-3	1,1-Dichloroethane	50	52.7	105	51.9	104	2	63-145/25
107-06-2	1,2-Dichloroethane	50	49.0	98	49.4	99	1	58-145/25
75-35-4	1,1-Dichloroethene	50	60.1	120	64.8	130	8	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	55.9	112	55.4	111	1	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	54.3	109	52.4	105	4	66-136/25
78-87-5	1,2-Dichloropropane	50	48.7	97	47.8	96	2	75-133/25
142-28-9	1,3-Dichloropropane	50	48.9	98	49.2	98	1	70-127/25
594-20-7	2,2-Dichloropropane	50	55.5	111	55.4	111	0	52-163/25
563-58-6	1,1-Dichloropropene	50	51.3	103	50.5	101	2	77-140/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1488-BS	V41224.D	1	07/21/15	JB	n/a	n/a	MSV1488
MSV1488-BSD	V41225.D	1	07/21/15	JB	n/a	n/a	MSV1488

The QC reported here applies to the following samples: Method: SW846 8260C

MC39970-10

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	50	59.4	119	59.7	119	1	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	51.0	102	51.7	103	1	77-143/25
123-91-1	1,4-Dioxane	250	190	76	173	69	9	30-182/25
97-63-2	Ethyl methacrylate	50	52.5	105	51.7	103	2	64-131/25
100-41-4	Ethylbenzene	50	53.2	106	50.9	102	4	71-129/25
87-68-3	Hexachlorobutadiene	50	46.5	93	47.5	95	2	64-146/25
591-78-6	2-Hexanone	50	60.7	121	59.2	118	3	22-163/25
98-82-8	Isopropylbenzene	50	56.8	114	55.6	111	2	72-133/25
99-87-6	p-Isopropyltoluene	50	57.4	115	56.5	113	2	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	52.0	104	54.8	110	5	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	53.5	107	52.4	105	2	47-145/25
74-95-3	Methylene bromide	50	46.6	93	48.2	96	3	70-132/25
75-09-2	Methylene chloride	50	49.5	99	53.1	106	7	55-146/25
91-20-3	Naphthalene	50	35.2	70	37.4	75	6	39-176/25
103-65-1	n-Propylbenzene	50	55.4	111	53.8	108	3	74-134/25
100-42-5	Styrene	50	57.3	115	55.7	111	3	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	48.5	97	46.6	93	4	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	46.2	92	46.2	92	0	58-145/25
127-18-4	Tetrachloroethene	50	48.4	97	47.2	94	3	63-137/25
108-88-3	Toluene	50	51.1	102	49.3	99	4	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	45.3	91	49.4	99	9	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	42.8	86	44.6	89	4	40-176/25
71-55-6	1,1,1-Trichloroethane	50	51.9	104	52.0	104	0	68-144/25
79-00-5	1,1,2-Trichloroethane	50	48.0	96	48.2	96	0	72-133/25
79-01-6	Trichloroethene	50	49.1	98	48.7	97	1	73-126/25
75-69-4	Trichlorofluoromethane	50	52.0	104	52.0	104	0	43-152/25
96-18-4	1,2,3-Trichloropropane	50	50.2	100	50.0	100	0	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	57.3	115	55.7	111	3	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	57.7	115	56.5	113	2	71-127/25
108-05-4	Vinyl Acetate	50	56.0	112	56.7	113	1	10-170/25
75-01-4	Vinyl chloride	50	54.4	109	55.0	110	1	36-167/25
	m,p-Xylene	100	110	110	105	105	5	68-130/25
95-47-6	o-Xylene	50	55.4	111	52.9	106	5	69-126/25
1330-20-7	Xylene (total)	150	165	110	158	105	4	67-129/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1488-BS	V41224.D	1	07/21/15	JB	n/a	n/a	MSV1488
MSV1488-BSD	V41225.D	1	07/21/15	JB	n/a	n/a	MSV1488

The QC reported here applies to the following samples: Method: SW846 8260C

MC39970-10

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	97%	98%	72-133%
2037-26-5	Toluene-D8	104%	102%	85-114%
460-00-4	4-Bromofluorobenzene	101%	102%	70-134%

* = Outside of Control Limits.

Volatile Internal Standard Area Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSV1487-CC1479	Injection Date:	07/20/15
Lab File ID:	V41201.D	Injection Time:	22:04
Instrument ID:	GCMSV	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	728197	6.58	1160659	7.77	529681	11.09	530620	13.30	100489	3.55
Upper Limit [a]	1456394	7.08	2321318	8.27	1059362	11.59	1061240	13.80	200978	4.05
Lower Limit [b]	364099	6.08	580330	7.27	264841	10.59	265310	12.80	50245	3.05
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSV1487-BS	728197	6.58	1160659	7.77	529681	11.09	530620	13.30	100489	3.55
MSV1487-BSD	679820	6.58	1043541	7.76	479979	11.09	490872	13.30	86418	3.54
MSV1487-MB	627164	6.58	988206	7.76	438577	11.09	449338	13.30	81705	3.55
MC39970-1	599100	6.58	964822	7.76	427868	11.09	439418	13.30	85990	3.54
MC39970-4	580780	6.58	925742	7.76	410165	11.09	417992	13.30	75273	3.55
MC39970-6	584374	6.58	932075	7.76	421811	11.09	430577	13.30	83773	3.55
MC39970-9	590229	6.59	956435	7.77	430619	11.09	429423	13.30	78362	3.55
ZZZZZZ	527648	6.58	864992	7.76	400652	11.09	411419	13.30	77176	3.54
ZZZZZZ	589703	6.59	961824	7.77	436058	11.09	439023	13.30	74554	3.56
ZZZZZZ	550034	6.58	915245	7.76	420424	11.09	424228	13.30	75805	3.54
ZZZZZZ	526407	6.58	866021	7.76	399489	11.09	401793	13.30	65196	3.54
ZZZZZZ	541272	6.58	891795	7.77	408095	11.09	408528	13.30	73944	3.55
ZZZZZZ	523728	6.58	864513	7.76	400948	11.09	412187	13.30	78475	3.55
MC39970-3	692208	6.58	1007301	7.76	468918	11.09	458095	13.30	136824	3.55
MC39970-5	546734	6.59	910469	7.77	417072	11.09	416676	13.30	78333	3.56
MC39970-8	536674	6.58	875147	7.76	406363	11.09	414677	13.30	77423	3.55
ZZZZZZ	540918	6.58	892866	7.77	415657	11.09	413936	13.30	74104	3.55
MC39970-11	666810	6.58	1045001	7.76	472783	11.09	480706	13.30	117101	3.55
ZZZZZZ	599047	6.58	906118	7.76	418743	11.09	433912	13.30	84096	3.56

IS 1 = Pentafluorobenzene
IS 2 = 1,4-Difluorobenzene
IS 3 = Chlorobenzene-D5
IS 4 = 1,4-Dichlorobenzene-d4
IS 5 = Tert Butyl Alcohol-D9

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

6.3.1

Volatile Internal Standard Area Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSV1488-CC1479	Injection Date:	07/21/15
Lab File ID:	V41224.D	Injection Time:	09:05
Instrument ID:	GCMSV	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	1019894	7.77	478183	11.09	85371	3.56	666181	6.58	489473	13.30
Upper Limit [a]	2039788	8.27	956366	11.59	170742	4.06	1332362	7.08	978946	13.80
Lower Limit [b]	509947	7.27	239092	10.59	42686	3.06	333091	6.08	244737	12.80
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSV1488-BSD	1041053	7.76	487967	11.09	84036	3.54	664824	6.58	491391	13.30
MSV1488-MB	978094	7.77	438573	11.09	89426	3.56	624059	6.59	446934	13.30
MSV1489-MB	978094	7.77	438573	11.09	89426	3.56	624059	6.59	446934	13.30
ZZZZZZ	907520	7.77	405450	11.09	70746	3.55	577151	6.59	408514	13.30
ZZZZZZ	940002	7.77	426521	11.09	89583	3.56	575136	6.59	436328	13.30
MC39872-1	918001	7.77	411359	11.09	77273	3.56	576997	6.59	419457	13.30
ZZZZZZ	901270	7.77	416434	11.09	82298	3.56	560928	6.59	428405	13.30
ZZZZZZ	854314	7.76	394433	11.09	70127	3.55	526586	6.58	391006	13.30
ZZZZZZ	860261	7.77	395475	11.09	74632	3.55	531421	6.59	396049	13.31
ZZZZZZ	894586	7.77	409023	11.10	78370	3.56	545371	6.59	415528	13.31
ZZZZZZ	837692	7.77	390380	11.10	68420	3.55	510436	6.59	395754	13.31
ZZZZZZ	815502	7.77	381089	11.10	71115	3.55	500780	6.59	384045	13.31
ZZZZZZ	839159	7.77	398300	11.10	75370	3.55	529203	6.59	424150	13.31
ZZZZZZ	876561	7.77	408482	11.10	69927	3.55	546363	6.59	411972	13.31
ZZZZZZ	910237	7.77	411357	11.10	81023	3.55	565350	6.59	410106	13.31
ZZZZZZ	886146	7.77	401924	11.10	69589	3.55	550234	6.59	401168	13.31
MC39970-10	1041352	7.77	479382	11.10	230149[c]	3.57	665806	6.60	477774	13.31
ZZZZZZ	1042062	7.77	481414	11.10	106796	3.56	678738	6.59	487278	13.31
ZZZZZZ	1020345	7.77	440097	11.10	83807	3.55	641898	6.59	441612	13.31
ZZZZZZ	1009427	7.77	453520	11.10	142338	3.55	669307	6.59	454371	13.31
MC39872-1MS	1062890	7.77	485684	11.10	93561	3.56	668402	6.59	482247	13.31
MC39872-1MSD	1025366	7.77	467594	11.10	88512	3.56	638678	6.59	468877	13.31
ZZZZZZ	997308	7.77	445547	11.10	91232	3.56	624144	6.59	447633	13.31
ZZZZZZ	990615	7.77	452648	11.10	88240	3.56	616363	6.59	451453	13.31
ZZZZZZ	893153	7.77	407889	11.10	82513	3.55	551429	6.59	413145	13.31

IS 1 = 1,4-Difluorobenzene
IS 2 = Chlorobenzene-D5
IS 3 = Tert Butyl Alcohol-D9
IS 4 = Pentafluorobenzene
IS 5 = 1,4-Dichlorobenzene-d4

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.
(c) Outside control limits. Target analytes not associated with this internal standard.

6.3.2

Volatile Surrogate Recovery Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8260C Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC39970-1	V41205.D	103	99	98
MC39970-3	V41215.D	95	104	102
MC39970-4	V41206.D	105	99	97
MC39970-5	V41216.D	110	101	98
MC39970-6	V41207.D	106	100	98
MC39970-8	V41217.D	110	103	97
MC39970-9	V41208.D	108	100	99
MC39970-10	V41241.D	97	102	102
MC39970-11	V41220.D	99	100	101
MSV1487-BS	V41201.D	98	102	103
MSV1487-BSD	V41202.D	95	102	102
MSV1487-MB	V41204.D	100	100	98
MSV1488-BS	V41224.D	97	104	101
MSV1488-BSD	V41225.D	98	102	102
MSV1488-MB	V41227.D	104	98	98

Surrogate Compounds	Recovery Limits
S1 = Dibromofluoromethane	72-133%
S2 = Toluene-D8	85-114%
S3 = 4-Bromofluorobenzene	70-134%

6.4.1

New England ACCUTEST LABORATORIES

GC/MS Semi-volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43789-MB	F81770.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541

The QC reported here applies to the following samples: Method: SW846 8270D

MC39970-3, MC39970-4, MC39970-5, MC39970-8, MC39970-9, MC39970-10, MC39970-11

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.5	ug/l	
95-57-8	2-Chlorophenol	ND	5.0	0.29	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.37	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.28	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.50	ug/l	
51-28-5	2,4-Dinitrophenol	ND	20	2.5	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	1.9	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.47	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.41	ug/l	
100-02-7	4-Nitrophenol	ND	20	2.5	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.30	ug/l	
108-95-2	Phenol	ND	5.0	0.25	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.34	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.30	ug/l	
62-53-3	Aniline	ND	10	2.5	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.0	0.82	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.0	0.21	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.51	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.0	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.54	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.0	0.24	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.0	0.42	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.0	0.24	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.0	0.21	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.0	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.0	0.37	ug/l	
132-64-9	Dibenzofuran	ND	2.0	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.0	0.37	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.0	0.72	ug/l	
84-66-2	Diethyl phthalate	ND	5.0	0.57	ug/l	
131-11-3	Dimethyl phthalate	ND	5.0	0.27	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.0	0.30	ug/l	
118-74-1	Hexachlorobenzene	ND	5.0	0.77	ug/l	

Method Blank Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43789-MB	F81770.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541

The QC reported here applies to the following samples: Method: SW846 8270D

MC39970-3, MC39970-4, MC39970-5, MC39970-8, MC39970-9, MC39970-10, MC39970-11

CAS No.	Compound	Result	RL	MDL	Units	Q
77-47-4	Hexachlorocyclopentadiene	ND	10	1.3	ug/l	
67-72-1	Hexachloroethane	ND	5.0	0.29	ug/l	
78-59-1	Isophorone	ND	5.0	0.23	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.6	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.1	ug/l	
98-95-3	Nitrobenzene	ND	5.0	0.26	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.0	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.0	0.52	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.0	0.77	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries		Limits
367-12-4	2-Fluorophenol	58%	10-80%
4165-62-2	Phenol-d5	42%	10-72%
118-79-6	2,4,6-Tribromophenol	105%	42-134%
4165-60-0	Nitrobenzene-d5	99%	25-117%
321-60-8	2-Fluorobiphenyl	94%	24-112%
1718-51-0	Terphenyl-d14	132%	48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

Method Blank Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43790-MB	I96924.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC39970-3, MC39970-4, MC39970-5, MC39970-8, MC39970-9, MC39970-10, MC39970-11

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.10	0.0075	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0084	ug/l	
120-12-7	Anthracene	ND	0.10	0.0098	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.050	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.015	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.050	0.019	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.013	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0074	ug/l	
86-73-7	Fluorene	ND	0.10	0.015	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.020	ug/l	
90-12-0	1-Methylnaphthalene	0.018	2.0	0.012	ug/l	J
91-57-6	2-Methylnaphthalene	0.032	2.0	0.011	ug/l	J
85-01-8	Phenanthrene	ND	0.050	0.011	ug/l	
129-00-0	Pyrene	ND	0.10	0.0085	ug/l	

CAS No.	Surrogate Recoveries		Limits
4165-60-0	Nitrobenzene-d5	95%	26-121%
321-60-8	2-Fluorobiphenyl	85%	28-107%
1718-51-0	Terphenyl-d14	125%	29-129%

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43789-BS	F81771.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541
OP43789-BSD	F81772.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541

The QC reported here applies to the following samples: Method: SW846 8270D

MC39970-3, MC39970-4, MC39970-5, MC39970-8, MC39970-9, MC39970-10, MC39970-11

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
65-85-0	Benzoic Acid	50	20.0	40	19.8	40	1	10-70/20
95-57-8	2-Chlorophenol	50	37.7	75	37.5	75	1	39-100/20
59-50-7	4-Chloro-3-methyl phenol	50	41.5	83	41.4	83	0	43-112/20
120-83-2	2,4-Dichlorophenol	50	41.2	82	39.5	79	4	44-113/20
105-67-9	2,4-Dimethylphenol	50	38.1	76	35.6	71	7	21-108/20
51-28-5	2,4-Dinitrophenol	50	44.8	90	43.8	88	2	22-128/20
534-52-1	4,6-Dinitro-o-cresol	50	46.2	92	44.5	89	4	42-132/20
95-48-7	2-Methylphenol	50	34.9	70	36.0	72	3	34-91/20
	3&4-Methylphenol	100	68.6	69	70.5	71	3	31-90/20
88-75-5	2-Nitrophenol	50	41.9	84	41.2	82	2	40-118/20
100-02-7	4-Nitrophenol	50	21.9	44	23.3	47	6	10-71/20
87-86-5	Pentachlorophenol	50	34.2	68	34.4	69	1	33-123/20
108-95-2	Phenol	50	17.5	35	19.0	38	8	11-57/20
95-95-4	2,4,5-Trichlorophenol	50	44.5	89	43.2	86	3	50-122/20
88-06-2	2,4,6-Trichlorophenol	50	42.9	86	42.1	84	2	48-118/20
62-53-3	Aniline	50	26.6	53	30.9	62	15	18-90/20
101-55-3	4-Bromophenyl phenyl ether	50	46.6	93	46.9	94	1	55-126/20
85-68-7	Butyl benzyl phthalate	50	51.0	102	50.0	100	2	56-124/20
100-51-6	Benzyl Alcohol	50	38.7	77	38.9	78	1	13-106/20
91-58-7	2-Chloronaphthalene	50	48.6	97	47.4	95	3	45-123/20
106-47-8	4-Chloroaniline	50	39.8	80	41.0	82	3	35-111/20
111-91-1	bis(2-Chloroethoxy)methane	50	46.9	94	45.1	90	4	41-117/20
111-44-4	bis(2-Chloroethyl)ether	50	44.2	88	43.7	87	1	31-114/20
108-60-1	bis(2-Chloroisopropyl)ether	50	54.4	109	54.1	108	1	33-135/20
7005-72-3	4-Chlorophenyl phenyl ether	50	46.7	93	46.5	93	0	52-124/20
122-66-7	1,2-Diphenylhydrazine	50	54.8	110	54.3	109	1	45-119/20
121-14-2	2,4-Dinitrotoluene	50	46.5	93	46.6	93	0	52-128/20
606-20-2	2,6-Dinitrotoluene	50	47.8	96	45.9	92	4	50-126/20
91-94-1	3,3'-Dichlorobenzidine	50	41.9	84	45.9	92	9	46-134/20
132-64-9	Dibenzofuran	50	45.5	91	44.7	89	2	51-118/20
84-74-2	Di-n-butyl phthalate	50	47.8	96	49.2	98	3	57-120/20
117-84-0	Di-n-octyl phthalate	50	54.8	110	52.5	105	4	58-125/20
84-66-2	Diethyl phthalate	50	48.1	96	48.5	97	1	40-125/20
131-11-3	Dimethyl phthalate	50	47.6	95	47.0	94	1	10-145/20
117-81-7	bis(2-Ethylhexyl)phthalate	50	52.1	104	52.4	105	1	60-126/20
118-74-1	Hexachlorobenzene	50	44.0	88	44.5	89	1	53-127/20

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43789-BS	F81771.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541
OP43789-BSD	F81772.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541

The QC reported here applies to the following samples: Method: SW846 8270D

MC39970-3, MC39970-4, MC39970-5, MC39970-8, MC39970-9, MC39970-10, MC39970-11

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
77-47-4	Hexachlorocyclopentadiene	50	24.4	49	23.4	47	4	10-75/20
67-72-1	Hexachloroethane	50	34.7	69	32.3	65	7	15-98/20
78-59-1	Isophorone	50	46.6	93	45.5	91	2	36-106/20
88-74-4	2-Nitroaniline	50	50.1	100	48.5	97	3	52-130/20
99-09-2	3-Nitroaniline	50	44.6	89	45.1	90	1	47-120/20
100-01-6	4-Nitroaniline	50	47.1	94	46.6	93	1	51-121/20
98-95-3	Nitrobenzene	50	46.0	92	44.7	89	3	27-120/20
62-75-9	n-Nitrosodimethylamine	50	33.2	66	33.5	67	1	10-87/20
621-64-7	N-Nitroso-di-n-propylamine	50	51.4	103	50.4	101	2	37-123/20
86-30-6	N-Nitrosodiphenylamine	50	45.3	91	44.7	89	1	50-112/20
110-86-1	Pyridine	50	14.8	30	16.1	32	8	10-72/20

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
367-12-4	2-Fluorophenol	56%	57%	10-80%
4165-62-2	Phenol-d5	40%	43%	10-72%
118-79-6	2,4,6-Tribromophenol	100%	100%	42-134%
4165-60-0	Nitrobenzene-d5	104%	101%	25-117%
321-60-8	2-Fluorobiphenyl	101%	95%	24-112%
1718-51-0	Terphenyl-d14	115%	117%	48-133%

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43790-BS	I96925.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626
OP43790-BSD	I96926.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC39970-3, MC39970-4, MC39970-5, MC39970-8, MC39970-9, MC39970-10, MC39970-11

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
83-32-9	Acenaphthene	50	42.8	86	41.6	83	3	45-116/30
208-96-8	Acenaphthylene	50	43.8	88	38.6	77	13	34-110/30
120-12-7	Anthracene	50	42.7	85	43.6	87	2	50-117/30
56-55-3	Benzo(a)anthracene	50	43.8	88	43.9	88	0	55-139/30
50-32-8	Benzo(a)pyrene	50	51.5	103	51.8	104	1	48-131/30
205-99-2	Benzo(b)fluoranthene	50	47.9	96	48.8	98	2	49-141/30
191-24-2	Benzo(g,h,i)perylene	50	49.6	99	49.6	99	0	60-130/30
207-08-9	Benzo(k)fluoranthene	50	50.3	101	50.1	100	0	49-133/30
218-01-9	Chrysene	50	43.3	87	43.3	87	0	52-128/30
53-70-3	Dibenzo(a,h)anthracene	50	50.5	101	50.2	100	1	60-136/30
206-44-0	Fluoranthene	50	35.1	70	43.8	88	22	46-132/30
86-73-7	Fluorene	50	42.4	85	39.7	79	7	53-120/30
193-39-5	Indeno(1,2,3-cd)pyrene	50	49.4	99	49.2	98	0	57-134/30
90-12-0	1-Methylnaphthalene	50	38.8	78	41.3	83	6	41-105/30
91-57-6	2-Methylnaphthalene	50	41.6	83	40.0	80	4	36-111/30
85-01-8	Phenanthrene	50	38.4	77	41.0	82	7	50-120/30
129-00-0	Pyrene	50	34.4	69	42.7	85	22	48-127/30

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
4165-60-0	Nitrobenzene-d5	103%	89%	26-121%
321-60-8	2-Fluorobiphenyl	93%	86%	28-107%
1718-51-0	Terphenyl-d14	92%	115%	29-129%

* = Outside of Control Limits.

Semivolatile Internal Standard Area Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSF3541-CC3514	Injection Date:	07/24/15
Lab File ID:	F81769.D	Injection Time:	08:25
Instrument ID:	GCMSF	Method:	SW846 8270D

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
Check Std	26279	3.28	97566	4.31	57422	5.81	95188	7.06	111625	9.39	97390	10.88
Upper Limit [a]	52558	3.78	195132	4.81	114844	6.31	190376	7.56	223250	9.89	194780	11.38
Lower Limit [b]	13140	2.78	48783	3.81	28711	5.31	47594	6.56	55813	8.89	48695	10.38

Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43789-MB	27282	3.28	98248	4.31	59121	5.80	103392	7.06	112401	9.38	101399	10.88
OP43789-BS	28932	3.28	107423	4.31	61392	5.81	106914	7.06	120515	9.39	105348	10.88
OP43789-BSD	28065	3.28	107360	4.31	62052	5.80	106556	7.06	118557	9.38	109359	10.88
MC39970-3	26020	3.28	96941	4.31	56766	5.80	100301	7.06	111837	9.38	104763	10.88
MC39970-4	27147	3.28	99285	4.31	57502	5.80	102371	7.06	108656	9.38	104249	10.88
MC39970-5	26666	3.28	98475	4.31	58638	5.80	102612	7.05	110225	9.38	99872	10.88
MC39970-8	26015	3.28	97407	4.31	55502	5.81	100053	7.05	110084	9.38	100916	10.88
MC39970-9	25759	3.28	92816	4.31	55652	5.80	96765	7.06	109949	9.38	100122	10.87
MC39970-10	27054	3.28	100605	4.31	59945	5.80	105083	7.06	113237	9.38	110601	10.88
MC39970-11	29039	3.28	109925	4.31	64400	5.80	115548	7.06	124581	9.38	117294	10.88
ZZZZZZ	27616	3.28	102441	4.31	59713	5.80	105289	7.05	119912	9.38	113934	10.88
OP43901-MB	30692	3.28	115842	4.31	66778	5.80	117754	7.05	131025	9.38	120085	10.88
OP43901-BS	32136	3.28	120962	4.31	69877	5.81	118877	7.06	145612	9.39	124911	10.88
OP43901-MS	29157	3.28	107123	4.31	63302	5.80	110393	7.06	134330	9.39	117843	10.88
OP43901-MSD	29537	3.28	112953	4.31	64634	5.81	111360	7.06	133555	9.39	116926	10.88
MC40090-1	29663	3.28	109904	4.31	64771	5.80	114775	7.06	127419	9.38	120716	10.88
OP43932-BS	33579	3.28	120873	4.31	68841	5.81	115625	7.06	126003	9.39	105304	10.88

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

Semivolatile Internal Standard Area Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSI3626-CC3621	Injection Date:	07/23/15
Lab File ID:	I96923.D	Injection Time:	15:55
Instrument ID:	GCMSI	Method:	SW846 8270D

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
Check Std	251723	3.70	621874	4.74	280314	6.26	425708	7.59	446787	10.58	1426934	12.24
Upper Limit [a]	503446	4.20	1243748	5.24	560628	6.76	851416	8.09	893574	11.08	2853868	12.74
Lower Limit [b]	125862	3.20	310937	4.24	140157	5.76	212854	7.09	223394	10.08	713467	11.74
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43790-MB	287976	3.70	617472	4.74	286731	6.26	422608	7.59	402711	10.57	1049107	12.24
OP43790-BS	301897	3.70	535825	4.75	266615	6.26	454031	7.59	540476	10.59	1433149	12.25
OP43790-BSD	239435	3.70	568435	4.75	308909	6.26	519258	7.59	539732	10.59	1417664	12.25
MC39970-3	268130	3.70	498270	4.74	295112	6.26	475576	7.59	503343	10.58	1333757	12.24
MC39970-4	279708	3.70	599195	4.74	246096	6.26	376618	7.59	501012	10.58	1335506	12.24
MC39970-5	237090	3.70	639560	4.74	305078	6.26	495933	7.59	516413	10.58	1360871	12.24
MC39970-8	234092	3.70	612074	4.74	291850	6.26	461123	7.59	395153	10.58	1231550	12.24
MC39970-9	222208	3.70	554477	4.74	268262	6.26	471741	7.59	497852	10.58	1312335	12.24
MC39970-10	290605	3.70	534605	4.74	256911	6.26	474334	7.59	498090	10.58	1306491	12.24
MC39970-11	281610	3.70	573211	4.75	293489	6.26	402433	7.59	427632	10.58	1052406	12.24
OP43804-MB	353229	3.70	627683	4.74	310716	6.26	484443	7.59	481568	10.58	1204079	12.24
ZZZZZZ	365472	3.70	661089	4.74	399658	6.26	501565	7.59	631958	10.58	1583178	12.24
ZZZZZZ	283374	3.70	673420	4.74	405714	6.26	641795	7.59	497410	10.57	1233051	12.24
ZZZZZZ	362422	3.70	803701	4.74	430216	6.26	577412	7.59	769959	10.58	1940152	12.24
ZZZZZZ	389836	3.70	858630	4.74	410462	6.26	647964	7.59	667146	10.58	1676175	12.24
ZZZZZZ	315292	3.70	688427	4.74	409868	6.26	649500	7.59	657810	10.58	1642277	12.24

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

Semivolatile Surrogate Recovery Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3	S4	S5	S6
MC39970-3	F81773.D	55	37	103	102	100	123
MC39970-4	F81774.D	52	35	106	103	102	134* [a]
MC39970-5	F81775.D	46	31	93	97	95	125
MC39970-8	F81776.D	46	32	93	103	102	121
MC39970-9	F81777.D	55	37	107	112	101	125
MC39970-10	F81778.D	49	33	99	97	90	111
MC39970-11	F81779.D	53	35	105	104	97	118
OP43789-BS	F81771.D	56	40	100	104	101	115
OP43789-BSD	F81772.D	57	43	100	101	95	117
OP43789-MB	F81770.D	58	42	105	99	94	132

Surrogate Compounds	Recovery Limits
S1 = 2-Fluorophenol	10-80%
S2 = Phenol-d5	10-72%
S3 = 2,4,6-Tribromophenol	42-134%
S4 = Nitrobenzene-d5	25-117%
S5 = 2-Fluorobiphenyl	24-112%
S6 = Terphenyl-d14	48-133%

(a) Outside control limits. Associated target analytes are non-detect.

Semivolatile Surrogate Recovery Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D BY SIM Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC39970-3	I96927.D	94	87	114
MC39970-4	I96928.D	94	101	97
MC39970-5	I96929.D	90	87	116
MC39970-8	I96930.D	83	89	116
MC39970-9	I96931.D	105	86	117
MC39970-10	I96932.D	81	86	109
MC39970-11	I96933.D	89	76	115
OP43790-BS	I96925.D	103	93	92
OP43790-BSD	I96926.D	89	86	115
OP43790-MB	I96924.D	95	85	125

Surrogate Compounds	Recovery Limits
S1 = Nitrobenzene-d5	26-121%
S2 = 2-Fluorobiphenyl	28-107%
S3 = Terphenyl-d14	29-129%

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GC Volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Surrogate Recovery Summaries
- GC Surrogate Retention Time Summaries

Method Blank Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43898-MB	BB63850.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461

The QC reported here applies to the following samples: Method: SW846 8011

MC39970-2, MC39970-3, MC39970-4, MC39970-5, MC39970-7, MC39970-8, MC39970-9, MC39970-10, MC39970-11

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.015	0.0061	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.015	0.0061	ug/l	

CAS No.	Surrogate Recoveries		Limits
460-00-4	Bromofluorobenzene (S)	101%	60-140%
460-00-4	Bromofluorobenzene (S)	95%	60-140%

8.1.1

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43898-BS	BB63851.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
OP43898-BSD	BB63852.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461

The QC reported here applies to the following samples: Method: SW846 8011

MC39970-2, MC39970-3, MC39970-4, MC39970-5, MC39970-7, MC39970-8, MC39970-9, MC39970-10, MC39970-11

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
96-12-8	1,2-Dibromo-3-chloropropane	0.071	0.069	97	0.067	94	3	45-149/30
106-93-4	1,2-Dibromoethane	0.071	0.070	99	0.069	97	1	51-149/30

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
460-00-4	Bromofluorobenzene (S)	93%	95%	60-140%
460-00-4	Bromofluorobenzene (S)	97%	92%	60-140%

8.2.1

* = Outside of Control Limits.

Volatile Surrogate Recovery Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8011 Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1 [a]	S1 [b]
MC39970-2	BB63853.D	99	95
MC39970-3	BB63854.D	95	98
MC39970-4	BB63855.D	95	95
MC39970-5	BB63856.D	104	101
MC39970-7	BB63857.D	94	98
MC39970-8	BB63858.D	94	101
MC39970-9	BB63859.D	93	93
MC39970-10	BB63861.D	93	114
MC39970-11	BB63862.D	85	112
OP43898-BS	BB63851.D	93	97
OP43898-BSD	BB63852.D	95	92
OP43898-MB	BB63850.D	101	95

Surrogate Compounds	Recovery Limits
S1 = Bromofluorobenzene (S)	60-140%

(a) Recovery from GC signal #2
(b) Recovery from GC signal #1

8.3.1 8

GC Surrogate Retention Time Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3461-CC3460	Injection Date:	07/22/15
Lab File ID:	BB63849.D	Injection Time:	08:57
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	7.01	8.20

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
OP43898-MB	BB63850.D	07/22/15	09:29	7.05	8.26
OP43898-BS	BB63851.D	07/22/15	09:57	7.09	8.31
OP43898-BSD	BB63852.D	07/22/15	10:25	7.15	8.37
MC39970-2	BB63853.D	07/22/15	10:53	7.21	8.45
MC39970-3	BB63854.D	07/22/15	11:21	7.28	8.54
MC39970-4	BB63855.D	07/22/15	11:49	7.36	8.62
MC39970-5	BB63856.D	07/22/15	12:17	7.44	8.72
MC39970-7	BB63857.D	07/22/15	12:45	7.53	8.83
MC39970-8	BB63858.D	07/22/15	13:13	7.64	8.96
MC39970-9	BB63859.D	07/22/15	13:41	7.75	9.09

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

8.4.1

GC Surrogate Retention Time Summary

Job Number: MC39970
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3461-CC3460	Injection Date:	07/22/15
Lab File ID:	BB63860.D	Injection Time:	14:09
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	7.86	9.21

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
MC39970-10	BB63861.D	07/22/15	14:37	7.96	9.34
MC39970-11	BB63862.D	07/22/15	15:05	8.09	9.47
ZZZZZZ	BB63863.D	07/22/15	15:33	8.24	9.65
ZZZZZZ	BB63864.D	07/22/15	16:02	8.39	9.82
GBB3461-ECC3468	BB63865.D	07/22/15	16:30	8.54	9.97

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

8.4.2

Roxana Groundwater Quarterly – 3rd Quarter 2015 Data Review

Laboratory SDG: MC39971

Data Reviewer: Melissa Mansker

Peer Reviewer: Elizabeth Kunkel

Date Reviewed: 8/4/2015

Guidance: USEPA National Functional Guidelines for Superfund Organic Methods Data Review 2014

Sample Identification	Sample Identification
TB-ROX-071015-HCL-BP	TB-ROX-071015-ST-BP
MW23-ROX-071015-BP	

1.0 Data Package Completeness

Were all items delivered as specified in the QAPP and COC as appropriate?

Yes

2.0 Laboratory Case Narrative \ Cooler Receipt Form

Were problems noted in the laboratory case narrative or cooler receipt form?

Yes, the laboratory case narrative indicated VOCs and PAHs were detected in the method blank, and although not indicated in the laboratory case narrative, VOCs were detected in the trip blank. The VOC LCS recovery for 2-butanone (MEK) was outside evaluation criteria. These issues are addressed further in the appropriate sections below. Additionally, the initial calibration verifications for vinyl acetate, 2-chloroethyl vinyl ether, and acrolein exceeded 30 percent difference (%D). Continuing calibration verifications for acetone, vinyl acetate, and 2-butanone exceeded 40%D.

The cooler receipt form did not indicate any problems.

3.0 Holding Times

Were samples extracted/analyzed within applicable limits?

Yes

4.0 Blank Contamination

Were any analytes detected in the Method Blanks, Field Blanks or Trip Blanks?

Yes

Blank ID	Parameter	Analyte	Concentration/ Amount
TB-ROX-071015-HCL-BP	VOCs	Carbon disulfide	0.40 µg/L
TB-ROX-071015-HCL-BP	VOCs	Hexachlorobutadiene	1.2 µg/L
TB-ROX-071015-HCL-BP	VOCs	1,2,3-Trichlorobenzene	1.1 µg/L
TB-ROX-071015-HCL-BP	VOCs	1,2,4-Trichlorobenzene	1.1 µg/L
MSL4087-MB	VOCs	Carbon disulfide	0.59 µg/L
MSL4087-MB	VOCs	Hexachlorobutadiene	1.9 µg/L
MSL4087-MB	VOCs	1,2,4-Trichlorobenzene	1.5 µg/L
OP43790-MB	PAHs	1-Methylnaphthalene	0.018 µg/L

Blank ID	Parameter	Analyte	Concentration/ Amount
OP43790-MB	PAHs	2-Methylnaphthalene	0.032 µg/L

Analytical data that were reported non-detect or at concentrations greater than five times (5X) the associated blank concentration did not require qualification. Please see section 12.0 of this review for additional qualifications regarding samples associated with 1-methylnaphthalene and 2-methylnaphthalene in method blank OP-43790-MB.

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
MW23-ROX-071015-BP	VOCs	Carbon disulfide	-	**U**
MW23-ROX-071015-BP	VOCs	1,2,3-Trichlorobenzene	-	**U**

5.0 Laboratory Control Sample

Were LCS recoveries within evaluation criteria?

No

LCS/LCSD ID	Parameter	Analyte	LCS/LCSD Recovery	RPD	LCS/LCSD/ RPD Criteria
MSL4087-BS/BSD	VOCs	2-Butanone (MEK)	**167**/126	**28**	43-147/25

Analytical data reported as non-detect and associated with LCS recoveries above evaluation criteria, indicating a possible high bias, did not require qualification. No qualification of data was required.

6.0 Surrogate Recoveries

Were surrogate recoveries within evaluation criteria?

Yes

7.0 Matrix Spike and Matrix Spike Duplicate Recoveries

Were MS/MSD samples analyzed as part of this SDG?

No

8.0 Internal Standard (IS) Recoveries

Were internal standard area recoveries within evaluation criteria?

Yes

9.0 Laboratory Duplicate Results

Were laboratory duplicate samples analyzed as part of this SDG?

No

10.0 Field Duplicate Results

Were field duplicate samples collected as part of this SDG?

No

11.0 Sample Dilutions

For samples that were diluted and nondetect, were undiluted results also reported?

Not applicable; samples analyzed did not require dilution.

12.0 Additional Qualifications

Were additional qualifications applied?

Yes, professional judgment was also used to qualify as estimated, however not reject, data that was associated with 1-methylnaphthalene and 2-methylnaphthalene in method blank OP-43790-MB, due to comparable historical detections.

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
MW23-ROX-071015-BP	PAHs	1-Methylnaphthalene	-	**J**
MW23-ROX-071015-BP	PAHs	2-Methylnaphthalene	-	**J**

New England ACCUTEST LABORATORIES

07/30/15



Technical Report for

Shell Oil

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, 60400249

Accutest Job Number: MC39971

Sampling Date: 07/10/15

Report to:

AECOM, INC.

elizabeth.kunkel@URS.com

ATTN: Elizabeth Kunkel

Total number of pages in report: **50**

Reviewed 8/4/15

Reza Pand
Lab Director

Test results contained within this data package meet the requirements of the National Environmental Laboratory Accreditation Program and/or state specific certification programs as applicable.

Client Service contact: Jeremy Vienneau 508-481-6200

Certifications: MA (M-MA136,SW846 NELAC) CT (PH-0109) NH (250210) RI (00071) ME (MA00136) FL (E87579) NY (11791) NJ (MA926) PA (6801121) ND (R-188) CO MN (11546AA) NC (653) IL (002337) WI (399080220) DoD ELAP (L-A-B L2235)

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Sample Summary

Shell Oil

Job No: MC39971

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Collected Date	Time	By	Received	Matrix Code	Matrix Type	Client Sample ID
MC39971-1	07/10/15	00:00	SFDH	07/11/15	AQ	Trip Blank Water	TB-ROX-071015-HCL-BP
MC39971-2	07/10/15	00:00	SFDH	07/11/15	AQ	Trip Blank Water	TB-ROX-071015-ST-BP
MC39971-3	07/10/15	09:50	SFDH	07/11/15	AQ	Ground Water	MW23-ROX-071015-BP

ACCUTEST LABORATORIES

2

SAMPLE DELIVERY GROUP CASE NARRATIVE

Client:	Shell Oil	**Job No**	MC39971
Site:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central	**Report Date**	7/29/2015 10:50:06 AM

1 Sample(s), 2 Trip Blank(s) and 0 Field Blank(s) were collected on 07/10/2015 and were received at Accutest on 07/11/2015 properly preserved, at 2.4 Deg. C and intact. These Samples received an Accutest job number of MC39971. A listing of the Laboratory Sample ID, Client Sample ID and dates of collection are presented in the Results Summary Section of this report. 1-Chlorohexane, Benzenethiol,
Dibenz(a,h)acridine, Indene, and Quinoline were searched in the library search and reported only if detections were found.

Except as noted below, all method specified calibrations and quality control performance criteria were met for this job. For more information, please refer to QC summary pages.

Volatiles by GCMS By Method SW846 8260C

Matrix: AQ **Batch ID:** MSL4087

- All samples were analyzed within the recommended method holding time.
- Sample(s) MC39971-1, MC39971-3 have compound(s) reported with a "B" qualifier, indicating analyte is found in the associated method blank.
- RPD for MSL4087-BSD for 2-Butanone (MEK): Outside control limits. Associated samples are non-detect for this compound.
- MSL4087-BS for 2-Butanone (MEK): Outside control limits. Associated samples are non-detect for this compound.
- Continuing calibration check standard MSL4087-CC4070 for acetone, vinyl acetate, 2-butanone exceed 40% Difference (response bias high). Associated samples are non-detect for this compound.
- Initial calibration verification standard MSL4070-ICV4070 for vinyl acetate, 2-chloroethyl vinyl ether exceed 30% Difference (response bias high). Associated samples are non-detect for this compound.
- Initial calibration verification standard MSL4070-ICV4070 for acrolein exceed 30% Difference. Acrolein is within criteria in continuing calibration check standard MSL4087-CC4070.

Extractables by GCMS By Method SW846 8270D

Matrix: AQ **Batch ID:** OP43789

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.

Extractables by GCMS By Method SW846 8270D BY SIM

Matrix: AQ **Batch ID:** OP43790

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- Sample(s) MC39971-3 have compound(s) reported with a "B" qualifier, indicating analyte is found in the associated method blank.

Volatiles by GC By Method SW846 8011

Matrix: AQ **Batch ID:** OP43898

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.

The Accutest Laboratories of New England certifies that all analysis were performed within method specification. It is further recommended that this report to be used in its entirety.The Accutest Laboratories of NE, Laboratory Director or assignee as verified by the signature on the cover page has authorized the release of this report(MC39971).

Summary of Hits

Job Number: MC39971
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/10/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
MC39971-1	TB-ROX-071015-HCL-BP					
Carbon disulfide		0.40 JB	5.0	0.19	ug/l	SW846 8260C
Hexachlorobutadiene		1.2 JB	5.0	0.45	ug/l	SW846 8260C
1,2,3-Trichlorobenzene		1.1 J	5.0	0.78	ug/l	SW846 8260C
1,2,4-Trichlorobenzene		1.1 JB	5.0	0.74	ug/l	SW846 8260C
MC39971-2	TB-ROX-071015-ST-BP					
No hits reported in this sample.						
MC39971-3	MW23-ROX-071015-BP					
Carbon disulfide		~~0.29 JB~~ U	5.0	0.19	ug/l	SW846 8260C
Naphthalene		4.0 J	5.0	0.61	ug/l	SW846 8260C
1,2,3-Trichlorobenzene		~~1.1 J~~ U	5.0	0.78	ug/l	SW846 8260C
m,p-Xylene		0.62 J	1.0	0.47	ug/l	SW846 8260C
Xylene (total)		0.62 J	1.0	0.22	ug/l	SW846 8260C
Acenaphthene		0.036 J	0.11	0.0083	ug/l	SW846 8270D BY SIM
Anthracene		0.033 J	0.11	0.011	ug/l	SW846 8270D BY SIM
Chrysene		0.018 J	0.11	0.015	ug/l	SW846 8270D BY SIM
Fluoranthene		0.020 J	0.11	0.0082	ug/l	SW846 8270D BY SIM
Fluorene		0.025 J	0.11	0.017	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.045 JB J	2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.079 JB J	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.052 J	0.056	0.012	ug/l	SW846 8270D BY SIM
Pyrene		0.068 J	0.11	0.0094	ug/l	SW846 8270D BY SIM

New England ACCUTEST LABORATORIES

Sample Results

Report of Analysis

Report of Analysis

Client Sample ID:	TB-ROX-071015-HCL-BP		
Lab Sample ID:	MC39971-1	Date Sampled:	07/10/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92919.D	1	07/21/15	MC	n/a	n/a	MSL4087
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	0.40	5.0	0.19	ug/l	JB
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071015-HCL-BP		
Lab Sample ID:	MC39971-1	Date Sampled:	07/10/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	1.2	5.0	0.45	ug/l	JB
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	1.1	5.0	0.78	ug/l	J
120-82-1	1,2,4-Trichlorobenzene	1.1	5.0	0.74	ug/l	JB
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071015-HCL-BP		
Lab Sample ID:	MC39971-1	Date Sampled:	07/10/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	117%		72-133%
2037-26-5	Toluene-D8	100%		85-114%
460-00-4	4-Bromofluorobenzene	106%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071015-ST-BP		
Lab Sample ID:	MC39971-2	Date Sampled:	07/10/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/11/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63863.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
Run #2							

	Initial Volume	Final Volume
Run #1	36.6 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	92%		60-140%
460-00-4	Bromofluorobenzene (S)	90%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW23-ROX-071015-BP		
Lab Sample ID:	MC39971-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92927.D	1	07/21/15	MC	n/a	n/a	MSL4087
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	~~0.29~~ u	5.0	0.19	ug/l	JB 4
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW23-ROX-071015-BP		
Lab Sample ID:	MC39971-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	4.0	5.0	0.61	ug/l	J
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	~~1.1~~ 4	5.0	0.78	ug/l	J 4
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	0.62	1.0	0.47	ug/l	J
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	0.62	1.0	0.22	ug/l	J

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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW23-ROX-071015-BP		
Lab Sample ID:	MC39971-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	115%		72-133%
2037-26-5	Toluene-D8	100%		85-114%
460-00-4	4-Bromofluorobenzene	107%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW23-ROX-071015-BP		
Lab Sample ID:	MC39971-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81780.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.8	ug/l	
95-57-8	2-Chlorophenol	ND	5.6	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.41	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.56	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.8	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.52	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.45	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.8	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.33	ug/l	
108-95-2	Phenol	ND	5.6	0.28	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.38	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.8	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.6	0.91	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.6	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.56	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.6	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.60	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.6	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.6	0.46	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.6	0.27	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.6	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.6	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.7	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.6	0.42	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.6	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.6	0.80	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW23-ROX-071015-BP		
Lab Sample ID:	MC39971-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.6	0.63	ug/l	
131-11-3	Dimethyl phthalate	ND	5.6	0.30	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.6	0.85	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.6	0.32	ug/l	
78-59-1	Isophorone	ND	5.6	0.26	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.1	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.5	ug/l	
98-95-3	Nitrobenzene	ND	5.6	0.29	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.6	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.6	0.58	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.6	0.86	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	53%		10-80%
4165-62-2	Phenol-d5	36%		10-72%
118-79-6	2,4,6-Tribromophenol	102%		42-134%
4165-60-0	Nitrobenzene-d5	101%		25-117%
321-60-8	2-Fluorobiphenyl	99%		24-112%
1718-51-0	Terphenyl-d14	113%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW23-ROX-071015-BP		
Lab Sample ID:	MC39971-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96998.D	1	07/29/15	MR	07/13/15	OP43790	MSI3629
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.036	0.11	0.0083	ug/l	J
208-96-8	Acenaphthylene	ND	0.11	0.0093	ug/l	
120-12-7	Anthracene	0.033	0.11	0.011	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.056	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.056	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	0.018	0.11	0.015	ug/l	J
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.017	ug/l	
206-44-0	Fluoranthene	0.020	0.11	0.0082	ug/l	J
86-73-7	Fluorene	0.025	0.11	0.017	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.023	ug/l	
90-12-0	1-Methylnaphthalene	0.045 J	2.2	0.014	ug/l	JB J
91-57-6	2-Methylnaphthalene	0.079 J	2.2	0.012	ug/l	JB J
85-01-8	Phenanthrene	0.052	0.056	0.012	ug/l	J
129-00-0	Pyrene	0.068	0.11	0.0094	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	53%		10-81%
4165-62-2	Phenol-d5	39%		10-72%
118-79-6	2,4,6-Tribromophenol	112%		35-137%
4165-60-0	Nitrobenzene-d5	95%		26-121%
321-60-8	2-Fluorobiphenyl	86%		28-107%
1718-51-0	Terphenyl-d14	125%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW23-ROX-071015-BP		
Lab Sample ID:	MC39971-3	Date Sampled:	07/10/15
Matrix:	AQ - Ground Water	Date Received:	07/11/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63864.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
Run #2							

	Initial Volume	Final Volume
Run #1	36.9 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	84%		60-140%
460-00-4	Bromofluorobenzene (S)	68%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

New England ACCUTEST LABORATORIES

Misc. Forms

Custody Documents and Other Forms

Includes the following where applicable:

- Chain of Custody
- Sample Tracking Chronicle
- Internal Chain of Custody

LAB (LOCATION)
☐ XENCO (_____)
☐ CALSCIENCE (_____)
☑ OTHER (Accutest Labs, 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200))
☐ SPL (_____)
Lab Vendor #

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:
☑ ENV. SERVICES ☐ MOTIVA RETAIL ☐ SHELL RETAIL
☐ MOTIVA SD&CH ☐ CONSULTANT ☐ LUBES
☐ SHELL PIPELINE ☐ OTHER

Print Bill To Contact Name: Bob Billman
INCIDENT # (ENV SERVICES): 9 7 2 1 6 6 4 0
☐ CHECK IF NO INCIDENT # APPLIES
DATE: 10 July 2015
PO #
SAP #: 3 4 0 0 6 1
PAGE: 1 of 1

SAMPLING COMPANY: AECOM
LOG CODE:
SITE ADDRESS: Street and City: 900 South Central Ave; ROXANA
State: IL
GLOBAL ID NO:
ADDRESS: 1001 HIGHLANDS PLAZA DRIVE WEST - SUITE 300; ST. LOUIS, MO 63110
EDF DELIVERABLE TO (Name, Company, Office Location):
PHONE NO:
EMAIL:
CONSULTANT PROJECT NO: Roxana Quarterly GW / 60400249-21563720.03003
PROJECT CONTACT (Hardcopy or PDF Report to): Elizabeth Kunkel, Bob Billman, Lindsay Rathnow
TELEPHONE: 314-429-0100
FAX: 314-429-0462
Bill To Contact E-MAIL: [illegible]
SAMPLER NAME(S) (Print): S. Fisher / D. Haxel
LAB USE ONLY: MC39971

TURNAROUND TIME (CALENDAR DAYS)
☑ STANDARD (10 DAY) ☐ 5 DAYS ☐ 3 DAYS ☐ 2 DAYS ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND
☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:
DELIVERABLES: ☐ LEVEL 1 ☑ LEVEL 2 ☐ LEVEL 3 ☑ LEVEL 4 ☑ OTHER (SPECIFY) EDD
TEMPERATURE ON RECEIPT C°: Cooler #1 | Cooler #2 | Cooler #3

SPECIAL INSTRUCTIONS OR NOTES :
* Please include "J" values on Reports.
* Please provide sample receipt upon login.

☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMBURSEMENT RATE APPLIES
☐ EDD NOT NEEDED
☑ RECEIPT VERIFICATION REQUESTED
☐ PROVIDE LEDD DISK

REQUESTED ANALYSIS

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	FIELD NOTES: Container PID Readings or Laboratory Notes
-1	TB-ROX-071015-HCL-BP	7/10/15	0000	water	2					2	X				0.0
-2	TB-ROX-071015-ST-BP	↓	"	↓					2	2		X			↓
-3	MW23-ROX-071015-BP	↓	0950	↓	2			2	2		X	X	X	X	
															19C, 2C3

TEMPERATURE ON RECEIPT C°: 2.4°, 2.2°

Relinquished by (Signature): [signature] — Received by (Signature): FED EX # 807993189 1810 — Date: 10 July 2015 — Time:
Relinquished by (Signature): FX — Received by (Signature): [signature] — Date: 7/11/15 — Time: 10:10
Relinquished by (Signature): — Received by (Signature): — Date: — Time:

05/2008 Revision

Custody seal 07/10/2015 -01A-BP
-01B-BP

MC39971: Chain of Custody
Page 1 of 2

Accutest Laboratories Sample Receipt Summary

Accutest Job Number: MC39971 **Client:** AECOM **Project:** 900 SOUTH CENTRAL AVE

Date / Time Received: 7/11/2015 10:10:00 AM **Delivery Method:** **Airbill #'s:**

Cooler Temps (Initial/Adjusted): #1: (2.2/2.2); #2: (2.4/2.4);

Cooler Security	Y or N		Y or N
1. Custody Seals Present:	☑ ☐	3. COC Present:	☑ ☐
2. Custody Seals Intact:	☑ ☐	4. Smpl Dates/Time OK	☑ ☐

Cooler Temperature	Y or N
1. Temp criteria achieved:	☑ ☐
2. Thermometer ID:	G1;
3. Cooler media:	Ice (Bag)
4. No. Coolers:	2

Quality Control Preservation	Y or N	N/A
1. Trip Blank present / cooler:	☑ ☐	☐
2. Trip Blank listed on COC:	☑ ☐	☐
3. Samples preserved properly:	☑ ☐	
4. VOCs headspace free:	☑ ☐	☐

Sample Integrity - Documentation	Y or N
1. Sample labels present on bottles:	☑ ☐
2. Container labeling complete:	☑ ☐
3. Sample container label / COC agree:	☑ ☐

Sample Integrity - Condition	Y or N
1. Sample recvd within HT:	☑ ☐
2. All containers accounted for:	☑ ☐
3. Condition of sample:	Intact

Sample Integrity - Instructions	Y or N	N/A
1. Analysis requested is clear:	☑ ☐	
2. Bottles received for unspecified tests	☐ ☑	
3. Sufficient volume recvd for analysis:	☑ ☐	
4. Compositing instructions clear:	☐ ☐	☑
5. Filtering instructions clear:	☐ ☐	☑

Comments

Accutest Laboratories
V:(508) 481-6200

495 Technology Center West, Bldg One
F: (508) 481-7753

Marlborough, MA 01752
www/accutest.com

5.1

5

MC39971: Chain of Custody
Page 2 of 2

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC39971

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC39971-1 Collected: 10-JUL-15 00:00 By: SFDH Received: 11-JUL-15 By: TB-ROX-071015-HCL-BP						
MC39971-1	SW846 8260C	21-JUL-15 12:27	MC			V8260SL+
MC39971-2 Collected: 10-JUL-15 00:00 By: SFDH Received: 11-JUL-15 By: TB-ROX-071015-ST-BP						
MC39971-2	SW846 8011	22-JUL-15 15:33	NK	21-JUL-15	MD	V8011SL
MC39971-3 Collected: 10-JUL-15 09:50 By: SFDH Received: 11-JUL-15 By: MW23-ROX-071015-BP						
MC39971-3	SW846 8260C	21-JUL-15 16:43	MC			V8260SL+
MC39971-3	SW846 8011	22-JUL-15 16:02	NK	21-JUL-15	MD	V8011SL
MC39971-3	SW846 8270D	24-JUL-15 12:42	MR	13-JUL-15	AJ	AB8270SL+
MC39971-3	SW846 8270D BY SIM	29-JUL-15 08:45	MR	13-JUL-15	AJ	B8270SIMSL

Accutest Internal Chain of Custody

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/11/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC39971-1.2	VOC Ref #2	Megan Crichton	07/21/15 11:34	Retrieve from Storage
MC39971-1.2	Megan Crichton	GCMSL	07/21/15 11:37	Load on Instrument
MC39971-1.2	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39971-1.2	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC39971-2.1	VOC Ref #2	Elizabeth Stefanik	07/21/15 14:28	Retrieve from Storage
MC39971-2.1	Elizabeth Stefanik		07/21/15 18:29	Depleted
MC39971-2.2	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39971-2.2	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39971-3.1	Walk In Ref #22	Forrest Thompson	07/13/15 14:25	Retrieve from Storage
MC39971-3.1	Forrest Thompson		07/15/15 21:43	Depleted
MC39971-3.3	VOC Ref #2	Elizabeth Stefanik	07/21/15 14:28	Retrieve from Storage
MC39971-3.3	Elizabeth Stefanik		07/21/15 18:29	Depleted
MC39971-3.4	VOC Ref #2	Elizabeth Stefanik	07/17/15 15:14	Retrieve from Storage
MC39971-3.4	Elizabeth Stefanik		07/18/15 00:11	Depleted
MC39971-3.5	VOC Ref #2	Megan Crichton	07/21/15 11:34	Retrieve from Storage
MC39971-3.5	Megan Crichton	GCMSL	07/21/15 11:37	Load on Instrument
MC39971-3.5	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC39971-3.5	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage

New England ACCUTEST LABORATORIES

GC/MS Volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-MB	L92918.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC39971-1, MC39971-3

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	0.59	5.0	0.19	ug/l	J
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	

Method Blank Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-MB	L92918.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC39971-1, MC39971-3

CAS No.	Compound	Result	RL	MDL	Units	Q
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	1.9	5.0	0.45	ug/l	J
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	1.5	5.0	0.74	ug/l	J
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

Method Blank Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-MB	L92918.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC39971-1, MC39971-3

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	114%	72-133%
2037-26-5	Toluene-D8	99%	85-114%
460-00-4	4-Bromofluorobenzene	104%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

6.1.1

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-BS	L92915.D	1	07/21/15	MC	n/a	n/a	MSL4087
MSL4087-BSD	L92916.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC39971-1, MC39971-3

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	71.3	143	61.1	122	15	14-172/25
107-02-8	Acrolein	250	280	112	246	98	13	10-168/25
107-13-1	Acrylonitrile	50	68.6	137	55.8	112	21	41-158/25
71-43-2	Benzene	50	48.1	96	46.4	93	4	68-127/25
108-86-1	Bromobenzene	50	47.9	96	47.9	96	0	74-124/25
74-97-5	Bromochloromethane	50	50.1	100	46.1	92	8	68-135/25
75-27-4	Bromodichloromethane	50	53.5	107	53.1	106	1	72-144/25
75-25-2	Bromoform	50	59.3	119	53.4	107	10	59-147/25
74-83-9	Bromomethane	50	57.2	114	59.1	118	3	34-175/25
78-93-3	2-Butanone (MEK)	50	83.6	167* [a]	63.1	126	28* [a]	43-147/25
104-51-8	n-Butylbenzene	50	57.2	114	55.7	111	3	77-136/25
135-98-8	sec-Butylbenzene	50	51.1	102	50.4	101	1	75-134/25
98-06-6	tert-Butylbenzene	50	49.7	99	49.3	99	1	74-132/25
75-15-0	Carbon disulfide	50	46.8	94	52.3	105	11	34-171/25
56-23-5	Carbon tetrachloride	50	50.5	101	55.4	111	9	55-153/25
108-90-7	Chlorobenzene	50	46.5	93	45.0	90	3	71-123/25
75-00-3	Chloroethane	50	54.9	110	54.8	110	0	58-175/25
110-75-8	2-Chloroethyl vinyl ether	50	45.7	91	48.2	96	5	44-169/25
67-66-3	Chloroform	50	52.9	106	50.6	101	4	67-136/25
74-87-3	Chloromethane	50	51.1	102	53.1	106	4	25-182/25
95-49-8	o-Chlorotoluene	50	48.6	97	48.3	97	1	72-130/25
106-43-4	p-Chlorotoluene	50	49.3	99	49.1	98	0	73-127/25
124-48-1	Dibromochloromethane	50	62.3	125	59.2	118	5	73-139/25
95-50-1	1,2-Dichlorobenzene	50	48.2	96	47.5	95	1	77-125/25
541-73-1	1,3-Dichlorobenzene	50	49.8	100	48.7	97	2	77-124/25
106-46-7	1,4-Dichlorobenzene	50	48.5	97	48.3	97	0	73-128/25
75-71-8	Dichlorodifluoromethane	50	32.2	64	31.2	62	3	23-157/25
75-34-3	1,1-Dichloroethane	50	51.1	102	49.6	99	3	63-145/25
107-06-2	1,2-Dichloroethane	50	52.4	105	50.1	100	4	58-145/25
75-35-4	1,1-Dichloroethene	50	58.6	117	57.3	115	2	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	49.9	100	48.0	96	4	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	49.9	100	48.7	97	2	66-136/25
78-87-5	1,2-Dichloropropane	50	49.7	99	49.8	100	0	75-133/25
142-28-9	1,3-Dichloropropane	50	50.0	100	46.5	93	7	70-127/25
594-20-7	2,2-Dichloropropane	50	65.4	131	67.4	135	3	52-163/25
563-58-6	1,1-Dichloropropene	50	49.3	99	48.4	97	2	77-140/25

* = Outside of Control Limits.

6.2.1

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-BS	L92915.D	1	07/21/15	MC	n/a	n/a	MSL4087
MSL4087-BSD	L92916.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC39971-1, MC39971-3

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	50	59.9	120	59.9	120	0	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	55.1	110	51.6	103	7	77-143/25
123-91-1	1,4-Dioxane	250	227	91	193	77	16	30-182/25
97-63-2	Ethyl methacrylate	50	53.9	108	46.9	94	14	64-131/25
100-41-4	Ethylbenzene	50	48.2	96	46.6	93	3	71-129/25
87-68-3	Hexachlorobutadiene	50	51.4	103	50.8	102	1	64-146/25
591-78-6	2-Hexanone	50	68.8	138	57.4	115	18	22-163/25
98-82-8	Isopropylbenzene	50	48.4	97	48.1	96	1	72-133/25
99-87-6	p-Isopropyltoluene	50	50.4	101	50.1	100	1	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	51.4	103	51.2	102	0	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	58.2	116	49.2	98	17	47-145/25
74-95-3	Methylene bromide	50	46.9	94	43.7	87	7	70-132/25
75-09-2	Methylene chloride	50	55.9	112	53.9	108	4	55-146/25
91-20-3	Naphthalene	50	44.1	88	39.7	79	11	39-176/25
103-65-1	n-Propylbenzene	50	50.7	101	50.3	101	1	74-134/25
100-42-5	Styrene	50	50.2	100	48.2	96	4	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	58.1	116	56.3	113	3	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	50.5	101	45.8	92	10	58-145/25
127-18-4	Tetrachloroethene	50	47.0	94	46.1	92	2	63-137/25
108-88-3	Toluene	50	49.4	99	48.2	96	2	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	47.1	94	44.8	90	5	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	47.4	95	46.5	93	2	40-176/25
71-55-6	1,1,1-Trichloroethane	50	50.1	100	50.3	101	0	68-144/25
79-00-5	1,1,2-Trichloroethane	50	50.4	101	47.7	95	6	72-133/25
79-01-6	Trichloroethene	50	50.0	100	49.0	98	2	73-126/25
75-69-4	Trichlorofluoromethane	50	52.6	105	51.6	103	2	43-152/25
96-18-4	1,2,3-Trichloropropane	50	53.0	106	47.6	95	11	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	49.7	99	49.1	98	1	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	48.8	98	48.6	97	0	71-127/25
108-05-4	Vinyl Acetate	50	76.2	152	70.8	142	7	10-170/25
75-01-4	Vinyl chloride	50	50.8	102	50.5	101	1	36-167/25
	m,p-Xylene	100	95.8	96	92.5	93	4	68-130/25
95-47-6	o-Xylene	50	48.2	96	46.7	93	3	69-126/25
1330-20-7	Xylene (total)	150	144	96	139	93	4	67-129/25

* = Outside of Control Limits.

6.2.1

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-BS	L92915.D	1	07/21/15	MC	n/a	n/a	MSL4087
MSL4087-BSD	L92916.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC39971-1, MC39971-3

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	109%	108%	72-133%
2037-26-5	Toluene-D8	99%	98%	85-114%
460-00-4	4-Bromofluorobenzene	98%	100%	70-134%

(a) Outside control limits. Associated samples are non-detect for this compound.

* = Outside of Control Limits.

Volatile Internal Standard Area Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSL4087-CC4070	Injection Date:	07/21/15
Lab File ID:	L92915.D	Injection Time:	10:27
Instrument ID:	GCMSL	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	1748749	8.11	2755107	8.92	1529077	12.11	1291392	14.65	220816	5.91
Upper Limit [a]	3497498	8.61	5510214	9.42	3058154	12.61	2582784	15.15	441632	6.41
Lower Limit [b]	874375	7.61	1377554	8.42	764539	11.61	645696	14.15	110408	5.41

Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSL4087-BS	1748749	8.11	2755107	8.92	1529077	12.11	1291392	14.65	220816	5.91
MSL4087-BSD	1651102	8.10	2572560	8.91	1420376	12.10	1165806	14.65	166750	5.91
MSL4087-MB	1498617	8.11	2348488	8.92	1206329	12.11	888824	14.65	209174	5.97
MC39971-1	1429105	8.11	2263296	8.92	1174956	12.11	844824	14.65	197626	5.96
ZZZZZZ	1620337	8.11	2592706	8.92	1346697	12.11	971663	14.65	206471	5.95
ZZZZZZ	1373034	8.11	2210630	8.92	1165620	12.11	828527	14.65	187041	5.97
ZZZZZZ	1470001	8.11	2451404	8.92	1301822	12.11	1083692	14.65	218503	5.92
ZZZZZZ	1492024	8.10	2367899	8.92	1234852	12.11	1016909	14.65	238797	5.94
ZZZZZZ	1469159	8.10	2486931	8.92	1258309	12.11	969568	14.65	202311	5.98
ZZZZZZ	1452841	8.10	2356598	8.92	1230563	12.11	1034419	14.65	249168	5.95
MC39971-3	1468029	8.11	2324995	8.92	1215065	12.11	921161	14.65	208327	5.96
ZZZZZZ	1444466	8.10	2306227	8.92	1244468	12.11	936415	14.65	214222	5.94
ZZZZZZ	1533605	8.10	2450063	8.92	1316694	12.11	1030140	14.65	204102	5.93
ZZZZZZ	1708554	8.10	2645159	8.92	1368000	12.11	1187962	14.65	242901	5.93
ZZZZZZ	1526475	8.10	2437698	8.92	1253087	12.11	952213	14.65	212913	5.95
ZZZZZZ	1397887	8.10	2319301	8.91	1193992	12.11	888270	14.65	218141	5.94
ZZZZZZ	1406408	8.10	2336072	8.92	1235202	12.11	1040075	14.65	232844	5.94
ZZZZZZ	1438589	8.10	2634333	8.91	1252250	12.11	942918	14.65	189221	5.95
ZZZZZZ	1374624	8.10	2355216	8.91	1184748	12.11	864585	14.65	205240	5.93

IS 1 = Pentafluorobenzene
IS 2 = 1,4-Difluorobenzene
IS 3 = Chlorobenzene-D5
IS 4 = 1,4-Dichlorobenzene-d4
IS 5 = Tert Butyl Alcohol-D9

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

Volatile Surrogate Recovery Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8260C	Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC39971-1	L92919.D	117	100	106
MC39971-3	L92927.D	115	100	107
MSL4087-BS	L92915.D	109	99	98
MSL4087-BSD	L92916.D	108	98	100
MSL4087-MB	L92918.D	114	99	104

Surrogate Compounds	Recovery Limits
S1 = Dibromofluoromethane	72-133%
S2 = Toluene-D8	85-114%
S3 = 4-Bromofluorobenzene	70-134%

New England ACCUTEST LABORATORIES

GC/MS Semi-volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43789-MB	F81770.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541

The QC reported here applies to the following samples: Method: SW846 8270D

MC39971-3

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.5	ug/l	
95-57-8	2-Chlorophenol	ND	5.0	0.29	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.37	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.28	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.50	ug/l	
51-28-5	2,4-Dinitrophenol	ND	20	2.5	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	1.9	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.47	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.41	ug/l	
100-02-7	4-Nitrophenol	ND	20	2.5	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.30	ug/l	
108-95-2	Phenol	ND	5.0	0.25	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.34	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.30	ug/l	
62-53-3	Aniline	ND	10	2.5	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.0	0.82	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.0	0.21	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.51	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.0	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.54	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.0	0.24	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.0	0.42	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.0	0.24	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.0	0.21	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.0	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.0	0.37	ug/l	
132-64-9	Dibenzofuran	ND	2.0	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.0	0.37	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.0	0.72	ug/l	
84-66-2	Diethyl phthalate	ND	5.0	0.57	ug/l	
131-11-3	Dimethyl phthalate	ND	5.0	0.27	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.0	0.30	ug/l	
118-74-1	Hexachlorobenzene	ND	5.0	0.77	ug/l	

Method Blank Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43789-MB	F81770.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541

The QC reported here applies to the following samples: Method: SW846 8270D

MC39971-3

CAS No.	Compound	Result	RL	MDL	Units	Q
77-47-4	Hexachlorocyclopentadiene	ND	10	1.3	ug/l	
67-72-1	Hexachloroethane	ND	5.0	0.29	ug/l	
78-59-1	Isophorone	ND	5.0	0.23	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.6	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.1	ug/l	
98-95-3	Nitrobenzene	ND	5.0	0.26	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.0	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.0	0.52	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.0	0.77	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries		Limits
367-12-4	2-Fluorophenol	58%	10-80%
4165-62-2	Phenol-d5	42%	10-72%
118-79-6	2,4,6-Tribromophenol	105%	42-134%
4165-60-0	Nitrobenzene-d5	99%	25-117%
321-60-8	2-Fluorobiphenyl	94%	24-112%
1718-51-0	Terphenyl-d14	132%	48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

Method Blank Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43790-MB	I96924.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC39971-3

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.10	0.0075	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0084	ug/l	
120-12-7	Anthracene	ND	0.10	0.0098	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.050	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.015	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.050	0.019	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.013	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0074	ug/l	
86-73-7	Fluorene	ND	0.10	0.015	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.020	ug/l	
90-12-0	1-Methylnaphthalene	0.018	2.0	0.012	ug/l	J
91-57-6	2-Methylnaphthalene	0.032	2.0	0.011	ug/l	J
85-01-8	Phenanthrene	ND	0.050	0.011	ug/l	
129-00-0	Pyrene	ND	0.10	0.0085	ug/l	

CAS No.	Surrogate Recoveries		Limits
4165-60-0	Nitrobenzene-d5	95%	26-121%
321-60-8	2-Fluorobiphenyl	85%	28-107%
1718-51-0	Terphenyl-d14	125%	29-129%

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43789-BS	F81771.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541
OP43789-BSD	F81772.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541

The QC reported here applies to the following samples: Method: SW846 8270D

MC39971-3

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
65-85-0	Benzoic Acid	50	20.0	40	19.8	40	1	10-70/20
95-57-8	2-Chlorophenol	50	37.7	75	37.5	75	1	39-100/20
59-50-7	4-Chloro-3-methyl phenol	50	41.5	83	41.4	83	0	43-112/20
120-83-2	2,4-Dichlorophenol	50	41.2	82	39.5	79	4	44-113/20
105-67-9	2,4-Dimethylphenol	50	38.1	76	35.6	71	7	21-108/20
51-28-5	2,4-Dinitrophenol	50	44.8	90	43.8	88	2	22-128/20
534-52-1	4,6-Dinitro-o-cresol	50	46.2	92	44.5	89	4	42-132/20
95-48-7	2-Methylphenol	50	34.9	70	36.0	72	3	34-91/20
	3&4-Methylphenol	100	68.6	69	70.5	71	3	31-90/20
88-75-5	2-Nitrophenol	50	41.9	84	41.2	82	2	40-118/20
100-02-7	4-Nitrophenol	50	21.9	44	23.3	47	6	10-71/20
87-86-5	Pentachlorophenol	50	34.2	68	34.4	69	1	33-123/20
108-95-2	Phenol	50	17.5	35	19.0	38	8	11-57/20
95-95-4	2,4,5-Trichlorophenol	50	44.5	89	43.2	86	3	50-122/20
88-06-2	2,4,6-Trichlorophenol	50	42.9	86	42.1	84	2	48-118/20
62-53-3	Aniline	50	26.6	53	30.9	62	15	18-90/20
101-55-3	4-Bromophenyl phenyl ether	50	46.6	93	46.9	94	1	55-126/20
85-68-7	Butyl benzyl phthalate	50	51.0	102	50.0	100	2	56-124/20
100-51-6	Benzyl Alcohol	50	38.7	77	38.9	78	1	13-106/20
91-58-7	2-Chloronaphthalene	50	48.6	97	47.4	95	3	45-123/20
106-47-8	4-Chloroaniline	50	39.8	80	41.0	82	3	35-111/20
111-91-1	bis(2-Chloroethoxy)methane	50	46.9	94	45.1	90	4	41-117/20
111-44-4	bis(2-Chloroethyl)ether	50	44.2	88	43.7	87	1	31-114/20
108-60-1	bis(2-Chloroisopropyl)ether	50	54.4	109	54.1	108	1	33-135/20
7005-72-3	4-Chlorophenyl phenyl ether	50	46.7	93	46.5	93	0	52-124/20
122-66-7	1,2-Diphenylhydrazine	50	54.8	110	54.3	109	1	45-119/20
121-14-2	2,4-Dinitrotoluene	50	46.5	93	46.6	93	0	52-128/20
606-20-2	2,6-Dinitrotoluene	50	47.8	96	45.9	92	4	50-126/20
91-94-1	3,3'-Dichlorobenzidine	50	41.9	84	45.9	92	9	46-134/20
132-64-9	Dibenzofuran	50	45.5	91	44.7	89	2	51-118/20
84-74-2	Di-n-butyl phthalate	50	47.8	96	49.2	98	3	57-120/20
117-84-0	Di-n-octyl phthalate	50	54.8	110	52.5	105	4	58-125/20
84-66-2	Diethyl phthalate	50	48.1	96	48.5	97	1	40-125/20
131-11-3	Dimethyl phthalate	50	47.6	95	47.0	94	1	10-145/20
117-81-7	bis(2-Ethylhexyl)phthalate	50	52.1	104	52.4	105	1	60-126/20
118-74-1	Hexachlorobenzene	50	44.0	88	44.5	89	1	53-127/20

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43789-BS	F81771.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541
OP43789-BSD	F81772.D	1	07/24/15	MR	07/13/15	OP43789	MSF3541

The QC reported here applies to the following samples: Method: SW846 8270D

MC39971-3

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
77-47-4	Hexachlorocyclopentadiene	50	24.4	49	23.4	47	4	10-75/20
67-72-1	Hexachloroethane	50	34.7	69	32.3	65	7	15-98/20
78-59-1	Isophorone	50	46.6	93	45.5	91	2	36-106/20
88-74-4	2-Nitroaniline	50	50.1	100	48.5	97	3	52-130/20
99-09-2	3-Nitroaniline	50	44.6	89	45.1	90	1	47-120/20
100-01-6	4-Nitroaniline	50	47.1	94	46.6	93	1	51-121/20
98-95-3	Nitrobenzene	50	46.0	92	44.7	89	3	27-120/20
62-75-9	n-Nitrosodimethylamine	50	33.2	66	33.5	67	1	10-87/20
621-64-7	N-Nitroso-di-n-propylamine	50	51.4	103	50.4	101	2	37-123/20
86-30-6	N-Nitrosodiphenylamine	50	45.3	91	44.7	89	1	50-112/20
110-86-1	Pyridine	50	14.8	30	16.1	32	8	10-72/20

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
367-12-4	2-Fluorophenol	56%	57%	10-80%
4165-62-2	Phenol-d5	40%	43%	10-72%
118-79-6	2,4,6-Tribromophenol	100%	100%	42-134%
4165-60-0	Nitrobenzene-d5	104%	101%	25-117%
321-60-8	2-Fluorobiphenyl	101%	95%	24-112%
1718-51-0	Terphenyl-d14	115%	117%	48-133%

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43790-BS	I96925.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626
OP43790-BSD	I96926.D	1	07/23/15	MR	07/13/15	OP43790	MSI3626

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC39971-3

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
83-32-9	Acenaphthene	50	42.8	86	41.6	83	3	45-116/30
208-96-8	Acenaphthylene	50	43.8	88	38.6	77	13	34-110/30
120-12-7	Anthracene	50	42.7	85	43.6	87	2	50-117/30
56-55-3	Benzo(a)anthracene	50	43.8	88	43.9	88	0	55-139/30
50-32-8	Benzo(a)pyrene	50	51.5	103	51.8	104	1	48-131/30
205-99-2	Benzo(b)fluoranthene	50	47.9	96	48.8	98	2	49-141/30
191-24-2	Benzo(g,h,i)perylene	50	49.6	99	49.6	99	0	60-130/30
207-08-9	Benzo(k)fluoranthene	50	50.3	101	50.1	100	0	49-133/30
218-01-9	Chrysene	50	43.3	87	43.3	87	0	52-128/30
53-70-3	Dibenzo(a,h)anthracene	50	50.5	101	50.2	100	1	60-136/30
206-44-0	Fluoranthene	50	35.1	70	43.8	88	22	46-132/30
86-73-7	Fluorene	50	42.4	85	39.7	79	7	53-120/30
193-39-5	Indeno(1,2,3-cd)pyrene	50	49.4	99	49.2	98	0	57-134/30
90-12-0	1-Methylnaphthalene	50	38.8	78	41.3	83	6	41-105/30
91-57-6	2-Methylnaphthalene	50	41.6	83	40.0	80	4	36-111/30
85-01-8	Phenanthrene	50	38.4	77	41.0	82	7	50-120/30
129-00-0	Pyrene	50	34.4	69	42.7	85	22	48-127/30

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
4165-60-0	Nitrobenzene-d5	103%	89%	26-121%
321-60-8	2-Fluorobiphenyl	93%	86%	28-107%
1718-51-0	Terphenyl-d14	92%	115%	29-129%

* = Outside of Control Limits.

Semivolatile Internal Standard Area Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSF3541-CC3514	Injection Date:	07/24/15
Lab File ID:	F81769.D	Injection Time:	08:25
Instrument ID:	GCMSF	Method:	SW846 8270D

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
Check Std	26279	3.28	97566	4.31	57422	5.81	95188	7.06	111625	9.39	97390	10.88
Upper Limit [a]	52558	3.78	195132	4.81	114844	6.31	190376	7.56	223250	9.89	194780	11.38
Lower Limit [b]	13140	2.78	48783	3.81	28711	5.31	47594	6.56	55813	8.89	48695	10.38
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43789-MB	27282	3.28	98248	4.31	59121	5.80	103392	7.06	112401	9.38	101399	10.88
OP43789-BS	28932	3.28	107423	4.31	61392	5.81	106914	7.06	120515	9.39	105348	10.88
OP43789-BSD	28065	3.28	107360	4.31	62052	5.80	106556	7.06	118557	9.38	109359	10.88
ZZZZZZ	26020	3.28	96941	4.31	56766	5.80	100301	7.06	111837	9.38	104763	10.88
ZZZZZZ	27147	3.28	99285	4.31	57502	5.80	102371	7.06	108656	9.38	104249	10.88
ZZZZZZ	26666	3.28	98475	4.31	58638	5.80	102612	7.05	110225	9.38	99872	10.88
ZZZZZZ	26015	3.28	97407	4.31	55502	5.81	100053	7.05	110084	9.38	100916	10.88
ZZZZZZ	25759	3.28	92816	4.31	55652	5.80	96765	7.06	109949	9.38	100122	10.87
ZZZZZZ	27054	3.28	100605	4.31	59945	5.80	105083	7.06	113237	9.38	110601	10.88
ZZZZZZ	29039	3.28	109925	4.31	64400	5.80	115548	7.06	124581	9.38	117294	10.88
MC39971-3	27616	3.28	102441	4.31	59713	5.80	105289	7.05	119912	9.38	113934	10.88
OP43901-MB	30692	3.28	115842	4.31	66778	5.80	117754	7.05	131025	9.38	120085	10.88
OP43901-BS	32136	3.28	120962	4.31	69877	5.81	118877	7.06	145612	9.39	124911	10.88
OP43901-MS	29157	3.28	107123	4.31	63302	5.80	110393	7.06	134330	9.39	117843	10.88
OP43901-MSD	29537	3.28	112953	4.31	64634	5.81	111360	7.06	133555	9.39	116926	10.88
MC40090-1	29663	3.28	109904	4.31	64771	5.80	114775	7.06	127419	9.38	120716	10.88
OP43932-BS	33579	3.28	120873	4.31	68841	5.81	115625	7.06	126003	9.39	105304	10.88

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

Semivolatile Internal Standard Area Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSI3626-CC3621	Injection Date:	07/23/15
Lab File ID:	I96923.D	Injection Time:	15:55
Instrument ID:	GCMSI	Method:	SW846 8270D

	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT
Check Std	251723	3.70	621874	4.74	280314	6.26	425708	7.59	446787	10.58	1426934	12.24
Upper Limit [a]	503446	4.20	1243748	5.24	560628	6.76	851416	8.09	893574	11.08	2853868	12.74
Lower Limit [b]	125862	3.20	310937	4.24	140157	5.76	212854	7.09	223394	10.08	713467	11.74
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43790-MB	287976	3.70	617472	4.74	286731	6.26	422608	7.59	402711	10.57	1049107	12.24
OP43790-BS	301897	3.70	535825	4.75	266615	6.26	454031	7.59	540476	10.59	1433149	12.25
OP43790-BSD	239435	3.70	568435	4.75	308909	6.26	519258	7.59	539732	10.59	1417664	12.25
ZZZZZZ	268130	3.70	498270	4.74	295112	6.26	475576	7.59	503343	10.58	1333757	12.24
ZZZZZZ	279708	3.70	599195	4.74	246096	6.26	376618	7.59	501012	10.58	1335506	12.24
ZZZZZZ	237090	3.70	639560	4.74	305078	6.26	495933	7.59	516413	10.58	1360871	12.24
ZZZZZZ	234092	3.70	612074	4.74	291850	6.26	461123	7.59	395153	10.58	1231550	12.24
ZZZZZZ	222208	3.70	554477	4.74	268262	6.26	471741	7.59	497852	10.58	1312335	12.24
ZZZZZZ	290605	3.70	534605	4.74	256911	6.26	474334	7.59	498090	10.58	1306491	12.24
ZZZZZZ	281610	3.70	573211	4.75	293489	6.26	402433	7.59	427632	10.58	1052406	12.24
OP43804-MB	353229	3.70	627683	4.74	310716	6.26	484443	7.59	481568	10.58	1204079	12.24
ZZZZZZ	365472	3.70	661089	4.74	399658	6.26	501565	7.59	631958	10.58	1583178	12.24
ZZZZZZ	283374	3.70	673420	4.74	405714	6.26	641795	7.59	497410	10.57	1233051	12.24
ZZZZZZ	362422	3.70	803701	4.74	430216	6.26	577412	7.59	769959	10.58	1940152	12.24
ZZZZZZ	389836	3.70	858630	4.74	410462	6.26	647964	7.59	667146	10.58	1676175	12.24
ZZZZZZ	315292	3.70	688427	4.74	409868	6.26	649500	7.59	657810	10.58	1642277	12.24

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

Semivolatile Internal Standard Area Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSI3629-CC3621	Injection Date:	07/29/15
Lab File ID:	I96997.D	Injection Time:	08:21
Instrument ID:	GCMSI	Method:	SW846 8270D BY SIM

	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT
Check Std	294414	3.70	632595	4.74	278262	6.26	468753	7.59	539561	10.58	1374820	12.24
Upper Limit [a]	588828	4.20	1265190	5.24	556524	6.76	937506	8.09	1079122	11.08	2749640	12.74
Lower Limit [b]	147207	3.20	316298	4.24	139131	5.76	234377	7.09	269781	10.08	687410	11.74
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
MC39971-3	277625	3.70	616848	4.74	295500	6.26	488963	7.59	472292	10.58	1415937	12.25
OP43882-MB	245104	3.70	599204	4.74	262824	6.25	441030	7.59	442080	10.58	1243111	12.24
OP43882-BS	267752	3.70	569289	4.74	303675	6.26	503091	7.59	488152	10.58	1076381	12.24
ZZZZZZ	287448	3.70	644666	4.74	313022	6.25	516818	7.58	530548	10.58	1345697	12.24
ZZZZZZ	244641	3.70	562405	4.74	265459	6.25	499262	7.58	447827	10.57	1063274	12.24
ZZZZZZ	224849	3.70	565468	4.74	288057	6.25	481251	7.58	521522	10.57	1326034	12.24
ZZZZZZ	273334	3.70	529413	4.74	298665	6.25	489175	7.58	496043	10.57	1260041	12.24
ZZZZZZ	226662	3.70	538054	4.73	266249	6.25	494418	7.59	500764	10.57	1269527	12.24
ZZZZZZ	202241	3.70	503054	4.74	244481	6.25	379891	7.59	476872	10.57	1221643	12.24
ZZZZZZ	247588	3.70	539937	4.74	261169	6.25	493886	7.58	429134	10.58	1051510	12.24
ZZZZZZ	284830	3.70	632312	4.74	305433	6.25	502721	7.58	509875	10.57	1299628	12.24
OP43850-MB	263981	3.70	641981	4.73	297740	6.25	475547	7.58	467844	10.57	1099307	12.24
ZZZZZZ	304285	3.70	818409	4.73	374777	6.25	534892	7.58	496532	10.57	1239442	12.24
ZZZZZZ	316572	3.68	713035	4.73	346943	6.25	572243	7.58	540626	10.57	1302346	12.24
ZZZZZZ	394323	3.70	855249	4.73	415049	6.25	665398	7.59	650545	10.58	1540615	12.24
ZZZZZZ	299304	3.70	675355	4.73	327363	6.25	537797	7.58	473634	10.57	1072829	12.24
OP43850-BS	312512	3.70	744754	4.73	345068	6.25	652363	7.59	672783	10.58	1209087	12.24
OP43850-BSD	304418	3.70	766665	4.73	343697	6.25	635428	7.58	502517	10.58	1181303	12.24

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

7.3.3

Semivolatile Surrogate Recovery Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3	S4	S5	S6
MC39971-3	F81780.D	53	36	102	101	99	113
OP43789-BS	F81771.D	56	40	100	104	101	115
OP43789-BSD	F81772.D	57	43	100	101	95	117
OP43789-MB	F81770.D	58	42	105	99	94	132

Surrogate Compounds	Recovery Limits
S1 = 2-Fluorophenol	10-80%
S2 = Phenol-d5	10-72%
S3 = 2,4,6-Tribromophenol	42-134%
S4 = Nitrobenzene-d5	25-117%
S5 = 2-Fluorobiphenyl	24-112%
S6 = Terphenyl-d14	48-133%

Semivolatile Surrogate Recovery Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D BY SIM Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3	S4	S5	S6
MC39971-3	I96998.D	53	39	112	95	86	125
OP43790-BS	I96925.D				103	93	92
OP43790-BSD	I96926.D				89	86	115
OP43790-MB	I96924.D				95	85	125

Surrogate Compounds	Recovery Limits
S1 = 2-Fluorophenol	10-81%
S2 = Phenol-d5	10-72%
S3 = 2,4,6-Tribromophenol	35-137%
S4 = Nitrobenzene-d5	26-121%
S5 = 2-Fluorobiphenyl	28-107%
S6 = Terphenyl-d14	29-129%

New England ACCUTEST LABORATORIES

GC Volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Surrogate Recovery Summaries
- GC Surrogate Retention Time Summaries

Method Blank Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43898-MB	BB63850.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461

The QC reported here applies to the following samples: Method: SW846 8011

MC39971-2, MC39971-3

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.015	0.0061	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.015	0.0061	ug/l	

CAS No.	Surrogate Recoveries		Limits
460-00-4	Bromofluorobenzene (S)	101%	60-140%
460-00-4	Bromofluorobenzene (S)	95%	60-140%

8.1.1

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43898-BS	BB63851.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461
OP43898-BSD	BB63852.D	1	07/22/15	NK	07/21/15	OP43898	GBB3461

The QC reported here applies to the following samples: Method: SW846 8011

MC39971-2, MC39971-3

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
96-12-8	1,2-Dibromo-3-chloropropane	0.071	0.069	97	0.067	94	3	45-149/30
106-93-4	1,2-Dibromoethane	0.071	0.070	99	0.069	97	1	51-149/30

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
460-00-4	Bromofluorobenzene (S)	93%	95%	60-140%
460-00-4	Bromofluorobenzene (S)	97%	92%	60-140%

8.2.1

* = Outside of Control Limits.

Volatile Surrogate Recovery Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8011 Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1 [a]	S1 [b]
MC39971-2	BB63863.D	92	90
MC39971-3	BB63864.D	84	68
OP43898-BS	BB63851.D	93	97
OP43898-BSD	BB63852.D	95	92
OP43898-MB	BB63850.D	101	95

Surrogate Compounds	Recovery Limits
S1 = Bromofluorobenzene (S)	60-140%

(a) Recovery from GC signal #2
(b) Recovery from GC signal #1

8.3.1

GC Surrogate Retention Time Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3461-CC3460	Injection Date:	07/22/15
Lab File ID:	BB63849.D	Injection Time:	08:57
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	7.01	8.20

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
OP43898-MB	BB63850.D	07/22/15	09:29	7.05	8.26
OP43898-BS	BB63851.D	07/22/15	09:57	7.09	8.31
OP43898-BSD	BB63852.D	07/22/15	10:25	7.15	8.37
ZZZZZZ	BB63853.D	07/22/15	10:53	7.21	8.45
ZZZZZZ	BB63854.D	07/22/15	11:21	7.28	8.54
ZZZZZZ	BB63855.D	07/22/15	11:49	7.36	8.62
ZZZZZZ	BB63856.D	07/22/15	12:17	7.44	8.72
ZZZZZZ	BB63857.D	07/22/15	12:45	7.53	8.83
ZZZZZZ	BB63858.D	07/22/15	13:13	7.64	8.96
ZZZZZZ	BB63859.D	07/22/15	13:41	7.75	9.09

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

GC Surrogate Retention Time Summary

Job Number: MC39971
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3461-CC3460	Injection Date:	07/22/15
Lab File ID:	BB63860.D	Injection Time:	14:09
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	7.86	9.21

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
ZZZZZZ	BB63861.D	07/22/15	14:37	7.96	9.34
ZZZZZZ	BB63862.D	07/22/15	15:05	8.09	9.47
MC39971-2	BB63863.D	07/22/15	15:33	8.24	9.65
MC39971-3	BB63864.D	07/22/15	16:02	8.39	9.82
GBB3461-ECC3461	BB63865.D	07/22/15	16:30	8.54	9.97

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

8.4.2

Roxana Groundwater Quarterly – 3rd Quarter 2015 Data Review

Laboratory SDG: MC40028

Data Reviewer: Melissa Mansker

Peer Reviewer: Elizabeth Kunkel

Date Reviewed: 8/12/2015

Guidance: USEPA National Functional Guidelines for Superfund Organic Methods Data Review 2014

Sample Identification	Sample Identification
TB-ROX-071315-HCL-A	TB-ROX-071315-ST-A
ROST4PZ-ROX-071315	ROST3MW-ROX-071315
MW5-ROX-071315	MW2-ROX-071315
TB-ROX-071315-HCL-B	TB-ROX-071315-ST-B
P59-ROX-071315	P93C-ROX-071315
P57-ROX-071315	P93A-ROX-071315

1.0 Data Package Completeness

Were all items delivered as specified in the QAPP and COC as appropriate?

Yes

2.0 Laboratory Case Narrative \ Cooler Receipt Form

Were problems noted in the laboratory case narrative or cooler receipt form?

Yes, the laboratory case narrative indicated VOCs were detected in the method blank, and although not indicated in the laboratory case narrative, VOCs were detected in the trip blanks. VOC LCS/LCSD recoveries, and SVOC and VOC LCS/LCSD RPDs, were outside evaluation criteria. The VOC by 8011 surrogate recovery for bromofluorobenzene was outside evaluation criteria in several samples. Samples MW2-ROX-071315, P59-ROX-071315, P57-ROX-071315, and P93A-ROX-071315 were diluted due to high levels of target analytes. These issues are addressed further in the appropriate sections below.

Additionally, the initial calibration verification for vinyl acetate, 2-chloroethyl vinyl ether, acrolein, and hexachlorocyclopentadiene exceeded 30 percent difference (%D). Continuing calibration verification for acetone, vinyl acetate, acrylonitrile, 2,2-dichloropropane, and 2-butanone exceeded 40%D, and the continuing calibration verification for 1,2-dibromo-3-chloropropane and bromofluorobenzene exceeded 15%D. Also, the laboratory report was revised to correctly report 2-chloroethyl vinyl ether as non-detect, which had been previously reported as a false positive by the laboratory in sample MW2-ROX-071315 due to co-elution. Laboratory resolution involved software peak identification optimization.

The cooler receipt form indicated three of three coolers were received by the laboratory at temperatures of 0.8°C, 1.2°C, and 0.2°C, which are outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

3.0 Holding Times

Were samples extracted/analyzed within applicable limits?

Yes

4.0 Blank Contamination

Were any analytes detected in the Method Blanks, Field Blanks or Trip Blanks?

Yes

Blank ID	Parameter	Analyte	Concentration/ Amount
TB-ROX-071315-HCL-A	VOCs	Carbon disulfide	0.28 µg/L
TB-ROX-071315-HCL-A	VOCs	Hexachlorobutadiene	0.71 µg/L
TB-ROX-071315-HCL-A	VOCs	Naphthalene	3.5 µg/L
TB-ROX-071315-HCL-A	VOCs	1,2,3-Trichlorobenzene	1.1 µg/L
TB-ROX-071315-HCL-A	VOCs	1,2,4-Trichlorobenzene	0.99 µg/L
TB-ROX-071315-HCL-B	VOCs	Naphthalene	3.5 µg/L
TB-ROX-071315-HCL-B	VOCs	1,2,4-Trichlorobenzene	0.93 µg/L
MSL4087-MB	VOCs	Carbon disulfide	0.59 µg/L
MSL4087-MB	VOCs	Hexachlorobutadiene	1.9 µg/L
MSL4087-MB	VOCs	1,2,4-Trichlorobenzene	1.5 µg/L
MSL4088-MB	VOCs	Carbon disulfide	0.51 µg/L
MSL4090-MB	VOCs	Hexachlorobutadiene	1.4 µg/L
MSL4090-MB	VOCs	Naphthalene	3.6 µg/L
MSL4090-MB	VOCs	1,2,3-Trichlorobenzene	1.6 µg/L
MSL4090-MB	VOCs	1,2,4-Trichlorobenzene	1.4 µg/L
MSL4091-MB	VOCs	Carbon disulfide	0.47 µg/L
MSL4091-MB	VOCs	Hexachlorobutadiene	1.7 µg/L
MSL4091-MB	VOCs	Naphthalene	3.6 µg/L
MSL4091-MB	VOCs	1,2,3-Trichlorobenzene	1.7 µg/L
MSL4091-MB	VOCs	1,2,4-Trichlorobenzene	1.5 µg/L
OP43843-MB	PAHs	1-Methylnaphthalene	0.032 µg/L
OP43843-MB	PAHs	2-Methylnaphthalene	0.085 µg/L
OP43843-MB	PAHs	Phenanthrene	0.015 µg/L

Qualifications due to blank contamination are included in the table below. Analytical data that were reported non-detect or at concentrations greater than five times (5X) the associated blank concentration did not require qualification. Please see section 12.0 of this review for additional qualifications regarding samples associated with PAHs in method blank OP43843-MB.

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
ROST4PZ-ROX-071315	VOCs	Carbon disulfide	-	**U**
ROST3MW-ROX-071315	VOCs	Carbon disulfide	-	**U**
MW5-ROX-071315	VOCs	Carbon disulfide	-	**U**
MW2-ROX-071315	VOCs	Carbon disulfide	-	**U**
MW2-ROX-071315	VOCs	1,2,3-Trichlorobenzene	-	**U**

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
P93C-ROX-071315	VOCs	Carbon disulfide	-	**U**
P93C-ROX-071315	VOCs	Naphthalene	-	**U**
ROST3MW-ROX-071315	VOCs	Hexachlorobutadiene	-	**U**
ROST3MW-ROX-071315	VOCs	1,2,3-Trichlorobenzene	-	**U**
ROST3MW-ROX-071315	VOCs	1,2,4-Trichlorobenzene	-	**U**

5.0 Laboratory Control Sample

Were LCS recoveries within evaluation criteria?

No

LCS/LCSD ID	Parameter	Analyte	LCS/LCSD Recovery	RPD	LCS/LCSD/ RPD Criteria
MSL4087-BS/BSD	VOCs	2-Butanone (MEK)	**167/**126	**28**	43-147/25
MSL4088-BS/BSD	VOCs	2-Butanone (MEK)	**162/162**	0	43-147/25
MSL4090-BS/BSD	VOCs	Acetone	**189**/158	18	14-172/25
MSL4090-BS/BSD	VOCs	Carbon disulfide	104/78	**29**	34-141/25
MSL4091-BS/BSD	VOCs	Acetone	153/**241**	**33**	14-172/25
MSL4091-BS/BSD	VOCs	2-Butanone (MEK)	136/**165**	19	43-147/25
MSL4091-BS/BSD	VOCs	1,4-Dioxane	69/92	**29**	30-128/25
OP43842-BS/BSD	SVOCs	Pyridine	22/49	**76**	10-72/20

Analytical data reported as non-detect and associated with LCS recoveries above evaluation criteria, indicating a possible high bias, did not require qualification. No qualification of data was required.

6.0 Surrogate Recoveries

Were surrogate recoveries within evaluation criteria?

No

Sample ID	Parameter	Surrogate	Recovery (%)	Criteria (%)
ROST4PZ-ROX-071315	VOCs by 8011	Bromofluorobenzene	**141**	60-140
ROST3MW-ROX-071315	VOCs by 8011	Bromofluorobenzene	**149**	60-140
MW2-ROX-071315	VOCs by 8011	Bromofluorobenzene	**148**	60-140
P59-ROX-071315	VOCs by 8011	Bromofluorobenzene	**156**	60-140
P57-ROX-071315	VOCs by 8011	Bromofluorobenzene	**184**	60-140
P93A-ROX-071315	VOCs by 8011	Bromofluorobenzene	**144**	60-140

Analytical data reported as non-detect and associated with surrogate recoveries above evaluation criteria, indicating a possible high bias, did not require qualification. No qualification of data was required.

7.0 Matrix Spike and Matrix Spike Duplicate Recoveries

Were MS/MSD samples analyzed as part of this SDG?

No

8.0 Internal Standard (IS) Recoveries

Were internal standard area recoveries within evaluation criteria?

Yes

9.0 Laboratory Duplicate Results

Were laboratory duplicate samples analyzed as part of this SDG?

No

10.0 Field Duplicate Results

Were field duplicate samples collected as part of this SDG?

No

11.0 Sample Dilutions

For samples that were diluted and nondetect, were undiluted results also reported?

Not applicable; analytes were detected in samples that were diluted.

12.0 Additional Qualifications

Were additional qualifications applied?

Yes, professional judgment was also used to qualify as estimated, however not reject, data that was associated with PAHs in method blank OP43843-MB, and naphthalene in trip blank TB-ROX-071315-HCL-A due to comparable historical detections.

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
MW5-ROX-071315	PAHs	1-Methylnaphthalene	-	**J**
MW5-ROX-071315	PAHs	2-Methylnaphthalene	-	**J**
MW5-ROX-071315	PAHs	Phenanthrene	-	**J**
MW2-ROX-071315	PAHs	Phenanthrene	-	**J**
P93C-ROX-071315	PAHs	1-Methylnaphthalene	-	**J**
P93C-ROX-071315	PAHs	2-Methylnaphthalene	-	**J**
ROST3MW-ROX-071315	VOCs	Naphthalene	-	**J**

New England ACCUTEST LABORATORIES

Reissue #1
08/10/15



Technical Report for

Shell Oil

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, 60400249

Accutest Job Number: MC40028

Sampling Date: 07/13/15

Report to:

AECOM, INC.

Melissa.mansker@urs.com

ATTN: Melissa Mansker

Total number of pages in report: **140**

Reviewed 8/12/15

Reza Tand
Lab Director

Test results contained within this data package meet the requirements of the National Environmental Laboratory Accreditation Program and/or state specific certification programs as applicable.

Client Service contact: Jeremy Vienneau 508-481-6200

Certifications: MA (M-MA136,SW846 NELAC) CT (PH-0109) NH (250210) RI (00071) ME (MA00136) FL (E87579) NY (11791) NJ (MA926) PA (6801121) ND (R-188) CO MN (11546AA) NC (653) IL (002337) WI (399080220) DoD ELAP (L-A-B L2235)

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Test results relate only to samples analyzed.

Accutest Laboratories is the sole authority for authorizing edits or modifications to this document. Unauthorized modification of this report is strictly prohibited.

ACCUTEST LABORATORIES

Elizabeth Kunkel
AECOM, INC.
1001 Highlands Plaza Drive West Suite 300
St. Louis, MO 63110
Elizabeth.Kunkel@URS.com

August 7th, 2015

Accutest Job MC40028 (revision 1)

Ms. Kunkel,

The report of Accutest job number MC40028 has been revised to correct the 2-Chloroethyl vinyl ether result from sample MC40028-6 which was a false positive. This change has been incorporated into the attached report.

Sincerely,

Nancy Ma
Report Generation
Accutest Laboratories of New England, Inc.

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1

Sample Summary

Shell Oil

Job No: MC40028

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Collected Date	Time	By	Received	Matrix Code	Matrix Type	Client Sample ID
MC40028-1	07/13/15	00:00	BTES	07/15/15	AQ	Trip Blank Water	TB-ROX-071315-HCL-A
MC40028-2	07/13/15	00:00	BTES	07/15/15	AQ	Trip Blank Water	TB-ROX-071315-ST-A
MC40028-3	07/13/15	10:25	BTES	07/15/15	AQ	Ground Water	ROST4PZ-ROX-071315
MC40028-4	07/13/15	11:25	BTES	07/15/15	AQ	Ground Water	ROST3MW-ROX-071315
MC40028-5	07/13/15	13:35	BTES	07/15/15	AQ	Ground Water	MW5-ROX-071315
MC40028-6	07/13/15	14:45	BTES	07/15/15	AQ	Ground Water	MW2-ROX-071315
MC40028-7	07/13/15	00:00	BTES	07/15/15	AQ	Trip Blank Water	TB-ROX-071315-HCL-B
MC40028-8	07/13/15	00:00	BTES	07/15/15	AQ	Trip Blank Water	TB-ROX-071315-ST-B
MC40028-9	07/13/15	09:55	BTES	07/15/15	AQ	Ground Water	P59-ROX-071315
MC40028-10	07/13/15	11:40	BTES	07/15/15	AQ	Ground Water	P93C-ROX-071315
MC40028-11	07/13/15	12:40	BTES	07/15/15	AQ	Ground Water	P57-ROX-071315
MC40028-12	07/13/15	13:50	BTES	07/15/15	AQ	Ground Water	P93A-ROX-071315

ACCUTEST LABORATORIES

SAMPLE DELIVERY GROUP CASE NARRATIVE

Client: Shell Oil **Job No** MC40028

Site: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Centra **Report Date** 7/29/2015 9:22:12 AM

8 Sample(s) and 4 Trip Blank(s) were collected on 07/13/2015 and were received at Accutest on 07/15/2015 properly preserved, at 1.2 Deg. C and intact. These Samples received an Accutest job number of MC40028. A listing of the Laboratory Sample ID, Client Sample ID and dates of collection are presented in the Results Summary Section of this report. 1-Chlorohexane, Benzenethiol, Dibenz(a,h)acridine, Indene, and Quinoline were searched in the library search and reported only if detections were found.

Except as noted below, all method specified calibrations and quality control performance criteria were met for this job. For more information, please refer to QC summary pages.

Volatiles by GCMS By Method SW846 8260C

Matrix: AQ **Batch ID:** MSL4087

- All samples were analyzed within the recommended method holding time.
- Sample(s) MC40028-1, MC40028-3, MC40028-7 have compound(s) reported with a "B" qualifier, indicating analyte is found in the associated method blank.
- RPD of MSL4087-BSD for 2-Butanone (MEK): Outside control limits. Associated samples are non-detect for this compound.
- MSL4087-BS for 2-Butanone (MEK): Outside control limits. Associated samples are non-detect for this compound.
- Initial calibration verification standard MSL4070-ICV4070 for acrolein exceed 30% Difference. Acrolein is within in criteria in continuing calibration check standard MSL4087-CC4070, MSL4088-CC4070, MSL4090-CC4070, MSL4091-CC4070.
- Initial calibration verification standard MSL4070-ICV4070 for vinyl acetate, 2-chloroethyl vinyl ether exceed 30% Difference (response bias high). Associated samples are non-detect for this compound.
- Continuing calibration check standard MSL4087-CC4070 for acetone, vinyl acetate, 2-butanone exceed 40% Difference (response bias high). Associated samples are non-detect for this compound.

Matrix: AQ **Batch ID:** MSL4088

- All samples were analyzed within the recommended method holding time.
- Sample(s) MC40028-4, MC40028-5, MC40028-6 have compound(s) reported with a "B" qualifier, indicating analyte is found in the associated method blank.
- MSL4088-BS/BSD for 2-Butanone (MEK): Outside control limits. Associated samples are non-detect for this compound.
- Continuing calibration check standard MSL4088-CC4070 for acetone, acrylonitrile, 2-butanone exceed 40% Difference (response bias high). Associated samples are non-detect for this compound.

Matrix: AQ **Batch ID:** MSL4090

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- MSL4090-BS for Acetone: Outside control limits. Associated samples are non-detect for this compound.
- RPD of MSL4090-BSD for Carbon disulfide: Outside control limits. Individual spike recoveries within acceptance limits.
- Continuing calibration check standard MSL40990-CC4070 for acetone, vinyl acetate, 2,2-dichloropropane exceed 40% Difference (response bias high). Associated samples are non-detect for this compound.

Matrix: AQ **Batch ID:** MSL4091

- All samples were analyzed within the recommended method holding time.
- MSL4091-BSD for Acetone, 2-Butanone (MEK): Outside control limits. Associated samples are not reported for this compound.
- Sample(s) MC40028-10 have compound(s) reported with a "B" qualifier, indicating analyte is found in the associated method blank.
- RPD of MSL4091-BSD for 1,4-Dioxane: Outside control limits. Individual spike recoveries within acceptance limits.
- RPD of MSL4091-BSD for Acetone: Outside control limits. Associated samples are not reported for this compound.

Volatiles by GCMS By Method SW846 8260C

Matrix: AQ	Batch ID: MSL4091

- Continuing calibration check standard MSL40991-CC4070 for acetone, vinyl acetate exceed 40% Difference (response bias high). Associated samples are non-detect for this compound.

Matrix: AQ	Batch ID: MSV1495

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.

Extractables by GCMS By Method SW846 8270D

Matrix: AQ	Batch ID: OP43842

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- RPD of OP43842-BSD for Pyridine: Outside control limits. Individual spike recoveries within acceptance limits.

Extractables by GCMS By Method SW846 8270D BY SIM

Matrix: AQ	Batch ID: OP43843

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- Sample(s) MC40028-10, MC40028-3, MC40028-4, MC40028-5, MC40028-6 have compound(s) reported with a "B" qualifier, indicating analyte is found in the associated method blank.

Volatiles by GC By Method SW846 8011

Matrix: AQ	Batch ID: OP43937

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- MC40028-3,4,6,9,11,12 for Bromofluorobenzene (S): Outside control limits.Sample non-detect for target analytes.
- Continuing calibration check standard GBB3462-CC3462, signal #1, file BB63915, BB63926 for 1,2-Dibromo-3-chloropropane exceed 15% Dev. 1,2-Dibromo-3-chloropropane is reported from signal #2.

The Accutest Laboratories of New England certifies that all analysis were performed within method specification. It is further recommended that this report to be used in its entirety.The Accutest Laboratories of NE, Laboratory Director or assignee as verified by the signature on the cover page has authorized the release of this report(MC40028).

Summary of Hits

Job Number: MC40028
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/13/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
MC40028-1	TB-ROX-071315-HCL-A					
Carbon disulfide		0.28 JB	5.0	0.19	ug/l	SW846 8260C
Hexachlorobutadiene		0.71 JB	5.0	0.45	ug/l	SW846 8260C
Naphthalene		3.5 J	5.0	0.61	ug/l	SW846 8260C
1,2,3-Trichlorobenzene		1.1 J	5.0	0.78	ug/l	SW846 8260C
1,2,4-Trichlorobenzene		0.99 JB	5.0	0.74	ug/l	SW846 8260C
MC40028-2	TB-ROX-071315-ST-A					
No hits reported in this sample.						
MC40028-3	ROST4PZ-ROX-071315					
Benzene		68.3	0.50	0.27	ug/l	SW846 8260C
Carbon disulfide		1.1 JB	5.0	0.19	ug/l	SW846 8260C
Ethylbenzene		159	1.0	0.24	ug/l	SW846 8260C
Isopropylbenzene		3.7 J	5.0	0.27	ug/l	SW846 8260C
Naphthalene		80.6	5.0	0.61	ug/l	SW846 8260C
n-Propylbenzene		5.3	5.0	0.29	ug/l	SW846 8260C
Toluene		45.6	1.0	0.29	ug/l	SW846 8260C
1,2,4-Trimethylbenzene		33.4	5.0	0.29	ug/l	SW846 8260C
1,3,5-Trimethylbenzene		5.2	5.0	0.20	ug/l	SW846 8260C
m,p-Xylene		400	1.0	0.47	ug/l	SW846 8260C
o-Xylene		30.2	1.0	0.22	ug/l	SW846 8260C
Xylene (total)		430	1.0	0.22	ug/l	SW846 8260C
2,4-Dimethylphenol		2.8 J	10	0.52	ug/l	SW846 8270D
Acenaphthene		0.093 J	0.10	0.0078	ug/l	SW846 8270D BY SIM
Fluorene		0.050 J	0.10	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		9.5	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		7.7	2.1	0.011	ug/l	SW846 8270D BY SIM
Phenanthrene		0.11 B	0.052	0.011	ug/l	SW846 8270D BY SIM
Pyrene		0.025 J	0.10	0.0089	ug/l	SW846 8270D BY SIM
MC40028-4	ROST3MW-ROX-071315					
Carbon disulfide		0.66 JB	5.0	0.19	ug/l	SW846 8260C
Ethylbenzene		20.0	1.0	0.24	ug/l	SW846 8260C
Hexachlorobutadiene		0.71 J	5.0	0.45	ug/l	SW846 8260C
Isopropylbenzene		0.93 J	5.0	0.27	ug/l	SW846 8260C
Naphthalene		5.2	5.0	0.61	ug/l	SW846 8260C
n-Propylbenzene		1.2 J	5.0	0.29	ug/l	SW846 8260C
Toluene		2.7	1.0	0.29	ug/l	SW846 8260C
1,2,3-Trichlorobenzene		1.5 J	5.0	0.78	ug/l	SW846 8260C
1,2,4-Trichlorobenzene		1.3 J	5.0	0.74	ug/l	SW846 8260C

Summary of Hits

Job Number: MC40028
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/13/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
1,2,4-Trimethylbenzene		5.9	5.0	0.29	ug/l	SW846 8260C
1,3,5-Trimethylbenzene		0.61 J	5.0	0.20	ug/l	SW846 8260C
Vinyl Acetate		58.3	5.0	1.4	ug/l	SW846 8260C
m,p-Xylene		26.3	1.0	0.47	ug/l	SW846 8260C
o-Xylene		6.5	1.0	0.22	ug/l	SW846 8260C
Xylene (total)		32.8	1.0	0.22	ug/l	SW846 8260C
Acenaphthene		0.037 J	0.11	0.0079	ug/l	SW846 8270D BY SIM
Fluorene		0.048 J	0.11	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		1.4 J	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.84 JB	2.1	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.11 B	0.053	0.011	ug/l	SW846 8270D BY SIM
Pyrene		0.018 J	0.11	0.0089	ug/l	SW846 8270D BY SIM
MC40028-5	MW5-ROX-071315					
tert-Butylbenzene		3.1 J	5.0	0.57	ug/l	SW846 8260C
Carbon disulfide		0.32 JB	5.0	0.19	ug/l	SW846 8260C
Isopropylbenzene		0.97 J	5.0	0.27	ug/l	SW846 8260C
Methyl Tert Butyl Ether		41.3	1.0	0.35	ug/l	SW846 8260C
Toluene		0.32 J	1.0	0.29	ug/l	SW846 8260C
m,p-Xylene		1.9	1.0	0.47	ug/l	SW846 8260C
o-Xylene		0.32 J	1.0	0.22	ug/l	SW846 8260C
Xylene (total)		2.2	1.0	0.22	ug/l	SW846 8260C
Acenaphthene		0.062 J	0.11	0.0081	ug/l	SW846 8270D BY SIM
Fluorene		0.026 J	0.11	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.087 JB	2.2	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.18 JB	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.024 JB	0.054	0.012	ug/l	SW846 8270D BY SIM
MC40028-6	MW2-ROX-071315					
Benzene		20.4	0.50	0.27	ug/l	SW846 8260C
sec-Butylbenzene		6.0	5.0	0.50	ug/l	SW846 8260C
tert-Butylbenzene		1.2 J	5.0	0.57	ug/l	SW846 8260C
Carbon disulfide		2.3 JB	5.0	0.19	ug/l	SW846 8260C
Ethylbenzene		984	10	2.4	ug/l	SW846 8260C
Isopropylbenzene		68.3	5.0	0.27	ug/l	SW846 8260C
p-Isopropyltoluene		6.0	5.0	0.32	ug/l	SW846 8260C
Naphthalene		87.8	5.0	0.61	ug/l	SW846 8260C
n-Propylbenzene		98.3	5.0	0.29	ug/l	SW846 8260C
Toluene		10.3	1.0	0.29	ug/l	SW846 8260C
1,2,3-Trichlorobenzene		1.5 J	5.0	0.78	ug/l	SW846 8260C
1,2,4-Trimethylbenzene		206	50	2.9	ug/l	SW846 8260C
1,3,5-Trimethylbenzene		109	5.0	0.20	ug/l	SW846 8260C
m,p-Xylene		719	10	4.7	ug/l	SW846 8260C

Summary of Hits

Job Number: MC40028
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/13/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
o-Xylene		68.9	1.0	0.22	ug/l	SW846 8260C
Xylene (total)		780	10	2.2	ug/l	SW846 8260C
2,4-Dimethylphenol		2.8 J	11	0.54	ug/l	SW846 8270D
Acenaphthene		0.042 J	0.11	0.0081	ug/l	SW846 8270D BY SIM
Fluorene		0.036 J	0.11	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		12.9	2.2	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		28.3	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.027 JB	0.054	0.012	ug/l	SW846 8270D BY SIM
MC40028-7	TB-ROX-071315-HCL-B					
Naphthalene		3.5 J	5.0	0.61	ug/l	SW846 8260C
1,2,4-Trichlorobenzene		0.93 JB	5.0	0.74	ug/l	SW846 8260C
MC40028-8	TB-ROX-071315-ST-B					
No hits reported in this sample.						
MC40028-9	P59-ROX-071315					
Benzene		3080	13	6.8	ug/l	SW846 8260C
Ethylbenzene		664	25	6.0	ug/l	SW846 8260C
Isopropylbenzene		11.1 J	130	6.6	ug/l	SW846 8260C
Naphthalene		162	130	15	ug/l	SW846 8260C
n-Propylbenzene		21.1 J	130	7.3	ug/l	SW846 8260C
Toluene		103	25	7.3	ug/l	SW846 8260C
1,2,3-Trichlorobenzene		28.3 J	130	20	ug/l	SW846 8260C
1,2,4-Trimethylbenzene		150	130	7.2	ug/l	SW846 8260C
1,3,5-Trimethylbenzene		54.1 J	130	5.0	ug/l	SW846 8260C
m,p-Xylene		1600	25	12	ug/l	SW846 8260C
o-Xylene		36.8	25	5.4	ug/l	SW846 8260C
Xylene (total)		1630	25	5.4	ug/l	SW846 8260C
2,4-Dimethylphenol		113	11	0.54	ug/l	SW846 8270D
2-Methylphenol		44.0	11	0.22	ug/l	SW846 8270D
3&4-Methylphenol		12.3	11	0.50	ug/l	SW846 8270D
Phenol		6.2	5.4	0.27	ug/l	SW846 8270D
Acenaphthene		0.58	0.11	0.0081	ug/l	SW846 8270D BY SIM
Anthracene		0.37	0.11	0.011	ug/l	SW846 8270D BY SIM
Benzo(a)anthracene		0.068	0.054	0.025	ug/l	SW846 8270D BY SIM
Benzo(a)pyrene		0.035 J	0.11	0.016	ug/l	SW846 8270D BY SIM
Benzo(b)fluoranthene		0.056	0.054	0.020	ug/l	SW846 8270D BY SIM
Benzo(g,h,i)perylene		0.037 J	0.11	0.013	ug/l	SW846 8270D BY SIM
Benzo(k)fluoranthene		0.033 J	0.11	0.011	ug/l	SW846 8270D BY SIM
Chrysene		0.13	0.11	0.014	ug/l	SW846 8270D BY SIM
Fluoranthene		0.20	0.11	0.0080	ug/l	SW846 8270D BY SIM

Summary of Hits

Job Number: MC40028
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/13/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
Fluorene		0.45	0.11	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		4.5	2.2	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		4.9	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.64	0.054	0.012	ug/l	SW846 8270D BY SIM
Pyrene		0.39	0.11	0.0091	ug/l	SW846 8270D BY SIM
MC40028-10	P93C-ROX-071315					
Benzene		36.5	0.50	0.27	ug/l	SW846 8260C
Carbon disulfide		0.25 JB	5.0	0.19	ug/l	SW846 8260C
Ethylbenzene		0.47 J	1.0	0.24	ug/l	SW846 8260C
Methyl Tert Butyl Ether		1.6	1.0	0.35	ug/l	SW846 8260C
Naphthalene		3.7 JB	5.0	0.61	ug/l	SW846 8260C
1,2,4-Trimethylbenzene		0.59 J	5.0	0.29	ug/l	SW846 8260C
m,p-Xylene		0.95 J	1.0	0.47	ug/l	SW846 8260C
Xylene (total)		1.1	1.0	0.22	ug/l	SW846 8260C
1-Methylnaphthalene		0.095 JB	2.2	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.16 JB	2.2	0.012	ug/l	SW846 8270D BY SIM
MC40028-11	P57-ROX-071315					
Benzene		138000	500	270	ug/l	SW846 8260C
Carbon disulfide		852 J	5000	190	ug/l	SW846 8260C
Ethylbenzene		440 J	1000	240	ug/l	SW846 8260C
Trichloroethene		440 J	1000	250	ug/l	SW846 8260C
Xylene (total)		237 J	1000	220	ug/l	SW846 8260C
Phenol		189	26	1.3	ug/l	SW846 8270D
Di-n-butyl phthalate		0.44 J	5.3	0.39	ug/l	SW846 8270D
Acenaphthene		0.49	0.11	0.0079	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.10 J	0.11	0.0088	ug/l	SW846 8270D BY SIM
Fluorene		0.82	0.11	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		30.2	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		46.4	2.1	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.64	0.053	0.011	ug/l	SW846 8270D BY SIM
Pyrene		0.020 J	0.11	0.0089	ug/l	SW846 8270D BY SIM
MC40028-12	P93A-ROX-071315					
Benzene		315000	1000	540	ug/l	SW846 8260C
Carbon disulfide		47.6 J	500	19	ug/l	SW846 8260C
Ethylbenzene		36.1 J	100	24	ug/l	SW846 8260C
Toluene		34.2 J	100	29	ug/l	SW846 8260C
1,2,4-Trimethylbenzene		31.3 J	500	29	ug/l	SW846 8260C
Xylene (total)		50.2 J	100	22	ug/l	SW846 8260C
Phenol		128	5.2	0.26	ug/l	SW846 8270D

Summary of Hits

Job Number: MC40028
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/13/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
Di-n-butyl phthalate		0.64 J	5.2	0.39	ug/l	SW846 8270D
bis(2-Ethylhexyl)phthalate		0.48 J	2.1	0.31	ug/l	SW846 8270D
Acenaphthene		0.11	0.10	0.0078	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.029 J	0.10	0.0088	ug/l	SW846 8270D BY SIM
Anthracene		0.030 J	0.10	0.010	ug/l	SW846 8270D BY SIM
Fluoranthene		0.025 J	0.10	0.0077	ug/l	SW846 8270D BY SIM
Fluorene		0.22	0.10	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		5.6	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		3.2	2.1	0.011	ug/l	SW846 8270D BY SIM
Phenanthrene		0.18	0.052	0.011	ug/l	SW846 8270D BY SIM
Pyrene		0.032 J	0.10	0.0089	ug/l	SW846 8270D BY SIM

New England ACCUTEST LABORATORIES

Sample Results

Report of Analysis

Report of Analysis

Client Sample ID:	TB-ROX-071315-HCL-A		
Lab Sample ID:	MC40028-1	Date Sampled:	07/13/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92920.D	1	07/21/15	MC	n/a	n/a	MSL4087
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	0.28	5.0	0.19	ug/l	JB
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071315-HCL-A		
Lab Sample ID:	MC40028-1	Date Sampled:	07/13/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	0.71	5.0	0.45	ug/l	JB
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	3.5	5.0	0.61	ug/l	J
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	1.1	5.0	0.78	ug/l	J
120-82-1	1,2,4-Trichlorobenzene	0.99	5.0	0.74	ug/l	JB
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071315-HCL-A		
Lab Sample ID:	MC40028-1	Date Sampled:	07/13/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	116%		72-133%
2037-26-5	Toluene-D8	99%		85-114%
460-00-4	4-Bromofluorobenzene	105%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071315-ST-A		
Lab Sample ID:	MC40028-2	Date Sampled:	07/13/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63908.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	37.3 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	107%		60-140%
460-00-4	Bromofluorobenzene (S)	109%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST4PZ-ROX-071315		
Lab Sample ID:	MC40028-3	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92930.D	1	07/21/15	MC	n/a	n/a	MSL4087
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	68.3	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	~~1.1~~ 4	5.0	0.19	ug/l	JB 4
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST4PZ-ROX-071315		
Lab Sample ID:	MC40028-3	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	159	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	3.7	5.0	0.27	ug/l	J
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	80.6	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	5.3	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	45.6	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	33.4	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	5.2	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	400	1.0	0.47	ug/l	
95-47-6	o-Xylene	30.2	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	430	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST4PZ-ROX-071315		
Lab Sample ID:	MC40028-3	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	103%		72-133%
2037-26-5	Toluene-D8	101%		85-114%
460-00-4	4-Bromofluorobenzene	100%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST4PZ-ROX-071315		
Lab Sample ID:	MC40028-3	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81794.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2							

	Initial Volume	Final Volume
Run #1	960 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.2	0.30	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.29	ug/l	
105-67-9	2,4-Dimethylphenol	2.8	10	0.52	ug/l	J
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	2.0	ug/l	
95-48-7	2-Methylphenol	ND	10	0.22	ug/l	
	3&4-Methylphenol	ND	10	0.49	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.42	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.31	ug/l	
108-95-2	Phenol	ND	5.2	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.31	ug/l	
62-53-3	Aniline	ND	10	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.2	0.85	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.2	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.2	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.56	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.2	0.25	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.2	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.2	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.2	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.2	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.2	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.2	0.39	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.2	0.75	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST4PZ-ROX-071315		
Lab Sample ID:	MC40028-3	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.2	0.59	ug/l	
131-11-3	Dimethyl phthalate	ND	5.2	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.2	0.80	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.2	0.30	ug/l	
78-59-1	Isophorone	ND	5.2	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.2	ug/l	
98-95-3	Nitrobenzene	ND	5.2	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.2	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.2	0.54	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.2	0.81	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	45%		10-80%
4165-62-2	Phenol-d5	30%		10-72%
118-79-6	2,4,6-Tribromophenol	82%		42-134%
4165-60-0	Nitrobenzene-d5	83%		25-117%
321-60-8	2-Fluorobiphenyl	74%		24-112%
1718-51-0	Terphenyl-d14	96%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST4PZ-ROX-071315		
Lab Sample ID:	MC40028-3	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96982.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	960 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.093	0.10	0.0078	ug/l	J
208-96-8	Acenaphthylene	ND	0.10	0.0088	ug/l	
120-12-7	Anthracene	ND	0.10	0.010	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.052	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.052	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0077	ug/l	
86-73-7	Fluorene	0.050	0.10	0.016	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.021	ug/l	
90-12-0	1-Methylnaphthalene	9.5	2.1	0.013	ug/l	
91-57-6	2-Methylnaphthalene	7.7	2.1	0.011	ug/l	
85-01-8	Phenanthrene	0.11	0.052	0.011	ug/l	B
129-00-0	Pyrene	0.025	0.10	0.0089	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	77%		26-121%
321-60-8	2-Fluorobiphenyl	66%		28-107%
1718-51-0	Terphenyl-d14	91%		29-129%

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST4PZ-ROX-071315		
Lab Sample ID:	MC40028-3	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63909.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	37.0 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	105%		60-140%
460-00-4	Bromofluorobenzene (S)	141% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST3MW-ROX-071315		
Lab Sample ID:	MC40028-4	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92944A.D	1	07/22/15	MC	n/a	n/a	MSL4088
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	~~0.66~~ 4	5.0	0.19	ug/l	JB 4
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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Report of Analysis

Client Sample ID:	ROST3MW-ROX-071315		
Lab Sample ID:	MC40028-4	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	20.0	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	~~0.71~~ U	5.0	0.45	ug/l	J U
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	0.93	5.0	0.27	ug/l	J
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	5.2	5.0	0.61	ug/l	J
103-65-1	n-Propylbenzene	1.2	5.0	0.29	ug/l	J
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	2.7	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	~~1.5~~ U	5.0	0.78	ug/l	J U
120-82-1	1,2,4-Trichlorobenzene	~~1.3~~ U	5.0	0.74	ug/l	J U
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	5.9	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	0.61	5.0	0.20	ug/l	J
108-05-4	Vinyl Acetate	58.3	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	26.3	1.0	0.47	ug/l	
95-47-6	o-Xylene	6.5	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	32.8	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST3MW-ROX-071315		
Lab Sample ID:	MC40028-4	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	110%		72-133%
2037-26-5	Toluene-D8	101%		85-114%
460-00-4	4-Bromofluorobenzene	102%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST3MW-ROX-071315		
Lab Sample ID:	MC40028-4	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81795.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.3	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.53	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.0	ug/l	
95-48-7	2-Methylphenol	ND	11	0.22	ug/l	
	3&4-Methylphenol	ND	11	0.49	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.43	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.31	ug/l	
108-95-2	Phenol	ND	5.3	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.31	ug/l	
62-53-3	Aniline	ND	11	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.3	0.86	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.3	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.3	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.57	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.3	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.3	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.3	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.3	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.3	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.3	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.3	0.39	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.3	0.76	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST3MW-ROX-071315		
Lab Sample ID:	MC40028-4	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.3	0.60	ug/l	
131-11-3	Dimethyl phthalate	ND	5.3	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.3	0.81	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.3	0.30	ug/l	
78-59-1	Isophorone	ND	5.3	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.3	ug/l	
98-95-3	Nitrobenzene	ND	5.3	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.3	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.3	0.55	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.3	0.81	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	44%		10-80%
4165-62-2	Phenol-d5	29%		10-72%
118-79-6	2,4,6-Tribromophenol	80%		42-134%
4165-60-0	Nitrobenzene-d5	83%		25-117%
321-60-8	2-Fluorobiphenyl	67%		24-112%
1718-51-0	Terphenyl-d14	94%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST3MW-ROX-071315		
Lab Sample ID:	MC40028-4	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96983.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.037	0.11	0.0079	ug/l	J
208-96-8	Acenaphthylene	ND	0.11	0.0088	ug/l	
120-12-7	Anthracene	ND	0.11	0.010	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.053	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.053	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0078	ug/l	
86-73-7	Fluorene	0.048	0.11	0.016	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.021	ug/l	
90-12-0	1-Methylnaphthalene	1.4	2.1	0.013	ug/l	J
91-57-6	2-Methylnaphthalene	0.84	2.1	0.012	ug/l	JB
85-01-8	Phenanthrene	0.11	0.053	0.011	ug/l	B
129-00-0	Pyrene	0.018	0.11	0.0089	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	82%		26-121%
321-60-8	2-Fluorobiphenyl	65%		28-107%
1718-51-0	Terphenyl-d14	92%		29-129%

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	ROST3MW-ROX-071315		
Lab Sample ID:	MC40028-4	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63910.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	36.8 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	122%		60-140%
460-00-4	Bromofluorobenzene (S)	149% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW5-ROX-071315		
Lab Sample ID:	MC40028-5	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92945.D	1	07/22/15	MC	n/a	n/a	MSL4088
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	3.1	5.0	0.57	ug/l	J
75-15-0	Carbon disulfide	~~0.32~~ 4	5.0	0.19	ug/l	JB 4
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW5-ROX-071315		
Lab Sample ID:	MC40028-5	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	0.97	5.0	0.27	ug/l	J
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	41.3	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	0.32	1.0	0.29	ug/l	J
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	1.9	1.0	0.47	ug/l	
95-47-6	o-Xylene	0.32	1.0	0.22	ug/l	J
1330-20-7	Xylene (total)	2.2	1.0	0.22	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW5-ROX-071315		
Lab Sample ID:	MC40028-5	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	113%		72-133%
2037-26-5	Toluene-D8	100%		85-114%
460-00-4	4-Bromofluorobenzene	102%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

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J = Indicates an estimated value
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Report of Analysis

Client Sample ID:	MW5-ROX-071315		
Lab Sample ID:	MC40028-5	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81796.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2							

	Initial Volume	Final Volume
Run #1	930 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.4	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.39	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.54	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.22	ug/l	
	3&4-Methylphenol	ND	11	0.50	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.44	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.32	ug/l	
108-95-2	Phenol	ND	5.4	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.37	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.32	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.4	0.88	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.4	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.55	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.4	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.58	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.4	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.4	0.45	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.4	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.4	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.4	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.4	0.40	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.4	0.40	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.4	0.77	ug/l	

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Report of Analysis

Client Sample ID:	MW5-ROX-071315		
Lab Sample ID:	MC40028-5	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.4	0.61	ug/l	
131-11-3	Dimethyl phthalate	ND	5.4	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.32	ug/l	
118-74-1	Hexachlorobenzene	ND	5.4	0.83	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.4	0.31	ug/l	
78-59-1	Isophorone	ND	5.4	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.9	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.4	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.4	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.4	0.56	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.4	0.83	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	40%		10-80%
4165-62-2	Phenol-d5	27%		10-72%
118-79-6	2,4,6-Tribromophenol	79%		42-134%
4165-60-0	Nitrobenzene-d5	74%		25-117%
321-60-8	2-Fluorobiphenyl	61%		24-112%
1718-51-0	Terphenyl-d14	98%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW5-ROX-071315		
Lab Sample ID:	MC40028-5	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96984.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	930 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.062	0.11	0.0081	ug/l	J
208-96-8	Acenaphthylene	ND	0.11	0.0090	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.054	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.054	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0080	ug/l	
86-73-7	Fluorene	0.026	0.11	0.016	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	0.087	2.2	0.013	ug/l	JB J
91-57-6	2-Methylnaphthalene	0.18	2.2	0.012	ug/l	JB J
85-01-8	Phenanthrene	0.024	0.054	0.012	ug/l	JB J
129-00-0	Pyrene	ND	0.11	0.0091	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	70%		26-121%
321-60-8	2-Fluorobiphenyl	56%		28-107%
1718-51-0	Terphenyl-d14	95%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW5-ROX-071315		
Lab Sample ID:	MC40028-5	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63911.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	37.4 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	102%		60-140%
460-00-4	Bromofluorobenzene (S)	137%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW2-ROX-071315		
Lab Sample ID:	MC40028-6	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92946A.D	1	07/22/15	MC	n/a	n/a	MSL4088
Run #2	L93002.D	10	07/23/15	MC	n/a	n/a	MSL4090

	Purge Volume
Run #1	5.0 ml
Run #2	5.0 ml

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	20.4	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	6.0	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	1.2	5.0	0.57	ug/l	J
75-15-0	Carbon disulfide	~~2.3~~ 4	5.0	0.19	ug/l	JB 4
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW2-ROX-071315		
Lab Sample ID:	MC40028-6	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	984 [a]	10	2.4	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	68.3	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	6.0	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	87.8	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	98.3	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	10.3	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	~~1.5~~ 4	5.0	0.78	ug/l	J 4
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	206 [a]	50	2.9	ug/l	
108-67-8	1,3,5-Trimethylbenzene	109	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	719 [a]	10	4.7	ug/l	
95-47-6	o-Xylene	68.9	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	780 [a]	10	2.2	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW2-ROX-071315		
Lab Sample ID:	MC40028-6	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	95%	108%	72-133%
2037-26-5	Toluene-D8	98%	101%	85-114%
460-00-4	4-Bromofluorobenzene	99%	102%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

(a) Result is from Run# 2

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW2-ROX-071315		
Lab Sample ID:	MC40028-6	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81797.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2							

	Initial Volume	Final Volume
Run #1	930 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.4	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.39	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	2.8	11	0.54	ug/l	J
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.22	ug/l	
	3&4-Methylphenol	ND	11	0.50	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.44	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.32	ug/l	
108-95-2	Phenol	ND	5.4	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.37	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.32	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.4	0.88	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.4	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.55	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.4	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.58	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.4	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.4	0.45	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.4	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.4	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.4	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.4	0.40	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.4	0.40	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.4	0.77	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW2-ROX-071315		
Lab Sample ID:	MC40028-6	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.4	0.61	ug/l	
131-11-3	Dimethyl phthalate	ND	5.4	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.32	ug/l	
118-74-1	Hexachlorobenzene	ND	5.4	0.83	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.4	0.31	ug/l	
78-59-1	Isophorone	ND	5.4	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.9	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.4	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.4	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.4	0.56	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.4	0.83	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	49%		10-80%
4165-62-2	Phenol-d5	33%		10-72%
118-79-6	2,4,6-Tribromophenol	82%		42-134%
4165-60-0	Nitrobenzene-d5	86%		25-117%
321-60-8	2-Fluorobiphenyl	67%		24-112%
1718-51-0	Terphenyl-d14	93%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW2-ROX-071315		
Lab Sample ID:	MC40028-6	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96985.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	930 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.042	0.11	0.0081	ug/l	J
208-96-8	Acenaphthylene	ND	0.11	0.0090	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.054	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.054	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0080	ug/l	
86-73-7	Fluorene	0.036	0.11	0.016	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	12.9	2.2	0.013	ug/l	
91-57-6	2-Methylnaphthalene	28.3	2.2	0.012	ug/l	
85-01-8	Phenanthrene	0.027	0.054	0.012	ug/l	JB J
129-00-0	Pyrene	ND	0.11	0.0091	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	77%		26-121%
321-60-8	2-Fluorobiphenyl	61%		28-107%
1718-51-0	Terphenyl-d14	105%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW2-ROX-071315		
Lab Sample ID:	MC40028-6	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63912.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	36.9 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	109%		60-140%
460-00-4	Bromofluorobenzene (S)	148% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071315-HCL-B		
Lab Sample ID:	MC40028-7	Date Sampled:	07/13/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92921.D	1	07/21/15	MC	n/a	n/a	MSL4087
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071315-HCL-B		
Lab Sample ID:	MC40028-7	Date Sampled:	07/13/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	3.5	5.0	0.61	ug/l	J
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	0.93	5.0	0.74	ug/l	JB
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071315-HCL-B		
Lab Sample ID:	MC40028-7	Date Sampled:	07/13/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	122%		72-133%
2037-26-5	Toluene-D8	102%		85-114%
460-00-4	4-Bromofluorobenzene	105%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071315-ST-B		
Lab Sample ID:	MC40028-8	Date Sampled:	07/13/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63913.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	36.5 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0059	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	105%		60-140%
460-00-4	Bromofluorobenzene (S)	110%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P59-ROX-071315		
Lab Sample ID:	MC40028-9	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L93003.D	25	07/23/15	MC	n/a	n/a	MSL4090
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	250	51	ug/l	
107-02-8	Acrolein	ND	630	270	ug/l	
107-13-1	Acrylonitrile	ND	130	57	ug/l	
71-43-2	Benzene	3080	13	6.8	ug/l	
108-86-1	Bromobenzene	ND	130	6.5	ug/l	
74-97-5	Bromochloromethane	ND	130	9.2	ug/l	
75-27-4	Bromodichloromethane	ND	25	4.5	ug/l	
75-25-2	Bromoform	ND	25	9.8	ug/l	
74-83-9	Bromomethane	ND	50	20	ug/l	
78-93-3	2-Butanone (MEK)	ND	130	74	ug/l	
104-51-8	n-Butylbenzene	ND	130	12	ug/l	
135-98-8	sec-Butylbenzene	ND	130	13	ug/l	
98-06-6	tert-Butylbenzene	ND	130	14	ug/l	
75-15-0	Carbon disulfide	ND	130	4.7	ug/l	
56-23-5	Carbon tetrachloride	ND	25	8.5	ug/l	
108-90-7	Chlorobenzene	ND	25	5.9	ug/l	
75-00-3	Chloroethane	ND	50	12	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	130	31	ug/l	
67-66-3	Chloroform	ND	25	10	ug/l	
74-87-3	Chloromethane	ND	50	12	ug/l	
95-49-8	o-Chlorotoluene	ND	130	15	ug/l	
106-43-4	p-Chlorotoluene	ND	130	11	ug/l	
124-48-1	Dibromochloromethane	ND	25	5.6	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	25	6.1	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	25	6.0	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	25	9.3	ug/l	
75-71-8	Dichlorodifluoromethane	ND	50	13	ug/l	
75-34-3	1,1-Dichloroethane	ND	25	7.1	ug/l	
107-06-2	1,2-Dichloroethane	ND	25	7.7	ug/l	
75-35-4	1,1-Dichloroethene	ND	25	7.1	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	25	7.8	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	25	12	ug/l	

ND = Not detected MDL = Method Detection Limit
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P59-ROX-071315		
Lab Sample ID:	MC40028-9	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	50	5.3	ug/l	
142-28-9	1,3-Dichloropropane	ND	130	7.2	ug/l	
594-20-7	2,2-Dichloropropane	ND	130	42	ug/l	
563-58-6	1,1-Dichloropropene	ND	130	5.9	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	13	6.7	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	13	11	ug/l	
123-91-1	1,4-Dioxane	ND	630	500	ug/l	
97-63-2	Ethyl methacrylate	ND	130	13	ug/l	
100-41-4	Ethylbenzene	664	25	6.0	ug/l	
87-68-3	Hexachlorobutadiene	ND	130	11	ug/l	
591-78-6	2-Hexanone	ND	130	67	ug/l	
98-82-8	Isopropylbenzene	11.1	130	6.6	ug/l	J
99-87-6	p-Isopropyltoluene	ND	130	7.9	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	25	8.7	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	130	19	ug/l	
74-95-3	Methylene bromide	ND	130	7.4	ug/l	
75-09-2	Methylene chloride	ND	50	6.7	ug/l	
91-20-3	Naphthalene	162	130	15	ug/l	
103-65-1	n-Propylbenzene	21.1	130	7.3	ug/l	J
100-42-5	Styrene	ND	130	6.9	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	25	6.2	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	13	7.3	ug/l	
127-18-4	Tetrachloroethene	ND	25	5.1	ug/l	
108-88-3	Toluene	103	25	7.3	ug/l	
87-61-6	1,2,3-Trichlorobenzene	28.3	130	20	ug/l	J
120-82-1	1,2,4-Trichlorobenzene	ND	130	18	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	25	10	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	25	8.1	ug/l	
79-01-6	Trichloroethene	ND	25	6.2	ug/l	
75-69-4	Trichlorofluoromethane	ND	25	12	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	130	9.9	ug/l	
95-63-6	1,2,4-Trimethylbenzene	150	130	7.2	ug/l	
108-67-8	1,3,5-Trimethylbenzene	54.1	130	5.0	ug/l	J
108-05-4	Vinyl Acetate	ND	130	36	ug/l	
75-01-4	Vinyl chloride	ND	25	11	ug/l	
	m,p-Xylene	1600	25	12	ug/l	
95-47-6	o-Xylene	36.8	25	5.4	ug/l	
1330-20-7	Xylene (total)	1630	25	5.4	ug/l	

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E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P59-ROX-071315		
Lab Sample ID:	MC40028-9	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	109%		72-133%
2037-26-5	Toluene-D8	98%		85-114%
460-00-4	4-Bromofluorobenzene	103%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P59-ROX-071315		
Lab Sample ID:	MC40028-9	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81798.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2							

	Initial Volume	Final Volume
Run #1	930 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.4	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.39	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	113	11	0.54	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	44.0	11	0.22	ug/l	
	3&4-Methylphenol	12.3	11	0.50	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.44	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.32	ug/l	
108-95-2	Phenol	6.2	5.4	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.37	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.32	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.4	0.88	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.4	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.55	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.4	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.58	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.4	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.4	0.45	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.4	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.4	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.4	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.4	0.40	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.4	0.40	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.4	0.77	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P59-ROX-071315		
Lab Sample ID:	MC40028-9	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.4	0.61	ug/l	
131-11-3	Dimethyl phthalate	ND	5.4	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.32	ug/l	
118-74-1	Hexachlorobenzene	ND	5.4	0.83	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.4	0.31	ug/l	
78-59-1	Isophorone	ND	5.4	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.9	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.4	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.4	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.4	0.56	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.4	0.83	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	50%		10-80%
4165-62-2	Phenol-d5	28%		10-72%
118-79-6	2,4,6-Tribromophenol	83%		42-134%
4165-60-0	Nitrobenzene-d5	80%		25-117%
321-60-8	2-Fluorobiphenyl	65%		24-112%
1718-51-0	Terphenyl-d14	95%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P59-ROX-071315		
Lab Sample ID:	MC40028-9	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96986.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	930 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.58	0.11	0.0081	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0090	ug/l	
120-12-7	Anthracene	0.37	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	0.068	0.054	0.025	ug/l	
50-32-8	Benzo(a)pyrene	0.035	0.11	0.016	ug/l	J
205-99-2	Benzo(b)fluoranthene	0.056	0.054	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	0.037	0.11	0.013	ug/l	J
207-08-9	Benzo(k)fluoranthene	0.033	0.11	0.011	ug/l	J
218-01-9	Chrysene	0.13	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	0.20	0.11	0.0080	ug/l	
86-73-7	Fluorene	0.45	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	4.5	2.2	0.013	ug/l	
91-57-6	2-Methylnaphthalene	4.9	2.2	0.012	ug/l	
85-01-8	Phenanthrene	0.64	0.054	0.012	ug/l	
129-00-0	Pyrene	0.39	0.11	0.0091	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	67%		26-121%
321-60-8	2-Fluorobiphenyl	49%		28-107%
1718-51-0	Terphenyl-d14	114%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P59-ROX-071315		
Lab Sample ID:	MC40028-9	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63914.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	36.9 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	99%		60-140%
460-00-4	Bromofluorobenzene (S)	156% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93C-ROX-071315		
Lab Sample ID:	MC40028-10	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L93033.D	1	07/24/15	MC	n/a	n/a	MSL4091
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	36.5	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	~~0.25~~ U	5.0	0.19	ug/l	JB U
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93C-ROX-071315		
Lab Sample ID:	MC40028-10	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	0.47	1.0	0.24	ug/l	J
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	1.6	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	~~3.7~~ 4	5.0	0.61	ug/l	JB 4
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	0.59	5.0	0.29	ug/l	J
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	0.95	1.0	0.47	ug/l	J
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	1.1	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93C-ROX-071315		
Lab Sample ID:	MC40028-10	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	109%		72-133%
2037-26-5	Toluene-D8	98%		85-114%
460-00-4	4-Bromofluorobenzene	107%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93C-ROX-071315		
Lab Sample ID:	MC40028-10	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81799.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2							

	Initial Volume	Final Volume
Run #1	920 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.4	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.40	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.54	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.51	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.44	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.32	ug/l	
108-95-2	Phenol	ND	5.4	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.37	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.4	0.89	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.4	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.55	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.4	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.59	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.4	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.4	0.45	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.4	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.4	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.4	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.4	0.41	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.4	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.4	0.78	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93C-ROX-071315		
Lab Sample ID:	MC40028-10	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.4	0.62	ug/l	
131-11-3	Dimethyl phthalate	ND	5.4	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.4	0.84	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.4	0.31	ug/l	
78-59-1	Isophorone	ND	5.4	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.0	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.4	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.4	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.4	0.56	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.4	0.84	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	34%		10-80%
4165-62-2	Phenol-d5	23%		10-72%
118-79-6	2,4,6-Tribromophenol	73%		42-134%
4165-60-0	Nitrobenzene-d5	63%		25-117%
321-60-8	2-Fluorobiphenyl	56%		24-112%
1718-51-0	Terphenyl-d14	88%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93C-ROX-071315		
Lab Sample ID:	MC40028-10	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96987.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	920 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0082	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0091	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.054	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.054	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0080	ug/l	
86-73-7	Fluorene	ND	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	0.095	2.2	0.013	ug/l	JB J
91-57-6	2-Methylnaphthalene	0.16	2.2	0.012	ug/l	JB J
85-01-8	Phenanthrene	ND	0.054	0.012	ug/l	
129-00-0	Pyrene	ND	0.11	0.0092	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	64%		26-121%
321-60-8	2-Fluorobiphenyl	49%		28-107%
1718-51-0	Terphenyl-d14	73%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93C-ROX-071315		
Lab Sample ID:	MC40028-10	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63916.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	36.9 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	111%		60-140%
460-00-4	Bromofluorobenzene (S)	106%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P57-ROX-071315		
Lab Sample ID:	MC40028-11	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92933.D	1000	07/21/15	MC	n/a	n/a	MSL4087
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10000	2000	ug/l	
107-02-8	Acrolein	ND	25000	11000	ug/l	
107-13-1	Acrylonitrile	ND	5000	2300	ug/l	
71-43-2	Benzene	138000	500	270	ug/l	
108-86-1	Bromobenzene	ND	5000	260	ug/l	
74-97-5	Bromochloromethane	ND	5000	370	ug/l	
75-27-4	Bromodichloromethane	ND	1000	180	ug/l	
75-25-2	Bromoform	ND	1000	390	ug/l	
74-83-9	Bromomethane	ND	2000	790	ug/l	
78-93-3	2-Butanone (MEK)	ND	5000	3000	ug/l	
104-51-8	n-Butylbenzene	ND	5000	500	ug/l	
135-98-8	sec-Butylbenzene	ND	5000	500	ug/l	
98-06-6	tert-Butylbenzene	ND	5000	570	ug/l	
75-15-0	Carbon disulfide	852	5000	190	ug/l	J
56-23-5	Carbon tetrachloride	ND	1000	340	ug/l	
108-90-7	Chlorobenzene	ND	1000	240	ug/l	
75-00-3	Chloroethane	ND	2000	490	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5000	1300	ug/l	
67-66-3	Chloroform	ND	1000	400	ug/l	
74-87-3	Chloromethane	ND	2000	490	ug/l	
95-49-8	o-Chlorotoluene	ND	5000	600	ug/l	
106-43-4	p-Chlorotoluene	ND	5000	460	ug/l	
124-48-1	Dibromochloromethane	ND	1000	220	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1000	240	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1000	240	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1000	370	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2000	530	ug/l	
75-34-3	1,1-Dichloroethane	ND	1000	280	ug/l	
107-06-2	1,2-Dichloroethane	ND	1000	310	ug/l	
75-35-4	1,1-Dichloroethene	ND	1000	280	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1000	310	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1000	480	ug/l	

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J = Indicates an estimated value
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P57-ROX-071315		
Lab Sample ID:	MC40028-11	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2000	210	ug/l	
142-28-9	1,3-Dichloropropane	ND	5000	290	ug/l	
594-20-7	2,2-Dichloropropane	ND	5000	1700	ug/l	
563-58-6	1,1-Dichloropropene	ND	5000	230	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	500	270	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	500	430	ug/l	
123-91-1	1,4-Dioxane	ND	25000	20000	ug/l	
97-63-2	Ethyl methacrylate	ND	5000	500	ug/l	
100-41-4	Ethylbenzene	440	1000	240	ug/l	J
87-68-3	Hexachlorobutadiene	ND	5000	450	ug/l	
591-78-6	2-Hexanone	ND	5000	2700	ug/l	
98-82-8	Isopropylbenzene	ND	5000	270	ug/l	
99-87-6	p-Isopropyltoluene	ND	5000	320	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1000	350	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5000	770	ug/l	
74-95-3	Methylene bromide	ND	5000	300	ug/l	
75-09-2	Methylene chloride	ND	2000	270	ug/l	
91-20-3	Naphthalene	ND	5000	610	ug/l	
103-65-1	n-Propylbenzene	ND	5000	290	ug/l	
100-42-5	Styrene	ND	5000	280	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1000	250	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	500	290	ug/l	
127-18-4	Tetrachloroethene	ND	1000	210	ug/l	
108-88-3	Toluene	ND	1000	290	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5000	780	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5000	740	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1000	420	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1000	320	ug/l	
79-01-6	Trichloroethene	440	1000	250	ug/l	J
75-69-4	Trichlorofluoromethane	ND	1000	470	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5000	390	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5000	290	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5000	200	ug/l	
108-05-4	Vinyl Acetate	ND	5000	1400	ug/l	
75-01-4	Vinyl chloride	ND	1000	450	ug/l	
	m,p-Xylene	ND	1000	470	ug/l	
95-47-6	o-Xylene	ND	1000	220	ug/l	
1330-20-7	Xylene (total)	237	1000	220	ug/l	J

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Report of Analysis

Client Sample ID:	P57-ROX-071315		
Lab Sample ID:	MC40028-11	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	117%		72-133%
2037-26-5	Toluene-D8	97%		85-114%
460-00-4	4-Bromofluorobenzene	104%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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Report of Analysis

Client Sample ID:	P57-ROX-071315		
Lab Sample ID:	MC40028-11	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81800.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2	F81836.D	5	07/28/15	MR	07/16/15	OP43842	MSF3543

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2	950 ml	1.0 ml

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.3	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.53	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.0	ug/l	
95-48-7	2-Methylphenol	ND	11	0.22	ug/l	
	3&4-Methylphenol	ND	11	0.49	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.43	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.31	ug/l	
108-95-2	Phenol	189 [a]	26	1.3	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.31	ug/l	
62-53-3	Aniline	ND	11	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.3	0.86	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.3	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.3	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.57	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.3	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.3	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.3	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.3	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.3	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.3	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	0.44	5.3	0.39	ug/l	J
117-84-0	Di-n-octyl phthalate	ND	5.3	0.76	ug/l	

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Report of Analysis

Client Sample ID:	P57-ROX-071315		
Lab Sample ID:	MC40028-11	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.3	0.60	ug/l	
131-11-3	Dimethyl phthalate	ND	5.3	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.3	0.81	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.3	0.30	ug/l	
78-59-1	Isophorone	ND	5.3	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.3	ug/l	
98-95-3	Nitrobenzene	ND	5.3	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.3	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.3	0.55	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.3	0.81	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	46%	45%	10-80%
4165-62-2	Phenol-d5	31%	31%	10-72%
118-79-6	2,4,6-Tribromophenol	75%	70%	42-134%
4165-60-0	Nitrobenzene-d5	79%	80%	25-117%
321-60-8	2-Fluorobiphenyl	65%	64%	24-112%
1718-51-0	Terphenyl-d14	91%	84%	48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

(a) Result is from Run# 2

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P57-ROX-071315		
Lab Sample ID:	MC40028-11	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96988.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.49	0.11	0.0079	ug/l	
208-96-8	Acenaphthylene	0.10	0.11	0.0088	ug/l	J
120-12-7	Anthracene	ND	0.11	0.010	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.053	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.053	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0078	ug/l	
86-73-7	Fluorene	0.82	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.021	ug/l	
90-12-0	1-Methylnaphthalene	30.2	2.1	0.013	ug/l	
91-57-6	2-Methylnaphthalene	46.4	2.1	0.012	ug/l	
85-01-8	Phenanthrene	0.64	0.053	0.011	ug/l	
129-00-0	Pyrene	0.020	0.11	0.0089	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	65%		26-121%
321-60-8	2-Fluorobiphenyl	60%		28-107%
1718-51-0	Terphenyl-d14	87%		29-129%

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Report of Analysis

Client Sample ID:	P57-ROX-071315		
Lab Sample ID:	MC40028-11	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63917.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	37.6 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	96%		60-140%
460-00-4	Bromofluorobenzene (S)	184% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

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RL = Reporting Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93A-ROX-071315		
Lab Sample ID:	MC40028-12	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	L92935.D	100	07/21/15	MC	n/a	n/a	MSL4087
Run #2	V41391.D	2000	07/27/15	KD	n/a	n/a	MSV1495

	Purge Volume
Run #1	5.0 ml
Run #2	5.0 ml

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	1000	200	ug/l	
107-02-8	Acrolein	ND	2500	1100	ug/l	
107-13-1	Acrylonitrile	ND	500	230	ug/l	
71-43-2	Benzene	315000 [a]	1000	540	ug/l	
108-86-1	Bromobenzene	ND	500	26	ug/l	
74-97-5	Bromochloromethane	ND	500	37	ug/l	
75-27-4	Bromodichloromethane	ND	100	18	ug/l	
75-25-2	Bromoform	ND	100	39	ug/l	
74-83-9	Bromomethane	ND	200	79	ug/l	
78-93-3	2-Butanone (MEK)	ND	500	300	ug/l	
104-51-8	n-Butylbenzene	ND	500	50	ug/l	
135-98-8	sec-Butylbenzene	ND	500	50	ug/l	
98-06-6	tert-Butylbenzene	ND	500	57	ug/l	
75-15-0	Carbon disulfide	47.6	500	19	ug/l	J
56-23-5	Carbon tetrachloride	ND	100	34	ug/l	
108-90-7	Chlorobenzene	ND	100	24	ug/l	
75-00-3	Chloroethane	ND	200	49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	500	130	ug/l	
67-66-3	Chloroform	ND	100	40	ug/l	
74-87-3	Chloromethane	ND	200	49	ug/l	
95-49-8	o-Chlorotoluene	ND	500	60	ug/l	
106-43-4	p-Chlorotoluene	ND	500	46	ug/l	
124-48-1	Dibromochloromethane	ND	100	22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	100	24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	100	24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	100	37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	200	53	ug/l	
75-34-3	1,1-Dichloroethane	ND	100	28	ug/l	
107-06-2	1,2-Dichloroethane	ND	100	31	ug/l	
75-35-4	1,1-Dichloroethene	ND	100	28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	100	31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	100	48	ug/l	

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Report of Analysis

Client Sample ID:	P93A-ROX-071315		
Lab Sample ID:	MC40028-12	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	200	21	ug/l	
142-28-9	1,3-Dichloropropane	ND	500	29	ug/l	
594-20-7	2,2-Dichloropropane	ND	500	170	ug/l	
563-58-6	1,1-Dichloropropene	ND	500	23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	50	27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	50	43	ug/l	
123-91-1	1,4-Dioxane	ND	2500	2000	ug/l	
97-63-2	Ethyl methacrylate	ND	500	50	ug/l	
100-41-4	Ethylbenzene	36.1	100	24	ug/l	J
87-68-3	Hexachlorobutadiene	ND	500	45	ug/l	
591-78-6	2-Hexanone	ND	500	270	ug/l	
98-82-8	Isopropylbenzene	ND	500	27	ug/l	
99-87-6	p-Isopropyltoluene	ND	500	32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	100	35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	500	77	ug/l	
74-95-3	Methylene bromide	ND	500	30	ug/l	
75-09-2	Methylene chloride	ND	200	27	ug/l	
91-20-3	Naphthalene	ND	500	61	ug/l	
103-65-1	n-Propylbenzene	ND	500	29	ug/l	
100-42-5	Styrene	ND	500	28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	100	25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	50	29	ug/l	
127-18-4	Tetrachloroethene	ND	100	21	ug/l	
108-88-3	Toluene	34.2	100	29	ug/l	J
87-61-6	1,2,3-Trichlorobenzene	ND	500	78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	500	74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	100	42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	100	32	ug/l	
79-01-6	Trichloroethene	ND	100	25	ug/l	
75-69-4	Trichlorofluoromethane	ND	100	47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	500	39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	31.3	500	29	ug/l	J
108-67-8	1,3,5-Trimethylbenzene	ND	500	20	ug/l	
108-05-4	Vinyl Acetate	ND	500	140	ug/l	
75-01-4	Vinyl chloride	ND	100	45	ug/l	
	m,p-Xylene	ND	100	47	ug/l	
95-47-6	o-Xylene	ND	100	22	ug/l	
1330-20-7	Xylene (total)	50.2	100	22	ug/l	J

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93A-ROX-071315		
Lab Sample ID:	MC40028-12	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	118%	116%	72-133%
2037-26-5	Toluene-D8	91%	102%	85-114%
460-00-4	4-Bromofluorobenzene	104%	99%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

(a) Result is from Run# 2

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93A-ROX-071315		
Lab Sample ID:	MC40028-12	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81801.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2							

	Initial Volume	Final Volume
Run #1	960 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.2	0.30	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.29	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.52	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	2.0	ug/l	
95-48-7	2-Methylphenol	ND	10	0.22	ug/l	
	3&4-Methylphenol	ND	10	0.49	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.42	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.31	ug/l	
108-95-2	Phenol	128	5.2	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.31	ug/l	
62-53-3	Aniline	ND	10	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.2	0.85	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.2	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.2	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.56	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.2	0.25	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.2	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.2	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.2	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.2	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.2	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	0.64	5.2	0.39	ug/l	J
117-84-0	Di-n-octyl phthalate	ND	5.2	0.75	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93A-ROX-071315		
Lab Sample ID:	MC40028-12	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.2	0.59	ug/l	
131-11-3	Dimethyl phthalate	ND	5.2	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	0.48	2.1	0.31	ug/l	J
118-74-1	Hexachlorobenzene	ND	5.2	0.80	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.2	0.30	ug/l	
78-59-1	Isophorone	ND	5.2	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.2	ug/l	
98-95-3	Nitrobenzene	ND	5.2	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.2	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.2	0.54	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.2	0.81	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	49%		10-80%
4165-62-2	Phenol-d5	34%		10-72%
118-79-6	2,4,6-Tribromophenol	82%		42-134%
4165-60-0	Nitrobenzene-d5	87%		25-117%
321-60-8	2-Fluorobiphenyl	74%		24-112%
1718-51-0	Terphenyl-d14	112%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93A-ROX-071315		
Lab Sample ID:	MC40028-12	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96989.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	960 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.11	0.10	0.0078	ug/l	
208-96-8	Acenaphthylene	0.029	0.10	0.0088	ug/l	J
120-12-7	Anthracene	0.030	0.10	0.010	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.052	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.052	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.016	ug/l	
206-44-0	Fluoranthene	0.025	0.10	0.0077	ug/l	J
86-73-7	Fluorene	0.22	0.10	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.021	ug/l	
90-12-0	1-Methylnaphthalene	5.6	2.1	0.013	ug/l	
91-57-6	2-Methylnaphthalene	3.2	2.1	0.011	ug/l	
85-01-8	Phenanthrene	0.18	0.052	0.011	ug/l	
129-00-0	Pyrene	0.032	0.10	0.0089	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	82%		26-121%
321-60-8	2-Fluorobiphenyl	69%		28-107%
1718-51-0	Terphenyl-d14	99%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P93A-ROX-071315		
Lab Sample ID:	MC40028-12	Date Sampled:	07/13/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63918.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	37.6 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	106%		60-140%
460-00-4	Bromofluorobenzene (S)	144% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

New England ACCUTEST LABORATORIES

Misc. Forms

Custody Documents and Other Forms

Includes the following where applicable:

- Chain of Custody
- Sample Tracking Chronicle
- Internal Chain of Custody

LAB (LOCATION)

☐ XENCO (_____)
☐ CALSCIENCE (_____)
☑ OTHER Accutest Labs, 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200)
☐ SPL (_____)
Lab Vendor # _____

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:
☑ ENV. SERVICES ☐ MOTIVA RETAIL ☐ SHELL RETAIL
☐ MOTIVA SD&CH ☐ CONSULTANT ☐ LUBES
☐ SHELL PIPELINE ☐ OTHER _____

Print Bill To Contact Name: Bob Billman

PO #

INCIDENT # (ENV SERVICES): 9 7 2 1 5 6 4 0

SAP #: 3 4 0 0 6 1

☐ CHECK IF NO INCIDENT # APPLIES

DATE: 13 July 2015

PAGE: 1 of 2

SAMPLING COMPANY: AECOM

LOG CODE:

SITE ADDRESS: Street and City: 900 South Central Ave; ROXANA

State: IL

GLOBAL ID NO.:

ADDRESS: 1001 HIGHLANDS PLAZA DRIVE WEST - SUITE 300; ST. LOUIS, MO 63110

EDF DELIVERABLE TO (Name, Company, Office Location):

PHONE NO.:

E-MAIL:

CONSULTANT PROJECT NO.: Roxana Quarterly GW / 60400249-21563720.03003

PROJECT CONTACT (Hardcopy or PDF Report to): Elizabeth Kunkel, Bob Billman, Lindsay Rathnow

TELEPHONE: 314-429-0100

FAX: 314-429-0462

Bill To Contact E-MAIL: bob.billman@aecom.com, elizabeth.kunkel@aecom.com, lindsay.rathnow@aecom.com

SAMPLER NAME(S) (Print): B. Testu / E. Schumacher, S. Fishen, C. Williams / D. Haxel

LAB USE ONLY: MC40028

TURNAROUND TIME (CALENDAR DAYS): ☑ STANDARD (10 DAY) ☐ 5 DAYS ☐ 3 DAYS ☐ 2 DAYS ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

DELIVERABLES: ☐ LEVEL 1 ☑ LEVEL 2 ☐ LEVEL 3 ☑ LEVEL 4 ☑ OTHER (SPECIFY) EDD

TEMPERATURE ON RECEIPT C°: Cooler #1 | Cooler #2 | Cooler #3

SPECIAL INSTRUCTIONS OR NOTES:
* Please include "J" values on Reports.
* Please provide sample receipt upon login.

☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMBURSEMENT RATE APPLIES
☐ EDD NOT NEEDED
☑ RECEIPT VERIFICATION REQUESTED
☐ PROVIDE LEDD DISK

REQUESTED ANALYSIS

FIELD NOTES: TEMPERATURE ON RECEIPT C°

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
-1	TB-ROX-071315-HCL-A	7/13/15	0000	water	X					2	X				0.0
-2	TB-ROX-071315-ST-A		"						X	2		X			
-3	ROST4PZ-ROX-071315		1025		X			X	X	6	X	X	X	X	
-4	ROST3MW-ROX-071315		1125		X			X	X	6	X	X	X	X	
-5	MW5-ROX-071315		1335		X			X	X	6	X	X	X	X	
-6	MW2-ROX-071315		1445		X			X	X	6	X	X	X	X	
-7	TB-ROX-071315-HCL-B		0000		X					2	X				
-8	TB-ROX-071315-ST-B		"						X	2		X			19DD, 2E3
-9	P59-ROX-071315		0955		X			X	X	6	X	X	X	X	
-10	P93C-ROX-071315		1140		X			X	X	6	X	X	X	X	

Relinquished by (Signature)	Received by (Signature)	Date	Time
[signature]	FED EX # 8066 2852 5202	13 July 2015	17:30
FEDX	[signature]	7-15-15	1030

Custody seals: 07/13/2015 -01A -02A -03A 0.8-1.2-0.2 -01B -02B -03B

05/2/06 Revision

5.1

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MC40028: Chain of Custody
Page 1 of 3

LAB (LOCATION)

☐ XENCO (_____)

☐ CALSCIENCE (_____)

☑ OTHER (Accutest Labs, 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200))

☐ SPL (_____)

Lab Vendor #

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:

☑ ENV. SERVICES	☐ MOTIVA RETAIL	☐ SHELL RETAIL
☐ MOTIVA SD&CM	☐ CONSULTANT	☐ LUBES
☐ SHELL PIPELINE	☐ OTHER _____	

Print Bill To Contact Name: Bob Billman

PO #

INCIDENT # (ENV SERVICES): 9 7 2 1 6 6 4 0

SAP #: 3 4 0 0 6 1

☐ CHECK IF NO INCIDENT # APPLIES

DATE: 13 July 2015

PAGE: 2 of 2

SAMPLING COMPANY: AECOM

LOG CODE:

SITE ADDRESS: Street and City: 900 South Central Ave; ROXANA

State: IL

GLOBAL ID NO:

ADDRESS: 1001 HIGHLANDS PLAZA DRIVE WEST - SUITE 300, ST. LOUIS, MO 63110

EDF DELIVERABLE TO (Name, Company, Office Location):

PHONE NO.:

EMAIL:

CONSULTANT PROJECT NO: Roxana Quarterly GW / 60400249-21563720.03003

PROJECT CONTACT (Hardcopy or PDF Report to): Elizabeth Kunkel, Bob Billman, Lindsay Rathnow

TELEPHONE: 314-429-0100

FAX: 314-429-0462

Bill To Contact E-MAIL: bob.billman@aecom.com; elizabeth.kunkel@aecom.com; lindsay.rathnow@aecom.com

SAMPLER NAME(S) (Print): B. Testa / E. Schumacher / S. Fisher / C. Williams / D. Haxel

LAB USE ONLY: MC40028

TURNAROUND TIME (CALENDAR DAYS): ☑ STANDARD (10 DAY) ☐ 5 DAYS ☐ 3 DAYS ☐ 2 DAYS ☐ 24 HOURS ☐ RESULTS NEEDED ☐ WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

DELIVERABLES: ☐ LEVEL 1 ☑ LEVEL 2 ☐ LEVEL 3 ☑ LEVEL 4 ☑ OTHER (SPECIFY) EDD

TEMPERATURE ON RECEIPT C°: Cooler #1 | Cooler #2 | Cooler #3

SPECIAL INSTRUCTIONS OR NOTES:
* Please include "J" values on Reports.
* Please provide sample receipt upon login.

☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMBURSEMENT RATE APPLIES
☐ EDD NOT NEEDED
☑ RECEIPT VERIFICATION REQUESTED
☐ PROVIDE LEDD DISK

REQUESTED ANALYSIS

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
-11	P57-ROX-071315	7/13/15	1240	water	X			X	X	6	X	X	X	X	0.0
-12	P93A-ROX-071315	"	1350	"	X			X	X	6	X	X	X	X	"

FIELD NOTES:

TEMPERATURE ON RECEIPT C°

13 July 2015

Relinquished by (Signature):	Received by (Signature): FED EX # 8066 2852 5202	Date: 13 July 2015	Time: 17:30
Relinquished by (Signature): FEDEX	Received by (Signature):	Date: 7-15-15	Time: 1030
Relinquished by (Signature):	Received by (Signature):	Date:	Time:

08.2.05 Revision

0.8 - 1.2 - 0.2 °C

MC40028: Chain of Custody
Page 2 of 3

ACCUTEST LABORATORIES

Accutest Laboratories Sample Receipt Summary

Accutest Job Number: MC40028 **Client:** AECOM **Project:** 900 SOUTH CENTRAL

Date / Time Received: 7/15/2015 10:30:00 AM **Delivery Method:** **Airbill #'s:**

Cooler Temps (Initial/Adjusted): #1: (1.2/1.2); #2: (0.2/0.2); #3: (0.8/0.8);

Cooler Security	Y	or	N		Y	or	N
1. Custody Seals Present:	☑		☐	3. COC Present:	☑		☐
2. Custody Seals Intact:	☑		☐	4. Smpl Dates/Time OK	☑		☐

Cooler Temperature	Y	or	N
1. Temp criteria achieved:	☑		☐
2. Thermometer ID:	G1;		
3. Cooler media:	Ice (Bag)		
4. No. Coolers:	3		

Quality Control Preservation	Y	or	N	N/A
1. Trip Blank present / cooler:	☑		☐	☐
2. Trip Blank listed on COC:	☑		☐	☐
3. Samples preserved properly:	☑		☐	
4. VOCs headspace free:	☑		☐	☐

Sample Integrity - Documentation	Y	or	N
1. Sample labels present on bottles:	☑		☐
2. Container labeling complete:	☑		☐
3. Sample container label / COC agree:	☑		☐

Sample Integrity - Condition	Y	or	N
1. Sample recvd within HT:	☑		☐
2. All containers accounted for:	☑		☐
3. Condition of sample:	Intact		

Sample Integrity - Instructions	Y	or	N	N/A
1. Analysis requested is clear:	☑		☐	
2. Bottles received for unspecified tests	☐		☑	
3. Sufficient volume recvd for analysis:	☑		☐	
4. Compositing instructions clear:	☐		☐	☑
5. Filtering instructions clear:	☐		☐	☑

Comments

Accutest Laboratories
V:(508) 481-6200

495 Technology Center West, Bldg One
F: (508) 481-7753

Marlborough, MA 01752
www/accutest.com

5.1

MC40028: Chain of Custody
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Internal Sample Tracking Chronicle

Shell Oil

Job No: MC40028

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC40028-1 Collected: 13-JUL-15 00:00 By: BTES Received: 15-JUL-15 By: AF						
TB-ROX-071315-HCL-A						
MC40028-1	SW846 8260C	21-JUL-15 12:56	MC			V8260SL+
MC40028-2 Collected: 13-JUL-15 00:00 By: BTES Received: 15-JUL-15 By: AF						
TB-ROX-071315-ST-A						
MC40028-2	SW846 8011	27-JUL-15 14:52	NK	23-JUL-15	ES	V8011SL
MC40028-3 Collected: 13-JUL-15 10:25 By: BTES Received: 15-JUL-15 By: AF						
ROST4PZ-ROX-071315						
MC40028-3	SW846 8260C	21-JUL-15 18:12	MC			V8260SL+
MC40028-3	SW846 8270D	27-JUL-15 10:00	MR	16-JUL-15	MC	AB8270SL+
MC40028-3	SW846 8270D BY SIM	27-JUL-15 12:33	MR	16-JUL-15	MC	B8270SIMSL
MC40028-3	SW846 8011	27-JUL-15 15:21	NK	23-JUL-15	ES	V8011SL
MC40028-4 Collected: 13-JUL-15 11:25 By: BTES Received: 15-JUL-15 By: AF						
ROST3MW-ROX-071315						
MC40028-4	SW846 8260C	22-JUL-15 01:12	MC			V8260SL+
MC40028-4	SW846 8270D	27-JUL-15 10:24	MR	16-JUL-15	MC	AB8270SL+
MC40028-4	SW846 8270D BY SIM	27-JUL-15 12:56	MR	16-JUL-15	MC	B8270SIMSL
MC40028-4	SW846 8011	27-JUL-15 15:49	NK	23-JUL-15	ES	V8011SL
MC40028-5 Collected: 13-JUL-15 13:35 By: BTES Received: 15-JUL-15 By: AF						
MW5-ROX-071315						
MC40028-5	SW846 8260C	22-JUL-15 01:42	MC			V8260SL+
MC40028-5	SW846 8270D	27-JUL-15 10:47	MR	16-JUL-15	MC	AB8270SL+
MC40028-5	SW846 8270D BY SIM	27-JUL-15 13:19	MR	16-JUL-15	MC	B8270SIMSL
MC40028-5	SW846 8011	27-JUL-15 16:17	NK	23-JUL-15	ES	V8011SL
MC40028-6 Collected: 13-JUL-15 14:45 By: BTES Received: 15-JUL-15 By: AF						
MW2-ROX-071315						
MC40028-6	SW846 8260C	22-JUL-15 02:12	MC			V8260SL+
MC40028-6	SW846 8260C	23-JUL-15 15:29	MC			V8260SL+
MC40028-6	SW846 8270D	27-JUL-15 11:11	MR	16-JUL-15	MC	AB8270SL+

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC40028

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC40028-6	SW846 8270D BY SIM	27-JUL-15 13:43	MR	16-JUL-15	MC	B8270SIMSL
MC40028-6	SW846 8011	27-JUL-15 16:46	NK	23-JUL-15	ES	V8011SL
MC40028-7 Collected: 13-JUL-15 00:00 By: BTES Received: 15-JUL-15 By: AF TB-ROX-071315-HCL-B						
MC40028-7	SW846 8260C	21-JUL-15 13:26	MC			V8260SL+
MC40028-8 Collected: 13-JUL-15 00:00 By: BTES Received: 15-JUL-15 By: AF TB-ROX-071315-ST-B						
MC40028-8	SW846 8011	27-JUL-15 17:14	NK	23-JUL-15	ES	V8011SL
MC40028-9 Collected: 13-JUL-15 09:55 By: BTES Received: 15-JUL-15 By: AF P59-ROX-071315						
MC40028-9	SW846 8260C	23-JUL-15 15:59	MC			V8260SL+
MC40028-9	SW846 8270D	27-JUL-15 11:35	MR	16-JUL-15	MC	AB8270SL+
MC40028-9	SW846 8270D BY SIM	27-JUL-15 14:06	MR	16-JUL-15	MC	B8270SIMSL
MC40028-9	SW846 8011	27-JUL-15 17:43	NK	23-JUL-15	ES	V8011SL
MC40028-10 Collected: 13-JUL-15 11:40 By: BTES Received: 15-JUL-15 By: AF P93C-ROX-071315						
MC40028-10	SW846 8260C	24-JUL-15 17:46	MC			V8260SL+
MC40028-10	SW846 8270D	27-JUL-15 11:59	MR	16-JUL-15	MC	AB8270SL+
MC40028-10	SW846 8270D BY SIM	27-JUL-15 14:30	MR	16-JUL-15	MC	B8270SIMSL
MC40028-10	SW846 8011	27-JUL-15 18:40	NK	23-JUL-15	ES	V8011SL
MC40028-11 Collected: 13-JUL-15 12:40 By: BTES Received: 15-JUL-15 By: AF P57-ROX-071315						
MC40028-11	SW846 8260C	21-JUL-15 19:44	MC			V8260SL+
MC40028-11	SW846 8270D	27-JUL-15 12:22	MR	16-JUL-15	MC	AB8270SL+
MC40028-11	SW846 8270D BY SIM	27-JUL-15 14:53	MR	16-JUL-15	MC	B8270SIMSL
MC40028-11	SW846 8011	27-JUL-15 19:08	NK	23-JUL-15	ES	V8011SL
MC40028-11	SW846 8270D	28-JUL-15 14:36	MR	16-JUL-15	MC	AB8270SL+

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC40028

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC40028-12	Collected: 13-JUL-15 13:50 By: BTES Received: 15-JUL-15 By: AF					
P93A-ROX-071315						
MC40028-12	SW846 8260C	21-JUL-15 20:44	MC			V8260SL+
MC40028-12	SW846 8270D	27-JUL-15 12:46	MR	16-JUL-15	MC	AB8270SL+
MC40028-12	SW846 8260C	27-JUL-15 14:16	KD			V8260SL+
MC40028-12	SW846 8270D BY SIM	27-JUL-15 15:16	MR	16-JUL-15	MC	B8270SIMSL
MC40028-12	SW846 8011	27-JUL-15 19:36	NK	23-JUL-15	ES	V8011SL

Accutest Internal Chain of Custody

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/15/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC40028-1.2	VOC Ref #2	Megan Crichton	07/21/15 11:34	Retrieve from Storage
MC40028-1.2	Megan Crichton	GCMSL	07/21/15 11:37	Load on Instrument
MC40028-1.2	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-1.2	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC40028-2.1	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40028-2.1	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40028-3.1	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40028-3.1	Michael DiBuono		07/20/15 14:49	Depleted
MC40028-3.4	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40028-3.4	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40028-3.5	VOC Ref #2	Megan Crichton	07/22/15 15:04	Retrieve from Storage
MC40028-3.5	Megan Crichton	GCMSL	07/22/15 15:04	Load on Instrument
MC40028-3.5	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-3.5	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC40028-3.6	VOC Ref #2	Megan Crichton	07/21/15 11:34	Retrieve from Storage
MC40028-3.6	Megan Crichton	GCMSL	07/21/15 11:37	Load on Instrument
MC40028-3.6	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-3.6	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC40028-3.6	VOC Ref #2	Megan Crichton	07/24/15 12:57	Retrieve from Storage
MC40028-3.6	Megan Crichton	GCMSL	07/24/15 12:57	Load on Instrument
MC40028-3.6	GCMSL	Andrew Delman	07/27/15 10:42	Unload from Instrument
MC40028-3.6	Andrew Delman	VOC Ref #2	07/27/15 10:42	Return to Storage
MC40028-4.1	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40028-4.1	Michael DiBuono		07/20/15 14:49	Depleted
MC40028-4.3	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40028-4.3	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40028-4.6	VOC Ref #2	Megan Crichton	07/21/15 11:34	Retrieve from Storage
MC40028-4.6	Megan Crichton	GCMSL	07/21/15 11:37	Load on Instrument
MC40028-4.6	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-4.6	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC40028-5.2	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40028-5.2	Michael DiBuono		07/20/15 14:49	Depleted
MC40028-5.4	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40028-5.4	Elizabeth Stefanik		07/23/15 23:24	Depleted

5.3

Accutest Internal Chain of Custody

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/15/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC40028-5.6	VOC Ref #2	Megan Crichton	07/21/15 11:34	Retrieve from Storage
MC40028-5.6	Megan Crichton	GCMSL	07/21/15 11:37	Load on Instrument
MC40028-5.6	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-5.6	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC40028-6.1	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40028-6.1	Michael DiBuono		07/20/15 14:49	Depleted
MC40028-6.3	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40028-6.3	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40028-6.5	VOC Ref #2	Megan Crichton	07/21/15 11:34	Retrieve from Storage
MC40028-6.5	Megan Crichton	GCMSL	07/21/15 11:37	Load on Instrument
MC40028-6.5	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-6.5	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC40028-6.6	VOC Ref #2	Megan Crichton	07/23/15 11:04	Retrieve from Storage
MC40028-6.6	Megan Crichton	GCMSL	07/23/15 11:04	Load on Instrument
MC40028-6.6	GCMSL	Megan Crichton	07/24/15 15:53	Unload from Instrument
MC40028-6.6	Megan Crichton	VOC Ref #2	07/24/15 15:53	Return to Storage
MC40028-7.2	VOC Ref #2	Megan Crichton	07/21/15 11:34	Retrieve from Storage
MC40028-7.2	Megan Crichton	GCMSL	07/21/15 11:37	Load on Instrument
MC40028-7.2	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-7.2	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC40028-8.2	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40028-8.2	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40028-9.1	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40028-9.1	Michael DiBuono		07/20/15 14:49	Depleted
MC40028-9.3	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40028-9.3	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40028-9.5	VOC Ref #2	Megan Crichton	07/21/15 11:34	Retrieve from Storage
MC40028-9.5	Megan Crichton	GCMSL	07/21/15 11:37	Load on Instrument
MC40028-9.5	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-9.5	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC40028-9.6	VOC Ref #2	Megan Crichton	07/22/15 15:04	Retrieve from Storage
MC40028-9.6	Megan Crichton	GCMSL	07/22/15 15:04	Load on Instrument
MC40028-9.6	GCMSL	Megan Crichton	07/24/15 15:53	Unload from Instrument

5.3

Accutest Internal Chain of Custody

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/15/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC40028-9.6	Megan Crichton	VOC Ref #2	07/24/15 15:53	Return to Storage
MC40028-10.1	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40028-10.1	Michael DiBuono		07/20/15 14:49	Depleted
MC40028-10.3	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40028-10.3	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40028-10.4	VOC Ref #2	Jen Tran	07/27/15 12:00	Retrieve from Storage
MC40028-10.4	Jen Tran	GCMSV	07/27/15 12:00	Load on Instrument
MC40028-10.4	GCMSV	Krysten Dufort	07/27/15 12:06	Unload from Instrument
MC40028-10.4	Krysten Dufort	VOC Ref #2	07/27/15 12:07	Return to Storage
MC40028-10.5	VOC Ref #2	Megan Crichton	07/21/15 11:34	Retrieve from Storage
MC40028-10.5	Megan Crichton	GCMSL	07/21/15 11:37	Load on Instrument
MC40028-10.5	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-10.5	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC40028-10.5	VOC Ref #2	Megan Crichton	07/24/15 12:57	Retrieve from Storage
MC40028-10.5	Megan Crichton	GCMSL	07/24/15 12:57	Load on Instrument
MC40028-10.5	GCMSL	Andrew Delman	07/27/15 10:42	Unload from Instrument
MC40028-10.5	Andrew Delman	VOC Ref #2	07/27/15 10:42	Return to Storage
MC40028-10.6	VOC Ref #2	Megan Crichton	07/22/15 15:04	Retrieve from Storage
MC40028-10.6	Megan Crichton	GCMSL	07/22/15 15:04	Load on Instrument
MC40028-10.6	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-10.6	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC40028-10.6	VOC Ref #2	Krysten Dufort	07/27/15 12:09	Retrieve from Storage
MC40028-10.6	Krysten Dufort	GCMSV	07/27/15 12:09	Load on Instrument
MC40028-10.6	GCMSV	Jaclyn Bergeron	07/28/15 09:32	Unload from Instrument
MC40028-10.6	Jaclyn Bergeron	VOC Ref #2	07/28/15 09:33	Return to Storage
MC40028-11.2	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40028-11.2	Michael DiBuono		07/20/15 14:49	Depleted
MC40028-11.3	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40028-11.3	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40028-11.6	VOC Ref #2	Megan Crichton	07/21/15 11:34	Retrieve from Storage
MC40028-11.6	Megan Crichton	GCMSL	07/21/15 11:37	Load on Instrument
MC40028-11.6	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-11.6	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC40028-12.1	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40028-12.1	Michael DiBuono		07/20/15 14:49	Depleted

Accutest Internal Chain of Custody

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/15/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC40028-12.3	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40028-12.3	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40028-12.4	VOC Ref #2	Jen Tran	07/27/15 12:00	Retrieve from Storage
MC40028-12.4	Jen Tran	GCMSV	07/27/15 12:00	Load on Instrument
MC40028-12.4	GCMSV	Krysten Dufort	07/27/15 12:06	Unload from Instrument
MC40028-12.4	Krysten Dufort	VOC Ref #2	07/27/15 12:07	Return to Storage
MC40028-12.5	VOC Ref #2	Megan Crichton	07/22/15 15:04	Retrieve from Storage
MC40028-12.5	Megan Crichton	GCMSL	07/22/15 15:04	Load on Instrument
MC40028-12.5	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-12.5	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage
MC40028-12.5	VOC Ref #2	Krysten Dufort	07/27/15 12:09	Retrieve from Storage
MC40028-12.5	Krysten Dufort	GCMSV	07/27/15 12:09	Load on Instrument
MC40028-12.5	GCMSV	Jaclyn Bergeron	07/28/15 09:32	Unload from Instrument
MC40028-12.5	Jaclyn Bergeron	VOC Ref #2	07/28/15 09:33	Return to Storage
MC40028-12.6	VOC Ref #2	Megan Crichton	07/21/15 11:34	Retrieve from Storage
MC40028-12.6	Megan Crichton	GCMSL	07/21/15 11:37	Load on Instrument
MC40028-12.6	GCMSL	Megan Crichton	07/23/15 16:08	Unload from Instrument
MC40028-12.6	Megan Crichton	VOC Ref #2	07/23/15 16:08	Return to Storage

New England ACCUTEST LABORATORIES

GC/MS Volatiles

6

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-MB	L92918.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-1, MC40028-3, MC40028-7, MC40028-11, MC40028-12

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	0.59	5.0	0.19	ug/l	J
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	

6.1.1

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Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-MB	L92918.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-1, MC40028-3, MC40028-7, MC40028-11, MC40028-12

CAS No.	Compound	Result	RL	MDL	Units	Q
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	1.9	5.0	0.45	ug/l	J
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	1.5	5.0	0.74	ug/l	J
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

6.1.1

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-MB	L92918.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-1, MC40028-3, MC40028-7, MC40028-11, MC40028-12

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	114%	72-133%
2037-26-5	Toluene-D8	99%	85-114%
460-00-4	4-Bromofluorobenzene	104%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4088-MB	L92943A.D	1	07/22/15	MC	n/a	n/a	MSL4088

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-4, MC40028-5, MC40028-6

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	0.51	5.0	0.19	ug/l	J
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4088-MB	L92943A.D	1	07/22/15	MC	n/a	n/a	MSL4088

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-4, MC40028-5, MC40028-6

CAS No.	Compound	Result	RL	MDL	Units	Q
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

6.1.2

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4088-MB	L92943A.D	1	07/22/15	MC	n/a	n/a	MSL4088

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-4, MC40028-5, MC40028-6

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	117%	72-133%
2037-26-5	Toluene-D8	99%	85-114%
460-00-4	4-Bromofluorobenzene	103%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

6.1.2

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4090-MB	L92994.D	1	07/23/15	MC	n/a	n/a	MSL4090

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-6, MC40028-9

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4090-MB	L92994.D	1	07/23/15	MC	n/a	n/a	MSL4090

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-6, MC40028-9

CAS No.	Compound	Result	RL	MDL	Units	Q
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	1.4	5.0	0.45	ug/l	J
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	3.6	5.0	0.61	ug/l	J
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	1.6	5.0	0.78	ug/l	J
120-82-1	1,2,4-Trichlorobenzene	1.4	5.0	0.74	ug/l	J
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4090-MB	L92994.D	1	07/23/15	MC	n/a	n/a	MSL4090

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-6, MC40028-9

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	114%	72-133%
2037-26-5	Toluene-D8	99%	85-114%
460-00-4	4-Bromofluorobenzene	105%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4091-MB	L93020.D	1	07/24/15	MC	n/a	n/a	MSL4091

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-10

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	0.47	5.0	0.19	ug/l	J
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	

6.1.4

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4091-MB	L93020.D	1	07/24/15	MC	n/a	n/a	MSL4091

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-10

CAS No.	Compound	Result	RL	MDL	Units	Q
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	1.7	5.0	0.45	ug/l	J
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	3.6	5.0	0.61	ug/l	J
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	1.7	5.0	0.78	ug/l	J
120-82-1	1,2,4-Trichlorobenzene	1.5	5.0	0.74	ug/l	J
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

6.1.4

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4091-MB	L93020.D	1	07/24/15	MC	n/a	n/a	MSL4091

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-10

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	115%	72-133%
2037-26-5	Toluene-D8	99%	85-114%
460-00-4	4-Bromofluorobenzene	105%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

6.1.4

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1495-MB	V41385.D	1	07/27/15	KD	n/a	n/a	MSV1495

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-12

CAS No.	Compound	Result	RL	MDL	Units	Q
71-43-2	Benzene	ND	0.50	0.27	ug/l	

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	107%	72-133%
2037-26-5	Toluene-D8	102%	85-114%
460-00-4	4-Bromofluorobenzene	99%	70-134%

6.1.5

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-BS	L92915.D	1	07/21/15	MC	n/a	n/a	MSL4087
MSL4087-BSD	L92916.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-1, MC40028-3, MC40028-7, MC40028-11, MC40028-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	71.3	143	61.1	122	15	14-172/25
107-02-8	Acrolein	250	280	112	246	98	13	10-168/25
107-13-1	Acrylonitrile	50	68.6	137	55.8	112	21	41-158/25
71-43-2	Benzene	50	48.1	96	46.4	93	4	68-127/25
108-86-1	Bromobenzene	50	47.9	96	47.9	96	0	74-124/25
74-97-5	Bromochloromethane	50	50.1	100	46.1	92	8	68-135/25
75-27-4	Bromodichloromethane	50	53.5	107	53.1	106	1	72-144/25
75-25-2	Bromoform	50	59.3	119	53.4	107	10	59-147/25
74-83-9	Bromomethane	50	57.2	114	59.1	118	3	34-175/25
78-93-3	2-Butanone (MEK)	50	83.6	167* a	63.1	126	28* a	43-147/25
104-51-8	n-Butylbenzene	50	57.2	114	55.7	111	3	77-136/25
135-98-8	sec-Butylbenzene	50	51.1	102	50.4	101	1	75-134/25
98-06-6	tert-Butylbenzene	50	49.7	99	49.3	99	1	74-132/25
75-15-0	Carbon disulfide	50	46.8	94	52.3	105	11	34-171/25
56-23-5	Carbon tetrachloride	50	50.5	101	55.4	111	9	55-153/25
108-90-7	Chlorobenzene	50	46.5	93	45.0	90	3	71-123/25
75-00-3	Chloroethane	50	54.9	110	54.8	110	0	58-175/25
110-75-8	2-Chloroethyl vinyl ether	50	45.7	91	48.2	96	5	44-169/25
67-66-3	Chloroform	50	52.9	106	50.6	101	4	67-136/25
74-87-3	Chloromethane	50	51.1	102	53.1	106	4	25-182/25
95-49-8	o-Chlorotoluene	50	48.6	97	48.3	97	1	72-130/25
106-43-4	p-Chlorotoluene	50	49.3	99	49.1	98	0	73-127/25
124-48-1	Dibromochloromethane	50	62.3	125	59.2	118	5	73-139/25
95-50-1	1,2-Dichlorobenzene	50	48.2	96	47.5	95	1	77-125/25
541-73-1	1,3-Dichlorobenzene	50	49.8	100	48.7	97	2	77-124/25
106-46-7	1,4-Dichlorobenzene	50	48.5	97	48.3	97	0	73-128/25
75-71-8	Dichlorodifluoromethane	50	32.2	64	31.2	62	3	23-157/25
75-34-3	1,1-Dichloroethane	50	51.1	102	49.6	99	3	63-145/25
107-06-2	1,2-Dichloroethane	50	52.4	105	50.1	100	4	58-145/25
75-35-4	1,1-Dichloroethene	50	58.6	117	57.3	115	2	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	49.9	100	48.0	96	4	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	49.9	100	48.7	97	2	66-136/25
78-87-5	1,2-Dichloropropane	50	49.7	99	49.8	100	0	75-133/25
142-28-9	1,3-Dichloropropane	50	50.0	100	46.5	93	7	70-127/25
594-20-7	2,2-Dichloropropane	50	65.4	131	67.4	135	3	52-163/25
563-58-6	1,1-Dichloropropene	50	49.3	99	48.4	97	2	77-140/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-BS	L92915.D	1	07/21/15	MC	n/a	n/a	MSL4087
MSL4087-BSD	L92916.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-1, MC40028-3, MC40028-7, MC40028-11, MC40028-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	50	59.9	120	59.9	120	0	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	55.1	110	51.6	103	7	77-143/25
123-91-1	1,4-Dioxane	250	227	91	193	77	16	30-182/25
97-63-2	Ethyl methacrylate	50	53.9	108	46.9	94	14	64-131/25
100-41-4	Ethylbenzene	50	48.2	96	46.6	93	3	71-129/25
87-68-3	Hexachlorobutadiene	50	51.4	103	50.8	102	1	64-146/25
591-78-6	2-Hexanone	50	68.8	138	57.4	115	18	22-163/25
98-82-8	Isopropylbenzene	50	48.4	97	48.1	96	1	72-133/25
99-87-6	p-Isopropyltoluene	50	50.4	101	50.1	100	1	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	51.4	103	51.2	102	0	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	58.2	116	49.2	98	17	47-145/25
74-95-3	Methylene bromide	50	46.9	94	43.7	87	7	70-132/25
75-09-2	Methylene chloride	50	55.9	112	53.9	108	4	55-146/25
91-20-3	Naphthalene	50	44.1	88	39.7	79	11	39-176/25
103-65-1	n-Propylbenzene	50	50.7	101	50.3	101	1	74-134/25
100-42-5	Styrene	50	50.2	100	48.2	96	4	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	58.1	116	56.3	113	3	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	50.5	101	45.8	92	10	58-145/25
127-18-4	Tetrachloroethene	50	47.0	94	46.1	92	2	63-137/25
108-88-3	Toluene	50	49.4	99	48.2	96	2	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	47.1	94	44.8	90	5	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	47.4	95	46.5	93	2	40-176/25
71-55-6	1,1,1-Trichloroethane	50	50.1	100	50.3	101	0	68-144/25
79-00-5	1,1,2-Trichloroethane	50	50.4	101	47.7	95	6	72-133/25
79-01-6	Trichloroethene	50	50.0	100	49.0	98	2	73-126/25
75-69-4	Trichlorofluoromethane	50	52.6	105	51.6	103	2	43-152/25
96-18-4	1,2,3-Trichloropropane	50	53.0	106	47.6	95	11	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	49.7	99	49.1	98	1	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	48.8	98	48.6	97	0	71-127/25
108-05-4	Vinyl Acetate	50	76.2	152	70.8	142	7	10-170/25
75-01-4	Vinyl chloride	50	50.8	102	50.5	101	1	36-167/25
	m,p-Xylene	100	95.8	96	92.5	93	4	68-130/25
95-47-6	o-Xylene	50	48.2	96	46.7	93	3	69-126/25
1330-20-7	Xylene (total)	150	144	96	139	93	4	67-129/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4087-BS	L92915.D	1	07/21/15	MC	n/a	n/a	MSL4087
MSL4087-BSD	L92916.D	1	07/21/15	MC	n/a	n/a	MSL4087

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-1, MC40028-3, MC40028-7, MC40028-11, MC40028-12

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	109%	108%	72-133%
2037-26-5	Toluene-D8	99%	98%	85-114%
460-00-4	4-Bromofluorobenzene	98%	100%	70-134%

(a) Outside control limits. Associated samples are non-detect for this compound.

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4088-BS	L92940.D	1	07/21/15	MC	n/a	n/a	MSL4088
MSL4088-BSD	L92941.D	1	07/21/15	MC	n/a	n/a	MSL4088

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-4, MC40028-5, MC40028-6

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	76.8	154	81.9	164	6	14-172/25
107-02-8	Acrolein	250	221	88	213	85	4	10-168/25
107-13-1	Acrylonitrile	50	71.6	143	62.6	125	13	41-158/25
71-43-2	Benzene	50	47.0	94	45.9	92	2	68-127/25
108-86-1	Bromobenzene	50	46.5	93	45.7	91	2	74-124/25
74-97-5	Bromochloromethane	50	49.0	98	48.2	96	2	68-135/25
75-27-4	Bromodichloromethane	50	53.2	106	52.9	106	1	72-144/25
75-25-2	Bromoform	50	58.6	117	55.7	111	5	59-147/25
74-83-9	Bromomethane	50	48.4	97	51.3	103	6	34-175/25
78-93-3	2-Butanone (MEK)	50	81.2	162* [a]	81.2	162* [a]	0	43-147/25
104-51-8	n-Butylbenzene	50	53.7	107	52.9	106	2	77-136/25
135-98-8	sec-Butylbenzene	50	49.1	98	47.8	96	3	75-134/25
98-06-6	tert-Butylbenzene	50	48.2	96	46.8	94	3	74-132/25
75-15-0	Carbon disulfide	50	50.9	102	53.1	106	4	34-171/25
56-23-5	Carbon tetrachloride	50	47.1	94	48.7	97	3	55-153/25
108-90-7	Chlorobenzene	50	45.0	90	43.9	88	2	71-123/25
75-00-3	Chloroethane	50	54.7	109	51.3	103	6	58-175/25
110-75-8	2-Chloroethyl vinyl ether	50	48.2	96	38.7	77	22	44-169/25
67-66-3	Chloroform	50	53.3	107	52.0	104	2	67-136/25
74-87-3	Chloromethane	50	46.8	94	47.2	94	1	25-182/25
95-49-8	o-Chlorotoluene	50	46.8	94	45.8	92	2	72-130/25
106-43-4	p-Chlorotoluene	50	47.8	96	46.9	94	2	73-127/25
124-48-1	Dibromochloromethane	50	61.8	124	58.9	118	5	73-139/25
95-50-1	1,2-Dichlorobenzene	50	47.7	95	46.5	93	3	77-125/25
541-73-1	1,3-Dichlorobenzene	50	48.1	96	47.2	94	2	77-124/25
106-46-7	1,4-Dichlorobenzene	50	47.8	96	46.6	93	3	73-128/25
75-71-8	Dichlorodifluoromethane	50	32.0	64	30.3	61	5	23-157/25
75-34-3	1,1-Dichloroethane	50	51.5	103	50.5	101	2	63-145/25
107-06-2	1,2-Dichloroethane	50	53.7	107	51.6	103	4	58-145/25
75-35-4	1,1-Dichloroethene	50	57.4	115	55.4	111	4	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	49.3	99	48.6	97	1	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	47.7	95	47.6	95	0	66-136/25
78-87-5	1,2-Dichloropropane	50	49.5	99	49.0	98	1	75-133/25
142-28-9	1,3-Dichloropropane	50	50.0	100	47.4	95	5	70-127/25
594-20-7	2,2-Dichloropropane	50	57.2	114	58.0	116	1	52-163/25
563-58-6	1,1-Dichloropropene	50	47.3	95	46.6	93	1	77-140/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4088-BS	L92940.D	1	07/21/15	MC	n/a	n/a	MSL4088
MSL4088-BSD	L92941.D	1	07/21/15	MC	n/a	n/a	MSL4088

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-4, MC40028-5, MC40028-6

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	50	57.1	114	57.0	114	0	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	52.9	106	50.9	102	4	77-143/25
123-91-1	1,4-Dioxane	250	218	87	214	86	2	30-182/25
97-63-2	Ethyl methacrylate	50	53.2	106	49.8	100	7	64-131/25
100-41-4	Ethylbenzene	50	46.2	92	45.2	90	2	71-129/25
87-68-3	Hexachlorobutadiene	50	48.2	96	46.7	93	3	64-146/25
591-78-6	2-Hexanone	50	63.8	128	64.9	130	2	22-163/25
98-82-8	Isopropylbenzene	50	46.4	93	45.1	90	3	72-133/25
99-87-6	p-Isopropyltoluene	50	48.5	97	47.2	94	3	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	50.4	101	51.4	103	2	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	59.1	118	55.5	111	6	47-145/25
74-95-3	Methylene bromide	50	47.7	95	45.6	91	5	70-132/25
75-09-2	Methylene chloride	50	54.3	109	53.3	107	2	55-146/25
91-20-3	Naphthalene	50	46.0	92	44.0	88	4	39-176/25
103-65-1	n-Propylbenzene	50	48.6	97	47.3	95	3	74-134/25
100-42-5	Styrene	50	48.2	96	47.1	94	2	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	57.4	115	55.2	110	4	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	49.7	99	44.9	90	10	58-145/25
127-18-4	Tetrachloroethene	50	44.5	89	43.9	88	1	63-137/25
108-88-3	Toluene	50	48.5	97	47.3	95	3	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	46.6	93	46.2	92	1	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	45.4	91	46.0	92	1	40-176/25
71-55-6	1,1,1-Trichloroethane	50	49.8	100	49.1	98	1	68-144/25
79-00-5	1,1,2-Trichloroethane	50	51.5	103	48.4	97	6	72-133/25
79-01-6	Trichloroethene	50	49.3	99	49.8	100	1	73-126/25
75-69-4	Trichlorofluoromethane	50	52.1	104	49.3	99	6	43-152/25
96-18-4	1,2,3-Trichloropropane	50	52.6	105	49.3	99	6	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	47.9	96	46.9	94	2	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	47.0	94	46.1	92	2	71-127/25
108-05-4	Vinyl Acetate	50	68.6	137	55.2	110	22	10-170/25
75-01-4	Vinyl chloride	50	49.5	99	47.3	95	5	36-167/25
	m,p-Xylene	100	92.0	92	90.5	91	2	68-130/25
95-47-6	o-Xylene	50	46.6	93	45.3	91	3	69-126/25
1330-20-7	Xylene (total)	150	139	93	136	91	2	67-129/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4088-BS	L92940.D	1	07/21/15	MC	n/a	n/a	MSL4088
MSL4088-BSD	L92941.D	1	07/21/15	MC	n/a	n/a	MSL4088

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-4, MC40028-5, MC40028-6

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	111%	113%	72-133%
2037-26-5	Toluene-D8	97%	99%	85-114%
460-00-4	4-Bromofluorobenzene	96%	97%	70-134%

(a) Outside control limits. Associated samples are non-detect for this compound.

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4090-BS	L92991.D	1	07/23/15	MC	n/a	n/a	MSL4090
MSL4090-BSD	L92992.D	1	07/23/15	MC	n/a	n/a	MSL4090

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-6, MC40028-9

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	94.5	189* a	79.0	158	18	14-172/25
107-02-8	Acrolein	250	262	105	247	99	6	10-168/25
107-13-1	Acrylonitrile	50	64.7	129	61.4	123	5	41-158/25
71-43-2	Benzene	50	47.8	96	41.1	82	15	68-127/25
108-86-1	Bromobenzene	50	47.3	95	43.3	87	9	74-124/25
74-97-5	Bromochloromethane	50	49.8	100	42.2	84	17	68-135/25
75-27-4	Bromodichloromethane	50	57.3	115	48.6	97	16	72-144/25
75-25-2	Bromoform	50	54.4	109	52.0	104	5	59-147/25
74-83-9	Bromomethane	50	66.1	132	51.5	103	25	34-175/25
78-93-3	2-Butanone (MEK)	50	64.8	130	61.7	123	5	43-147/25
104-51-8	n-Butylbenzene	50	58.3	117	52.0	104	11	77-136/25
135-98-8	sec-Butylbenzene	50	51.1	102	45.4	91	12	75-134/25
98-06-6	tert-Butylbenzene	50	50.7	101	44.8	90	12	74-132/25
75-15-0	Carbon disulfide	50	51.9	104	38.9	78	29* b	34-171/25
56-23-5	Carbon tetrachloride	50	54.8	110	45.0	90	20	55-153/25
108-90-7	Chlorobenzene	50	44.7	89	40.3	81	10	71-123/25
75-00-3	Chloroethane	50	62.7	125	51.2	102	20	58-175/25
110-75-8	2-Chloroethyl vinyl ether	50	49.9	100	47.6	95	5	44-169/25
67-66-3	Chloroform	50	54.5	109	45.8	92	17	67-136/25
74-87-3	Chloromethane	50	56.1	112	47.7	95	16	25-182/25
95-49-8	o-Chlorotoluene	50	49.0	98	43.4	87	12	72-130/25
106-43-4	p-Chlorotoluene	50	50.3	101	44.8	90	12	73-127/25
124-48-1	Dibromochloromethane	50	59.1	118	55.2	110	7	73-139/25
95-50-1	1,2-Dichlorobenzene	50	48.7	97	43.5	87	11	77-125/25
541-73-1	1,3-Dichlorobenzene	50	50.0	100	44.5	89	12	77-124/25
106-46-7	1,4-Dichlorobenzene	50	48.9	98	44.4	89	10	73-128/25
75-71-8	Dichlorodifluoromethane	50	54.3	109	44.8	90	19	23-157/25
75-34-3	1,1-Dichloroethane	50	52.2	104	44.0	88	17	63-145/25
107-06-2	1,2-Dichloroethane	50	54.1	108	47.0	94	14	58-145/25
75-35-4	1,1-Dichloroethene	50	58.5	117	48.8	98	18	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	50.1	100	41.5	83	19	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	47.5	95	40.6	81	16	66-136/25
78-87-5	1,2-Dichloropropane	50	50.6	101	44.1	88	14	75-133/25
142-28-9	1,3-Dichloropropane	50	46.9	94	43.9	88	7	70-127/25
594-20-7	2,2-Dichloropropane	50	71.5	143	58.9	118	19	52-163/25
563-58-6	1,1-Dichloropropene	50	49.5	99	42.1	84	16	77-140/25

* = Outside of Control Limits.

6.2.3

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4090-BS	L92991.D	1	07/23/15	MC	n/a	n/a	MSL4090
MSL4090-BSD	L92992.D	1	07/23/15	MC	n/a	n/a	MSL4090

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-6, MC40028-9

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	50	61.8	124	54.0	108	13	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	54.6	109	49.2	98	10	77-143/25
123-91-1	1,4-Dioxane	250	193	77	193	77	0	30-182/25
97-63-2	Ethyl methacrylate	50	50.0	100	46.2	92	8	64-131/25
100-41-4	Ethylbenzene	50	46.6	93	42.2	84	10	71-129/25
87-68-3	Hexachlorobutadiene	50	52.1	104	46.4	93	12	64-146/25
591-78-6	2-Hexanone	50	58.2	116	57.9	116	1	22-163/25
98-82-8	Isopropylbenzene	50	48.6	97	43.1	86	12	72-133/25
99-87-6	p-Isopropyltoluene	50	50.8	102	45.4	91	11	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	52.9	106	46.6	93	13	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	54.4	109	52.9	106	3	47-145/25
74-95-3	Methylene bromide	50	47.5	95	42.1	84	12	70-132/25
75-09-2	Methylene chloride	50	55.1	110	47.3	95	15	55-146/25
91-20-3	Naphthalene	50	41.9	84	41.3	83	1	39-176/25
103-65-1	n-Propylbenzene	50	51.0	102	45.3	91	12	74-134/25
100-42-5	Styrene	50	47.9	96	43.7	87	9	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	57.2	114	51.2	102	11	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	47.4	95	45.4	91	4	58-145/25
127-18-4	Tetrachloroethene	50	45.3	91	40.3	81	12	63-137/25
108-88-3	Toluene	50	50.0	100	42.2	84	17	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	46.3	93	42.8	86	8	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	47.1	94	43.7	87	7	40-176/25
71-55-6	1,1,1-Trichloroethane	50	52.3	105	43.7	87	18	68-144/25
79-00-5	1,1,2-Trichloroethane	50	49.6	99	44.4	89	11	72-133/25
79-01-6	Trichloroethene	50	50.3	101	42.3	85	17	73-126/25
75-69-4	Trichlorofluoromethane	50	61.0	122	51.2	102	17	43-152/25
96-18-4	1,2,3-Trichloropropane	50	49.8	100	48.3	97	3	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	49.8	100	44.2	88	12	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	49.1	98	43.9	88	11	71-127/25
108-05-4	Vinyl Acetate	50	77.1	154	71.0	142	8	10-170/25
75-01-4	Vinyl chloride	50	60.1	120	49.6	99	19	36-167/25
	m,p-Xylene	100	92.2	92	83.2	83	10	68-130/25
95-47-6	o-Xylene	50	46.4	93	41.7	83	11	69-126/25
1330-20-7	Xylene (total)	150	139	93	125	83	11	67-129/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4090-BS	L92991.D	1	07/23/15	MC	n/a	n/a	MSL4090
MSL4090-BSD	L92992.D	1	07/23/15	MC	n/a	n/a	MSL4090

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-6, MC40028-9

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	111%	109%	72-133%
2037-26-5	Toluene-D8	99%	99%	85-114%
460-00-4	4-Bromofluorobenzene	99%	99%	70-134%

(a) Outside control limits. Associated samples are non-detect for this compound.
(b) Outside control limits. Individual spike recoveries within acceptance limits.

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4091-BS	L93017.D	1	07/24/15	MC	n/a	n/a	MSL4091
MSL4091-BSD	L93018.D	1	07/24/15	MC	n/a	n/a	MSL4091

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-10

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	76.6	153	107	214* a	33* a	14-172/25
107-02-8	Acrolein	250	265	106	296	118	11	10-168/25
107-13-1	Acrylonitrile	50	56.7	113	71.3	143	23	41-158/25
71-43-2	Benzene	50	44.0	88	44.7	89	2	68-127/25
108-86-1	Bromobenzene	50	47.0	94	47.8	96	2	74-124/25
74-97-5	Bromochloromethane	50	46.0	92	47.3	95	3	68-135/25
75-27-4	Bromodichloromethane	50	53.8	108	53.0	106	1	72-144/25
75-25-2	Bromoform	50	54.0	108	60.3	121	11	59-147/25
74-83-9	Bromomethane	50	59.0	118	54.3	109	8	34-175/25
78-93-3	2-Butanone (MEK)	50	67.9	136	82.3	165* a	19	43-147/25
104-51-8	n-Butylbenzene	50	56.6	113	58.3	117	3	77-136/25
135-98-8	sec-Butylbenzene	50	50.1	100	50.8	102	1	75-134/25
98-06-6	tert-Butylbenzene	50	49.4	99	50.7	101	3	74-132/25
75-15-0	Carbon disulfide	50	43.3	87	39.8	80	8	34-171/25
56-23-5	Carbon tetrachloride	50	52.5	105	47.6	95	10	55-153/25
108-90-7	Chlorobenzene	50	43.6	87	44.4	89	2	71-123/25
75-00-3	Chloroethane	50	60.3	121	59.4	119	2	58-175/25
110-75-8	2-Chloroethyl vinyl ether	50	50.6	101	41.1	82	21	44-169/25
67-66-3	Chloroform	50	50.6	101	51.6	103	2	67-136/25
74-87-3	Chloromethane	50	55.2	110	52.1	104	6	25-182/25
95-49-8	o-Chlorotoluene	50	48.2	96	48.9	98	1	72-130/25
106-43-4	p-Chlorotoluene	50	49.6	99	49.9	100	1	73-127/25
124-48-1	Dibromochloromethane	50	59.1	118	61.3	123	4	73-139/25
95-50-1	1,2-Dichlorobenzene	50	47.6	95	48.9	98	3	77-125/25
541-73-1	1,3-Dichlorobenzene	50	49.0	98	49.5	99	1	77-124/25
106-46-7	1,4-Dichlorobenzene	50	48.1	96	49.0	98	2	73-128/25
75-71-8	Dichlorodifluoromethane	50	49.5	99	50.4	101	2	23-157/25
75-34-3	1,1-Dichloroethane	50	48.4	97	48.8	98	1	63-145/25
107-06-2	1,2-Dichloroethane	50	51.9	104	55.0	110	6	58-145/25
75-35-4	1,1-Dichloroethene	50	52.0	104	52.8	106	2	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	46.5	93	46.2	92	1	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	43.8	88	44.2	88	1	66-136/25
78-87-5	1,2-Dichloropropane	50	48.2	96	49.0	98	2	75-133/25
142-28-9	1,3-Dichloropropane	50	47.4	95	49.9	100	5	70-127/25
594-20-7	2,2-Dichloropropane	50	67.3	135	64.2	128	5	52-163/25
563-58-6	1,1-Dichloropropene	50	45.3	91	46.1	92	2	77-140/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4091-BS	L93017.D	1	07/24/15	MC	n/a	n/a	MSL4091
MSL4091-BSD	L93018.D	1	07/24/15	MC	n/a	n/a	MSL4091

6.2.4

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-10

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	50	58.2	116	57.8	116	1	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	50.7	101	55.6	111	9	77-143/25
123-91-1	1,4-Dioxane	250	173	69	231	92	29* b	30-182/25
97-63-2	Ethyl methacrylate	50	47.5	95	53.8	108	12	64-131/25
100-41-4	Ethylbenzene	50	45.7	91	46.3	93	1	71-129/25
87-68-3	Hexachlorobutadiene	50	50.5	101	51.6	103	2	64-146/25
591-78-6	2-Hexanone	50	60.2	120	75.2	150	22	22-163/25
98-82-8	Isopropylbenzene	50	47.4	95	48.0	96	1	72-133/25
99-87-6	p-Isopropyltoluene	50	49.7	99	50.7	101	2	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	49.4	99	49.1	98	1	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	53.6	107	65.4	131	20	47-145/25
74-95-3	Methylene bromide	50	44.8	90	47.4	95	6	70-132/25
75-09-2	Methylene chloride	50	51.6	103	51.9	104	1	55-146/25
91-20-3	Naphthalene	50	41.2	82	48.9	98	17	39-176/25
103-65-1	n-Propylbenzene	50	49.9	100	50.7	101	2	74-134/25
100-42-5	Styrene	50	46.4	93	48.0	96	3	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	56.4	113	57.0	114	1	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	47.9	96	53.3	107	11	58-145/25
127-18-4	Tetrachloroethene	50	43.1	86	44.2	88	3	63-137/25
108-88-3	Toluene	50	46.5	93	46.9	94	1	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	45.1	90	49.4	99	9	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	45.9	92	49.2	98	7	40-176/25
71-55-6	1,1,1-Trichloroethane	50	48.7	97	48.1	96	1	68-144/25
79-00-5	1,1,2-Trichloroethane	50	46.9	94	50.7	101	8	72-133/25
79-01-6	Trichloroethene	50	46.3	93	47.8	96	3	73-126/25
75-69-4	Trichlorofluoromethane	50	60.0	120	60.6	121	1	43-152/25
96-18-4	1,2,3-Trichloropropane	50	50.3	101	57.2	114	13	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	48.9	98	49.6	99	1	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	48.4	97	48.8	98	1	71-127/25
108-05-4	Vinyl Acetate	50	72.8	146	80.6	161	10	10-170/25
75-01-4	Vinyl chloride	50	57.7	115	55.8	112	3	36-167/25
	m,p-Xylene	100	90.8	91	91.5	92	1	68-130/25
95-47-6	o-Xylene	50	45.2	90	46.0	92	2	69-126/25
1330-20-7	Xylene (total)	150	136	91	137	91	1	67-129/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSL4091-BS	L93017.D	1	07/24/15	MC	n/a	n/a	MSL4091
MSL4091-BSD	L93018.D	1	07/24/15	MC	n/a	n/a	MSL4091

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-10

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	110%	111%	72-133%
2037-26-5	Toluene-D8	100%	99%	85-114%
460-00-4	4-Bromofluorobenzene	99%	99%	70-134%

(a) Outside control limits. Associated samples are not reported for this compound.
(b) Outside control limits. Individual spike recoveries within acceptance limits.

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1495-BS	V41382.D	1	07/27/15	KD	n/a	n/a	MSV1495
MSV1495-BSD	V41383.D	1	07/27/15	KD	n/a	n/a	MSV1495

The QC reported here applies to the following samples: Method: SW846 8260C

MC40028-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
71-43-2	Benzene	50	51.5	103	50.9	102	1	74-124/25

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	100%	101%	79-127%
2037-26-5	Toluene-D8	104%	104%	87-112%
460-00-4	4-Bromofluorobenzene	101%	101%	77-124%

* = Outside of Control Limits.

Volatile Internal Standard Area Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSL4087-CC4070	Injection Date:	07/21/15
Lab File ID:	L92915.D	Injection Time:	10:27
Instrument ID:	GCMSL	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	1748749	8.11	2755107	8.92	1529077	12.11	1291392	14.65	220816	5.91
Upper Limit [a]	3497498	8.61	5510214	9.42	3058154	12.61	2582784	15.15	441632	6.41
Lower Limit [b]	874375	7.61	1377554	8.42	764539	11.61	645696	14.15	110408	5.41

Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSL4087-BS	1748749	8.11	2755107	8.92	1529077	12.11	1291392	14.65	220816	5.91
MSL4087-BSD	1651102	8.10	2572560	8.91	1420376	12.10	1165806	14.65	166750	5.91
MSL4087-MB	1498617	8.11	2348488	8.92	1206329	12.11	888824	14.65	209174	5.97
ZZZZZZ	1429105	8.11	2263296	8.92	1174956	12.11	844824	14.65	197626	5.96
MC40028-1	1620337	8.11	2592706	8.92	1346697	12.11	971663	14.65	206471	5.95
MC40028-7	1373034	8.11	2210630	8.92	1165620	12.11	828527	14.65	187041	5.97
ZZZZZZ	1470001	8.11	2451404	8.92	1301822	12.11	1083692	14.65	218503	5.92
ZZZZZZ	1492024	8.10	2367899	8.92	1234852	12.11	1016909	14.65	238797	5.94
ZZZZZZ	1469159	8.10	2486931	8.92	1258309	12.11	969568	14.65	202311	5.98
ZZZZZZ	1452841	8.10	2356598	8.92	1230563	12.11	1034419	14.65	249168	5.95
ZZZZZZ	1468029	8.11	2324995	8.92	1215065	12.11	921161	14.65	208327	5.96
ZZZZZZ	1444466	8.10	2306227	8.92	1244468	12.11	936415	14.65	214222	5.94
ZZZZZZ	1533605	8.10	2450063	8.92	1316694	12.11	1030140	14.65	204102	5.93
MC40028-3	1708554	8.10	2645159	8.92	1368000	12.11	1187962	14.65	242901	5.93
ZZZZZZ	1526475	8.10	2437698	8.92	1253087	12.11	952213	14.65	212913	5.95
MC40028-11	1397887	8.10	2319301	8.91	1193992	12.11	888270	14.65	218141	5.94
ZZZZZZ	1406408	8.10	2336072	8.92	1235202	12.11	1040075	14.65	232844	5.94
MC40028-12	1438589	8.10	2634333	8.91	1252250	12.11	942918	14.65	189221	5.95
ZZZZZZ	1374624	8.10	2355216	8.91	1184748	12.11	864585	14.65	205240	5.93

IS 1 = Pentafluorobenzene
IS 2 = 1,4-Difluorobenzene
IS 3 = Chlorobenzene-D5
IS 4 = 1,4-Dichlorobenzene-d4
IS 5 = Tert Butyl Alcohol-D9

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

6.3.1

Volatile Internal Standard Area Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSL4088-CC4070	Injection Date:	07/21/15
Lab File ID:	L92940.D	Injection Time:	23:13
Instrument ID:	GCMSL	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	1622203	8.10	2591079	8.91	1459718	12.10	1240662	14.64	218243	5.88
Upper Limit [a]	3244406	8.60	5182158	9.41	2919436	12.60	2481324	15.14	436486	6.38
Lower Limit [b]	811102	7.60	1295540	8.41	729859	11.60	620331	14.14	109122	5.38

Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSL4088-BS	1622203	8.10	2591079	8.91	1459718	12.10	1240662	14.64	218243	5.88
MSL4088-BSD	1585855	8.10	2532850	8.91	1429251	12.10	1207527	14.64	184621	5.87
MSL4088-MB	1408766	8.10	2258805	8.92	1184093	12.11	883075	14.65	219358	5.95
MC40028-4	1529102	8.10	2387174	8.92	1240666	12.11	980856	14.65	170307	5.95
MC40028-5	1686270	8.10	2715860	8.91	1457072	12.11	1164475	14.65	268034	5.92
MC40028-6	1739880	8.10	2653185	8.91	1469847	12.10	1269775	14.64	288653	5.89
ZZZZZZ	1648982	8.10	2521893	8.91	1285788	12.11	1038797	14.65	269976	5.94
ZZZZZZ	1433371	8.10	2242358	8.91	1216756	12.11	981984	14.65	235393	5.94
ZZZZZZ	1439612	8.10	2271543	8.92	1183042	12.11	911866	14.65	239923	5.92
ZZZZZZ	1605667	8.10	2533733	8.92	1331562	12.11	990954	14.65	223621	5.96
ZZZZZZ	1353213	8.10	2184469	8.92	1167821	12.11	866015	14.65	223858	5.95
ZZZZZZ	1331416	8.10	2163897	8.92	1158681	12.11	860861	14.65	242137	5.94
ZZZZZZ	1309535	8.10	2114069	8.92	1142663	12.11	834089	14.65	212970	5.94
ZZZZZZ	1273269	8.10	2104800	8.92	1138865	12.11	836995	14.65	187043	5.95
ZZZZZZ	1330968	8.10	2160597	8.91	1151748	12.11	1051349	14.65	183335	5.92
ZZZZZZ	1365667	8.10	2188827	8.92	1155158	12.11	907409	14.65	187819	5.94
ZZZZZZ	1406653	8.10	2277366	8.91	1195030	12.11	956437	14.65	177462	5.94
ZZZZZZ	1397707	8.10	2230863	8.91	1196883	12.11	911055	14.65	253750	5.94
ZZZZZZ	1361810	8.10	2218338	8.91	1175113	12.11	893115	14.65	263156	5.94
ZZZZZZ	1446856	8.10	2309133	8.91	1256330	12.11	1009830	14.65	219253	5.92
ZZZZZZ	1366784	8.10	2216728	8.91	1210645	12.11	995287	14.65	222111	5.90
ZZZZZZ	1627855	8.10	2514442	8.91	1375372	12.10	1238766	14.64	231144	5.87

IS 1 = Pentafluorobenzene
IS 2 = 1,4-Difluorobenzene
IS 3 = Chlorobenzene-D5
IS 4 = 1,4-Dichlorobenzene-d4
IS 5 = Tert Butyl Alcohol-D9

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

Volatile Internal Standard Area Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSL4090-CC4070	Injection Date:	07/23/15
Lab File ID:	L92991.D	Injection Time:	09:50
Instrument ID:	GCMSL	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	1504779	8.10	2361072	8.91	1370989	12.10	1125959	14.64	175840	5.89
Upper Limit [a]	3009558	8.60	4722144	9.41	2741978	12.60	2251918	15.14	351680	6.39
Lower Limit [b]	752390	7.60	1180536	8.41	685495	11.60	562980	14.14	87920	5.39

Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSL4090-BS	1504779	8.10	2361072	8.91	1370989	12.10	1125959	14.64	175840	5.89
MSL4090-BSD	1773422	8.10	2764401	8.91	1523145	12.10	1256151	14.64	220742	5.89
MSL4090-MB	1454055	8.10	2251412	8.92	1169486	12.11	848829	14.65	203024	5.96
GP19375-LB1	1318627	8.10	2080752	8.92	1121543	12.11	797366	14.65	192541	5.95
ZZZZZZ	1303977	8.10	2081450	8.92	1105104	12.11	786612	14.65	213482	5.95
ZZZZZZ	1268936	8.11	2045465	8.92	1082485	12.11	778987	14.65	187824	5.95
ZZZZZZ	1370998	8.11	2223131	8.92	1151830	12.11	824132	14.65	184337	5.96
ZZZZZZ	1556990	8.10	2467205	8.92	1311077	12.11	1111641	14.65	209486	5.91
ZZZZZZ	1359899	8.10	2117119	8.92	1129838	12.11	948639	14.65	191984	5.94
MC40028-6	1449705	8.10	2253836	8.92	1185046	12.11	958247	14.65	221735	5.96
MC40028-9	1478216	8.10	2302938	8.91	1179934	12.11	936420	14.65	199818	5.87
ZZZZZZ	1628668	8.10	2506826	8.91	1333598	12.11	1210468	14.65	227348	5.85
ZZZZZZ	1856765	8.10	2775966	8.91	1444053	12.10	1337228	14.65	237490	5.86
ZZZZZZ	1925924	8.10	2813419	8.92	1384966	12.11	1166119	14.65	278549	5.95
ZZZZZZ	1832057	8.10	2712663	8.92	1324539	12.11	1086942	14.65	250274	5.95
ZZZZZZ	1712776	8.10	2505224	8.92	1252229	12.11	984752	14.65	254815	5.95
ZZZZZZ	1505567	8.10	2244355	8.92	1170369	12.11	880079	14.65	195801	5.95
ZZZZZZ	1420640	8.10	2167110	8.92	1117139	12.11	820851	14.65	183676	5.95
ZZZZZZ	1415482	8.10	2180414	8.92	1151313	12.11	843188	14.65	241077	5.95
GP19375-LS1	1569475	8.10	2513583	8.91	1424029	12.10	1165216	14.64	188648	5.88

IS 1 = Pentafluorobenzene
IS 2 = 1,4-Difluorobenzene
IS 3 = Chlorobenzene-D5
IS 4 = 1,4-Dichlorobenzene-d4
IS 5 = Tert Butyl Alcohol-D9

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

6.3.3

Volatile Internal Standard Area Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSL4091-CC4070	Injection Date:	07/24/15
Lab File ID:	L93017.D	Injection Time:	09:34
Instrument ID:	GCMSL	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	1508697	8.10	2352874	8.91	1318817	12.10	1068986	14.64	157703	5.89
Upper Limit [a]	3017394	8.60	4705748	9.41	2637634	12.60	2137972	15.14	315406	6.39
Lower Limit [b]	754349	7.60	1176437	8.41	659409	11.60	534493	14.14	78852	5.39

Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSL4091-BS	1508697	8.10	2352874	8.91	1318817	12.10	1068986	14.64	157703	5.89
MSL4091-BSD	1527019	8.10	2387379	8.91	1338898	12.10	1096648	14.64	227183	5.89
MSL4091-MB	1342483	8.10	2088980	8.92	1086529	12.11	784545	14.65	167534	5.96
ZZZZZZ	1520350	8.11	2351065	8.92	1233923	12.11	883396	14.65	219058	5.96
ZZZZZZ	1283936	8.10	2037629	8.92	1076874	12.11	764030	14.65	201168	5.96
ZZZZZZ	1273582	8.10	2029342	8.92	1073044	12.11	751381	14.65	181926	5.96
ZZZZZZ	1405694	8.10	2239521	8.91	1229633	12.11	1034844	14.64	200310	5.92
ZZZZZZ	1660877	8.12	2525755	8.92	1310612	12.11	949170	14.65	200404	5.98
ZZZZZZ	1418671	8.10	2242777	8.92	1180458	12.11	931982	14.65	186360	5.94
ZZZZZZ	1443294	8.10	2207863	8.92	1154159	12.11	963786	14.65	205114	5.97
ZZZZZZ	1424405	8.10	2205794	8.92	1150558	12.11	936072	14.65	215779	5.97
ZZZZZZ	1472793	8.10	2270518	8.91	1193926	12.11	1019612	14.64	302715	5.94
ZZZZZZ	1481535	8.10	2281370	8.92	1186740	12.11	976776	14.65	202230	5.95
ZZZZZZ	1396627	8.10	2120245	8.91	1127984	12.11	954614	14.65	239082	5.94
MC40028-10	1544277	8.10	2408397	8.91	1231970	12.11	900938	14.65	224070	5.94
ZZZZZZ	1351213	8.11	2109586	8.92	1104044	12.11	790747	14.65	194941	5.96

IS 1 = Pentafluorobenzene
IS 2 = 1,4-Difluorobenzene
IS 3 = Chlorobenzene-D5
IS 4 = 1,4-Dichlorobenzene-d4
IS 5 = Tert Butyl Alcohol-D9

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

Volatile Internal Standard Area Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSV1495-CC1479	Injection Date:	07/27/15
Lab File ID:	V41382.D	Injection Time:	09:59
Instrument ID:	GCMSV	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	992291	6.56	1503921	7.74	709061	11.08	723773	13.29	117205	3.53
Upper Limit [a]	1984582	7.06	3007842	8.24	1418122	11.58	1447546	13.79	234410	4.03
Lower Limit [b]	496146	6.06	751961	7.24	354531	10.58	361887	12.79	58603	3.03

Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSV1495-BSD	1038750	6.56	1584698	7.74	752963	11.08	770687	13.29	138167	3.53
MSV1496-MB	869077	6.56	1373210	7.74	635337	11.08	639427	13.29	115860	3.53
MSV1495-MB	869077	6.56	1373210	7.74	635337	11.08	639427	13.29	115860	3.53
ZZZZZZ	878073	6.56	1412422	7.74	657793	11.08	644255	13.29	118576	3.53
ZZZZZZ	870663	6.56	1376003	7.74	639823	11.08	631900	13.29	110490	3.53
ZZZZZZ	830665	6.56	1374022	7.74	643914	11.08	633609	13.29	113567	3.53
ZZZZZZ	806291	6.55	1324872	7.74	622677	11.08	609133	13.29	106096	3.53
MC40028-12	820851	6.56	1397086	7.74	646002	11.08	630585	13.29	99502	3.53
ZZZZZZ	872533	6.56	1379320	7.75	648907	11.08	638129	13.29	118063	3.53
ZZZZZZ	807516	6.56	1325601	7.74	635640	11.08	620678	13.29	104274	3.52
ZZZZZZ	822051	6.56	1351051	7.74	634415	11.08	624879	13.29	113216	3.53
ZZZZZZ	791503	6.56	1323610	7.74	632803	11.08	620673	13.29	99846	3.53
ZZZZZZ	833667	6.56	1381531	7.75	663274	11.08	662988	13.29	148108	3.53
ZZZZZZ	843968	6.56	1421741	7.75	821599	11.08	711091	13.29	105471	3.53
ZZZZZZ	999692	6.56	1523242	7.74	713863	11.08	720435	13.29	123240	3.53
ZZZZZZ	940869	6.56	1486375	7.74	698139	11.08	693544	13.29	118441	3.52
ZZZZZZ	946633	6.55	1426600	7.74	667246	11.08	639565	13.29	111417	3.52
ZZZZZZ	848850	6.56	1379486	7.74	669774	11.08	671141	13.29	114567	3.53
ZZZZZZ	932634	6.56	1500596	7.74	696516	11.08	676957	13.29	169614	3.53
ZZZZZZ	922926	6.56	1480715	7.74	689070	11.08	662272	13.29	122990	3.53
ZZZZZZ	930269	6.56	1465861	7.74	676284	11.08	657505	13.29	132888	3.53
ZZZZZZ	940737	6.56	1500006	7.74	688379	11.08	668414	13.29	130448	3.53
ZZZZZZ	894242	6.56	1452045	7.74	661824	11.08	634183	13.29	118893	3.53
ZZZZZZ	856105	6.56	1405471	7.74	658217	11.08	654059	13.29	128527	3.53
ZZZZZZ	900159	6.56	1481661	7.74	686650	11.08	657684	13.29	126482	3.53
ZZZZZZ	879866	6.56	1440473	7.74	679028	11.08	677345	13.29	122110	3.53
ZZZZZZ	822578	6.56	1362665	7.74	634195	11.08	612593	13.29	117099	3.52
ZZZZZZ	811593	6.56	1346750	7.74	645635	11.08	629768	13.29	121361	3.53
ZZZZZZ	857896	6.56	1419794	7.75	668270	11.08	638362	13.29	125024	3.54
ZZZZZZ	800111	6.56	1331247	7.74	641542	11.08	630260	13.29	116518	3.53
ZZZZZZ	839640	6.56	1391347	7.74	659427	11.08	632105	13.29	118560	3.54
ZZZZZZ	843226	6.56	1391234	7.74	672031	11.08	664694	13.29	127319	3.54
ZZZZZZ	818096	6.56	1349293	7.74	641386	11.08	610394	13.29	113986	3.53
ZZZZZZ	805023	6.56	1332835	7.74	646014	11.08	622197	13.29	123525	3.54
ZZZZZZ	830299	6.56	1396442	7.74	659940	11.08	630685	13.29	119057	3.53

6.3.5

Volatile Internal Standard Area Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSV1495-CC1479	Injection Date:	07/27/15
Lab File ID:	V41382.D	Injection Time:	09:59
Instrument ID:	GCMSV	Method:	SW846 8260C

Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
ZZZZZZ	797816	6.56	1312256	7.74	637617	11.08	619460	13.29	121500	3.53
ZZZZZZ	821919	6.56	1382404	7.75	654097	11.08	619601	13.29	116857	3.54
ZZZZZZ	811406	6.56	1376849	7.75	660096	11.08	637179	13.29	128580	3.54
ZZZZZZ	807214	6.56	1340963	7.75	635789	11.08	606506	13.29	105059	3.53
ZZZZZZ	834237	6.56	1400325	7.75	655445	11.08	629404	13.29	125988	3.53
ZZZZZZ	793115	6.56	1321040	7.74	632427	11.08	599014	13.29	101618	3.53

IS 1 = Pentafluorobenzene
IS 2 = 1,4-Difluorobenzene
IS 3 = Chlorobenzene-D5
IS 4 = 1,4-Dichlorobenzene-d4
IS 5 = Tert Butyl Alcohol-D9

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

6.3.5

Volatile Surrogate Recovery Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8260C Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC40028-1	L92920.D	116	99	105
MC40028-3	L92930.D	103	101	100
MC40028-4	L92944A.D	110	101	102
MC40028-5	L92945.D	113	100	102
MC40028-6	L93002.D	108	101	102
MC40028-6	L92946A.D	95	98	99
MC40028-7	L92921.D	122	102	105
MC40028-9	L93003.D	109	98	103
MC40028-10	L93033.D	109	98	107
MC40028-11	L92933.D	117	97	104
MC40028-12	V41391.D	116	102	99
MC40028-12	L92935.D	118	91	104
MSL4087-BS	L92915.D	109	99	98
MSL4087-BSD	L92916.D	108	98	100
MSL4087-MB	L92918.D	114	99	104
MSL4088-BS	L92940.D	111	97	96
MSL4088-BSD	L92941.D	113	99	97
MSL4088-MB	L92943A.D	117	99	103
MSL4090-BS	L92991.D	111	99	99
MSL4090-BSD	L92992.D	109	99	99
MSL4090-MB	L92994.D	114	99	105
MSL4091-BS	L93017.D	110	100	99
MSL4091-BSD	L93018.D	111	99	99
MSL4091-MB	L93020.D	115	99	105
MSV1495-BS	V41382.D	100	104	101
MSV1495-BSD	V41383.D	101	104	101
MSV1495-MB	V41385.D	107	102	99

Surrogate Compounds	Recovery Limits
S1 = Dibromofluoromethane	72-133%
S2 = Toluene-D8	85-114%
S3 = 4-Bromofluorobenzene	70-134%

6.4.1

New England ACCUTEST LABORATORIES

GC/MS Semi-volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43842-MB	F81791.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542

The QC reported here applies to the following samples: Method: SW846 8270D

MC40028-3, MC40028-4, MC40028-5, MC40028-6, MC40028-9, MC40028-10, MC40028-11, MC40028-12

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.5	ug/l	
95-57-8	2-Chlorophenol	ND	5.0	0.29	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.37	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.28	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.50	ug/l	
51-28-5	2,4-Dinitrophenol	ND	20	2.5	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	1.9	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.47	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.41	ug/l	
100-02-7	4-Nitrophenol	ND	20	2.5	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.30	ug/l	
108-95-2	Phenol	ND	5.0	0.25	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.34	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.30	ug/l	
62-53-3	Aniline	ND	10	2.5	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.0	0.82	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.0	0.21	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.51	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.0	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.54	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.0	0.24	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.0	0.42	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.0	0.24	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.0	0.21	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.0	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.0	0.37	ug/l	
132-64-9	Dibenzofuran	ND	2.0	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.0	0.37	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.0	0.72	ug/l	
84-66-2	Diethyl phthalate	ND	5.0	0.57	ug/l	
131-11-3	Dimethyl phthalate	ND	5.0	0.27	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.0	0.30	ug/l	
118-74-1	Hexachlorobenzene	ND	5.0	0.77	ug/l	

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43842-MB	F81791.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542

The QC reported here applies to the following samples: Method: SW846 8270D

MC40028-3, MC40028-4, MC40028-5, MC40028-6, MC40028-9, MC40028-10, MC40028-11, MC40028-12

CAS No.	Compound	Result	RL	MDL	Units	Q
77-47-4	Hexachlorocyclopentadiene	ND	10	1.3	ug/l	
67-72-1	Hexachloroethane	ND	5.0	0.29	ug/l	
78-59-1	Isophorone	ND	5.0	0.23	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.6	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.1	ug/l	
98-95-3	Nitrobenzene	ND	5.0	0.26	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.0	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.0	0.52	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.0	0.77	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries		Limits
367-12-4	2-Fluorophenol	53%	10-80%
4165-62-2	Phenol-d5	36%	10-72%
118-79-6	2,4,6-Tribromophenol	81%	42-134%
4165-60-0	Nitrobenzene-d5	84%	25-117%
321-60-8	2-Fluorobiphenyl	74%	24-112%
1718-51-0	Terphenyl-d14	103%	48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43843-MB	I96979.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC40028-3, MC40028-4, MC40028-5, MC40028-6, MC40028-9, MC40028-10, MC40028-11, MC40028-12

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.10	0.0075	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0084	ug/l	
120-12-7	Anthracene	ND	0.10	0.0098	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.050	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.015	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.050	0.019	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.013	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0074	ug/l	
86-73-7	Fluorene	ND	0.10	0.015	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.020	ug/l	
90-12-0	1-Methylnaphthalene	0.032	2.0	0.012	ug/l	J
91-57-6	2-Methylnaphthalene	0.085	2.0	0.011	ug/l	J
85-01-8	Phenanthrene	0.015	0.050	0.011	ug/l	J
129-00-0	Pyrene	ND	0.10	0.0085	ug/l	

CAS No.	Surrogate Recoveries		Limits
4165-60-0	Nitrobenzene-d5	82%	26-121%
321-60-8	2-Fluorobiphenyl	71%	28-107%
1718-51-0	Terphenyl-d14	100%	29-129%

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43842-BS	F81792.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
OP43842-BSD	F81793.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542

The QC reported here applies to the following samples: Method: SW846 8270D

MC40028-3, MC40028-4, MC40028-5, MC40028-6, MC40028-9, MC40028-10, MC40028-11, MC40028-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
65-85-0	Benzoic Acid	50	23.0	46	22.1	44	4	10-70/20
95-57-8	2-Chlorophenol	50	38.3	77	35.7	71	7	39-100/20
59-50-7	4-Chloro-3-methyl phenol	50	42.3	85	39.9	80	6	43-112/20
120-83-2	2,4-Dichlorophenol	50	41.4	83	38.4	77	8	44-113/20
105-67-9	2,4-Dimethylphenol	50	38.3	77	38.0	76	1	21-108/20
51-28-5	2,4-Dinitrophenol	50	41.5	83	40.2	80	3	22-128/20
534-52-1	4,6-Dinitro-o-cresol	50	44.0	88	41.2	82	7	42-132/20
95-48-7	2-Methylphenol	50	36.4	73	34.3	69	6	34-91/20
	3&4-Methylphenol	100	72.6	73	68.1	68	6	31-90/20
88-75-5	2-Nitrophenol	50	43.3	87	40.7	81	6	40-118/20
100-02-7	4-Nitrophenol	50	25.1	50	23.5	47	7	10-71/20
87-86-5	Pentachlorophenol	50	33.9	68	32.4	65	5	33-123/20
108-95-2	Phenol	50	19.9	40	18.7	37	6	11-57/20
95-95-4	2,4,5-Trichlorophenol	50	44.3	89	41.2	82	7	50-122/20
88-06-2	2,4,6-Trichlorophenol	50	43.1	86	40.5	81	6	48-118/20
62-53-3	Aniline	50	27.5	55	33.0	66	18	18-90/20
101-55-3	4-Bromophenyl phenyl ether	50	49.4	99	46.4	93	6	55-126/20
85-68-7	Butyl benzyl phthalate	50	51.6	103	50.2	100	3	56-124/20
100-51-6	Benzyl Alcohol	50	41.1	82	38.4	77	7	13-106/20
91-58-7	2-Chloronaphthalene	50	51.2	102	49.8	100	3	45-123/20
106-47-8	4-Chloroaniline	50	42.9	86	41.9	84	2	35-111/20
111-91-1	bis(2-Chloroethoxy)methane	50	46.4	93	45.5	91	2	41-117/20
111-44-4	bis(2-Chloroethyl)ether	50	45.2	90	42.9	86	5	31-114/20
108-60-1	bis(2-Chloroisopropyl)ether	50	57.3	115	55.0	110	4	33-135/20
7005-72-3	4-Chlorophenyl phenyl ether	50	48.3	97	46.5	93	4	52-124/20
122-66-7	1,2-Diphenylhydrazine	50	57.1	114	53.2	106	7	45-119/20
121-14-2	2,4-Dinitrotoluene	50	47.4	95	46.6	93	2	52-128/20
606-20-2	2,6-Dinitrotoluene	50	48.0	96	46.3	93	4	50-126/20
91-94-1	3,3'-Dichlorobenzidine	50	42.9	86	42.9	86	0	46-134/20
132-64-9	Dibenzofuran	50	46.9	94	44.6	89	5	51-118/20
84-74-2	Di-n-butyl phthalate	50	51.6	103	48.7	97	6	57-120/20
117-84-0	Di-n-octyl phthalate	50	58.3	117	54.7	109	6	58-125/20
84-66-2	Diethyl phthalate	50	49.6	99	48.4	97	2	40-125/20
131-11-3	Dimethyl phthalate	50	48.5	97	47.6	95	2	10-145/20
117-81-7	bis(2-Ethylhexyl)phthalate	50	53.2	106	52.1	104	2	60-126/20
118-74-1	Hexachlorobenzene	50	46.0	92	42.8	86	7	53-127/20

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43842-BS	F81792.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
OP43842-BSD	F81793.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542

The QC reported here applies to the following samples: Method: SW846 8270D

MC40028-3, MC40028-4, MC40028-5, MC40028-6, MC40028-9, MC40028-10, MC40028-11, MC40028-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
77-47-4	Hexachlorocyclopentadiene	50	27.9	56	27.2	54	3	10-75/20
67-72-1	Hexachloroethane	50	44.0	88	41.9	84	5	15-98/20
78-59-1	Isophorone	50	47.2	94	45.6	91	3	36-106/20
88-74-4	2-Nitroaniline	50	50.4	101	48.8	98	3	52-130/20
99-09-2	3-Nitroaniline	50	47.4	95	45.4	91	4	47-120/20
100-01-6	4-Nitroaniline	50	47.3	95	46.8	94	1	51-121/20
98-95-3	Nitrobenzene	50	47.4	95	45.7	91	4	27-120/20
62-75-9	n-Nitrosodimethylamine	50	35.4	71	35.0	70	1	10-87/20
621-64-7	N-Nitroso-di-n-propylamine	50	51.5	103	48.3	97	6	37-123/20
86-30-6	N-Nitrosodiphenylamine	50	47.3	95	44.3	89	7	50-112/20
110-86-1	Pyridine	50	10.9	22	24.3	49	76* a	10-72/20

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
367-12-4	2-Fluorophenol	49%	48%	10-80%
4165-62-2	Phenol-d5	37%	35%	10-72%
118-79-6	2,4,6-Tribromophenol	82%	78%	42-134%
4165-60-0	Nitrobenzene-d5	86%	85%	25-117%
321-60-8	2-Fluorobiphenyl	77%	76%	24-112%
1718-51-0	Terphenyl-d14	92%	92%	48-133%

(a) Outside control limits. Individual spike recoveries within acceptance limits.

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43843-BS	I96980.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
OP43843-BSD	I96981.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC40028-3, MC40028-4, MC40028-5, MC40028-6, MC40028-9, MC40028-10, MC40028-11, MC40028-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
83-32-9	Acenaphthene	50	42.9	86	41.8	84	3	45-116/30
208-96-8	Acenaphthylene	50	40.8	82	39.5	79	3	34-110/30
120-12-7	Anthracene	50	45.0	90	43.5	87	3	50-117/30
56-55-3	Benzo(a)anthracene	50	44.4	89	43.3	87	3	55-139/30
50-32-8	Benzo(a)pyrene	50	51.9	104	48.7	97	6	48-131/30
205-99-2	Benzo(b)fluoranthene	50	51.7	103	48.0	96	7	49-141/30
191-24-2	Benzo(g,h,i)perylene	50	51.1	102	49.6	99	3	60-130/30
207-08-9	Benzo(k)fluoranthene	50	50.0	100	46.9	94	6	49-133/30
218-01-9	Chrysene	50	44.0	88	39.8	80	10	52-128/30
53-70-3	Dibenzo(a,h)anthracene	50	51.3	103	50.5	101	2	60-136/30
206-44-0	Fluoranthene	50	44.3	89	46.2	92	4	46-132/30
86-73-7	Fluorene	50	41.5	83	43.1	86	4	53-120/30
193-39-5	Indeno(1,2,3-cd)pyrene	50	50.4	101	49.1	98	3	57-134/30
90-12-0	1-Methylnaphthalene	50	39.8	80	39.0	78	2	41-105/30
91-57-6	2-Methylnaphthalene	50	43.7	87	42.8	86	2	36-111/30
85-01-8	Phenanthrene	50	42.8	86	40.9	82	5	50-120/30
129-00-0	Pyrene	50	43.5	87	44.8	90	3	48-127/30

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
4165-60-0	Nitrobenzene-d5	84%	71%	26-121%
321-60-8	2-Fluorobiphenyl	72%	77%	28-107%
1718-51-0	Terphenyl-d14	94%	102%	29-129%

* = Outside of Control Limits.

Semivolatile Internal Standard Area Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSF3542-CC3514	Injection Date:	07/27/15
Lab File ID:	F81790.D	Injection Time:	08:26
Instrument ID:	GCMSF	Method:	SW846 8270D

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
Check Std	26403	3.28	95019	4.31	54475	5.81	93075	7.06	103952	9.38	88393	10.88
Upper Limit [a]	52806	3.78	190038	4.81	108950	6.31	186150	7.56	207904	9.88	176786	11.38
Lower Limit [b]	13202	2.78	47510	3.81	27238	5.31	46538	6.56	51976	8.88	44197	10.38
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43842-MB	26262	3.28	96606	4.31	55539	5.80	99017	7.05	103440	9.38	92672	10.87
OP43842-BS	28177	3.28	104632	4.31	59651	5.81	100734	7.06	116589	9.38	100292	10.88
OP43842-BSD	26120	3.28	94943	4.31	54286	5.80	94684	7.06	105097	9.38	93309	10.88
MC40028-3	28406	3.28	105044	4.31	62097	5.81	109132	7.06	116121	9.38	107310	10.87
MC40028-4	28617	3.28	105563	4.31	61165	5.81	105618	7.05	114596	9.38	104496	10.88
MC40028-5	25465	3.28	96308	4.31	56643	5.81	100278	7.06	107477	9.38	99480	10.88
MC40028-6	25764	3.28	96412	4.31	55432	5.80	94960	7.05	101904	9.38	95484	10.88
MC40028-9	35408	3.28	137370	4.32	86528	5.81	125599	7.07	128085	9.39	121268	10.89
MC40028-10	29428	3.28	105071	4.31	62159	5.80	109793	7.05	118977	9.38	111880	10.88
MC40028-11	28950	3.28	108681	4.31	62626	5.81	104884	7.06	109991	9.38	103896	10.88
MC40028-12	35176	3.28	132292	4.31	76508	5.80	130237	7.06	115189	9.38	110072	10.88
ZZZZZZ	28266	3.28	103746	4.31	58816	5.80	109828	7.06	122501	9.38	113642	10.88
ZZZZZZ	26902	3.28	95883	4.31	55546	5.80	99423	7.06	107203	9.38	98421	10.88
ZZZZZZ	25988	3.28	95657	4.31	55269	5.81	101253	7.06	111639	9.38	105628	10.88
ZZZZZZ	32032	3.29	119003	4.31	65898	5.81	110424	7.06	112217	9.39	105766	10.88
ZZZZZZ	25456	3.28	94393	4.31	55406	5.81	96573	7.06	106846	9.38	103319	10.88
OP43935-MB	36523	3.28	128788	4.31	74973	5.80	132372	7.06	131037	9.38	117976	10.88
OP43935-BS	37604	3.28	138049	4.31	81476	5.81	137039	7.06	146662	9.39	121994	10.88
OP43935-MS	45165	3.28	151986	4.31	82508	5.81	130803	7.06	137806	9.39	151900	10.89
OP43935-MSD	51232	3.28	172915	4.31	91791	5.81	145683	7.06	142656	9.39	145799	10.89
ZZZZZZ	47917	3.28	161460	4.31	91926	5.81	135371	7.06	154780	9.39	141751	10.90
ZZZZZZ	39698	3.28	141937	4.31	79458	5.81	120514	7.06	125232	9.39	132988	10.89
ZZZZZZ	44859	3.28	162078	4.31	90236	5.81	147069	7.06	134828	9.39	133862	10.89
ZZZZZZ	44685	3.28	162008	4.31	92791	5.81	149576	7.06	140225	9.39	151110	10.89
ZZZZZZ	41606	3.28	147919	4.31	84744	5.81	136615	7.06	143062	9.39	143603	10.88
ZZZZZZ	39778	3.28	141881	4.31	81053	5.81	129444	7.06	131557	9.39	142050	10.89

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.

7.3.1

7

Semivolatile Internal Standard Area Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSF3542-CC3514	Injection Date:	07/27/15
Lab File ID:	F81790.D	Injection Time:	08:26
Instrument ID:	GCMSF	Method:	SW846 8270D

Lab Sample ID	IS 1 AREA	IS 1 RT	IS 2 AREA	IS 2 RT	IS 3 AREA	IS 3 RT	IS 4 AREA	IS 4 RT	IS 5 AREA	IS 5 RT	IS 6 AREA	IS 6 RT

(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

7.3.1

7

Semivolatile Internal Standard Area Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSF3543-CC3514	Injection Date:	07/28/15
Lab File ID:	F81820.D	Injection Time:	08:15
Instrument ID:	GCMSF	Method:	SW846 8270D

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
Check Std	25526	3.28	93409	4.31	54952	5.81	98964	7.06	108583	9.39	102318	10.88
Upper Limit [a]	51052	3.78	186818	4.81	109904	6.31	197928	7.56	217166	9.89	204636	11.38
Lower Limit [b]	12763	2.78	46705	3.81	27476	5.31	49482	6.56	54292	8.89	51159	10.38

Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43957-MB	35663	3.28	127928	4.31	73751	5.80	129022	7.06	135359	9.39	126361	10.88
OP43957-BS	36262	3.28	132305	4.31	75466	5.81	129193	7.06	147841	9.39	128762	10.89
OP43957-MS	36596	3.28	133847	4.31	76683	5.81	130122	7.06	139132	9.39	119301	10.88
OP43957-MSD	38673	3.28	138275	4.31	80259	5.81	133898	7.06	141436	9.39	118843	10.89
MC40262-1	37279	3.28	134795	4.31	77009	5.81	132192	7.06	135434	9.39	117107	10.89
ZZZZZZ	39214	3.28	139605	4.31	80177	5.81	131270	7.06	140097	9.39	121856	10.88
ZZZZZZ	39391	3.28	145901	4.31	83646	5.81	138352	7.06	137212	9.39	132031	10.89
ZZZZZZ	39330	3.28	141275	4.31	81189	5.80	138501	7.06	134346	9.39	118223	10.89
ZZZZZZ	34761	3.28	126682	4.31	72931	5.81	125300	7.06	124060	9.39	110137	10.88
ZZZZZZ	38562	3.28	138415	4.31	79344	5.80	136482	7.06	134750	9.39	118146	10.88
ZZZZZZ	41387	3.28	149350	4.31	87689	5.81	146308	7.06	147228	9.39	136513	10.89
OP43952-MB	34174	3.28	123222	4.31	71507	5.81	121280	7.06	120455	9.39	107951	10.88
OP43952-BS	35180	3.28	126423	4.31	72157	5.81	122005	7.06	125583	9.39	109256	10.89
MC40028-11	27141	3.28	102121	4.31	60904	5.81	106064	7.06	119543	9.39	116381	10.88
OP43952-MS	38535	3.28	141919	4.31	82373	5.81	135666	7.06	131871	9.39	119488	10.89
MC40148-1	50688	3.28	179178	4.31	103545	5.81	172147	7.06	168409	9.39	172896	10.89
OP43952-MSD	40047	3.28	145354	4.31	85120	5.81	136518	7.06	132091	9.39	125205	10.89
MC40163-3	41292	3.28	151258	4.31	88235	5.81	145270	7.06	138370	9.39	131039	10.89
ZZZZZZ	37047	3.28	139219	4.31	80580	5.81	128322	7.06	118439	9.39	111778	10.89
ZZZZZZ	38198	3.28	139906	4.31	82936	5.81	133717	7.06	128813	9.39	121566	10.88
ZZZZZZ	34807	3.28	124764	4.31	72299	5.81	119629	7.06	119275	9.39	124099	10.89
ZZZZZZ	39256	3.28	141490	4.31	80746	5.81	132676	7.06	140735	9.39	143493	10.89
ZZZZZZ	35662	3.28	127110	4.31	73021	5.81	118977	7.06	124006	9.39	129253	10.89
ZZZZZZ	37247	3.28	131710	4.31	75765	5.81	125650	7.06	132890	9.39	135822	10.89
ZZZZZZ	40513	3.28	144982	4.31	80959	5.81	133904	7.06	136993	9.39	139916	10.89

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

Semivolatile Internal Standard Area Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSI3628-CC3621	Injection Date:	07/27/15
Lab File ID:	I96971.D	Injection Time:	08:18
Instrument ID:	GCMSI	Method:	SW846 8270D BY SIM

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
Check Std	306775	3.70	663769	4.74	291696	6.26	507638	7.59	541985	10.57	1355256	12.24
Upper Limit [a]	613550	4.20	1327538	5.24	583392	6.76	1015276	8.09	1083970	11.07	2710512	12.74
Lower Limit [b]	153388	3.20	331885	4.24	145848	5.76	253819	7.09	270993	10.07	677628	11.74
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43923-MB	325754	3.70	683372	4.74	326257	6.26	523166	7.58	557204	10.57	1549418	12.24
OP43923-BS	304534	3.70	641332	4.74	308253	6.26	514103	7.59	558383	10.58	1401765	12.24
OP43923-BSD	319012	3.70	703642	4.74	322010	6.26	548083	7.59	582333	10.58	1480001	12.24
ZZZZZZ	285985	3.70	636730	4.74	329334	6.26	503371	7.59	555866	10.58	1493646	12.24
ZZZZZZ	311554	3.70	665745	4.74	296981	6.25	523373	7.58	541504	10.57	1394568	12.24
ZZZZZZ	329407	3.70	692598	4.74	329216	6.25	529466	7.59	569866	10.58	1458851	12.24
ZZZZZZ	315192	3.70	665393	4.74	286563	6.25	494411	7.59	536206	10.58	1265618	12.24
OP43843-MB	272790	3.70	556719	4.74	286860	6.25	474289	7.59	463440	10.57	1231413	12.24
OP43843-BS	270409	3.70	675258	4.74	310577	6.26	518535	7.59	548649	10.58	1397505	12.24
OP43843-BSD	247920	3.70	625843	4.74	262863	6.26	474615	7.59	462980	10.58	1283050	12.24
MC40028-3	289029	3.70	636655	4.74	302241	6.26	481401	7.59	541352	10.57	1350382	12.24
MC40028-4	281266	3.70	564066	4.74	271431	6.25	539220	7.58	567117	10.57	1477607	12.24
MC40028-5	278558	3.70	544659	4.74	254460	6.26	449680	7.59	464618	10.58	1082903	12.24
MC40028-6	255466	3.70	514921	4.74	247560	6.26	445885	7.59	412535	10.58	1252730	12.24
MC40028-9	282916	3.70	684339	4.75	397141	6.27	474936	7.60	478696	10.60	1355454	12.26
MC40028-10	255845	3.70	617623	4.74	296830	6.26	462267	7.59	534669	10.58	1320211	12.24
MC40028-11	243739	3.70	597972	4.74	262415	6.26	430129	7.59	436968	10.58	1052382	12.24
MC40028-12	314555	3.70	694270	4.74	336274	6.26	536389	7.59	535581	10.58	1299059	12.24
ZZZZZZ	250672	3.70	560096	4.74	263711	6.26	494857	7.59	488689	10.58	1046523	12.24
ZZZZZZ	272847	3.70	565993	4.74	253305	6.26	403091	7.59	405207	10.58	994297	12.24
ZZZZZZ	229749	3.70	539540	4.74	241280	6.26	391079	7.59	501188	10.58	1286099	12.24
ZZZZZZ	254937	3.70	603902	4.74	270830	6.26	427591	7.59	515130	10.58	1078687	12.24
ZZZZZZ	218158	3.70	493903	4.74	248659	6.26	408152	7.59	374520	10.58	944323	12.24

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

7.3.3

Semivolatile Surrogate Recovery Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3	S4	S5	S6
MC40028-3	F81794.D	45	30	82	83	74	96
MC40028-4	F81795.D	44	29	80	83	67	94
MC40028-5	F81796.D	40	27	79	74	61	98
MC40028-6	F81797.D	49	33	82	86	67	93
MC40028-9	F81798.D	50	28	83	80	65	95
MC40028-10	F81799.D	34	23	73	63	56	88
MC40028-11	F81836.D	45	31	70	80	64	84
MC40028-11	F81800.D	46	31	75	79	65	91
MC40028-12	F81801.D	49	34	82	87	74	112
OP43842-BS	F81792.D	49	37	82	86	77	92
OP43842-BSD	F81793.D	48	35	78	85	76	92
OP43842-MB	F81791.D	53	36	81	84	74	103

Surrogate Compounds	Recovery Limits
S1 = 2-Fluorophenol	10-80%
S2 = Phenol-d5	10-72%
S3 = 2,4,6-Tribromophenol	42-134%
S4 = Nitrobenzene-d5	25-117%
S5 = 2-Fluorobiphenyl	24-112%
S6 = Terphenyl-d14	48-133%

Semivolatile Surrogate Recovery Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D BY SIM Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC40028-3	I96982.D	77	66	91
MC40028-4	I96983.D	82	65	92
MC40028-5	I96984.D	70	56	95
MC40028-6	I96985.D	77	61	105
MC40028-9	I96986.D	67	49	114
MC40028-10	I96987.D	64	49	73
MC40028-11	I96988.D	65	60	87
MC40028-12	I96989.D	82	69	99
OP43843-BS	I96980.D	84	72	94
OP43843-BSD	I96981.D	71	77	102
OP43843-MB	I96979.D	82	71	100

Surrogate Compounds	Recovery Limits
S1 = Nitrobenzene-d5	26-121%
S2 = 2-Fluorobiphenyl	28-107%
S3 = Terphenyl-d14	29-129%

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GC Volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Surrogate Recovery Summaries
- GC Surrogate Retention Time Summaries

Method Blank Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43937-MB	BB63905.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462

The QC reported here applies to the following samples: Method: SW846 8011

MC40028-2, MC40028-3, MC40028-4, MC40028-5, MC40028-6, MC40028-8, MC40028-9, MC40028-10, MC40028-11, MC40028-12

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.015	0.0061	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.015	0.0061	ug/l	

CAS No.	Surrogate Recoveries		Limits
460-00-4	Bromofluorobenzene (S)	108%	60-140%
460-00-4	Bromofluorobenzene (S)	111%	60-140%

8.1.1

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43937-BS	BB63906.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
OP43937-BSD	BB63907.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462

The QC reported here applies to the following samples: Method: SW846 8011

MC40028-2, MC40028-3, MC40028-4, MC40028-5, MC40028-6, MC40028-8, MC40028-9, MC40028-10, MC40028-11, MC40028-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
96-12-8	1,2-Dibromo-3-chloropropane	0.071	0.076	107	0.081	114	6	45-149/30
106-93-4	1,2-Dibromoethane	0.071	0.078	110	0.085	120	9	51-149/30

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
460-00-4	Bromofluorobenzene (S)	114%	110%	60-140%
460-00-4	Bromofluorobenzene (S)	112%	105%	60-140%

* = Outside of Control Limits.

Volatile Surrogate Recovery Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8011 Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1 [a]	S1 [b]
MC40028-2	BB63908.D	107	109
MC40028-3	BB63909.D	105	141* [c]
MC40028-4	BB63910.D	122	149* [c]
MC40028-5	BB63911.D	102	137
MC40028-6	BB63912.D	109	148* [c]
MC40028-8	BB63913.D	105	110
MC40028-9	BB63914.D	99	156* [c]
MC40028-10	BB63916.D	111	106
MC40028-11	BB63917.D	96	184* [c]
MC40028-12	BB63918.D	106	144* [c]
OP43937-BS	BB63906.D	114	112
OP43937-BSD	BB63907.D	110	105
OP43937-MB	BB63905.D	108	111

Surrogate Compounds	Recovery Limits
S1 = Bromofluorobenzene (S)	60-140%

(a) Recovery from GC signal #2
(b) Recovery from GC signal #1
(c) Outside control limits.Sample non-detect for target analytes.

8.3.1

GC Surrogate Retention Time Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3462-ICC3462	Injection Date:	07/27/15
Lab File ID:	BB63901.D	Injection Time:	11:33
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	6.30	7.29

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
OP43937-MB	BB63905.D	07/27/15	13:26	6.31	7.29
OP43937-BS	BB63906.D	07/27/15	13:55	6.30	7.28
OP43937-BSD	BB63907.D	07/27/15	14:23	6.30	7.28
MC40028-2	BB63908.D	07/27/15	14:52	6.31	7.29
MC40028-3	BB63909.D	07/27/15	15:21	6.30	7.28
MC40028-4	BB63910.D	07/27/15	15:49	6.30	7.28
MC40028-5	BB63911.D	07/27/15	16:17	6.30	7.28
MC40028-6	BB63912.D	07/27/15	16:46	6.30	7.27
MC40028-8	BB63913.D	07/27/15	17:14	6.31	7.29
MC40028-9	BB63914.D	07/27/15	17:43	6.29	7.27

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

GC Surrogate Retention Time Summary

Job Number: MC40028
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3462-CC3462	Injection Date:	07/27/15
Lab File ID:	BB63915.D	Injection Time:	18:11
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	6.31	7.29

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
MC40028-10	BB63916.D	07/27/15	18:40	6.31	7.28
MC40028-11	BB63917.D	07/27/15	19:08	6.30	7.28
MC40028-12	BB63918.D	07/27/15	19:36	6.31	7.28
ZZZZZZ	BB63919.D	07/27/15	20:04	6.31	7.29
ZZZZZZ	BB63920.D	07/27/15	20:32	6.30	7.28
ZZZZZZ	BB63921.D	07/27/15	21:00	6.31	7.29
ZZZZZZ	BB63922.D	07/27/15	21:28	6.31	7.29
ZZZZZZ	BB63923.D	07/27/15	21:56	6.31	7.29
ZZZZZZ	BB63924.D	07/27/15	22:23	6.30	7.27
ZZZZZZ	BB63925.D	07/27/15	22:51	6.31	7.28
GBB3462-ECC3462	BB63926.D	07/27/15	23:19	6.31	7.29

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

8.4.2

Roxana Groundwater Quarterly – 3rd Quarter 2015 Data Review

Laboratory SDG: MC40029

Data Reviewer: Elizabeth Kunkel

Peer Reviewer: Steve Gragert

Date Reviewed: 8/19/2015

Guidance: USEPA National Functional Guidelines for Superfund Organic Methods Data Review 2014

Sample Identification	Sample Identification
TB-ROX-071415-HCL-A	TB-ROX-071415-ST-A
MW6D-ROX-071415	MW6C-ROX-071415
MW6B-ROX-071415	TB-ROX-071415-HCL-B
TB-ROX-071415-ST-B	P58-ROX-071415
MW4-ROX-071415	

1.0 Data Package Completeness

Were all items delivered as specified in the QAPP and COC as appropriate?

Yes. AECOM cancelled all analyses for equipment blank MW-6B-ROX-071415-EB. The equipment blank was not associated with the samples collected in this SDG. Please see SDG MC40064 laboratory report for equipment blank results collected 7/15/2015.

2.0 Laboratory Case Narrative \ Cooler Receipt Form

Were problems noted in the laboratory case narrative or cooler receipt form?

Yes, the laboratory case narrative indicated the SVOC LCS/LCSD RPD for pyridine was outside evaluation criteria. The surrogate bromofluorobenzene was outside criteria for Method 8011 VOCs. PAHs were detected in the method blank. These issues are addressed further in the appropriate sections below.

Additionally, initial calibration verifications exceeded 30 percent difference (%D) for VOC compounds acetone, carbon disulfide, 2-butanone, and 2-hexanone. The continuing calibration verification exceeded 40%D for the VOC compound, acrolein. The continuing calibration verification exceeded 15%D for VOC compound 1,2-dibromo-3-chloropropane signal #1; 1,2-dibromo-3-chloropropane was reported from signal #2. No qualification of data was required.

The cooler receipt form indicated two of two coolers were received by the laboratory at temperatures of 1.8°C and 0.8°C, which are outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

3.0 Holding Times

Were samples extracted/analyzed within applicable limits?

Yes

4.0 Blank Contamination

Were any analytes detected in the Method Blanks, Field Blanks or Trip Blanks?

Yes

Blank ID	Parameter	Analyte	Concentration/ Amount
OP43843-MB	PAHs	1-Methylnaphthalene	0.032 µg/L
OP43843-MB	PAHs	2-Methylnaphthalene	0.085 µg/L
OP43843-MB	PAHs	Phenanthrene	0.015 µg/L

Analytical data that were reported non-detect or at concentrations greater than five times (5X) the associated blank concentration did not require qualification. Please see section 12.0 of this review for additional qualifications regarding samples associated with PAHs in method blank OP43843-MB.

5.0 Laboratory Control Sample

Were LCS recoveries within evaluation criteria?

No

LCS/LCSD ID	Parameter	Analyte	LCS/LCSD Recovery	RPD	LCS/LCSD/ RPD Criteria
OP43842-BS/BSD	SVOCs	Pyridine	22/49	**76**	10-72/20

Analytical data reported as non-detect and associated with LCS/LCSD relative percent deviation (RPD) above upper acceptance limit does not require qualification. No qualification of data was required.

6.0 Surrogate Recoveries

Were surrogate recoveries within evaluation criteria?

No

Sample ID	Parameter	Surrogate	Recovery (%)	Criteria (%)
P58-ROX-071415	Method 8011 VOCs	Bromofluorobenzene	**164**	60-140

Analytical data reported as non-detect and associated with surrogate recoveries above evaluation criteria, indicating a possible high bias, did not require qualification. No qualification of data was required.

7.0 Matrix Spike and Matrix Spike Duplicate Recoveries

Were MS/MSD samples analyzed as part of this SDG?

No

8.0 Internal Standard (IS) Recoveries

Were internal standard area recoveries within evaluation criteria?

Yes

9.0 Laboratory Duplicate Results

Were laboratory duplicate samples analyzed as part of this SDG?

No

10.0 Field Duplicate Results

Were field duplicate samples collected as part of this SDG?

No

11.0 Sample Dilutions

For samples that were diluted and nondetect, were undiluted results also reported?

Not applicable; analytes were detected in sample requiring dilution.

12.0 Additional Qualifications

Were additional qualifications applied?

Yes, professional judgment was also used to qualify as estimated, however not reject, data that was associated with PAHs in method blank OP43843-MB, due to comparable historical detections.

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
MW6D-ROX-071415	PAHs	1-Methylnaphthalene	-	**J**
MW6D-ROX-071415	PAHs	2-Methylnaphthalene	-	**J**
MW6C-ROX-071415	PAHs	1-Methylnaphthalene	-	**J**
MW6C-ROX-071415	PAHs	2-Methylnaphthalene	-	**J**
MW6B-ROX-071415	PAHs	Phenanthrene	-	**J**
MW4-ROX-071415	PAHs	2-Methylnaphthalene	-	**J**

New England ACCUTEST LABORATORIES

07/29/15



Technical Report for

Shell Oil

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana,

60400249

Accutest Job Number: MC40029

Sampling Date: 07/14/15

Report to:

AECOM, INC.

elizabeth.kunkel@URS.com

ATTN: Elizabeth Kunkel

Total number of pages in report: **86**

Reviewed on 8/18/2015

Reza Tand
Lab Director

Test results contained within this data package meet the requirements of the National Environmental Laboratory Accreditation Program and/or state specific certification programs as applicable.

Client Service contact: Jeremy Vienneau 508-481-6200

Certifications: MA (M-MA136,SW846 NELAC) CT (PH-0109) NH (250210) RI (00071) ME (MA00136) FL (E87579) NY (11791) NJ (MA926) PA (6801121) ND (R-188) CO MN (11546AA) NC (653) IL (002337) WI (399080220) DoD ELAP (L-A-B L2235)

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Sample Summary

Shell Oil

Job No: MC40029

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Collected Date	Time By	Received	Matrix Code	Matrix Type	Client Sample ID
MC40029-1	07/14/15	00:00 SFES	07/15/15	AQ	Trip Blank Water	TB-ROX-071415-HCL-A
MC40029-2	07/14/15	00:00 SFES	07/15/15	AQ	Trip Blank Water	TB-ROX-071415-ST-A
MC40029-3	07/14/15	09:55 SFES	07/15/15	AQ	Ground Water	MW6D-ROX-071415
MC40029-4	07/14/15	10:45 SFES	07/15/15	AQ	Ground Water	MW6C-ROX-071415
MC40029-5	07/14/15	11:45 SFES	07/15/15	AQ	Ground Water	MW6B-ROX-071415
MC40029-6	07/14/15	00:00 SFES	07/15/15	AQ	Trip Blank Water	TB-ROX-071415-HCL-B
MC40029-7	07/14/15	00:00 SFES	07/15/15	AQ	Trip Blank Water	TB-ROX-071415-ST-B
MC40029-8	07/14/15	10:40 SFES	07/15/15	AQ	Ground Water	P58-ROX-071415
MC40029-9	07/14/15	14:30 SFES	07/15/15	AQ	Ground Water	MW4-ROX-071415
MC40029-10	07/14/15	14:30 SFES	07/15/15	AQ	Equipment Blank	MW-6B-ROX-071415-EB

ACCUTEST LABORATORIES

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SAMPLE DELIVERY GROUP CASE NARRATIVE

Client: Shell Oil **Job No** MC40029

Site: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Centra **Report Date** 7/28/2015 4:25:57 PM

5 Sample(s) and 4 Trip Blank were collected on 07/14/2015 and were received at Accutest on 07/15/2015 properly preserved, at 1.8 Deg. C and intact. These Samples received an Accutest job number of MC40029. A listing of the Laboratory Sample ID, Client Sample ID and dates of collection are presented in the Results Summary Section of this report. 1-Chlorohexane, Benzenethiol, Dibenz(a,h)acridine, Indene, and Quinoline were searched in the library search and reported only if detections were found.

Except as noted below, all method specified calibrations and quality control performance criteria were met for this job. For more information, please refer to QC summary pages.

Volatiles by GCMS By Method SW846 8260C

Matrix: AQ **Batch ID:** MSV1488

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- Initial calibration verification standard MSV1479-ICV1479 for acrolein, Acetone, carbon disulfide, 2-butanone, 2-hexanone exceeds 30% Difference (response bias high). Associated samples are non-detect for these compounds.
- Continuing calibration check standard MSV1488-CC1479 for acrolein exceeds 40% Difference (response bias high). Associated samples are non-detect for these compounds.

Extractables by GCMS By Method SW846 8270D

Matrix: AQ **Batch ID:** OP43842

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- RPD of OP43842-BSD for Pyridine: Outside control limits. Individual spike recoveries within acceptance limits.

Extractables by GCMS By Method SW846 8270D BY SIM

Matrix: AQ **Batch ID:** OP43843

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- Sample(s) MC40029-3, MC40029-4, MC40029-5, MC40029-9 have compound(s) reported with a "B" qualifier, indicating analyte is found in the associated method blank.

Volatiles by GC By Method SW846 8011

Matrix: AQ **Batch ID:** OP43937

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- All samples were analyzed within the recommended method holding time.
- MC40029-8 for Bromofluorobenzene (S): Outside control limits.Sample non-detect for target analytes.
- Continuing calibration check standard GBB3462-CC3462, file BB63915, BB63926, signal for 1,2-Dibromo-3-chloropropane exceed 15% Dev. 1,2-Dibromo-3-chloropropane is reported from signal #2.

The Accutest Laboratories of New England certifies that all analysis were performed within method specification. It is further recommended that this report to be used in its entirety.The Accutest Laboratories of NE, Laboratory Director or assignee as verified by the signature on the cover page has authorized the release of this report(MC40029).

Summary of Hits

Job Number: MC40029
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/14/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
MC40029-1	TB-ROX-071415-HCL-A					
No hits reported in this sample.						
MC40029-2	TB-ROX-071415-ST-A					
No hits reported in this sample.						
MC40029-3	MW6D-ROX-071415					
1-Methylnaphthalene		0.11 JB	2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.23 JB	2.2	0.012	ug/l	SW846 8270D BY SIM
MC40029-4	MW6C-ROX-071415					
Acenaphthene		0.027 J	0.11	0.0081	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.020 J	0.11	0.0090	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.064 JB	2.2	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.14 JB	2.2	0.012	ug/l	SW846 8270D BY SIM
MC40029-5	MW6B-ROX-071415					
Methyl Tert Butyl Ether		4.8	1.0	0.35	ug/l	SW846 8260C
Acenaphthene		0.12	0.11	0.0079	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.017 J	0.11	0.0088	ug/l	SW846 8270D BY SIM
Fluorene		0.13	0.11	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		3.6	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		6.8	2.1	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.045 JB	0.053	0.011	ug/l	SW846 8270D BY SIM
MC40029-6	TB-ROX-071415-HCL-B					
No hits reported in this sample.						
MC40029-7	TB-ROX-071415-ST-B					
No hits reported in this sample.						
MC40029-8	P58-ROX-071415					
Benzene		266000	500	270	ug/l	SW846 8260C
Ethylbenzene		457 J	1000	240	ug/l	SW846 8260C
Xylene (total)		285 J	1000	220	ug/l	SW846 8260C
3&4-Methylphenol		16.5	11	0.51	ug/l	SW846 8270D
Phenol		153	5.5	0.27	ug/l	SW846 8270D

Summary of Hits

Job Number: MC40029
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/14/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
Dibenzofuran		2.0 J	2.2	0.22	ug/l	SW846 8270D
Di-n-butyl phthalate		0.81 J	5.5	0.41	ug/l	SW846 8270D
Acenaphthene		0.59	0.11	0.0082	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.18	0.11	0.0092	ug/l	SW846 8270D BY SIM
Benzo(a)anthracene		0.087	0.055	0.026	ug/l	SW846 8270D BY SIM
Benzo(a)pyrene		0.074 J	0.11	0.017	ug/l	SW846 8270D BY SIM
Benzo(g,h,i)perylene		0.042 J	0.11	0.014	ug/l	SW846 8270D BY SIM
Chrysene		0.15	0.11	0.015	ug/l	SW846 8270D BY SIM
Fluoranthene		0.054 J	0.11	0.0081	ug/l	SW846 8270D BY SIM
Fluorene		1.1	0.11	0.017	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		40.0	2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		55.0	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.83	0.055	0.012	ug/l	SW846 8270D BY SIM
Pyrene		0.23	0.11	0.0093	ug/l	SW846 8270D BY SIM
MC40029-9	MW4-ROX-071415					
Benzene		63.0	0.50	0.27	ug/l	SW846 8260C
n-Butylbenzene		0.66 J	5.0	0.50	ug/l	SW846 8260C
sec-Butylbenzene		0.51 J	5.0	0.50	ug/l	SW846 8260C
tert-Butylbenzene		0.74 J	5.0	0.57	ug/l	SW846 8260C
Ethylbenzene		0.57 J	1.0	0.24	ug/l	SW846 8260C
Isopropylbenzene		2.6 J	5.0	0.27	ug/l	SW846 8260C
n-Propylbenzene		2.9 J	5.0	0.29	ug/l	SW846 8260C
Toluene		3.3	1.0	0.29	ug/l	SW846 8260C
1,2,4-Trimethylbenzene		0.58 J	5.0	0.29	ug/l	SW846 8260C
1,3,5-Trimethylbenzene		0.24 J	5.0	0.20	ug/l	SW846 8260C
m,p-Xylene		8.2	1.0	0.47	ug/l	SW846 8260C
o-Xylene		1.6	1.0	0.22	ug/l	SW846 8260C
Xylene (total)		9.8	1.0	0.22	ug/l	SW846 8260C
Acenaphthene		0.023 J	0.11	0.0084	ug/l	SW846 8270D BY SIM
Fluorene		0.018 J	0.11	0.017	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.32 J	2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.35 JB	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.018 JB	0.056	0.012	ug/l	SW846 8270D BY SIM

New England ACCUTEST LABORATORIES

Sample Results

Report of Analysis

Report of Analysis

Client Sample ID:	TB-ROX-071415-HCL-A		
Lab Sample ID:	MC40029-1	Date Sampled:	07/14/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41228.D	1	07/21/15	JB	n/a	n/a	MSV1488
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071415-HCL-A		
Lab Sample ID:	MC40029-1	Date Sampled:	07/14/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071415-HCL-A		
Lab Sample ID:	MC40029-1	Date Sampled:	07/14/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	103%		72-133%
2037-26-5	Toluene-D8	100%		85-114%
460-00-4	4-Bromofluorobenzene	99%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071415-ST-A		
Lab Sample ID:	MC40029-2	Date Sampled:	07/14/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63919.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	36.3 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0059	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0059	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	107%		60-140%
460-00-4	Bromofluorobenzene (S)	111%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6D-ROX-071415		
Lab Sample ID:	MC40029-3	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41234.D	1	07/21/15	JB	n/a	n/a	MSV1488
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6D-ROX-071415		
Lab Sample ID:	MC40029-3	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6D-ROX-071415		
Lab Sample ID:	MC40029-3	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	112%		72-133%
2037-26-5	Toluene-D8	101%		85-114%
460-00-4	4-Bromofluorobenzene	97%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6D-ROX-071415		
Lab Sample ID:	MC40029-3	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81802.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.8	ug/l	
95-57-8	2-Chlorophenol	ND	5.6	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.41	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.56	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.8	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.52	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.45	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.8	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.33	ug/l	
108-95-2	Phenol	ND	5.6	0.28	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.38	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.8	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.6	0.91	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.6	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.56	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.6	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.60	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.6	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.6	0.46	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.6	0.27	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.6	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.6	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.7	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.6	0.42	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.6	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.6	0.80	ug/l	

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Report of Analysis

Client Sample ID:	MW6D-ROX-071415		
Lab Sample ID:	MC40029-3	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.6	0.63	ug/l	
131-11-3	Dimethyl phthalate	ND	5.6	0.30	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.6	0.85	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.6	0.32	ug/l	
78-59-1	Isophorone	ND	5.6	0.26	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.1	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.5	ug/l	
98-95-3	Nitrobenzene	ND	5.6	0.29	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.6	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.6	0.58	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.6	0.86	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	44%		10-80%
4165-62-2	Phenol-d5	30%		10-72%
118-79-6	2,4,6-Tribromophenol	77%		42-134%
4165-60-0	Nitrobenzene-d5	81%		25-117%
321-60-8	2-Fluorobiphenyl	76%		24-112%
1718-51-0	Terphenyl-d14	93%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6D-ROX-071415		
Lab Sample ID:	MC40029-3	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96990.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0083	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0093	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.056	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.056	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.017	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0082	ug/l	
86-73-7	Fluorene	ND	0.11	0.017	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.023	ug/l	
90-12-0	1-Methylnaphthalene	0.11	2.2	0.014	ug/l	JB J
91-57-6	2-Methylnaphthalene	0.23	2.2	0.012	ug/l	JB J
85-01-8	Phenanthrene	ND	0.056	0.012	ug/l	
129-00-0	Pyrene	ND	0.11	0.0094	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	85%		26-121%
321-60-8	2-Fluorobiphenyl	67%		28-107%
1718-51-0	Terphenyl-d14	81%		29-129%

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6D-ROX-071415		
Lab Sample ID:	MC40029-3	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63920.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	37.2 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	107%		60-140%
460-00-4	Bromofluorobenzene (S)	107%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6C-ROX-071415		
Lab Sample ID:	MC40029-4	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41235.D	1	07/21/15	JB	n/a	n/a	MSV1488
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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Report of Analysis

Client Sample ID:	MW6C-ROX-071415		
Lab Sample ID:	MC40029-4	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6C-ROX-071415		
Lab Sample ID:	MC40029-4	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	112%		72-133%
2037-26-5	Toluene-D8	102%		85-114%
460-00-4	4-Bromofluorobenzene	98%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6C-ROX-071415		
Lab Sample ID:	MC40029-4	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81803.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2							

	Initial Volume	Final Volume
Run #1	930 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.4	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.39	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.54	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.22	ug/l	
	3&4-Methylphenol	ND	11	0.50	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.44	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.32	ug/l	
108-95-2	Phenol	ND	5.4	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.37	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.32	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.4	0.88	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.4	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.55	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.4	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.58	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.4	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.4	0.45	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.4	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.4	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.4	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.4	0.40	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.4	0.40	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.4	0.77	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6C-ROX-071415		
Lab Sample ID:	MC40029-4	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.4	0.61	ug/l	
131-11-3	Dimethyl phthalate	ND	5.4	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.32	ug/l	
118-74-1	Hexachlorobenzene	ND	5.4	0.83	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.4	0.31	ug/l	
78-59-1	Isophorone	ND	5.4	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.9	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.4	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.4	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.4	0.56	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.4	0.83	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	45%		10-80%
4165-62-2	Phenol-d5	29%		10-72%
118-79-6	2,4,6-Tribromophenol	75%		42-134%
4165-60-0	Nitrobenzene-d5	82%		25-117%
321-60-8	2-Fluorobiphenyl	74%		24-112%
1718-51-0	Terphenyl-d14	93%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

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Report of Analysis

Client Sample ID:	MW6C-ROX-071415		
Lab Sample ID:	MC40029-4	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96991.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	930 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.027	0.11	0.0081	ug/l	J
208-96-8	Acenaphthylene	0.020	0.11	0.0090	ug/l	J
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.054	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.054	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0080	ug/l	
86-73-7	Fluorene	ND	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	0.064	2.2	0.013	ug/l	JB
91-57-6	2-Methylnaphthalene	0.14	2.2	0.012	ug/l	JB
85-01-8	Phenanthrene	ND	0.054	0.012	ug/l	
129-00-0	Pyrene	ND	0.11	0.0091	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	80%		26-121%
321-60-8	2-Fluorobiphenyl	64%		28-107%
1718-51-0	Terphenyl-d14	100%		29-129%

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6C-ROX-071415		
Lab Sample ID:	MC40029-4	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63921.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	37.0 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	111%		60-140%
460-00-4	Bromofluorobenzene (S)	104%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6B-ROX-071415		
Lab Sample ID:	MC40029-5	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41236.D	1	07/21/15	JB	n/a	n/a	MSV1488
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6B-ROX-071415		
Lab Sample ID:	MC40029-5	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	4.8	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6B-ROX-071415		
Lab Sample ID:	MC40029-5	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	113%		72-133%
2037-26-5	Toluene-D8	103%		85-114%
460-00-4	4-Bromofluorobenzene	98%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6B-ROX-071415		
Lab Sample ID:	MC40029-5	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81804.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.3	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.53	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.0	ug/l	
95-48-7	2-Methylphenol	ND	11	0.22	ug/l	
	3&4-Methylphenol	ND	11	0.49	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.43	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.31	ug/l	
108-95-2	Phenol	ND	5.3	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.31	ug/l	
62-53-3	Aniline	ND	11	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.3	0.86	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.3	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.3	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.57	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.3	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.3	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.3	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.3	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.3	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.3	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.3	0.39	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.3	0.76	ug/l	

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Report of Analysis

Client Sample ID:	MW6B-ROX-071415		
Lab Sample ID:	MC40029-5	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.3	0.60	ug/l	
131-11-3	Dimethyl phthalate	ND	5.3	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.3	0.81	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.3	0.30	ug/l	
78-59-1	Isophorone	ND	5.3	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.3	ug/l	
98-95-3	Nitrobenzene	ND	5.3	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.3	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.3	0.55	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.3	0.81	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	34%		10-80%
4165-62-2	Phenol-d5	24%		10-72%
118-79-6	2,4,6-Tribromophenol	74%		42-134%
4165-60-0	Nitrobenzene-d5	65%		25-117%
321-60-8	2-Fluorobiphenyl	62%		24-112%
1718-51-0	Terphenyl-d14	86%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6B-ROX-071415		
Lab Sample ID:	MC40029-5	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96992.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.12	0.11	0.0079	ug/l	
208-96-8	Acenaphthylene	0.017	0.11	0.0088	ug/l	J
120-12-7	Anthracene	ND	0.11	0.010	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.053	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.053	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0078	ug/l	
86-73-7	Fluorene	0.13	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.021	ug/l	
90-12-0	1-Methylnaphthalene	3.6	2.1	0.013	ug/l	
91-57-6	2-Methylnaphthalene	6.8	2.1	0.012	ug/l	
85-01-8	Phenanthrene	0.045	0.053	0.011	ug/l	JB
129-00-0	Pyrene	ND	0.11	0.0089	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	67%		26-121%
321-60-8	2-Fluorobiphenyl	57%		28-107%
1718-51-0	Terphenyl-d14	84%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6B-ROX-071415		
Lab Sample ID:	MC40029-5	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63922.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	36.8 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	106%		60-140%
460-00-4	Bromofluorobenzene (S)	98%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071415-HCL-B		
Lab Sample ID:	MC40029-6	Date Sampled:	07/14/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41229.D	1	07/21/15	JB	n/a	n/a	MSV1488
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071415-HCL-B		
Lab Sample ID:	MC40029-6	Date Sampled:	07/14/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071415-HCL-B		
Lab Sample ID:	MC40029-6	Date Sampled:	07/14/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	108%		72-133%
2037-26-5	Toluene-D8	100%		85-114%
460-00-4	4-Bromofluorobenzene	98%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071415-ST-B		
Lab Sample ID:	MC40029-7	Date Sampled:	07/14/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63923.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	37.3 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	116%		60-140%
460-00-4	Bromofluorobenzene (S)	111%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P58-ROX-071415		
Lab Sample ID:	MC40029-8	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41244.D	1000	07/21/15	JB	n/a	n/a	MSV1488
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10000	2000	ug/l	
107-02-8	Acrolein	ND	25000	11000	ug/l	
107-13-1	Acrylonitrile	ND	5000	2300	ug/l	
71-43-2	Benzene	266000	500	270	ug/l	
108-86-1	Bromobenzene	ND	5000	260	ug/l	
74-97-5	Bromochloromethane	ND	5000	370	ug/l	
75-27-4	Bromodichloromethane	ND	1000	180	ug/l	
75-25-2	Bromoform	ND	1000	390	ug/l	
74-83-9	Bromomethane	ND	2000	790	ug/l	
78-93-3	2-Butanone (MEK)	ND	5000	3000	ug/l	
104-51-8	n-Butylbenzene	ND	5000	500	ug/l	
135-98-8	sec-Butylbenzene	ND	5000	500	ug/l	
98-06-6	tert-Butylbenzene	ND	5000	570	ug/l	
75-15-0	Carbon disulfide	ND	5000	190	ug/l	
56-23-5	Carbon tetrachloride	ND	1000	340	ug/l	
108-90-7	Chlorobenzene	ND	1000	240	ug/l	
75-00-3	Chloroethane	ND	2000	490	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5000	1300	ug/l	
67-66-3	Chloroform	ND	1000	400	ug/l	
74-87-3	Chloromethane	ND	2000	490	ug/l	
95-49-8	o-Chlorotoluene	ND	5000	600	ug/l	
106-43-4	p-Chlorotoluene	ND	5000	460	ug/l	
124-48-1	Dibromochloromethane	ND	1000	220	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1000	240	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1000	240	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1000	370	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2000	530	ug/l	
75-34-3	1,1-Dichloroethane	ND	1000	280	ug/l	
107-06-2	1,2-Dichloroethane	ND	1000	310	ug/l	
75-35-4	1,1-Dichloroethene	ND	1000	280	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1000	310	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1000	480	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P58-ROX-071415		
Lab Sample ID:	MC40029-8	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2000	210	ug/l	
142-28-9	1,3-Dichloropropane	ND	5000	290	ug/l	
594-20-7	2,2-Dichloropropane	ND	5000	1700	ug/l	
563-58-6	1,1-Dichloropropene	ND	5000	230	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	500	270	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	500	430	ug/l	
123-91-1	1,4-Dioxane	ND	25000	20000	ug/l	
97-63-2	Ethyl methacrylate	ND	5000	500	ug/l	
100-41-4	Ethylbenzene	457	1000	240	ug/l	J
87-68-3	Hexachlorobutadiene	ND	5000	450	ug/l	
591-78-6	2-Hexanone	ND	5000	2700	ug/l	
98-82-8	Isopropylbenzene	ND	5000	270	ug/l	
99-87-6	p-Isopropyltoluene	ND	5000	320	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1000	350	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5000	770	ug/l	
74-95-3	Methylene bromide	ND	5000	300	ug/l	
75-09-2	Methylene chloride	ND	2000	270	ug/l	
91-20-3	Naphthalene	ND	5000	610	ug/l	
103-65-1	n-Propylbenzene	ND	5000	290	ug/l	
100-42-5	Styrene	ND	5000	280	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1000	250	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	500	290	ug/l	
127-18-4	Tetrachloroethene	ND	1000	210	ug/l	
108-88-3	Toluene	ND	1000	290	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5000	780	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5000	740	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1000	420	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1000	320	ug/l	
79-01-6	Trichloroethene	ND	1000	250	ug/l	
75-69-4	Trichlorofluoromethane	ND	1000	470	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5000	390	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5000	290	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5000	200	ug/l	
108-05-4	Vinyl Acetate	ND	5000	1400	ug/l	
75-01-4	Vinyl chloride	ND	1000	450	ug/l	
	m,p-Xylene	ND	1000	470	ug/l	
95-47-6	o-Xylene	ND	1000	220	ug/l	
1330-20-7	Xylene (total)	285	1000	220	ug/l	J

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P58-ROX-071415		
Lab Sample ID:	MC40029-8	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	101%		72-133%
2037-26-5	Toluene-D8	97%		85-114%
460-00-4	4-Bromofluorobenzene	102%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P58-ROX-071415		
Lab Sample ID:	MC40029-8	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81805.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2							

	Initial Volume	Final Volume
Run #1	910 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.7	ug/l	
95-57-8	2-Chlorophenol	ND	5.5	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.40	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.55	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.7	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	16.5	11	0.51	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.45	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.7	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.33	ug/l	
108-95-2	Phenol	153	5.5	0.27	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.38	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.7	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.5	0.90	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.5	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.56	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.5	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.59	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.5	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.5	0.46	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.5	0.26	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.5	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.5	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.5	0.41	ug/l	
132-64-9	Dibenzofuran	2.0	2.2	0.22	ug/l	J
84-74-2	Di-n-butyl phthalate	0.81	5.5	0.41	ug/l	J
117-84-0	Di-n-octyl phthalate	ND	5.5	0.79	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P58-ROX-071415		
Lab Sample ID:	MC40029-8	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.5	0.62	ug/l	
131-11-3	Dimethyl phthalate	ND	5.5	0.29	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.5	0.84	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.5	0.32	ug/l	
78-59-1	Isophorone	ND	5.5	0.25	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.0	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.4	ug/l	
98-95-3	Nitrobenzene	ND	5.5	0.28	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.5	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.5	0.57	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.5	0.85	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	49%		10-80%
4165-62-2	Phenol-d5	32%		10-72%
118-79-6	2,4,6-Tribromophenol	79%		42-134%
4165-60-0	Nitrobenzene-d5	78%		25-117%
321-60-8	2-Fluorobiphenyl	73%		24-112%
1718-51-0	Terphenyl-d14	92%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P58-ROX-071415		
Lab Sample ID:	MC40029-8	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96993.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	910 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.59	0.11	0.0082	ug/l	
208-96-8	Acenaphthylene	0.18	0.11	0.0092	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	0.087	0.055	0.026	ug/l	
50-32-8	Benzo(a)pyrene	0.074	0.11	0.017	ug/l	J
205-99-2	Benzo(b)fluoranthene	ND	0.055	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	0.042	0.11	0.014	ug/l	J
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	0.15	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	0.054	0.11	0.0081	ug/l	J
86-73-7	Fluorene	1.1	0.11	0.017	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.022	ug/l	
90-12-0	1-Methylnaphthalene	40.0	2.2	0.014	ug/l	
91-57-6	2-Methylnaphthalene	55.0	2.2	0.012	ug/l	
85-01-8	Phenanthrene	0.83	0.055	0.012	ug/l	
129-00-0	Pyrene	0.23	0.11	0.0093	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	70%		26-121%
321-60-8	2-Fluorobiphenyl	67%		28-107%
1718-51-0	Terphenyl-d14	91%		29-129%

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J = Indicates an estimated value
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	P58-ROX-071415		
Lab Sample ID:	MC40029-8	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63924.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	37.0 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	104%		60-140%
460-00-4	Bromofluorobenzene (S)	164% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW4-ROX-071415		
Lab Sample ID:	MC40029-9	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41245.D	1	07/21/15	JB	n/a	n/a	MSV1488
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	63.0	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	0.66	5.0	0.50	ug/l	J
135-98-8	sec-Butylbenzene	0.51	5.0	0.50	ug/l	J
98-06-6	tert-Butylbenzene	0.74	5.0	0.57	ug/l	J
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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Report of Analysis

Client Sample ID:	MW4-ROX-071415		
Lab Sample ID:	MC40029-9	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	0.57	1.0	0.24	ug/l	J
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	2.6	5.0	0.27	ug/l	J
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	2.9	5.0	0.29	ug/l	J
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	3.3	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	0.58	5.0	0.29	ug/l	J
108-67-8	1,3,5-Trimethylbenzene	0.24	5.0	0.20	ug/l	J
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	8.2	1.0	0.47	ug/l	
95-47-6	o-Xylene	1.6	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	9.8	1.0	0.22	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW4-ROX-071415		
Lab Sample ID:	MC40029-9	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	95%		72-133%
2037-26-5	Toluene-D8	101%		85-114%
460-00-4	4-Bromofluorobenzene	101%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW4-ROX-071415		
Lab Sample ID:	MC40029-9	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	F81806.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
Run #2							

	Initial Volume	Final Volume
Run #1	890 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.8	ug/l	
95-57-8	2-Chlorophenol	ND	5.6	0.33	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.41	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.32	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.56	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.8	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.2	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.52	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.46	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.8	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.34	ug/l	
108-95-2	Phenol	ND	5.6	0.28	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.39	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.34	ug/l	
62-53-3	Aniline	ND	11	2.8	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.6	0.92	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.6	0.24	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.57	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.6	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.61	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.6	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.6	0.47	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.6	0.27	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.6	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.6	0.27	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.7	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.6	0.42	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.6	0.42	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.6	0.81	ug/l	

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Report of Analysis

Client Sample ID:	MW4-ROX-071415		
Lab Sample ID:	MC40029-9	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.6	0.64	ug/l	
131-11-3	Dimethyl phthalate	ND	5.6	0.30	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.34	ug/l	
118-74-1	Hexachlorobenzene	ND	5.6	0.86	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.6	0.32	ug/l	
78-59-1	Isophorone	ND	5.6	0.26	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.1	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.5	ug/l	
98-95-3	Nitrobenzene	ND	5.6	0.29	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.6	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.6	0.58	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.6	0.87	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	39%		10-80%
4165-62-2	Phenol-d5	27%		10-72%
118-79-6	2,4,6-Tribromophenol	76%		42-134%
4165-60-0	Nitrobenzene-d5	72%		25-117%
321-60-8	2-Fluorobiphenyl	71%		24-112%
1718-51-0	Terphenyl-d14	95%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW4-ROX-071415		
Lab Sample ID:	MC40029-9	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I96994.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
Run #2							

	Initial Volume	Final Volume
Run #1	890 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.023	0.11	0.0084	ug/l	J
208-96-8	Acenaphthylene	ND	0.11	0.0094	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.056	0.027	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.056	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.017	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0083	ug/l	
86-73-7	Fluorene	0.018	0.11	0.017	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.023	ug/l	
90-12-0	1-Methylnaphthalene	0.32	2.2	0.014	ug/l	J
91-57-6	2-Methylnaphthalene	0.35	2.2	0.012	ug/l	JB J
85-01-8	Phenanthrene	0.018	0.056	0.012	ug/l	JB J
129-00-0	Pyrene	ND	0.11	0.0096	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	69%		26-121%
321-60-8	2-Fluorobiphenyl	62%		28-107%
1718-51-0	Terphenyl-d14	98%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW4-ROX-071415		
Lab Sample ID:	MC40029-9	Date Sampled:	07/14/15
Matrix:	AQ - Ground Water	Date Received:	07/15/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63925.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
Run #2							

	Initial Volume	Final Volume
Run #1	36.7 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	119%		60-140%
460-00-4	Bromofluorobenzene (S)	130%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

New England ACCUTEST LABORATORIES

Misc. Forms

Custody Documents and Other Forms

Includes the following where applicable:

- Chain of Custody
- Sample Tracking Chronicle
- Internal Chain of Custody

LAB (LOCATION)

☐ XENCO ( )
☐ CALSCIENCE
☐ OTHER Accutest Labs: 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200)
☐ Lab vendor # ( )
☐ SPL

Lab Vendor #

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:
☑ ENV. SERVICES ☐ MOTIVA RETAIL ☐ SHELL RETAIL
☐ MOTIVA SUBCM ☐ CONSULTANT ☐ LUBES
☐ SHELL PIPELINE ☐ OTHER

Print Bill To Contact Name: Bob Bitman

PO #

INCIDENT # (ENV SERVICES): 9 7 2 1 6 8 4 0

SAP #: 3 4 0 0 6 1

☐ CHECK IF NO INCIDENT # APPLIES

DATE: 14 July 2015

PAGE: 1 of 1

SAMPLING COMPANY: AECOM

LOG CODE:

DATE & ADDRESS: 900 South Central Ave, ROXANA

State: IL

TERMINAL NO.:

SAMPLING LOCATION: 1011 HIGHLANDS PLAZA DRIVE WEST - SUITE 300; ST LOUIS MO 63110

Roxana Quarterly GW / 60400249-21563720.03003

PROJECT CONTACT: Elizabeth Kunkel, Bob Bitman, Lindsay Rathnow

314-429-0100 | 314-429-0462

SAMPLER NAME: S. Fisher / E. Schumacher / C. Williams / D. Haxel

LAB USE ONLY: MC40029

TURNAROUND TIME (CALENDAR DAYS): ☑ STANDARD (10 DAY) ☐ 5 DAYS ☐ 3 DAYS ☐ 2 DAYS ☐ 24 HOURS ☐ RESULTS NEEDED ☐ SCREEN

☐ TA - RWQCB REPORT FORMAT ☐ UST AGENCY:

DELIVERABLES: ☐ LEVEL 1 ☑ LEVEL 2 ☐ LEVEL 3 ☑ LEVEL 4 ☑ OTHER (SPECIFY) EDD

TEMPERATURE ON RECEIPT C°: Cooler #1 | Cooler #2 | Cooler #3

SPECIAL INSTRUCTIONS OR NOTES:
Please include "J" values on Reports
Please provide sample receipt upon login

☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMBURSEMENT RATE APPLIES
☐ EDD NOT NEEDED
☐ RECEIPT VERIFICATION REQUESTED
☐ PROVIDE LEDD DISK

REQUESTED ANALYSIS

Please do Not Analyze the crossed-out sample set: MW6B-ROX-071415-EB D.H. EKR

FIELD NOTES:
TEMPERATURE ON RECEIPT C°

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
-1	TB-ROX-071415-HCLA	7/14/15	0000	water	X					2	X				0.0
-2	TB-ROX-071415-ST-A	↓	"	↓					X	2		X			↓
-3	MW6D-ROX-071415	↓	0955	↓	X			X	X	6	X	X	X	X	↓
-4	MW6C-ROX-071415	↓	1045	↓	X			X	X	6	X	X	X	X	↓
-5	MW6B-ROX-071415	↓	1145	↓	X			X	X	6	X	X	X	X	↓
-10	~~MW6B-ROX-071415-EB~~		~~1200~~		~~X~~			~~X~~	~~X~~	~~6~~	~~X~~	~~X~~	~~X~~	~~X~~ D.H.	↓
-6	TB-ROX-071415-HCL-B	7/14/15	0000	water	X					2	X				↓
-7	TB-ROX-071415-ST-B	7/14/15	0000	↓					X	2		X			↓
-8	P58-ROX-071415	↓	1040	↓	X			X	X	6	X	X	X	X	↓
-9	MW4-ROX-071415	↓	1430	↓	X			X	X	6	X	X	X	X	↓

Relinquished by (Signature)	Received by (Signature)	Date	Time
[signature]	FED EX # 8066 2852 5198	14 July 2015	
Relinquished by (Signature)	Received by (Signature)	Date	Time
Relinquished by (Signature)	Received by (Signature)	Date	

REVISED 7/15/15 JF

Custody seals 07/14/2015 -01A -02A -01B -02B

MC40029: Chain of Custody
Page 1 of 3

LAB (LOCATION)

☐ XENCO (_____)

☐ CALSCIENCE (_____)

☑ OTHER (Accutest Labs; 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200))

☐ SPL ☐ Lab Vendor # (_____)

Lab Vendor #

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:

☑ ENV. SERVICES ☐ MOTIVA RETAIL ☐ SHELL RETAIL

☐ MOTIVA SOAM ☐ CONSULTANT ☐ LUBES

☐ SHELL PIPELINE ☐ OTHER _____

Print Bill To Contact Name: Bob Billman

PO #

INCIDENT # (ENV SERVICES): 9 7 2 1 6 6 4 0

SAP #: 3 4 0 0 6 1

☐ CHECK IF NO INCIDENT # APPLIES

DATE: 14 July 2015

PAGE: 1 of 1

SAMPLING COMPANY: AECOM

LOG CODE:

ADDRESS: 1001 HIGHLANDS PLAZA DRIVE WEST - SUITE 300; ST. LOUIS, MO 63110

PROJECT CONTACT (Hardcopy or PDF Report to): Elizabeth Kunkel, Bob Billman, Lindsay Rathnow

TELEPHONE: 314-429-0100 FAX: 314-429-0462

EA To Contact E-MAIL: b.billman@aecom.com, elizabeth.kunkel@aecom.com, lindsay.rathnow@aecom.com

SITE ADDRESS: Street and City: 900 South Central Ave; ROXANA

State: IL

GLOBAL ID NO.:

EDF DELIVERABLE TO (Name, Company, Office Location):

PHONE NO.:

E-MAIL:

CONSULTANT PROJECT NO.: Roxana Quarterly GW / 60400249-21563720.03003

SAMPLER NAME(S) (Print): S. Fisher / E. Schumacher C. Williams / D. Haxel

LAB USE ONLY: MC40029

TURNAROUND TIME (CALENDAR DAYS)

☑ STANDARD (10 DAY) ☐ 5 DAYS ☐ 3 DAYS ☐ 2 DAYS ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

DELIVERABLES: ☐ LEVEL 1 ☑ LEVEL 2 ☐ LEVEL 3 ☑ LEVEL 4 ☑ OTHER (SPECIFY) EDD

TEMPERATURE ON RECEIPT C°: Cooler #1 Cooler #2 Cooler #3

SPECIAL INSTRUCTIONS OR NOTES:

* Please include "J" values on Reports.
* Please provide sample receipt upon login.

☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMBURSEMENT RATE APPLIES
☐ EDD NOT NEEDED
☑ RECEIPT VERIFICATION REQUESTED
☐ PROVIDE LEDD DISK

REQUESTED ANALYSIS

Please analyze the crossed-out sample set: MW6B-ROX-071415-EB D.H.

FIELD NOTES:

TEMPERATURE ON RECEIPT C°

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
-1	TB-ROX-071415-HCL-A	7/14/15	0000	water	X					2	X				0.0
-2	TB-ROX-071415-ST-A		"						X	2		X			
-3	MW6D-ROX-071415		0955		X			X	X	6	X	X	X	X	
-4	MW6C-ROX-071415		1045		X			X	X	6	X	X	X	X	
-5	MW6B-ROX-071415		1145		X			X	X	6	X	X	X	X	
~~-10~~	~~MW6B-ROX-071415-EB~~		1200		X			X	X	6	X	X	X	X	D.H. -10
-6	TB-ROX-071415-HCL-B	7/14/15	0000	water	X					2	X				
-7	TB-ROX-071415-ST-B	7/14/15	0000						X	2		X			1900, 2E1,
-8	P58-ROX-071415		1040		X			X	X	6	X	X	X	X	
-9	MW4-ROX-071415		1430		X			X	X	6	X	X	X	X	

Relinquished by: (Signature)	Received by: (Signature)	Date	Time
	FED EX # 8066 2852 5198	14 July 2015	
FedEx		7-15-15	1030

Custody Seals 07/14/2015 -01A -02A -01B -02B

03/2/06 Revision

1.8°C, 0.8°C

Accutest Laboratories Sample Receipt Summary

Accutest Job Number: MC40029 **Client:** AECOM **Project:** 900 SOUTH CENTRAL

Date / Time Received: 7/15/2015 10:30:00 AM **Delivery Method:** **Airbill #'s:**

Cooler Temps (Initial/Adjusted): #1: (0.8/0.8); #2: (1.8/1.8);

Cooler Security	Y	or	N		Y	or	N
1. Custody Seals Present:	☑		☐	3. COC Present:	☑		☐
2. Custody Seals Intact:	☑		☐	4. Smpl Dates/Time OK	☑		☐

Cooler Temperature	Y	or	N
1. Temp criteria achieved:	☑		☐
2. Thermometer ID:	G1;		
3. Cooler media:	Ice (Bag)		
4. No. Coolers:	2		

Quality Control Preservation	Y	or	N	N/A
1. Trip Blank present / cooler:	☑		☐	☐
2. Trip Blank listed on COC:	☑		☐	☐
3. Samples preserved properly:	☑		☐	
4. VOCs headspace free:	☑		☐	☐

Sample Integrity - Documentation	Y	or	N
1. Sample labels present on bottles:	☑		☐
2. Container labeling complete:	☑		☐
3. Sample container label / COC agree:	☑		☐

Sample Integrity - Condition	Y	or	N
1. Sample recvd within HT:	☑		☐
2. All containers accounted for:	☑		☐
3. Condition of sample:	Intact		

Sample Integrity - Instructions	Y	or	N	N/A
1. Analysis requested is clear:	☑		☐	
2. Bottles received for unspecified tests	☐		☑	
3. Sufficient volume recvd for analysis:	☑		☐	
4. Compositing instructions clear:	☐		☐	☑
5. Filtering instructions clear:	☐		☐	☑

Comments

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC40029

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC40029-1 Collected: 14-JUL-15 00:00 By: SFES		Received: 15-JUL-15 By: AF				
TB-ROX-071415-HCL-A						
MC40029-1	SW846 8260C	21-JUL-15 10:59	JB			V8260SL+
MC40029-2 Collected: 14-JUL-15 00:00 By: SFES		Received: 15-JUL-15 By: AF				
TB-ROX-071415-ST-A						
MC40029-2	SW846 8011	27-JUL-15 20:04	NK	23-JUL-15	ES	V8011SL
MC40029-3 Collected: 14-JUL-15 09:55 By: SFES		Received: 15-JUL-15 By: AF				
MW6D-ROX-071415						
MC40029-3	SW846 8260C	21-JUL-15 13:51	JB			V8260SL+
MC40029-3	SW846 8270D	27-JUL-15 13:10	MR	16-JUL-15	MC	AB8270SL+
MC40029-3	SW846 8270D BY SIM	27-JUL-15 15:39	MR	16-JUL-15	MC	B8270SIMSL
MC40029-3	SW846 8011	27-JUL-15 20:32	NK	23-JUL-15	ES	V8011SL
MC40029-4 Collected: 14-JUL-15 10:45 By: SFES		Received: 15-JUL-15 By: AF				
MW6C-ROX-071415						
MC40029-4	SW846 8260C	21-JUL-15 14:19	JB			V8260SL+
MC40029-4	SW846 8270D	27-JUL-15 13:34	MR	16-JUL-15	MC	AB8270SL+
MC40029-4	SW846 8270D BY SIM	27-JUL-15 16:02	MR	16-JUL-15	MC	B8270SIMSL
MC40029-4	SW846 8011	27-JUL-15 21:00	NK	23-JUL-15	ES	V8011SL
MC40029-5 Collected: 14-JUL-15 11:45 By: SFES		Received: 15-JUL-15 By: AF				
MW6B-ROX-071415						
MC40029-5	SW846 8260C	21-JUL-15 14:47	JB			V8260SL+
MC40029-5	SW846 8270D	27-JUL-15 13:57	MR	16-JUL-15	MC	AB8270SL+
MC40029-5	SW846 8270D BY SIM	27-JUL-15 16:25	MR	16-JUL-15	MC	B8270SIMSL
MC40029-5	SW846 8011	27-JUL-15 21:28	NK	23-JUL-15	ES	V8011SL
MC40029-6 Collected: 14-JUL-15 00:00 By: SFES		Received: 15-JUL-15 By: AF				
TB-ROX-071415-HCL-B						
MC40029-6	SW846 8260C	21-JUL-15 11:27	JB			V8260SL+

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC40029

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC40029-7 Collected: 14-JUL-15 00:00 By: SFES Received: 15-JUL-15 By: AF						
TB-ROX-071415-ST-B						
MC40029-7	SW846 8011	27-JUL-15 21:56	NK	23-JUL-15	ES	V8011SL
MC40029-8 Collected: 14-JUL-15 10:40 By: SFES Received: 15-JUL-15 By: AF						
P58-ROX-071415						
MC40029-8	SW846 8260C	21-JUL-15 18:35	JB			V8260SL+
MC40029-8	SW846 8270D	27-JUL-15 14:21	MR	16-JUL-15	MC	AB8270SL+
MC40029-8	SW846 8270D BY SIM	27-JUL-15 16:48	MR	16-JUL-15	MC	B8270SIMSL
MC40029-8	SW846 8011	27-JUL-15 22:23	NK	23-JUL-15	ES	V8011SL
MC40029-9 Collected: 14-JUL-15 14:30 By: SFES Received: 15-JUL-15 By: AF						
MW4-ROX-071415						
MC40029-9	SW846 8260C	21-JUL-15 19:04	JB			V8260SL+
MC40029-9	SW846 8270D	27-JUL-15 14:45	MR	16-JUL-15	MC	AB8270SL+
MC40029-9	SW846 8270D BY SIM	27-JUL-15 17:11	MR	16-JUL-15	MC	B8270SIMSL
MC40029-9	SW846 8011	27-JUL-15 22:51	NK	23-JUL-15	ES	V8011SL

Accutest Internal Chain of Custody

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/15/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC40029-1.2	VOC Ref #2	Jaclyn Bergeron	07/21/15 09:51	Retrieve from Storage
MC40029-1.2	Jaclyn Bergeron	GCMSV	07/21/15 09:51	Load on Instrument
MC40029-1.2	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40029-1.2	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40029-2.1	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40029-2.1	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40029-3.2	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40029-3.2	Michael DiBuono		07/20/15 14:49	Depleted
MC40029-3.3	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40029-3.3	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40029-3.6	VOC Ref #2	Jaclyn Bergeron	07/21/15 09:51	Retrieve from Storage
MC40029-3.6	Jaclyn Bergeron	GCMSV	07/21/15 09:51	Load on Instrument
MC40029-3.6	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40029-3.6	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40029-4.2	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40029-4.2	Michael DiBuono		07/20/15 14:49	Depleted
MC40029-4.3	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40029-4.3	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40029-4.5	VOC Ref #2	Jaclyn Bergeron	07/21/15 09:51	Retrieve from Storage
MC40029-4.5	Jaclyn Bergeron	GCMSV	07/21/15 09:51	Load on Instrument
MC40029-4.5	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40029-4.5	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40029-5.2	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40029-5.2	Michael DiBuono		07/20/15 14:49	Depleted
MC40029-5.3	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40029-5.3	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40029-5.5	VOC Ref #2	Jaclyn Bergeron	07/21/15 09:51	Retrieve from Storage
MC40029-5.5	Jaclyn Bergeron	GCMSV	07/21/15 09:51	Load on Instrument
MC40029-5.5	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40029-5.5	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40029-6.2	VOC Ref #2	Jaclyn Bergeron	07/21/15 09:51	Retrieve from Storage
MC40029-6.2	Jaclyn Bergeron	GCMSV	07/21/15 09:51	Load on Instrument
MC40029-6.2	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument

Accutest Internal Chain of Custody

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/15/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC40029-6.2	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40029-7.1	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40029-7.1	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40029-8.1	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40029-8.1	Michael DiBuono		07/20/15 14:49	Depleted
MC40029-8.3	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40029-8.3	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40029-8.5	VOC Ref #2	Jaclyn Bergeron	07/21/15 09:51	Retrieve from Storage
MC40029-8.5	Jaclyn Bergeron	GCMSV	07/21/15 09:51	Load on Instrument
MC40029-8.5	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40029-8.5	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40029-9.1	Walk In Ref #22	Michael DiBuono	07/16/15 08:55	Retrieve from Storage
MC40029-9.1	Michael DiBuono		07/20/15 14:49	Depleted
MC40029-9.2	Walk In Ref #22	James Marsden	07/15/15 21:29	Retrieve from Storage
MC40029-9.2	James Marsden		07/16/15 00:15	Depleted
MC40029-9.4	VOC Ref #2	Elizabeth Stefanik	07/23/15 17:25	Retrieve from Storage
MC40029-9.4	Elizabeth Stefanik		07/23/15 23:24	Depleted
MC40029-9.6	VOC Ref #2	Jaclyn Bergeron	07/21/15 09:51	Retrieve from Storage
MC40029-9.6	Jaclyn Bergeron	GCMSV	07/21/15 09:51	Load on Instrument
MC40029-9.6	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40029-9.6	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage

New England ACCUTEST LABORATORIES

GC/MS Volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1488-MB	V41227.D	1	07/21/15	JB	n/a	n/a	MSV1488

The QC reported here applies to the following samples: Method: SW846 8260C

MC40029-1, MC40029-3, MC40029-4, MC40029-5, MC40029-6, MC40029-8, MC40029-9

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	

Method Blank Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1488-MB	V41227.D	1	07/21/15	JB	n/a	n/a	MSV1488

The QC reported here applies to the following samples: Method: SW846 8260C

MC40029-1, MC40029-3, MC40029-4, MC40029-5, MC40029-6, MC40029-8, MC40029-9

CAS No.	Compound	Result	RL	MDL	Units	Q
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

Method Blank Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1488-MB	V41227.D	1	07/21/15	JB	n/a	n/a	MSV1488

The QC reported here applies to the following samples: Method: SW846 8260C

MC40029-1, MC40029-3, MC40029-4, MC40029-5, MC40029-6, MC40029-8, MC40029-9

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	104%	72-133%
2037-26-5	Toluene-D8	98%	85-114%
460-00-4	4-Bromofluorobenzene	98%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1488-BS	V41224.D	1	07/21/15	JB	n/a	n/a	MSV1488
MSV1488-BSD	V41225.D	1	07/21/15	JB	n/a	n/a	MSV1488

The QC reported here applies to the following samples: Method: SW846 8260C

MC40029-1, MC40029-3, MC40029-4, MC40029-5, MC40029-6, MC40029-8, MC40029-9

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	61.4	123	60.1	120	2	14-172/25
107-02-8	Acrolein	250	371	148	388	155	4	10-168/25
107-13-1	Acrylonitrile	50	53.5	107	53.1	106	1	41-158/25
71-43-2	Benzene	50	53.0	106	51.9	104	2	68-127/25
108-86-1	Bromobenzene	50	49.8	100	49.6	99	0	74-124/25
74-97-5	Bromochloromethane	50	50.4	101	50.4	101	0	68-135/25
75-27-4	Bromodichloromethane	50	46.3	93	46.2	92	0	72-144/25
75-25-2	Bromoform	50	44.3	89	44.6	89	1	59-147/25
74-83-9	Bromomethane	50	56.2	112	55.5	111	1	34-175/25
78-93-3	2-Butanone (MEK)	50	59.2	118	60.0	120	1	43-147/25
104-51-8	n-Butylbenzene	50	58.8	118	56.5	113	4	77-136/25
135-98-8	sec-Butylbenzene	50	55.1	110	53.7	107	3	75-134/25
98-06-6	tert-Butylbenzene	50	55.9	112	54.8	110	2	74-132/25
75-15-0	Carbon disulfide	50	65.4	131	70.1	140	7	34-171/25
56-23-5	Carbon tetrachloride	50	59.3	119	57.8	116	3	55-153/25
108-90-7	Chlorobenzene	50	48.9	98	47.8	96	2	71-123/25
75-00-3	Chloroethane	50	57.5	115	57.6	115	0	58-175/25
110-75-8	2-Chloroethyl vinyl ether	50	46.1	92	47.8	96	4	44-169/25
67-66-3	Chloroform	50	49.2	98	48.7	97	1	67-136/25
74-87-3	Chloromethane	50	56.8	114	54.4	109	4	25-182/25
95-49-8	o-Chlorotoluene	50	53.7	107	52.6	105	2	72-130/25
106-43-4	p-Chlorotoluene	50	53.1	106	52.0	104	2	73-127/25
124-48-1	Dibromochloromethane	50	45.3	91	45.0	90	1	73-139/25
95-50-1	1,2-Dichlorobenzene	50	48.7	97	48.0	96	1	77-125/25
541-73-1	1,3-Dichlorobenzene	50	49.6	99	49.4	99	0	77-124/25
106-46-7	1,4-Dichlorobenzene	50	47.6	95	46.8	94	2	73-128/25
75-71-8	Dichlorodifluoromethane	50	51.5	103	50.7	101	2	23-157/25
75-34-3	1,1-Dichloroethane	50	52.7	105	51.9	104	2	63-145/25
107-06-2	1,2-Dichloroethane	50	49.0	98	49.4	99	1	58-145/25
75-35-4	1,1-Dichloroethene	50	60.1	120	64.8	130	8	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	55.9	112	55.4	111	1	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	54.3	109	52.4	105	4	66-136/25
78-87-5	1,2-Dichloropropane	50	48.7	97	47.8	96	2	75-133/25
142-28-9	1,3-Dichloropropane	50	48.9	98	49.2	98	1	70-127/25
594-20-7	2,2-Dichloropropane	50	55.5	111	55.4	111	0	52-163/25
563-58-6	1,1-Dichloropropene	50	51.3	103	50.5	101	2	77-140/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1488-BS	V41224.D	1	07/21/15	JB	n/a	n/a	MSV1488
MSV1488-BSD	V41225.D	1	07/21/15	JB	n/a	n/a	MSV1488

The QC reported here applies to the following samples: Method: SW846 8260C

MC40029-1, MC40029-3, MC40029-4, MC40029-5, MC40029-6, MC40029-8, MC40029-9

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	50	59.4	119	59.7	119	1	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	51.0	102	51.7	103	1	77-143/25
123-91-1	1,4-Dioxane	250	190	76	173	69	9	30-182/25
97-63-2	Ethyl methacrylate	50	52.5	105	51.7	103	2	64-131/25
100-41-4	Ethylbenzene	50	53.2	106	50.9	102	4	71-129/25
87-68-3	Hexachlorobutadiene	50	46.5	93	47.5	95	2	64-146/25
591-78-6	2-Hexanone	50	60.7	121	59.2	118	3	22-163/25
98-82-8	Isopropylbenzene	50	56.8	114	55.6	111	2	72-133/25
99-87-6	p-Isopropyltoluene	50	57.4	115	56.5	113	2	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	52.0	104	54.8	110	5	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	53.5	107	52.4	105	2	47-145/25
74-95-3	Methylene bromide	50	46.6	93	48.2	96	3	70-132/25
75-09-2	Methylene chloride	50	49.5	99	53.1	106	7	55-146/25
91-20-3	Naphthalene	50	35.2	70	37.4	75	6	39-176/25
103-65-1	n-Propylbenzene	50	55.4	111	53.8	108	3	74-134/25
100-42-5	Styrene	50	57.3	115	55.7	111	3	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	48.5	97	46.6	93	4	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	46.2	92	46.2	92	0	58-145/25
127-18-4	Tetrachloroethene	50	48.4	97	47.2	94	3	63-137/25
108-88-3	Toluene	50	51.1	102	49.3	99	4	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	45.3	91	49.4	99	9	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	42.8	86	44.6	89	4	40-176/25
71-55-6	1,1,1-Trichloroethane	50	51.9	104	52.0	104	0	68-144/25
79-00-5	1,1,2-Trichloroethane	50	48.0	96	48.2	96	0	72-133/25
79-01-6	Trichloroethene	50	49.1	98	48.7	97	1	73-126/25
75-69-4	Trichlorofluoromethane	50	52.0	104	52.0	104	0	43-152/25
96-18-4	1,2,3-Trichloropropane	50	50.2	100	50.0	100	0	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	57.3	115	55.7	111	3	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	57.7	115	56.5	113	2	71-127/25
108-05-4	Vinyl Acetate	50	56.0	112	56.7	113	1	10-170/25
75-01-4	Vinyl chloride	50	54.4	109	55.0	110	1	36-167/25
	m,p-Xylene	100	110	110	105	105	5	68-130/25
95-47-6	o-Xylene	50	55.4	111	52.9	106	5	69-126/25
1330-20-7	Xylene (total)	150	165	110	158	105	4	67-129/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1488-BS	V41224.D	1	07/21/15	JB	n/a	n/a	MSV1488
MSV1488-BSD	V41225.D	1	07/21/15	JB	n/a	n/a	MSV1488

The QC reported here applies to the following samples: Method: SW846 8260C

MC40029-1, MC40029-3, MC40029-4, MC40029-5, MC40029-6, MC40029-8, MC40029-9

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	97%	98%	72-133%
2037-26-5	Toluene-D8	104%	102%	85-114%
460-00-4	4-Bromofluorobenzene	101%	102%	70-134%

* = Outside of Control Limits.

Volatile Internal Standard Area Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSV1488-CC1479	Injection Date:	07/21/15
Lab File ID:	V41224.D	Injection Time:	09:05
Instrument ID:	GCMSV	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	1019894	7.77	478183	11.09	85371	3.56	666181	6.58	489473	13.30
Upper Limit [a]	2039788	8.27	956366	11.59	170742	4.06	1332362	7.08	978946	13.80
Lower Limit [b]	509947	7.27	239092	10.59	42686	3.06	333091	6.08	244737	12.80
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSV1488-BSD	1041053	7.76	487967	11.09	84036	3.54	664824	6.58	491391	13.30
MSV1488-MB	978094	7.77	438573	11.09	89426	3.56	624059	6.59	446934	13.30
MSV1489-MB	978094	7.77	438573	11.09	89426	3.56	624059	6.59	446934	13.30
MC40029-1	907520	7.77	405450	11.09	70746	3.55	577151	6.59	408514	13.30
MC40029-6	940002	7.77	426521	11.09	89583	3.56	575136	6.59	436328	13.30
MC39872-1	918001	7.77	411359	11.09	77273	3.56	576997	6.59	419457	13.30
ZZZZZZ	901270	7.77	416434	11.09	82298	3.56	560928	6.59	428405	13.30
ZZZZZZ	854314	7.76	394433	11.09	70127	3.55	526586	6.58	391006	13.30
ZZZZZZ	860261	7.77	395475	11.09	74632	3.55	531421	6.59	396049	13.31
MC40029-3	894586	7.77	409023	11.10	78370	3.56	545371	6.59	415528	13.31
MC40029-4	837692	7.77	390380	11.10	68420	3.55	510436	6.59	395754	13.31
MC40029-5	815502	7.77	381089	11.10	71115	3.55	500780	6.59	384045	13.31
ZZZZZZ	839159	7.77	398300	11.10	75370	3.55	529203	6.59	424150	13.31
ZZZZZZ	876561	7.77	408482	11.10	69927	3.55	546363	6.59	411972	13.31
ZZZZZZ	910237	7.77	411357	11.10	81023	3.55	565350	6.59	410106	13.31
ZZZZZZ	886146	7.77	401924	11.10	69589	3.55	550234	6.59	401168	13.31
ZZZZZZ	1041352	7.77	479382	11.10	230149[c]	3.57	665806	6.60	477774	13.31
ZZZZZZ	1042062	7.77	481414	11.10	106796	3.56	678738	6.59	487278	13.31
MC40029-8	1020345	7.77	440097	11.10	83807	3.55	641898	6.59	441612	13.31
MC40029-9	1009427	7.77	453520	11.10	142338	3.55	669307	6.59	454371	13.31
MC39872-1MS	1062890	7.77	485684	11.10	93561	3.56	668402	6.59	482247	13.31
MC39872-1MSD	1025366	7.77	467594	11.10	88512	3.56	638678	6.59	468877	13.31
ZZZZZZ	997308	7.77	445547	11.10	91232	3.56	624144	6.59	447633	13.31
ZZZZZZ	990615	7.77	452648	11.10	88240	3.56	616363	6.59	451453	13.31
ZZZZZZ	893153	7.77	407889	11.10	82513	3.55	551429	6.59	413145	13.31

IS 1 = 1,4-Difluorobenzene
IS 2 = Chlorobenzene-D5
IS 3 = Tert Butyl Alcohol-D9
IS 4 = Pentafluorobenzene
IS 5 = 1,4-Dichlorobenzene-d4

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.
(c) Outside control limits. Target analytes not associated with this internal standard.

Volatile Surrogate Recovery Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8260C Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC40029-1	V41228.D	103	100	99
MC40029-3	V41234.D	112	101	97
MC40029-4	V41235.D	112	102	98
MC40029-5	V41236.D	113	103	98
MC40029-6	V41229.D	108	100	98
MC40029-8	V41244.D	101	97	102
MC40029-9	V41245.D	95	101	101
MSV1488-BS	V41224.D	97	104	101
MSV1488-BSD	V41225.D	98	102	102
MSV1488-MB	V41227.D	104	98	98

Surrogate Compounds	Recovery Limits
S1 = Dibromofluoromethane	72-133%
S2 = Toluene-D8	85-114%
S3 = 4-Bromofluorobenzene	70-134%

6.4.1

New England ACCUTEST LABORATORIES

GC/MS Semi-volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43842-MB	F81791.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542

The QC reported here applies to the following samples: Method: SW846 8270D

MC40029-3, MC40029-4, MC40029-5, MC40029-8, MC40029-9

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.5	ug/l	
95-57-8	2-Chlorophenol	ND	5.0	0.29	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.37	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.28	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.50	ug/l	
51-28-5	2,4-Dinitrophenol	ND	20	2.5	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	1.9	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.47	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.41	ug/l	
100-02-7	4-Nitrophenol	ND	20	2.5	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.30	ug/l	
108-95-2	Phenol	ND	5.0	0.25	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.34	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.30	ug/l	
62-53-3	Aniline	ND	10	2.5	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.0	0.82	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.0	0.21	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.51	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.0	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.54	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.0	0.24	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.0	0.42	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.0	0.24	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.0	0.21	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.0	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.0	0.37	ug/l	
132-64-9	Dibenzofuran	ND	2.0	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.0	0.37	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.0	0.72	ug/l	
84-66-2	Diethyl phthalate	ND	5.0	0.57	ug/l	
131-11-3	Dimethyl phthalate	ND	5.0	0.27	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.0	0.30	ug/l	
118-74-1	Hexachlorobenzene	ND	5.0	0.77	ug/l	

Method Blank Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43842-MB	F81791.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542

The QC reported here applies to the following samples: Method: SW846 8270D

MC40029-3, MC40029-4, MC40029-5, MC40029-8, MC40029-9

CAS No.	Compound	Result	RL	MDL	Units	Q
77-47-4	Hexachlorocyclopentadiene	ND	10	1.3	ug/l	
67-72-1	Hexachloroethane	ND	5.0	0.29	ug/l	
78-59-1	Isophorone	ND	5.0	0.23	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.6	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.1	ug/l	
98-95-3	Nitrobenzene	ND	5.0	0.26	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.0	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.0	0.52	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.0	0.77	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries		Limits
367-12-4	2-Fluorophenol	53%	10-80%
4165-62-2	Phenol-d5	36%	10-72%
118-79-6	2,4,6-Tribromophenol	81%	42-134%
4165-60-0	Nitrobenzene-d5	84%	25-117%
321-60-8	2-Fluorobiphenyl	74%	24-112%
1718-51-0	Terphenyl-d14	103%	48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

Method Blank Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43843-MB	I96979.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC40029-3, MC40029-4, MC40029-5, MC40029-8, MC40029-9

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.10	0.0075	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0084	ug/l	
120-12-7	Anthracene	ND	0.10	0.0098	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.050	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.015	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.050	0.019	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.013	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0074	ug/l	
86-73-7	Fluorene	ND	0.10	0.015	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.020	ug/l	
90-12-0	1-Methylnaphthalene	0.032	2.0	0.012	ug/l	J
91-57-6	2-Methylnaphthalene	0.085	2.0	0.011	ug/l	J
85-01-8	Phenanthrene	0.015	0.050	0.011	ug/l	J
129-00-0	Pyrene	ND	0.10	0.0085	ug/l	

CAS No.	Surrogate Recoveries		Limits
4165-60-0	Nitrobenzene-d5	82%	26-121%
321-60-8	2-Fluorobiphenyl	71%	28-107%
1718-51-0	Terphenyl-d14	100%	29-129%

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43842-BS	F81792.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
OP43842-BSD	F81793.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542

The QC reported here applies to the following samples: Method: SW846 8270D

MC40029-3, MC40029-4, MC40029-5, MC40029-8, MC40029-9

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
65-85-0	Benzoic Acid	50	23.0	46	22.1	44	4	10-70/20
95-57-8	2-Chlorophenol	50	38.3	77	35.7	71	7	39-100/20
59-50-7	4-Chloro-3-methyl phenol	50	42.3	85	39.9	80	6	43-112/20
120-83-2	2,4-Dichlorophenol	50	41.4	83	38.4	77	8	44-113/20
105-67-9	2,4-Dimethylphenol	50	38.3	77	38.0	76	1	21-108/20
51-28-5	2,4-Dinitrophenol	50	41.5	83	40.2	80	3	22-128/20
534-52-1	4,6-Dinitro-o-cresol	50	44.0	88	41.2	82	7	42-132/20
95-48-7	2-Methylphenol	50	36.4	73	34.3	69	6	34-91/20
	3&4-Methylphenol	100	72.6	73	68.1	68	6	31-90/20
88-75-5	2-Nitrophenol	50	43.3	87	40.7	81	6	40-118/20
100-02-7	4-Nitrophenol	50	25.1	50	23.5	47	7	10-71/20
87-86-5	Pentachlorophenol	50	33.9	68	32.4	65	5	33-123/20
108-95-2	Phenol	50	19.9	40	18.7	37	6	11-57/20
95-95-4	2,4,5-Trichlorophenol	50	44.3	89	41.2	82	7	50-122/20
88-06-2	2,4,6-Trichlorophenol	50	43.1	86	40.5	81	6	48-118/20
62-53-3	Aniline	50	27.5	55	33.0	66	18	18-90/20
101-55-3	4-Bromophenyl phenyl ether	50	49.4	99	46.4	93	6	55-126/20
85-68-7	Butyl benzyl phthalate	50	51.6	103	50.2	100	3	56-124/20
100-51-6	Benzyl Alcohol	50	41.1	82	38.4	77	7	13-106/20
91-58-7	2-Chloronaphthalene	50	51.2	102	49.8	100	3	45-123/20
106-47-8	4-Chloroaniline	50	42.9	86	41.9	84	2	35-111/20
111-91-1	bis(2-Chloroethoxy)methane	50	46.4	93	45.5	91	2	41-117/20
111-44-4	bis(2-Chloroethyl)ether	50	45.2	90	42.9	86	5	31-114/20
108-60-1	bis(2-Chloroisopropyl)ether	50	57.3	115	55.0	110	4	33-135/20
7005-72-3	4-Chlorophenyl phenyl ether	50	48.3	97	46.5	93	4	52-124/20
122-66-7	1,2-Diphenylhydrazine	50	57.1	114	53.2	106	7	45-119/20
121-14-2	2,4-Dinitrotoluene	50	47.4	95	46.6	93	2	52-128/20
606-20-2	2,6-Dinitrotoluene	50	48.0	96	46.3	93	4	50-126/20
91-94-1	3,3'-Dichlorobenzidine	50	42.9	86	42.9	86	0	46-134/20
132-64-9	Dibenzofuran	50	46.9	94	44.6	89	5	51-118/20
84-74-2	Di-n-butyl phthalate	50	51.6	103	48.7	97	6	57-120/20
117-84-0	Di-n-octyl phthalate	50	58.3	117	54.7	109	6	58-125/20
84-66-2	Diethyl phthalate	50	49.6	99	48.4	97	2	40-125/20
131-11-3	Dimethyl phthalate	50	48.5	97	47.6	95	2	10-145/20
117-81-7	bis(2-Ethylhexyl)phthalate	50	53.2	106	52.1	104	2	60-126/20
118-74-1	Hexachlorobenzene	50	46.0	92	42.8	86	7	53-127/20

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43842-BS	F81792.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542
OP43842-BSD	F81793.D	1	07/27/15	MR	07/16/15	OP43842	MSF3542

The QC reported here applies to the following samples: Method: SW846 8270D

MC40029-3, MC40029-4, MC40029-5, MC40029-8, MC40029-9

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
77-47-4	Hexachlorocyclopentadiene	50	27.9	56	27.2	54	3	10-75/20
67-72-1	Hexachloroethane	50	44.0	88	41.9	84	5	15-98/20
78-59-1	Isophorone	50	47.2	94	45.6	91	3	36-106/20
88-74-4	2-Nitroaniline	50	50.4	101	48.8	98	3	52-130/20
99-09-2	3-Nitroaniline	50	47.4	95	45.4	91	4	47-120/20
100-01-6	4-Nitroaniline	50	47.3	95	46.8	94	1	51-121/20
98-95-3	Nitrobenzene	50	47.4	95	45.7	91	4	27-120/20
62-75-9	n-Nitrosodimethylamine	50	35.4	71	35.0	70	1	10-87/20
621-64-7	N-Nitroso-di-n-propylamine	50	51.5	103	48.3	97	6	37-123/20
86-30-6	N-Nitrosodiphenylamine	50	47.3	95	44.3	89	7	50-112/20
110-86-1	Pyridine	50	10.9	22	24.3	49	76* [a]	10-72/20

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
367-12-4	2-Fluorophenol	49%	48%	10-80%
4165-62-2	Phenol-d5	37%	35%	10-72%
118-79-6	2,4,6-Tribromophenol	82%	78%	42-134%
4165-60-0	Nitrobenzene-d5	86%	85%	25-117%
321-60-8	2-Fluorobiphenyl	77%	76%	24-112%
1718-51-0	Terphenyl-d14	92%	92%	48-133%

(a) Outside control limits. Individual spike recoveries within acceptance limits.

* = Outside of Control Limits.

7.2.1

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Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43843-BS	I96980.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628
OP43843-BSD	I96981.D	1	07/27/15	MR	07/16/15	OP43843	MSI3628

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC40029-3, MC40029-4, MC40029-5, MC40029-8, MC40029-9

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
83-32-9	Acenaphthene	50	42.9	86	41.8	84	3	45-116/30
208-96-8	Acenaphthylene	50	40.8	82	39.5	79	3	34-110/30
120-12-7	Anthracene	50	45.0	90	43.5	87	3	50-117/30
56-55-3	Benzo(a)anthracene	50	44.4	89	43.3	87	3	55-139/30
50-32-8	Benzo(a)pyrene	50	51.9	104	48.7	97	6	48-131/30
205-99-2	Benzo(b)fluoranthene	50	51.7	103	48.0	96	7	49-141/30
191-24-2	Benzo(g,h,i)perylene	50	51.1	102	49.6	99	3	60-130/30
207-08-9	Benzo(k)fluoranthene	50	50.0	100	46.9	94	6	49-133/30
218-01-9	Chrysene	50	44.0	88	39.8	80	10	52-128/30
53-70-3	Dibenzo(a,h)anthracene	50	51.3	103	50.5	101	2	60-136/30
206-44-0	Fluoranthene	50	44.3	89	46.2	92	4	46-132/30
86-73-7	Fluorene	50	41.5	83	43.1	86	4	53-120/30
193-39-5	Indeno(1,2,3-cd)pyrene	50	50.4	101	49.1	98	3	57-134/30
90-12-0	1-Methylnaphthalene	50	39.8	80	39.0	78	2	41-105/30
91-57-6	2-Methylnaphthalene	50	43.7	87	42.8	86	2	36-111/30
85-01-8	Phenanthrene	50	42.8	86	40.9	82	5	50-120/30
129-00-0	Pyrene	50	43.5	87	44.8	90	3	48-127/30

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
4165-60-0	Nitrobenzene-d5	84%	71%	26-121%
321-60-8	2-Fluorobiphenyl	72%	77%	28-107%
1718-51-0	Terphenyl-d14	94%	102%	29-129%

* = Outside of Control Limits.

Semivolatile Internal Standard Area Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSF3542-CC3514	Injection Date:	07/27/15
Lab File ID:	F81790.D	Injection Time:	08:26
Instrument ID:	GCMSF	Method:	SW846 8270D

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
Check Std	26403	3.28	95019	4.31	54475	5.81	93075	7.06	103952	9.38	88393	10.88
Upper Limit [a]	52806	3.78	190038	4.81	108950	6.31	186150	7.56	207904	9.88	176786	11.38
Lower Limit [b]	13202	2.78	47510	3.81	27238	5.31	46538	6.56	51976	8.88	44197	10.38
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43842-MB	26262	3.28	96606	4.31	55539	5.80	99017	7.05	103440	9.38	92672	10.87
OP43842-BS	28177	3.28	104632	4.31	59651	5.81	100734	7.06	116589	9.38	100292	10.88
OP43842-BSD	26120	3.28	94943	4.31	54286	5.80	94684	7.06	105097	9.38	93309	10.88
ZZZZZZ	28406	3.28	105044	4.31	62097	5.81	109132	7.06	116121	9.38	107310	10.87
ZZZZZZ	28617	3.28	105563	4.31	61165	5.81	105618	7.05	114596	9.38	104496	10.88
ZZZZZZ	25465	3.28	96308	4.31	56643	5.81	100278	7.06	107477	9.38	99480	10.88
ZZZZZZ	25764	3.28	96412	4.31	55432	5.80	94960	7.05	101904	9.38	95484	10.88
ZZZZZZ	35408	3.28	137370	4.32	86528	5.81	125599	7.07	128085	9.39	121268	10.89
ZZZZZZ	29428	3.28	105071	4.31	62159	5.80	109793	7.05	118977	9.38	111880	10.88
ZZZZZZ	28950	3.28	108681	4.31	62626	5.81	104884	7.06	109991	9.38	103896	10.88
ZZZZZZ	35176	3.28	132292	4.31	76508	5.80	130237	7.06	115189	9.38	110072	10.88
MC40029-3	28266	3.28	103746	4.31	58816	5.80	109828	7.06	122501	9.38	113642	10.88
MC40029-4	26902	3.28	95883	4.31	55546	5.80	99423	7.06	107203	9.38	98421	10.88
MC40029-5	25988	3.28	95657	4.31	55269	5.81	101253	7.06	111639	9.38	105628	10.88
MC40029-8	32032	3.29	119003	4.31	65898	5.81	110424	7.06	112217	9.39	105766	10.88
MC40029-9	25456	3.28	94393	4.31	55406	5.81	96573	7.06	106846	9.38	103319	10.88
OP43935-MB	36523	3.28	128788	4.31	74973	5.80	132372	7.06	131037	9.38	117976	10.88
OP43935-BS	37604	3.28	138049	4.31	81476	5.81	137039	7.06	146662	9.39	121994	10.88
OP43935-MS	45165	3.28	151986	4.31	82508	5.81	130803	7.06	137806	9.39	151900	10.89
OP43935-MSD	51232	3.28	172915	4.31	91791	5.81	145683	7.06	142656	9.39	145799	10.89
ZZZZZZ	47917	3.28	161460	4.31	91926	5.81	135371	7.06	154780	9.39	141751	10.90
ZZZZZZ	39698	3.28	141937	4.31	79458	5.81	120514	7.06	125232	9.39	132988	10.89
ZZZZZZ	44859	3.28	162078	4.31	90236	5.81	147069	7.06	134828	9.39	133862	10.89
ZZZZZZ	44685	3.28	162008	4.31	92791	5.81	149576	7.06	140225	9.39	151110	10.89
ZZZZZZ	41606	3.28	147919	4.31	84744	5.81	136615	7.06	143062	9.39	143603	10.88
ZZZZZZ	39778	3.28	141881	4.31	81053	5.81	129444	7.06	131557	9.39	142050	10.89

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.

7.3.1

7

Semivolatile Internal Standard Area Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSF3542-CC3514	Injection Date:	07/27/15
Lab File ID:	F81790.D	Injection Time:	08:26
Instrument ID:	GCMSF	Method:	SW846 8270D

Lab Sample ID	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT

(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

7.3.1

7

Semivolatile Internal Standard Area Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSI3628-CC3621	Injection Date:	07/27/15
Lab File ID:	I96971.D	Injection Time:	08:18
Instrument ID:	GCMSI	Method:	SW846 8270D BY SIM

	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT
Check Std	306775	3.70	663769	4.74	291696	6.26	507638	7.59	541985	10.57	1355256	12.24
Upper Limit [a]	613550	4.20	1327538	5.24	583392	6.76	1015276	8.09	1083970	11.07	2710512	12.74
Lower Limit [b]	153388	3.20	331885	4.24	145848	5.76	253819	7.09	270993	10.07	677628	11.74
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43923-MB	325754	3.70	683372	4.74	326257	6.26	523166	7.58	557204	10.57	1549418	12.24
OP43923-BS	304534	3.70	641332	4.74	308253	6.26	514103	7.59	558383	10.58	1401765	12.24
OP43923-BSD	319012	3.70	703642	4.74	322010	6.26	548083	7.59	582333	10.58	1480001	12.24
ZZZZZZ	285985	3.70	636730	4.74	329334	6.26	503371	7.59	555866	10.58	1493646	12.24
ZZZZZZ	311554	3.70	665745	4.74	296981	6.25	523373	7.58	541504	10.57	1394568	12.24
ZZZZZZ	329407	3.70	692598	4.74	329216	6.25	529466	7.59	569866	10.58	1458851	12.24
ZZZZZZ	315192	3.70	665393	4.74	286563	6.25	494411	7.59	536206	10.58	1265618	12.24
OP43843-MB	272790	3.70	556719	4.74	286860	6.25	474289	7.59	463440	10.57	1231413	12.24
OP43843-BS	270409	3.70	675258	4.74	310577	6.26	518535	7.59	548649	10.58	1397505	12.24
OP43843-BSD	247920	3.70	625843	4.74	262863	6.26	474615	7.59	462980	10.58	1283050	12.24
ZZZZZZ	289029	3.70	636655	4.74	302241	6.26	481401	7.59	541352	10.57	1350382	12.24
ZZZZZZ	281266	3.70	564066	4.74	271431	6.25	539220	7.58	567117	10.57	1477607	12.24
ZZZZZZ	278558	3.70	544659	4.74	254460	6.26	449680	7.59	464618	10.58	1082903	12.24
ZZZZZZ	255466	3.70	514921	4.74	247560	6.26	445885	7.59	412535	10.58	1252730	12.24
ZZZZZZ	282916	3.70	684339	4.75	397141	6.27	474936	7.60	478696	10.60	1355454	12.26
ZZZZZZ	255845	3.70	617623	4.74	296830	6.26	462267	7.59	534669	10.58	1320211	12.24
ZZZZZZ	243739	3.70	597972	4.74	262415	6.26	430129	7.59	436968	10.58	1052382	12.24
ZZZZZZ	314555	3.70	694270	4.74	336274	6.26	536389	7.59	535581	10.58	1299059	12.24
MC40029-3	250672	3.70	560096	4.74	263711	6.26	494857	7.59	488689	10.58	1046523	12.24
MC40029-4	272847	3.70	565993	4.74	253305	6.26	403091	7.59	405207	10.58	994297	12.24
MC40029-5	229749	3.70	539540	4.74	241280	6.26	391079	7.59	501188	10.58	1286099	12.24
MC40029-8	254937	3.70	603902	4.74	270830	6.26	427591	7.59	515130	10.58	1078687	12.24
MC40029-9	218158	3.70	493903	4.74	248659	6.26	408152	7.59	374520	10.58	944323	12.24

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

7.3.2

Semivolatile Surrogate Recovery Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3	S4	S5	S6
MC40029-3	F81802.D	44	30	77	81	76	93
MC40029-4	F81803.D	45	29	75	82	74	93
MC40029-5	F81804.D	34	24	74	65	62	86
MC40029-8	F81805.D	49	32	79	78	73	92
MC40029-9	F81806.D	39	27	76	72	71	95
OP43842-BS	F81792.D	49	37	82	86	77	92
OP43842-BSD	F81793.D	48	35	78	85	76	92
OP43842-MB	F81791.D	53	36	81	84	74	103

Surrogate Compounds	Recovery Limits
S1 = 2-Fluorophenol	10-80%
S2 = Phenol-d5	10-72%
S3 = 2,4,6-Tribromophenol	42-134%
S4 = Nitrobenzene-d5	25-117%
S5 = 2-Fluorobiphenyl	24-112%
S6 = Terphenyl-d14	48-133%

Semivolatile Surrogate Recovery Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D BY SIM Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC40029-3	I96990.D	85	67	81
MC40029-4	I96991.D	80	64	100
MC40029-5	I96992.D	67	57	84
MC40029-8	I96993.D	70	67	91
MC40029-9	I96994.D	69	62	98
OP43843-BS	I96980.D	84	72	94
OP43843-BSD	I96981.D	71	77	102
OP43843-MB	I96979.D	82	71	100

Surrogate Compounds	Recovery Limits
S1 = Nitrobenzene-d5	26-121%
S2 = 2-Fluorobiphenyl	28-107%
S3 = Terphenyl-d14	29-129%

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GC Volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Surrogate Recovery Summaries
- GC Surrogate Retention Time Summaries

Method Blank Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43937-MB	BB63905.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462

The QC reported here applies to the following samples: Method: SW846 8011

MC40029-2, MC40029-3, MC40029-4, MC40029-5, MC40029-7, MC40029-8, MC40029-9

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.015	0.0061	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.015	0.0061	ug/l	

CAS No.	Surrogate Recoveries		Limits
460-00-4	Bromofluorobenzene (S)	108%	60-140%
460-00-4	Bromofluorobenzene (S)	111%	60-140%

8.1.1

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43937-BS	BB63906.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462
OP43937-BSD	BB63907.D	1	07/27/15	NK	07/23/15	OP43937	GBB3462

The QC reported here applies to the following samples: Method: SW846 8011

MC40029-2, MC40029-3, MC40029-4, MC40029-5, MC40029-7, MC40029-8, MC40029-9

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
96-12-8	1,2-Dibromo-3-chloropropane	0.071	0.076	107	0.081	114	6	45-149/30
106-93-4	1,2-Dibromoethane	0.071	0.078	110	0.085	120	9	51-149/30

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
460-00-4	Bromofluorobenzene (S)	114%	110%	60-140%
460-00-4	Bromofluorobenzene (S)	112%	105%	60-140%

8.2.1

* = Outside of Control Limits.

Volatile Surrogate Recovery Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8011 Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1 [a]	S1 [b]
MC40029-2	BB63919.D	107	111
MC40029-3	BB63920.D	107	107
MC40029-4	BB63921.D	111	104
MC40029-5	BB63922.D	106	98
MC40029-7	BB63923.D	116	111
MC40029-8	BB63924.D	104	164* [c]
MC40029-9	BB63925.D	119	130
OP43937-BS	BB63906.D	114	112
OP43937-BSD	BB63907.D	110	105
OP43937-MB	BB63905.D	108	111

Surrogate Compounds	Recovery Limits
S1 = Bromofluorobenzene (S)	60-140%

(a) Recovery from GC signal #2
(b) Recovery from GC signal #1
(c) Outside control limits.Sample non-detect for target analytes.

8.3.1

GC Surrogate Retention Time Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3462-ICC3462	Injection Date:	07/27/15
Lab File ID:	BB63901.D	Injection Time:	11:33
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	6.30	7.29

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
OP43937-MB	BB63905.D	07/27/15	13:26	6.31	7.29
OP43937-BS	BB63906.D	07/27/15	13:55	6.30	7.28
OP43937-BSD	BB63907.D	07/27/15	14:23	6.30	7.28
ZZZZZZ	BB63908.D	07/27/15	14:52	6.31	7.29
ZZZZZZ	BB63909.D	07/27/15	15:21	6.30	7.28
ZZZZZZ	BB63910.D	07/27/15	15:49	6.30	7.28
ZZZZZZ	BB63911.D	07/27/15	16:17	6.30	7.28
ZZZZZZ	BB63912.D	07/27/15	16:46	6.30	7.27
ZZZZZZ	BB63913.D	07/27/15	17:14	6.31	7.29
ZZZZZZ	BB63914.D	07/27/15	17:43	6.29	7.27

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

GC Surrogate Retention Time Summary

Job Number: MC40029
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3462-CC3462	Injection Date:	07/27/15
Lab File ID:	BB63915.D	Injection Time:	18:11
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	6.31	7.29

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
ZZZZZZ	BB63916.D	07/27/15	18:40	6.31	7.28
ZZZZZZ	BB63917.D	07/27/15	19:08	6.30	7.28
ZZZZZZ	BB63918.D	07/27/15	19:36	6.31	7.28
MC40029-2	BB63919.D	07/27/15	20:04	6.31	7.29
MC40029-3	BB63920.D	07/27/15	20:32	6.30	7.28
MC40029-4	BB63921.D	07/27/15	21:00	6.31	7.29
MC40029-5	BB63922.D	07/27/15	21:28	6.31	7.29
MC40029-7	BB63923.D	07/27/15	21:56	6.31	7.29
MC40029-8	BB63924.D	07/27/15	22:23	6.30	7.27
MC40029-9	BB63925.D	07/27/15	22:51	6.31	7.28
GBB3462-ECC3462	BB63926.D	07/27/15	23:19	6.31	7.29

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

8.4.2

Roxana Groundwater Quarterly – 3rd Quarter 2015 Data Review

Laboratory SDG: MC40064

Data Reviewer: Elizabeth Kunkel

Peer Reviewer: Steve Gragert

Date Reviewed: 8/26/2015

Guidance: USEPA National Functional Guidelines for Superfund Organic Methods Data Review 2014

Sample Identification	Sample Identification
TB-ROX-071515-HCL-A	TB-ROX-071515-ST-A
MW6A-ROX-071515	MW28-ROX-071515-EB
MW28-ROX-071515-EB	MW28-ROX-071515
MW22-ROX-071515	TB-ROX-071515-HCL-B
TB-ROX-071515-ST-B	MW25-ROX-071515
MW8-ROX-071515	MW7-ROX-071515
MW7-ROX-071515-Dup	

1.0 Data Package Completeness

Were all items delivered as specified in the QAPP and COC as appropriate?

Yes. The trip blank A/B grouping designations on the COC did not match bottle labels; AECOM instructed Accutest to proceed with analyses. Analytes were not detected in the trip blanks. No qualification of data was required.

2.0 Laboratory Case Narrative \ Cooler Receipt Form

Were problems noted in the laboratory case narrative or cooler receipt form?

Yes, the laboratory case narrative indicated the LCS recovery for benzoic acid was outside evaluation criteria. The surrogate bromofluorobenzene was outside criteria for Method 8011 VOCs in several samples. 2-Methylnaphthalene was detected in a method blank. Although not indicated in the laboratory case narrative, VOCs and PAHs were detected in equipment blank, MW28-ROX-071515-EB. These issues are addressed further in the appropriate sections below.

Additionally, initial calibration verifications exceeded 30 percent difference (%D) for VOC compounds acrolein, acetone, carbon disulfide, 2-butanone, and 2-hexanone, and for the SVOC compound hexachlorocyclopentadiene. The continuing calibration verification exceeded 40% D for the SVOC compound benzoic acid. Continuing calibration verifications exceeded 15%D for 1,2-dibromoethane and 1,2-dibromo-3-chloropropane.

The cooler receipt form indicated that two of two coolers were received by the laboratory at temperatures of 0.6°C and 1.1°C, which are outside the 4ºC ± 2ºC criteria. Samples were received in good condition; therefore, no qualification of data was required.

3.0 Holding Times

Were samples extracted/analyzed within applicable limits?

Yes

4.0 Blank Contamination

Were any analytes detected in the Method Blanks, Field Blanks or Trip Blanks?

Yes

Blank ID	Parameter	Analyte	Concentration/ Amount
MW28-ROX-071515-EB	VOCs	Chloroform	0.65 µg/L
MW28-ROX-071515-EB	VOCs	Toluene	0.36 µg/L
MW28-ROX-071515-EB	PAHs	1-Methylnaphthalene	0.099 µg/L
MW28-ROX-071515-EB	PAHs	2-Methylnaphthalene	0.24 µg/L
OP43886-MB	PAHs	2-Methylnaphthalene	0.020 µg/L

Analytical data that were reported non-detect or at concentrations greater than five times (5X) the associated blank concentration did not require qualification. Please see section 12.0 of this review for additional qualifications regarding samples associated with PAHs in method blank OP43886-MB and equipment blank MW28-ROX-071515-EB.

5.0 Laboratory Control Sample

Were LCS recoveries within evaluation criteria?

No

LCS/LCSD ID	Parameter	Analyte	LCS Percent Recovery	LCS Criteria
OP43885-BS	SVOCs	Benzoic acid	**101**	10-70

Analytical data reported as non-detect and associated with LCS recoveries above evaluation criteria, indicating a possible high bias, did not require qualification. No qualification of data was required.

6.0 Surrogate Recoveries

Were surrogate recoveries within evaluation criteria?

No

Sample ID	Parameter	Surrogate	Recovery (%)	Criteria (%)
MW22-ROX-071515	Method 8011 VOCs	Bromofluorobenzene	**195**	60-140
MW8-ROX-071515	Method 8011 VOCs	Bromofluorobenzene	**156**	60-140
MW7-ROX-071515	Method 8011 VOCs	Bromofluorobenzene	**146**	60-140
MW7-ROX-071515-Dup	Method 8011 VOCs	Bromofluorobenzene	**149**	60-140

Analytical data reported as non-detect and associated with surrogate recoveries above evaluation criteria, indicating a possible high bias, did not require qualification. No qualification of data was required.

7.0 Matrix Spike and Matrix Spike Duplicate Recoveries

Were MS/MSD samples analyzed as part of this SDG?

No

8.0 Internal Standard (IS) Recoveries

Were internal standard area recoveries within evaluation criteria?

Yes

9.0 Laboratory Duplicate Results

Were laboratory duplicate samples analyzed as part of this SDG?

No

10.0 Field Duplicate Results

Were field duplicate samples collected as part of this SDG?

Yes

Field ID	Field Duplicate ID
MW7-ROX-071515	MW7-ROX-071515-Dup

Were field duplicates within evaluation criteria?

Yes

11.0 Sample Dilutions

For samples that were diluted and nondetect, were undiluted results also reported?

Not applicable; analytes were detected in samples requiring dilution.

12.0 Additional Qualifications

Were additional qualifications applied?

Yes, professional judgment was also used to qualify as estimated, however not reject, data that was associated with PAHs in method blank OP43886-MB and equipment blank MW28-ROX-071515-EB , due to comparable historical detections.

Sample ID	Parameter	Analyte	New Reporting Limit (RL)	Qualification
MW6A-ROX-071515	PAHs	2-Methylnaphthalene	-	**J**
MW28-ROX-071515	PAHs	2-Methylnaphthalene	-	**J**
MW28-ROX-071515	PAHs	1-Methylnaphthalene	-	**J**

New England ACCUTEST LABORATORIES

08/31/15



Technical Report for

Shell Oil

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana,

60400249

Accutest Job Number: MC40064

Sampling Date: 07/15/15

Report to:

AECOM, INC.

elizabeth.kunkel@aecom.com

ATTN: Elizabeth Kunkel

Revised on 8/31/2015

Total number of pages in report: 117

NELAP ACCREDITED TNI LABORATORY

Test results contained within this data package meet the requirements of the National Environmental Laboratory Accreditation Program and/or state specific certification programs as applicable.

Reza Tand
Lab Director

Client Service contact: Jeremy Vienneau 508-481-6200

Certifications: MA (M-MA136,SW846 NELAC) CT (PH-0109) NH (250210) RI (00071) ME (MA00136) FL (E87579) NY (11791) NJ (MA926) PA (6801121) ND (R-188) CO MN (11546AA) NC (653) IL (002337) WI (399080220) DoD ELAP (L-A-B L2235)

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Sample Summary

Shell Oil

Job No: MC40064

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Collected Date	Time By	Received	Matrix Code	Matrix Type	Client Sample ID
MC40064-1	07/15/15	00:00 SFES	07/16/15	AQ	Trip Blank Water	TB-ROX-071515-HCL-A
MC40064-2	07/15/15	00:00 SFES	07/16/15	AQ	Trip Blank Water	TB-ROX-071515-ST-A
MC40064-3	07/15/15	10:10 SFES	07/16/15	AQ	Ground Water	MW6A-ROX-071515
MC40064-4	07/15/15	10:20 SFES	07/16/15	AQ	Equipment Blank	MW28-ROX-071515-EB
MC40064-5	07/15/15	11:20 SFES	07/16/15	AQ	Ground Water	MW28-ROX-071515
MC40064-6	07/15/15	13:35 SFES	07/16/15	AQ	Ground Water	MW22-ROX-071515
MC40064-7	07/15/15	00:00 SFES	07/16/15	AQ	Trip Blank Water	TB-ROX-071515-HCL-B
MC40064-8	07/15/15	00:00 SFES	07/16/15	AQ	Trip Blank Water	TB-ROX-071515-ST-B
MC40064-9	07/15/15	10:05 SFES	07/16/15	AQ	Ground Water	MW25-ROX-071515
MC40064-10	07/15/15	13:30 SFES	07/16/15	AQ	Ground Water	MW8-ROX-071515
MC40064-11	07/15/15	14:05 ESCW	07/16/15	AQ	Ground Water	MW7-ROX-071515
MC40064-12	07/15/15	14:05 ESCW	07/16/15	AQ	Ground Water	MW7-ROX-071515-DUP

SAMPLE DELIVERY GROUP CASE NARRATIVE

Client:	Shell Oil	**Job No**	MC40064
Site:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Centra	**Report Date**	8/4/2015 12:37:31 PM

8 Sample(s) and 4 Trip Blank(s) were collected on 07/15/2015 and were received at Accutest on 07/16/2015 properly preserved, at 1.6 Deg. C and intact. These Samples received an Accutest job number of MC40064. A listing of the Laboratory Sample ID, Client Sample ID and dates of collection are presented in the Results Summary Section of this report. 1-Chlorohexane, Benzenethiol, Dibenz(a,h)acridine, Indene, and Quinoline were searched in the library search and reported only if detections were found.

Except as noted below, all method specified calibrations and quality control performance criteria were met for this job. For more information, please refer to QC summary pages.

Volatiles by GCMS By Method SW846 8260C

Matrix: AQ **Batch ID:** MSV1492

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- Initial calibration verification standard MSV1479-ICV1479 for acrolein, Acetone, iodomethane, carbon disulfide, 2-butanone, 2-hexanone exceeds 30% Difference (response bias high). Associated samples are non-detect for these compounds.

Extractables by GCMS By Method SW846 8270D

Matrix: AQ **Batch ID:** OP43885

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- Sample(s) MC40121-3MS, MC40121-3MSD were used as the QC samples indicated.
- All method blanks for this batch meet method specific criteria.
- OP43885-MS/MSD Recovery(s) for 3,3'-Dichlorobenzidine are outside control limits. Outside control limits due to possible matrix interference. Refer to Blank Spike.
- Initial calibration verification MSW902-ICV902, file W21009 for Hexachlorocyclopentadiene exceed 30% Difference.
- RPD(s) for MSD for 2,4-Dinitrophenol, 4,6-Dinitro-o-cresol, Pentachlorophenol, Pyridine are outside control limits for sample OP43885-MSD. High RPD due to possible matrix interference and/or sample non-homogeneity.
- OP43885-BS/MS/MSD for Benzoic Acid: Outside control limits. Associated samples are non-detect for this compound.
- Continuing calibration check standard MSX207-CC206, file X06589 for Benzoic Acid exceed 40% Difference (response bias high). Associated samples are non-detect for this compound.
- Continuing calibration check standard MSX207-CC206, file X06588 not associate with this job.

Extractables by GCMS By Method SW846 8270D BY SIM

Matrix: AQ **Batch ID:** OP43886

- All samples were extracted within the recommended method holding time.
- All samples were analyzed within the recommended method holding time.
- Sample(s) MC40000-5MS, MC40000-5MSD were used as the QC samples indicated.
- Sample(s) MC40064-3, MC40064-5 have compound(s) reported with a "B" qualifier, indicating analyte is found in the associated method blank.

Volatiles by GC By Method SW846 8011

Matrix: AQ	Batch ID: OP43994

- All samples were analyzed within the recommended method holding time.
- All method blanks for this batch meet method specific criteria.
- Continuing calibration check standard GBB3463-CC3463, file BB63946 for 1,2-Dibromo-3-chloropropane and fileBB63950 for 1,2-Dibromoethane, 1,2-Dibromo-3-chloropropane exceed 15% Dev (response bias high). Associated samples are non-detect for this compound.
- MC40064-6,10,11,12 for Bromofluorobenzene (S): Outside control limits.Sample non-detect for target analytes.

The Accutest Laboratories of New England certifies that all analysis were performed within method specification. It is further recommended that this report to be used in its entirety.The Accutest Laboratories of NE, Laboratory Director or assignee as verified by the signature on the cover page has authorized the release of this report(MC40064).

Summary of Hits

Job Number: MC40064
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/15/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
MC40064-1	TB-ROX-071515-HCL-A					
No hits reported in this sample.						
MC40064-2	TB-ROX-071515-ST-A					
No hits reported in this sample.						
MC40064-3	MW6A-ROX-071515					
Methyl Tert Butyl Ether		4.5	1.0	0.35	ug/l	SW846 8260C
Acenaphthene		0.11	0.11	0.0085	ug/l	SW846 8270D BY SIM
Anthracene		0.047 J	0.11	0.011	ug/l	SW846 8270D BY SIM
Fluorene		0.058 J	0.11	0.017	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.056 J	2.3	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.076 JB	2.3	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.026 J	0.057	0.012	ug/l	SW846 8270D BY SIM
MC40064-4	MW28-ROX-071515-EB					
Chloroform		0.65 J	1.0	0.40	ug/l	SW846 8260C
Toluene		0.36 J	1.0	0.29	ug/l	SW846 8260C
1-Methylnaphthalene		0.099 J	2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.24 J	2.2	0.012	ug/l	SW846 8270D BY SIM
MC40064-5	MW28-ROX-071515					
Benzene		66.8	0.50	0.27	ug/l	SW846 8260C
1,2,4-Trimethylbenzene		0.31 J	5.0	0.29	ug/l	SW846 8260C
1-Methylnaphthalene		0.21 J	2.2	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.10 JB	2.2	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.020 J	0.056	0.012	ug/l	SW846 8270D BY SIM
MC40064-6	MW22-ROX-071515					
Benzene		2920	10	5.4	ug/l	SW846 8260C
Ethylbenzene		3210	20	4.8	ug/l	SW846 8260C
Isopropylbenzene		92.6 J	100	5.3	ug/l	SW846 8260C
Naphthalene		219	100	12	ug/l	SW846 8260C
n-Propylbenzene		185	100	5.8	ug/l	SW846 8260C
Toluene		5050	20	5.9	ug/l	SW846 8260C
1,2,4-Trimethylbenzene		1310	100	5.7	ug/l	SW846 8260C
1,3,5-Trimethylbenzene		296	100	4.0	ug/l	SW846 8260C
m,p-Xylene		6700	20	9.3	ug/l	SW846 8260C
o-Xylene		3480	20	4.3	ug/l	SW846 8260C

Summary of Hits

Job Number: MC40064
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/15/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
Xylene (total)		10200	20	4.3	ug/l	SW846 8260C
2-Methylphenol		7.5 J	57	1.2	ug/l	SW846 8270D
Acenaphthene		0.13	0.11	0.0086	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.028 J	0.11	0.0097	ug/l	SW846 8270D BY SIM
Fluorene		0.11	0.11	0.017	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		21.6	2.3	0.014	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		37.4	2.3	0.013	ug/l	SW846 8270D BY SIM
Phenanthrene		0.099	0.057	0.012	ug/l	SW846 8270D BY SIM
Total TIC, Semi-Volatile		33 J			ug/l	
MC40064-7	TB-ROX-071515-HCL-B					
No hits reported in this sample.						
MC40064-8	TB-ROX-071515-ST-B					
No hits reported in this sample.						
MC40064-9	MW25-ROX-071515					
Benzene		71900	100	54	ug/l	SW846 8260C
Tetrachloroethene		57.7 J	200	41	ug/l	SW846 8260C
Phenol		112	5.2	0.26	ug/l	SW846 8270D
Acenaphthene		0.036 J	0.10	0.0078	ug/l	SW846 8270D BY SIM
Fluorene		0.019 J	0.10	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		0.88 J	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		0.49 J	2.1	0.011	ug/l	SW846 8270D BY SIM
Phenanthrene		0.017 J	0.052	0.011	ug/l	SW846 8270D BY SIM
MC40064-10	MW8-ROX-071515					
Benzene		879000	2500	1400	ug/l	SW846 8260C
2-Methylphenol		1.8 J	11	0.22	ug/l	SW846 8270D
3&4-Methylphenol		4.6 J	11	0.49	ug/l	SW846 8270D
Phenol		135	5.3	0.26	ug/l	SW846 8270D
bis(2-Chloroethyl)ether		17.1	5.3	0.44	ug/l	SW846 8270D
Acenaphthene		0.18	0.11	0.0079	ug/l	SW846 8270D BY SIM
Anthracene		0.037 J	0.11	0.010	ug/l	SW846 8270D BY SIM
Fluorene		0.30	0.11	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		11.3	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		8.3	2.1	0.012	ug/l	SW846 8270D BY SIM
Phenanthrene		0.16	0.053	0.011	ug/l	SW846 8270D BY SIM

Summary of Hits

Job Number: MC40064
Account: Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Collected: 07/15/15

Lab Sample ID / Analyte	Client Sample ID	Result/ Qual	RL	MDL	Units	Method
MC40064-11	MW7-ROX-071515					
Benzene		1300000	2500	1400	ug/l	SW846 8260C
3&4-Methylphenol		3.1 J	10	0.48	ug/l	SW846 8270D
Phenol		104	5.1	0.26	ug/l	SW846 8270D
Di-n-butyl phthalate		0.63 J	5.1	0.38	ug/l	SW846 8270D
bis(2-Ethylhexyl)phthalate		0.37 J	2.0	0.31	ug/l	SW846 8270D
Acenaphthene		0.27	0.10	0.0077	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.038 J	0.10	0.0086	ug/l	SW846 8270D BY SIM
Anthracene		0.038 J	0.10	0.010	ug/l	SW846 8270D BY SIM
Chrysene		0.033 J	0.10	0.013	ug/l	SW846 8270D BY SIM
Fluoranthene		0.019 J	0.10	0.0076	ug/l	SW846 8270D BY SIM
Fluorene		0.21	0.10	0.015	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		4.7	2.0	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		6.5	2.0	0.011	ug/l	SW846 8270D BY SIM
Phenanthrene		0.31	0.051	0.011	ug/l	SW846 8270D BY SIM
Pyrene		0.052 J	0.10	0.0087	ug/l	SW846 8270D BY SIM
MC40064-12	MW7-ROX-071515-DUP					
Benzene		1370000	2500	1400	ug/l	SW846 8260C
3&4-Methylphenol		3.2 J	10	0.49	ug/l	SW846 8270D
Phenol		117	5.2	0.26	ug/l	SW846 8270D
Di-n-butyl phthalate		0.57 J	5.2	0.39	ug/l	SW846 8270D
Acenaphthene		0.25	0.10	0.0078	ug/l	SW846 8270D BY SIM
Acenaphthylene		0.043 J	0.10	0.0088	ug/l	SW846 8270D BY SIM
Anthracene		0.039 J	0.10	0.010	ug/l	SW846 8270D BY SIM
Chrysene		0.034 J	0.10	0.014	ug/l	SW846 8270D BY SIM
Fluoranthene		0.023 J	0.10	0.0077	ug/l	SW846 8270D BY SIM
Fluorene		0.18	0.10	0.016	ug/l	SW846 8270D BY SIM
1-Methylnaphthalene		5.5	2.1	0.013	ug/l	SW846 8270D BY SIM
2-Methylnaphthalene		8.2	2.1	0.011	ug/l	SW846 8270D BY SIM
Phenanthrene		0.34	0.052	0.011	ug/l	SW846 8270D BY SIM
Pyrene		0.053 J	0.10	0.0089	ug/l	SW846 8270D BY SIM

New England ACCUTEST LABORATORIES

Sample Results

Report of Analysis

Report of Analysis

Client Sample ID:	TB-ROX-071515-HCL-A		
Lab Sample ID:	MC40064-1	Date Sampled:	07/15/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41299.D	1	07/22/15	JB	n/a	n/a	MSV1492
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071515-HCL-A		
Lab Sample ID:	MC40064-1	Date Sampled:	07/15/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071515-HCL-A		
Lab Sample ID:	MC40064-1	Date Sampled:	07/15/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	110%		72-133%
2037-26-5	Toluene-D8	101%		85-114%
460-00-4	4-Bromofluorobenzene	99%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071515-ST-A		
Lab Sample ID:	MC40064-2	Date Sampled:	07/15/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/16/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63939.D	1	07/28/15	NK	07/28/15	OP43994	GBB3463
Run #2							

	Initial Volume	Final Volume
Run #1	36.6 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	102%		60-140%
460-00-4	Bromofluorobenzene (S)	93%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6A-ROX-071515		
Lab Sample ID:	MC40064-3	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41304.D	1	07/23/15	JB	n/a	n/a	MSV1492
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6A-ROX-071515		
Lab Sample ID:	MC40064-3	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	4.5	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6A-ROX-071515		
Lab Sample ID:	MC40064-3	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	114%		72-133%
2037-26-5	Toluene-D8	102%		85-114%
460-00-4	4-Bromofluorobenzene	100%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6A-ROX-071515		
Lab Sample ID:	MC40064-3	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	W23148.D	1	07/31/15	MR	07/20/15	OP43885	MSW981
Run #2							

	Initial Volume	Final Volume
Run #1	880 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.8	ug/l	
95-57-8	2-Chlorophenol	ND	5.7	0.33	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.41	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.32	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.57	ug/l	
51-28-5	2,4-Dinitrophenol	ND	23	2.8	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.2	ug/l	
95-48-7	2-Methylphenol	ND	11	0.24	ug/l	
	3&4-Methylphenol	ND	11	0.53	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.46	ug/l	
100-02-7	4-Nitrophenol	ND	23	2.8	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.34	ug/l	
108-95-2	Phenol	ND	5.7	0.28	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.39	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.34	ug/l	
62-53-3	Aniline	ND	11	2.8	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.7	0.93	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.7	0.24	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.58	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.7	0.18	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.61	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.7	0.28	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.7	0.47	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.7	0.27	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.7	0.24	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.7	0.27	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.7	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.6	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.7	0.43	ug/l	
132-64-9	Dibenzofuran	ND	2.3	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.7	0.42	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.7	0.82	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range
J = Indicates an estimated value
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6A-ROX-071515		
Lab Sample ID:	MC40064-3	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.7	0.64	ug/l	
131-11-3	Dimethyl phthalate	ND	5.7	0.30	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.3	0.34	ug/l	
118-74-1	Hexachlorobenzene	ND	5.7	0.87	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.7	0.33	ug/l	
78-59-1	Isophorone	ND	5.7	0.26	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.1	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.5	ug/l	
98-95-3	Nitrobenzene	ND	5.7	0.29	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.7	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.7	0.59	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.7	0.88	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	49%		10-80%
4165-62-2	Phenol-d5	36%		10-72%
118-79-6	2,4,6-Tribromophenol	118%		42-134%
4165-60-0	Nitrobenzene-d5	87%		25-117%
321-60-8	2-Fluorobiphenyl	80%		24-112%
1718-51-0	Terphenyl-d14	110%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6A-ROX-071515		
Lab Sample ID:	MC40064-3	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I97049.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630
Run #2							

	Initial Volume	Final Volume
Run #1	880 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.11	0.11	0.0085	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0095	ug/l	
120-12-7	Anthracene	0.047	0.11	0.011	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.057	0.027	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.057	0.022	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.017	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0084	ug/l	
86-73-7	Fluorene	0.058	0.11	0.017	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.023	ug/l	
90-12-0	1-Methylnaphthalene	0.056	2.3	0.014	ug/l	J
91-57-6	2-Methylnaphthalene	0.076	2.3	0.012	ug/l	JB J
85-01-8	Phenanthrene	0.026	0.057	0.012	ug/l	J
129-00-0	Pyrene	ND	0.11	0.0097	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	84%		26-121%
321-60-8	2-Fluorobiphenyl	71%		28-107%
1718-51-0	Terphenyl-d14	110%		29-129%

ND = Not detected MDL = Method Detection Limit
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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW6A-ROX-071515		
Lab Sample ID:	MC40064-3	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63940.D	1	07/28/15	NK	07/28/15	OP43994	GBB3463
Run #2							

	Initial Volume	Final Volume
Run #1	37.6 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	106%		60-140%
460-00-4	Bromofluorobenzene (S)	102%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515-EB		
Lab Sample ID:	MC40064-4	Date Sampled:	07/15/15
Matrix:	AQ - Equipment Blank	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41300.D	1	07/22/15	JB	n/a	n/a	MSV1492
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	0.65	1.0	0.40	ug/l	J
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515-EB		
Lab Sample ID:	MC40064-4	Date Sampled:	07/15/15
Matrix:	AQ - Equipment Blank	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	0.36	1.0	0.29	ug/l	J
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515-EB		
Lab Sample ID:	MC40064-4	Date Sampled:	07/15/15
Matrix:	AQ - Equipment Blank	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	113%		72-133%
2037-26-5	Toluene-D8	101%		85-114%
460-00-4	4-Bromofluorobenzene	99%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515-EB		
Lab Sample ID:	MC40064-4	Date Sampled:	07/15/15
Matrix:	AQ - Equipment Blank	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	W23149.D	1	07/31/15	MR	07/20/15	OP43885	MSW981
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.8	ug/l	
95-57-8	2-Chlorophenol	ND	5.6	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.41	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.56	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.8	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.52	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.45	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.8	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.33	ug/l	
108-95-2	Phenol	ND	5.6	0.28	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.38	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.8	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.6	0.91	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.6	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.56	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.6	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.60	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.6	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.6	0.46	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.6	0.27	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.6	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.6	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.7	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.6	0.42	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.6	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.6	0.80	ug/l	

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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515-EB		
Lab Sample ID:	MC40064-4	Date Sampled:	07/15/15
Matrix:	AQ - Equipment Blank	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.6	0.63	ug/l	
131-11-3	Dimethyl phthalate	ND	5.6	0.30	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.6	0.85	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.6	0.32	ug/l	
78-59-1	Isophorone	ND	5.6	0.26	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.1	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.5	ug/l	
98-95-3	Nitrobenzene	ND	5.6	0.29	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.6	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.6	0.58	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.6	0.86	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	50%		10-80%
4165-62-2	Phenol-d5	37%		10-72%
118-79-6	2,4,6-Tribromophenol	90%		42-134%
4165-60-0	Nitrobenzene-d5	91%		25-117%
321-60-8	2-Fluorobiphenyl	87%		24-112%
1718-51-0	Terphenyl-d14	109%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515-EB		
Lab Sample ID:	MC40064-4	Date Sampled:	07/15/15
Matrix:	AQ - Equipment Blank	Date Received:	07/16/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I97050.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0083	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0093	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.056	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.056	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.017	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0082	ug/l	
86-73-7	Fluorene	ND	0.11	0.017	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.023	ug/l	
90-12-0	1-Methylnaphthalene	0.099	2.2	0.014	ug/l	J
91-57-6	2-Methylnaphthalene	0.24	2.2	0.012	ug/l	J
85-01-8	Phenanthrene	ND	0.056	0.012	ug/l	
129-00-0	Pyrene	ND	0.11	0.0094	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	90%		26-121%
321-60-8	2-Fluorobiphenyl	74%		28-107%
1718-51-0	Terphenyl-d14	101%		29-129%

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515-EB		
Lab Sample ID:	MC40064-4	Date Sampled:	07/15/15
Matrix:	AQ - Equipment Blank	Date Received:	07/16/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63941.D	1	07/28/15	NK	07/28/15	OP43994	GBB3463
Run #2							

	Initial Volume	Final Volume
Run #1	37.2 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	106%		60-140%
460-00-4	Bromofluorobenzene (S)	106%		60-140%

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RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515		
Lab Sample ID:	MC40064-5	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41312.D	1	07/23/15	JB	n/a	n/a	MSV1492
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	66.8	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515		
Lab Sample ID:	MC40064-5	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	0.31	5.0	0.29	ug/l	J
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

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B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515		
Lab Sample ID:	MC40064-5	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	113%		72-133%
2037-26-5	Toluene-D8	104%		85-114%
460-00-4	4-Bromofluorobenzene	102%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515		
Lab Sample ID:	MC40064-5	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	W23150.D	1	07/31/15	MR	07/20/15	OP43885	MSW981
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.8	ug/l	
95-57-8	2-Chlorophenol	ND	5.6	0.32	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.41	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.31	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.56	ug/l	
51-28-5	2,4-Dinitrophenol	ND	22	2.8	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.1	ug/l	
95-48-7	2-Methylphenol	ND	11	0.23	ug/l	
	3&4-Methylphenol	ND	11	0.52	ug/l	
88-75-5	2-Nitrophenol	ND	11	0.45	ug/l	
100-02-7	4-Nitrophenol	ND	22	2.8	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.33	ug/l	
108-95-2	Phenol	ND	5.6	0.28	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.38	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.33	ug/l	
62-53-3	Aniline	ND	11	2.8	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.6	0.91	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.6	0.23	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.56	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.6	0.17	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.60	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.6	0.27	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.6	0.46	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.6	0.27	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.6	0.23	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.6	0.26	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.7	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.5	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.6	0.42	ug/l	
132-64-9	Dibenzofuran	ND	2.2	0.22	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.6	0.41	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.6	0.80	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515		
Lab Sample ID:	MC40064-5	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.6	0.63	ug/l	
131-11-3	Dimethyl phthalate	ND	5.6	0.30	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.2	0.33	ug/l	
118-74-1	Hexachlorobenzene	ND	5.6	0.85	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.5	ug/l	
67-72-1	Hexachloroethane	ND	5.6	0.32	ug/l	
78-59-1	Isophorone	ND	5.6	0.26	ug/l	
88-74-4	2-Nitroaniline	ND	11	4.1	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.3	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.5	ug/l	
98-95-3	Nitrobenzene	ND	5.6	0.29	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.6	1.4	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.6	0.58	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.6	0.86	ug/l	
110-86-1	Pyridine	ND	11	1.4	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	48%		10-80%
4165-62-2	Phenol-d5	36%		10-72%
118-79-6	2,4,6-Tribromophenol	96%		42-134%
4165-60-0	Nitrobenzene-d5	85%		25-117%
321-60-8	2-Fluorobiphenyl	81%		24-112%
1718-51-0	Terphenyl-d14	106%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515		
Lab Sample ID:	MC40064-5	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I97051.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630
Run #2							

	Initial Volume	Final Volume
Run #1	900 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.11	0.0083	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0093	ug/l	
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.056	0.026	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.056	0.021	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.017	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0082	ug/l	
86-73-7	Fluorene	ND	0.11	0.017	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.023	ug/l	
90-12-0	1-Methylnaphthalene	0.21	2.2	0.014	ug/l	J
91-57-6	2-Methylnaphthalene	0.10	2.2	0.012	ug/l	JB
85-01-8	Phenanthrene	0.020	0.056	0.012	ug/l	J
129-00-0	Pyrene	ND	0.11	0.0094	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	88%		26-121%
321-60-8	2-Fluorobiphenyl	72%		28-107%
1718-51-0	Terphenyl-d14	101%		29-129%

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J = Indicates an estimated value
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW28-ROX-071515		
Lab Sample ID:	MC40064-5	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63942.D	1	07/28/15	NK	07/28/15	OP43994	GBB3463
Run #2							

	Initial Volume	Final Volume
Run #1	37.8 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	108%		60-140%
460-00-4	Bromofluorobenzene (S)	117%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW22-ROX-071515		
Lab Sample ID:	MC40064-6	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41317.D	20	07/23/15	JB	n/a	n/a	MSV1492
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	200	41	ug/l	
107-02-8	Acrolein	ND	500	220	ug/l	
107-13-1	Acrylonitrile	ND	100	45	ug/l	
71-43-2	Benzene	2920	10	5.4	ug/l	
108-86-1	Bromobenzene	ND	100	5.2	ug/l	
74-97-5	Bromochloromethane	ND	100	7.3	ug/l	
75-27-4	Bromodichloromethane	ND	20	3.6	ug/l	
75-25-2	Bromoform	ND	20	7.9	ug/l	
74-83-9	Bromomethane	ND	40	16	ug/l	
78-93-3	2-Butanone (MEK)	ND	100	59	ug/l	
104-51-8	n-Butylbenzene	ND	100	9.9	ug/l	
135-98-8	sec-Butylbenzene	ND	100	10	ug/l	
98-06-6	tert-Butylbenzene	ND	100	11	ug/l	
75-15-0	Carbon disulfide	ND	100	3.7	ug/l	
56-23-5	Carbon tetrachloride	ND	20	6.8	ug/l	
108-90-7	Chlorobenzene	ND	20	4.7	ug/l	
75-00-3	Chloroethane	ND	40	9.8	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	100	25	ug/l	
67-66-3	Chloroform	ND	20	8.1	ug/l	
74-87-3	Chloromethane	ND	40	9.7	ug/l	
95-49-8	o-Chlorotoluene	ND	100	12	ug/l	
106-43-4	p-Chlorotoluene	ND	100	9.2	ug/l	
124-48-1	Dibromochloromethane	ND	20	4.5	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	20	4.9	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	20	4.8	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	20	7.5	ug/l	
75-71-8	Dichlorodifluoromethane	ND	40	11	ug/l	
75-34-3	1,1-Dichloroethane	ND	20	5.7	ug/l	
107-06-2	1,2-Dichloroethane	ND	20	6.2	ug/l	
75-35-4	1,1-Dichloroethene	ND	20	5.7	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	20	6.2	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	20	9.6	ug/l	

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Report of Analysis

Client Sample ID:	MW22-ROX-071515		
Lab Sample ID:	MC40064-6	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	40	4.3	ug/l	
142-28-9	1,3-Dichloropropane	ND	100	5.8	ug/l	
594-20-7	2,2-Dichloropropane	ND	100	34	ug/l	
563-58-6	1,1-Dichloropropene	ND	100	4.7	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	10	5.4	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	10	8.7	ug/l	
123-91-1	1,4-Dioxane	ND	500	400	ug/l	
97-63-2	Ethyl methacrylate	ND	100	10	ug/l	
100-41-4	Ethylbenzene	3210	20	4.8	ug/l	
87-68-3	Hexachlorobutadiene	ND	100	9.0	ug/l	
591-78-6	2-Hexanone	ND	100	54	ug/l	
98-82-8	Isopropylbenzene	92.6	100	5.3	ug/l	J
99-87-6	p-Isopropyltoluene	ND	100	6.3	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	20	7.0	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	100	15	ug/l	
74-95-3	Methylene bromide	ND	100	5.9	ug/l	
75-09-2	Methylene chloride	ND	40	5.4	ug/l	
91-20-3	Naphthalene	219	100	12	ug/l	
103-65-1	n-Propylbenzene	185	100	5.8	ug/l	
100-42-5	Styrene	ND	100	5.6	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	20	5.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	10	5.8	ug/l	
127-18-4	Tetrachloroethene	ND	20	4.1	ug/l	
108-88-3	Toluene	5050	20	5.9	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	100	16	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	100	15	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	20	8.4	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	20	6.5	ug/l	
79-01-6	Trichloroethene	ND	20	5.0	ug/l	
75-69-4	Trichlorofluoromethane	ND	20	9.4	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	100	7.9	ug/l	
95-63-6	1,2,4-Trimethylbenzene	1310	100	5.7	ug/l	
108-67-8	1,3,5-Trimethylbenzene	296	100	4.0	ug/l	
108-05-4	Vinyl Acetate	ND	100	29	ug/l	
75-01-4	Vinyl chloride	ND	20	9.0	ug/l	
	m,p-Xylene	6700	20	9.3	ug/l	
95-47-6	o-Xylene	3480	20	4.3	ug/l	
1330-20-7	Xylene (total)	10200	20	4.3	ug/l	

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Report of Analysis

Client Sample ID:	MW22-ROX-071515		
Lab Sample ID:	MC40064-6	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	102%		72-133%
2037-26-5	Toluene-D8	107%		85-114%
460-00-4	4-Bromofluorobenzene	103%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
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J = Indicates an estimated value
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW22-ROX-071515		
Lab Sample ID:	MC40064-6	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	W23153.D	5	07/31/15	MR	07/20/15	OP43885	MSW981
Run #2							

	Initial Volume	Final Volume
Run #1	870 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	57	14	ug/l	
95-57-8	2-Chlorophenol	ND	29	1.7	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	57	2.1	ug/l	
120-83-2	2,4-Dichlorophenol	ND	57	1.6	ug/l	
105-67-9	2,4-Dimethylphenol	ND	57	2.9	ug/l	
51-28-5	2,4-Dinitrophenol	ND	110	14	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	57	11	ug/l	
95-48-7	2-Methylphenol	7.5	57	1.2	ug/l	J
	3&4-Methylphenol	ND	57	2.7	ug/l	
88-75-5	2-Nitrophenol	ND	57	2.3	ug/l	
100-02-7	4-Nitrophenol	ND	110	14	ug/l	
87-86-5	Pentachlorophenol	ND	57	1.7	ug/l	
108-95-2	Phenol	ND	29	1.4	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	57	2.0	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	57	1.7	ug/l	
62-53-3	Aniline	ND	57	14	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	29	4.7	ug/l	
85-68-7	Butyl benzyl phthalate	ND	29	1.2	ug/l	
100-51-6	Benzyl Alcohol	ND	57	2.9	ug/l	
91-58-7	2-Chloronaphthalene	ND	29	0.89	ug/l	
106-47-8	4-Chloroaniline	ND	57	3.1	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	29	1.4	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	29	2.4	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	29	1.4	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	29	1.2	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	29	1.4	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	57	8.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	57	13	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	29	2.2	ug/l	
132-64-9	Dibenzofuran	ND	11	1.1	ug/l	
84-74-2	Di-n-butyl phthalate	ND	29	2.1	ug/l	
117-84-0	Di-n-octyl phthalate	ND	29	4.1	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW22-ROX-071515		
Lab Sample ID:	MC40064-6	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	29	3.3	ug/l	
131-11-3	Dimethyl phthalate	ND	29	1.5	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	11	1.7	ug/l	
118-74-1	Hexachlorobenzene	ND	29	4.4	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	57	7.6	ug/l	
67-72-1	Hexachloroethane	ND	29	1.7	ug/l	
78-59-1	Isophorone	ND	29	1.3	ug/l	
88-74-4	2-Nitroaniline	ND	57	21	ug/l	
99-09-2	3-Nitroaniline	ND	57	12	ug/l	
100-01-6	4-Nitroaniline	ND	57	18	ug/l	
98-95-3	Nitrobenzene	ND	29	1.5	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	29	7.2	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	29	3.0	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	29	4.4	ug/l	
110-86-1	Pyridine	ND	57	7.2	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	39%		10-80%
4165-62-2	Phenol-d5	36%		10-72%
118-79-6	2,4,6-Tribromophenol	87%		42-134%
4165-60-0	Nitrobenzene-d5	80%		25-117%
321-60-8	2-Fluorobiphenyl	78%		24-112%
1718-51-0	Terphenyl-d14	96%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
95-13-6	Indene	4.60	33	ug/l	JN
	Total TIC, Semi-Volatile		33	ug/l	J

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J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW22-ROX-071515		
Lab Sample ID:	MC40064-6	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I97052.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630
Run #2							

	Initial Volume	Final Volume
Run #1	870 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.13	0.11	0.0086	ug/l	
208-96-8	Acenaphthylene	0.028	0.11	0.0097	ug/l	J
120-12-7	Anthracene	ND	0.11	0.011	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.057	0.027	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.017	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.057	0.022	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.014	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.015	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.017	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0085	ug/l	
86-73-7	Fluorene	0.11	0.11	0.017	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.023	ug/l	
90-12-0	1-Methylnaphthalene	21.6	2.3	0.014	ug/l	
91-57-6	2-Methylnaphthalene	37.4	2.3	0.013	ug/l	
85-01-8	Phenanthrene	0.099	0.057	0.012	ug/l	
129-00-0	Pyrene	ND	0.11	0.0098	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	78%		26-121%
321-60-8	2-Fluorobiphenyl	66%		28-107%
1718-51-0	Terphenyl-d14	98%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW22-ROX-071515		
Lab Sample ID:	MC40064-6	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63943.D	1	07/29/15	NK	07/28/15	OP43994	GBB3463
Run #2							

	Initial Volume	Final Volume
Run #1	36.8 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	121%		60-140%
460-00-4	Bromofluorobenzene (S)	195% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071515-HCL-B		
Lab Sample ID:	MC40064-7	Date Sampled:	07/15/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41301.D	1	07/22/15	JB	n/a	n/a	MSV1492
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071515-HCL-B		
Lab Sample ID:	MC40064-7	Date Sampled:	07/15/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071515-HCL-B		
Lab Sample ID:	MC40064-7	Date Sampled:	07/15/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	115%		72-133%
2037-26-5	Toluene-D8	101%		85-114%
460-00-4	4-Bromofluorobenzene	98%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	TB-ROX-071515-ST-B		
Lab Sample ID:	MC40064-8	Date Sampled:	07/15/15
Matrix:	AQ - Trip Blank Water	Date Received:	07/16/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63944.D	1	07/29/15	NK	07/28/15	OP43994	GBB3463
Run #2							

	Initial Volume	Final Volume
Run #1	36.9 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	101%		60-140%
460-00-4	Bromofluorobenzene (S)	94%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW25-ROX-071515		
Lab Sample ID:	MC40064-9	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41313.D	200	07/23/15	JB	n/a	n/a	MSV1492
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	2000	410	ug/l	
107-02-8	Acrolein	ND	5000	2200	ug/l	
107-13-1	Acrylonitrile	ND	1000	450	ug/l	
71-43-2	Benzene	71900	100	54	ug/l	
108-86-1	Bromobenzene	ND	1000	52	ug/l	
74-97-5	Bromochloromethane	ND	1000	73	ug/l	
75-27-4	Bromodichloromethane	ND	200	36	ug/l	
75-25-2	Bromoform	ND	200	79	ug/l	
74-83-9	Bromomethane	ND	400	160	ug/l	
78-93-3	2-Butanone (MEK)	ND	1000	590	ug/l	
104-51-8	n-Butylbenzene	ND	1000	99	ug/l	
135-98-8	sec-Butylbenzene	ND	1000	100	ug/l	
98-06-6	tert-Butylbenzene	ND	1000	110	ug/l	
75-15-0	Carbon disulfide	ND	1000	37	ug/l	
56-23-5	Carbon tetrachloride	ND	200	68	ug/l	
108-90-7	Chlorobenzene	ND	200	47	ug/l	
75-00-3	Chloroethane	ND	400	98	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	1000	250	ug/l	
67-66-3	Chloroform	ND	200	81	ug/l	
74-87-3	Chloromethane	ND	400	97	ug/l	
95-49-8	o-Chlorotoluene	ND	1000	120	ug/l	
106-43-4	p-Chlorotoluene	ND	1000	92	ug/l	
124-48-1	Dibromochloromethane	ND	200	45	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	200	49	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	200	48	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	200	75	ug/l	
75-71-8	Dichlorodifluoromethane	ND	400	110	ug/l	
75-34-3	1,1-Dichloroethane	ND	200	57	ug/l	
107-06-2	1,2-Dichloroethane	ND	200	62	ug/l	
75-35-4	1,1-Dichloroethene	ND	200	57	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	200	62	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	200	96	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW25-ROX-071515		
Lab Sample ID:	MC40064-9	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	400	43	ug/l	
142-28-9	1,3-Dichloropropane	ND	1000	58	ug/l	
594-20-7	2,2-Dichloropropane	ND	1000	340	ug/l	
563-58-6	1,1-Dichloropropene	ND	1000	47	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	100	54	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	100	87	ug/l	
123-91-1	1,4-Dioxane	ND	5000	4000	ug/l	
97-63-2	Ethyl methacrylate	ND	1000	100	ug/l	
100-41-4	Ethylbenzene	ND	200	48	ug/l	
87-68-3	Hexachlorobutadiene	ND	1000	90	ug/l	
591-78-6	2-Hexanone	ND	1000	540	ug/l	
98-82-8	Isopropylbenzene	ND	1000	53	ug/l	
99-87-6	p-Isopropyltoluene	ND	1000	63	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	200	70	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	1000	150	ug/l	
74-95-3	Methylene bromide	ND	1000	59	ug/l	
75-09-2	Methylene chloride	ND	400	54	ug/l	
91-20-3	Naphthalene	ND	1000	120	ug/l	
103-65-1	n-Propylbenzene	ND	1000	58	ug/l	
100-42-5	Styrene	ND	1000	56	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	200	50	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	100	58	ug/l	
127-18-4	Tetrachloroethene	57.7	200	41	ug/l	J
108-88-3	Toluene	ND	200	59	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	1000	160	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	1000	150	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	200	84	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	200	65	ug/l	
79-01-6	Trichloroethene	ND	200	50	ug/l	
75-69-4	Trichlorofluoromethane	ND	200	94	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	1000	79	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	1000	57	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	1000	40	ug/l	
108-05-4	Vinyl Acetate	ND	1000	290	ug/l	
75-01-4	Vinyl chloride	ND	200	90	ug/l	
	m,p-Xylene	ND	200	93	ug/l	
95-47-6	o-Xylene	ND	200	43	ug/l	
1330-20-7	Xylene (total)	ND	200	43	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW25-ROX-071515		
Lab Sample ID:	MC40064-9	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	115%		72-133%
2037-26-5	Toluene-D8	99%		85-114%
460-00-4	4-Bromofluorobenzene	98%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW25-ROX-071515		
Lab Sample ID:	MC40064-9	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	W23152.D	1	07/31/15	MR	07/20/15	OP43885	MSW981
Run #2							

	Initial Volume	Final Volume
Run #1	960 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.2	0.30	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.29	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.52	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	2.0	ug/l	
95-48-7	2-Methylphenol	ND	10	0.22	ug/l	
	3&4-Methylphenol	ND	10	0.49	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.42	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.31	ug/l	
108-95-2	Phenol	112	5.2	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.31	ug/l	
62-53-3	Aniline	ND	10	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.2	0.85	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.2	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.2	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.56	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.2	0.25	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.2	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.2	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.2	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.2	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.2	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.2	0.39	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.2	0.75	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW25-ROX-071515		
Lab Sample ID:	MC40064-9	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.2	0.59	ug/l	
131-11-3	Dimethyl phthalate	ND	5.2	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.2	0.80	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.2	0.30	ug/l	
78-59-1	Isophorone	ND	5.2	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.2	ug/l	
98-95-3	Nitrobenzene	ND	5.2	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.2	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.2	0.54	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.2	0.81	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	44%		10-80%
4165-62-2	Phenol-d5	34%		10-72%
118-79-6	2,4,6-Tribromophenol	112%		42-134%
4165-60-0	Nitrobenzene-d5	86%		25-117%
321-60-8	2-Fluorobiphenyl	82%		24-112%
1718-51-0	Terphenyl-d14	112%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW25-ROX-071515		
Lab Sample ID:	MC40064-9	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I97053.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630
Run #2							

	Initial Volume	Final Volume
Run #1	960 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.036	0.10	0.0078	ug/l	J
208-96-8	Acenaphthylene	ND	0.10	0.0088	ug/l	
120-12-7	Anthracene	ND	0.10	0.010	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.052	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.052	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0077	ug/l	
86-73-7	Fluorene	0.019	0.10	0.016	ug/l	J
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.021	ug/l	
90-12-0	1-Methylnaphthalene	0.88	2.1	0.013	ug/l	J
91-57-6	2-Methylnaphthalene	0.49	2.1	0.011	ug/l	J
85-01-8	Phenanthrene	0.017	0.052	0.011	ug/l	J
129-00-0	Pyrene	ND	0.10	0.0089	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	86%		26-121%
321-60-8	2-Fluorobiphenyl	76%		28-107%
1718-51-0	Terphenyl-d14	108%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW25-ROX-071515		
Lab Sample ID:	MC40064-9	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63945.D	1	07/29/15	NK	07/28/15	OP43994	GBB3463
Run #2							

	Initial Volume	Final Volume
Run #1	37.7 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	110%		60-140%
460-00-4	Bromofluorobenzene (S)	120%		60-140%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW8-ROX-071515		
Lab Sample ID:	MC40064-10	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41314.D	5000	07/23/15	JB	n/a	n/a	MSV1492
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	50000	10000	ug/l	
107-02-8	Acrolein	ND	130000	55000	ug/l	
107-13-1	Acrylonitrile	ND	25000	11000	ug/l	
71-43-2	Benzene	879000	2500	1400	ug/l	
108-86-1	Bromobenzene	ND	25000	1300	ug/l	
74-97-5	Bromochloromethane	ND	25000	1800	ug/l	
75-27-4	Bromodichloromethane	ND	5000	890	ug/l	
75-25-2	Bromoform	ND	5000	2000	ug/l	
74-83-9	Bromomethane	ND	10000	3900	ug/l	
78-93-3	2-Butanone (MEK)	ND	25000	15000	ug/l	
104-51-8	n-Butylbenzene	ND	25000	2500	ug/l	
135-98-8	sec-Butylbenzene	ND	25000	2500	ug/l	
98-06-6	tert-Butylbenzene	ND	25000	2900	ug/l	
75-15-0	Carbon disulfide	ND	25000	930	ug/l	
56-23-5	Carbon tetrachloride	ND	5000	1700	ug/l	
108-90-7	Chlorobenzene	ND	5000	1200	ug/l	
75-00-3	Chloroethane	ND	10000	2500	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	25000	6300	ug/l	
67-66-3	Chloroform	ND	5000	2000	ug/l	
74-87-3	Chloromethane	ND	10000	2400	ug/l	
95-49-8	o-Chlorotoluene	ND	25000	3000	ug/l	
106-43-4	p-Chlorotoluene	ND	25000	2300	ug/l	
124-48-1	Dibromochloromethane	ND	5000	1100	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	5000	1200	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	5000	1200	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	5000	1900	ug/l	
75-71-8	Dichlorodifluoromethane	ND	10000	2700	ug/l	
75-34-3	1,1-Dichloroethane	ND	5000	1400	ug/l	
107-06-2	1,2-Dichloroethane	ND	5000	1500	ug/l	
75-35-4	1,1-Dichloroethene	ND	5000	1400	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	5000	1600	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	5000	2400	ug/l	

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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW8-ROX-071515		
Lab Sample ID:	MC40064-10	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	10000	1100	ug/l	
142-28-9	1,3-Dichloropropane	ND	25000	1400	ug/l	
594-20-7	2,2-Dichloropropane	ND	25000	8400	ug/l	
563-58-6	1,1-Dichloropropene	ND	25000	1200	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	2500	1300	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	2500	2200	ug/l	
123-91-1	1,4-Dioxane	ND	130000	100000	ug/l	
97-63-2	Ethyl methacrylate	ND	25000	2500	ug/l	
100-41-4	Ethylbenzene	ND	5000	1200	ug/l	
87-68-3	Hexachlorobutadiene	ND	25000	2300	ug/l	
591-78-6	2-Hexanone	ND	25000	13000	ug/l	
98-82-8	Isopropylbenzene	ND	25000	1300	ug/l	
99-87-6	p-Isopropyltoluene	ND	25000	1600	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	5000	1700	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	25000	3800	ug/l	
74-95-3	Methylene bromide	ND	25000	1500	ug/l	
75-09-2	Methylene chloride	ND	10000	1300	ug/l	
91-20-3	Naphthalene	ND	25000	3000	ug/l	
103-65-1	n-Propylbenzene	ND	25000	1500	ug/l	
100-42-5	Styrene	ND	25000	1400	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	5000	1200	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	2500	1500	ug/l	
127-18-4	Tetrachloroethene	ND	5000	1000	ug/l	
108-88-3	Toluene	ND	5000	1500	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	25000	3900	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	25000	3700	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	5000	2100	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	5000	1600	ug/l	
79-01-6	Trichloroethene	ND	5000	1200	ug/l	
75-69-4	Trichlorofluoromethane	ND	5000	2400	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	25000	2000	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	25000	1400	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	25000	1000	ug/l	
108-05-4	Vinyl Acetate	ND	25000	7200	ug/l	
75-01-4	Vinyl chloride	ND	5000	2300	ug/l	
	m,p-Xylene	ND	5000	2300	ug/l	
95-47-6	o-Xylene	ND	5000	1100	ug/l	
1330-20-7	Xylene (total)	ND	5000	1100	ug/l	

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E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW8-ROX-071515		
Lab Sample ID:	MC40064-10	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	117%		72-133%
2037-26-5	Toluene-D8	101%		85-114%
460-00-4	4-Bromofluorobenzene	98%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW8-ROX-071515		
Lab Sample ID:	MC40064-10	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	W23154.D	1	07/31/15	MR	07/20/15	OP43885	MSW981
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	11	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.3	0.31	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	11	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	11	0.30	ug/l	
105-67-9	2,4-Dimethylphenol	ND	11	0.53	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	11	2.0	ug/l	
95-48-7	2-Methylphenol	1.8	11	0.22	ug/l	J
	3&4-Methylphenol	4.6	11	0.49	ug/l	J
88-75-5	2-Nitrophenol	ND	11	0.43	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	11	0.31	ug/l	
108-95-2	Phenol	135	5.3	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	11	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	11	0.31	ug/l	
62-53-3	Aniline	ND	11	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.3	0.86	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.3	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	11	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.3	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	11	0.57	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.3	0.26	ug/l	
111-44-4	bis(2-Chloroethyl)ether	17.1	5.3	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.3	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.3	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.3	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	11	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	11	2.4	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.3	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.3	0.39	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.3	0.76	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW8-ROX-071515		
Lab Sample ID:	MC40064-10	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.3	0.60	ug/l	
131-11-3	Dimethyl phthalate	ND	5.3	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.3	0.81	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	11	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.3	0.30	ug/l	
78-59-1	Isophorone	ND	5.3	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	11	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	11	2.2	ug/l	
100-01-6	4-Nitroaniline	ND	11	3.3	ug/l	
98-95-3	Nitrobenzene	ND	5.3	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.3	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.3	0.55	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.3	0.81	ug/l	
110-86-1	Pyridine	ND	11	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	44%		10-80%
4165-62-2	Phenol-d5	36%		10-72%
118-79-6	2,4,6-Tribromophenol	116%		42-134%
4165-60-0	Nitrobenzene-d5	85%		25-117%
321-60-8	2-Fluorobiphenyl	81%		24-112%
1718-51-0	Terphenyl-d14	102%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW8-ROX-071515		
Lab Sample ID:	MC40064-10	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I97054.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630
Run #2							

	Initial Volume	Final Volume
Run #1	950 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.18	0.11	0.0079	ug/l	
208-96-8	Acenaphthylene	ND	0.11	0.0088	ug/l	
120-12-7	Anthracene	0.037	0.11	0.010	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.053	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.11	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.053	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.11	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.11	0.011	ug/l	
218-01-9	Chrysene	ND	0.11	0.014	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.11	0.016	ug/l	
206-44-0	Fluoranthene	ND	0.11	0.0078	ug/l	
86-73-7	Fluorene	0.30	0.11	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.11	0.021	ug/l	
90-12-0	1-Methylnaphthalene	11.3	2.1	0.013	ug/l	
91-57-6	2-Methylnaphthalene	8.3	2.1	0.012	ug/l	
85-01-8	Phenanthrene	0.16	0.053	0.011	ug/l	
129-00-0	Pyrene	ND	0.11	0.0089	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	80%		26-121%
321-60-8	2-Fluorobiphenyl	75%		28-107%
1718-51-0	Terphenyl-d14	99%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW8-ROX-071515		
Lab Sample ID:	MC40064-10	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63947.D	1	07/29/15	NK	07/28/15	OP43994	GBB3463
Run #2							

	Initial Volume	Final Volume
Run #1	36.9 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	95%		60-140%
460-00-4	Bromofluorobenzene (S)	156% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515		
Lab Sample ID:	MC40064-11	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41315.D	5000	07/23/15	JB	n/a	n/a	MSV1492
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	50000	10000	ug/l	
107-02-8	Acrolein	ND	130000	55000	ug/l	
107-13-1	Acrylonitrile	ND	25000	11000	ug/l	
71-43-2	Benzene	1300000	2500	1400	ug/l	
108-86-1	Bromobenzene	ND	25000	1300	ug/l	
74-97-5	Bromochloromethane	ND	25000	1800	ug/l	
75-27-4	Bromodichloromethane	ND	5000	890	ug/l	
75-25-2	Bromoform	ND	5000	2000	ug/l	
74-83-9	Bromomethane	ND	10000	3900	ug/l	
78-93-3	2-Butanone (MEK)	ND	25000	15000	ug/l	
104-51-8	n-Butylbenzene	ND	25000	2500	ug/l	
135-98-8	sec-Butylbenzene	ND	25000	2500	ug/l	
98-06-6	tert-Butylbenzene	ND	25000	2900	ug/l	
75-15-0	Carbon disulfide	ND	25000	930	ug/l	
56-23-5	Carbon tetrachloride	ND	5000	1700	ug/l	
108-90-7	Chlorobenzene	ND	5000	1200	ug/l	
75-00-3	Chloroethane	ND	10000	2500	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	25000	6300	ug/l	
67-66-3	Chloroform	ND	5000	2000	ug/l	
74-87-3	Chloromethane	ND	10000	2400	ug/l	
95-49-8	o-Chlorotoluene	ND	25000	3000	ug/l	
106-43-4	p-Chlorotoluene	ND	25000	2300	ug/l	
124-48-1	Dibromochloromethane	ND	5000	1100	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	5000	1200	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	5000	1200	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	5000	1900	ug/l	
75-71-8	Dichlorodifluoromethane	ND	10000	2700	ug/l	
75-34-3	1,1-Dichloroethane	ND	5000	1400	ug/l	
107-06-2	1,2-Dichloroethane	ND	5000	1500	ug/l	
75-35-4	1,1-Dichloroethene	ND	5000	1400	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	5000	1600	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	5000	2400	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515		
Lab Sample ID:	MC40064-11	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	10000	1100	ug/l	
142-28-9	1,3-Dichloropropane	ND	25000	1400	ug/l	
594-20-7	2,2-Dichloropropane	ND	25000	8400	ug/l	
563-58-6	1,1-Dichloropropene	ND	25000	1200	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	2500	1300	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	2500	2200	ug/l	
123-91-1	1,4-Dioxane	ND	130000	100000	ug/l	
97-63-2	Ethyl methacrylate	ND	25000	2500	ug/l	
100-41-4	Ethylbenzene	ND	5000	1200	ug/l	
87-68-3	Hexachlorobutadiene	ND	25000	2300	ug/l	
591-78-6	2-Hexanone	ND	25000	13000	ug/l	
98-82-8	Isopropylbenzene	ND	25000	1300	ug/l	
99-87-6	p-Isopropyltoluene	ND	25000	1600	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	5000	1700	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	25000	3800	ug/l	
74-95-3	Methylene bromide	ND	25000	1500	ug/l	
75-09-2	Methylene chloride	ND	10000	1300	ug/l	
91-20-3	Naphthalene	ND	25000	3000	ug/l	
103-65-1	n-Propylbenzene	ND	25000	1500	ug/l	
100-42-5	Styrene	ND	25000	1400	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	5000	1200	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	2500	1500	ug/l	
127-18-4	Tetrachloroethene	ND	5000	1000	ug/l	
108-88-3	Toluene	ND	5000	1500	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	25000	3900	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	25000	3700	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	5000	2100	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	5000	1600	ug/l	
79-01-6	Trichloroethene	ND	5000	1200	ug/l	
75-69-4	Trichlorofluoromethane	ND	5000	2400	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	25000	2000	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	25000	1400	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	25000	1000	ug/l	
108-05-4	Vinyl Acetate	ND	25000	7200	ug/l	
75-01-4	Vinyl chloride	ND	5000	2300	ug/l	
	m,p-Xylene	ND	5000	2300	ug/l	
95-47-6	o-Xylene	ND	5000	1100	ug/l	
1330-20-7	Xylene (total)	ND	5000	1100	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515		
Lab Sample ID:	MC40064-11	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	117%		72-133%
2037-26-5	Toluene-D8	102%		85-114%
460-00-4	4-Bromofluorobenzene	99%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515		
Lab Sample ID:	MC40064-11	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	W23155.D	1	07/31/15	MR	07/20/15	OP43885	MSW981
Run #2							

	Initial Volume	Final Volume
Run #1	980 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.1	0.30	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.37	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.29	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.51	ug/l	
51-28-5	2,4-Dinitrophenol	ND	20	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	2.0	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	3.1	10	0.48	ug/l	J
88-75-5	2-Nitrophenol	ND	10	0.41	ug/l	
100-02-7	4-Nitrophenol	ND	20	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.30	ug/l	
108-95-2	Phenol	104	5.1	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.35	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.31	ug/l	
62-53-3	Aniline	ND	10	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.1	0.83	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.1	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.52	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.1	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.55	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.1	0.25	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.1	0.43	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.1	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.1	0.21	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.1	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.1	0.38	ug/l	
132-64-9	Dibenzofuran	ND	2.0	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	0.63	5.1	0.38	ug/l	J
117-84-0	Di-n-octyl phthalate	ND	5.1	0.73	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515		
Lab Sample ID:	MC40064-11	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.1	0.58	ug/l	
131-11-3	Dimethyl phthalate	ND	5.1	0.27	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	0.37	2.0	0.31	ug/l	J
118-74-1	Hexachlorobenzene	ND	5.1	0.78	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.1	0.29	ug/l	
78-59-1	Isophorone	ND	5.1	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.7	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.2	ug/l	
98-95-3	Nitrobenzene	ND	5.1	0.26	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.1	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.1	0.53	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.1	0.79	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	47%		10-80%
4165-62-2	Phenol-d5	35%		10-72%
118-79-6	2,4,6-Tribromophenol	111%		42-134%
4165-60-0	Nitrobenzene-d5	86%		25-117%
321-60-8	2-Fluorobiphenyl	89%		24-112%
1718-51-0	Terphenyl-d14	107%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515		
Lab Sample ID:	MC40064-11	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I97055.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630
Run #2							

	Initial Volume	Final Volume
Run #1	980 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.27	0.10	0.0077	ug/l	
208-96-8	Acenaphthylene	0.038	0.10	0.0086	ug/l	J
120-12-7	Anthracene	0.038	0.10	0.010	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.051	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.051	0.019	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	0.033	0.10	0.013	ug/l	J
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	0.019	0.10	0.0076	ug/l	J
86-73-7	Fluorene	0.21	0.10	0.015	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.021	ug/l	
90-12-0	1-Methylnaphthalene	4.7	2.0	0.013	ug/l	
91-57-6	2-Methylnaphthalene	6.5	2.0	0.011	ug/l	
85-01-8	Phenanthrene	0.31	0.051	0.011	ug/l	
129-00-0	Pyrene	0.052	0.10	0.0087	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	80%		26-121%
321-60-8	2-Fluorobiphenyl	82%		28-107%
1718-51-0	Terphenyl-d14	100%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515		
Lab Sample ID:	MC40064-11	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63948.D	1	07/29/15	NK	07/28/15	OP43994	GBB3463
Run #2							

	Initial Volume	Final Volume
Run #1	36.9 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0058	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0058	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	109%		60-140%
460-00-4	Bromofluorobenzene (S)	144% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515-DUP		
Lab Sample ID:	MC40064-12	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	V41316.D	5000	07/23/15	JB	n/a	n/a	MSV1492
Run #2							

	Purge Volume
Run #1	5.0 ml
Run #2	

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	50000	10000	ug/l	
107-02-8	Acrolein	ND	130000	55000	ug/l	
107-13-1	Acrylonitrile	ND	25000	11000	ug/l	
71-43-2	Benzene	1370000	2500	1400	ug/l	
108-86-1	Bromobenzene	ND	25000	1300	ug/l	
74-97-5	Bromochloromethane	ND	25000	1800	ug/l	
75-27-4	Bromodichloromethane	ND	5000	890	ug/l	
75-25-2	Bromoform	ND	5000	2000	ug/l	
74-83-9	Bromomethane	ND	10000	3900	ug/l	
78-93-3	2-Butanone (MEK)	ND	25000	15000	ug/l	
104-51-8	n-Butylbenzene	ND	25000	2500	ug/l	
135-98-8	sec-Butylbenzene	ND	25000	2500	ug/l	
98-06-6	tert-Butylbenzene	ND	25000	2900	ug/l	
75-15-0	Carbon disulfide	ND	25000	930	ug/l	
56-23-5	Carbon tetrachloride	ND	5000	1700	ug/l	
108-90-7	Chlorobenzene	ND	5000	1200	ug/l	
75-00-3	Chloroethane	ND	10000	2500	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	25000	6300	ug/l	
67-66-3	Chloroform	ND	5000	2000	ug/l	
74-87-3	Chloromethane	ND	10000	2400	ug/l	
95-49-8	o-Chlorotoluene	ND	25000	3000	ug/l	
106-43-4	p-Chlorotoluene	ND	25000	2300	ug/l	
124-48-1	Dibromochloromethane	ND	5000	1100	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	5000	1200	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	5000	1200	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	5000	1900	ug/l	
75-71-8	Dichlorodifluoromethane	ND	10000	2700	ug/l	
75-34-3	1,1-Dichloroethane	ND	5000	1400	ug/l	
107-06-2	1,2-Dichloroethane	ND	5000	1500	ug/l	
75-35-4	1,1-Dichloroethene	ND	5000	1400	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	5000	1600	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	5000	2400	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515-DUP		
Lab Sample ID:	MC40064-12	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
78-87-5	1,2-Dichloropropane	ND	10000	1100	ug/l	
142-28-9	1,3-Dichloropropane	ND	25000	1400	ug/l	
594-20-7	2,2-Dichloropropane	ND	25000	8400	ug/l	
563-58-6	1,1-Dichloropropene	ND	25000	1200	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	2500	1300	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	2500	2200	ug/l	
123-91-1	1,4-Dioxane	ND	130000	100000	ug/l	
97-63-2	Ethyl methacrylate	ND	25000	2500	ug/l	
100-41-4	Ethylbenzene	ND	5000	1200	ug/l	
87-68-3	Hexachlorobutadiene	ND	25000	2300	ug/l	
591-78-6	2-Hexanone	ND	25000	13000	ug/l	
98-82-8	Isopropylbenzene	ND	25000	1300	ug/l	
99-87-6	p-Isopropyltoluene	ND	25000	1600	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	5000	1700	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	25000	3800	ug/l	
74-95-3	Methylene bromide	ND	25000	1500	ug/l	
75-09-2	Methylene chloride	ND	10000	1300	ug/l	
91-20-3	Naphthalene	ND	25000	3000	ug/l	
103-65-1	n-Propylbenzene	ND	25000	1500	ug/l	
100-42-5	Styrene	ND	25000	1400	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	5000	1200	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	2500	1500	ug/l	
127-18-4	Tetrachloroethene	ND	5000	1000	ug/l	
108-88-3	Toluene	ND	5000	1500	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	25000	3900	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	25000	3700	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	5000	2100	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	5000	1600	ug/l	
79-01-6	Trichloroethene	ND	5000	1200	ug/l	
75-69-4	Trichlorofluoromethane	ND	5000	2400	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	25000	2000	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	25000	1400	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	25000	1000	ug/l	
108-05-4	Vinyl Acetate	ND	25000	7200	ug/l	
75-01-4	Vinyl chloride	ND	5000	2300	ug/l	
	m,p-Xylene	ND	5000	2300	ug/l	
95-47-6	o-Xylene	ND	5000	1100	ug/l	
1330-20-7	Xylene (total)	ND	5000	1100	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515-DUP		
Lab Sample ID:	MC40064-12	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8260C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

VOA Special List

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
1868-53-7	Dibromofluoromethane	116%		72-133%
2037-26-5	Toluene-D8	100%		85-114%
460-00-4	4-Bromofluorobenzene	99%		70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515-DUP		
Lab Sample ID:	MC40064-12	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	W23156.D	1	07/31/15	MR	07/20/15	OP43885	MSW981
Run #2							

	Initial Volume	Final Volume
Run #1	960 ml	1.0 ml
Run #2		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.6	ug/l	
95-57-8	2-Chlorophenol	ND	5.2	0.30	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.38	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.29	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.52	ug/l	
51-28-5	2,4-Dinitrophenol	ND	21	2.6	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	2.0	ug/l	
95-48-7	2-Methylphenol	ND	10	0.22	ug/l	
	3&4-Methylphenol	3.2	10	0.49	ug/l	J
88-75-5	2-Nitrophenol	ND	10	0.42	ug/l	
100-02-7	4-Nitrophenol	ND	21	2.6	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.31	ug/l	
108-95-2	Phenol	117	5.2	0.26	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.36	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.31	ug/l	
62-53-3	Aniline	ND	10	2.6	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.2	0.85	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.2	0.22	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.53	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.2	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.56	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.2	0.25	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.2	0.44	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.2	0.25	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.2	0.22	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.2	0.25	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.6	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.2	0.39	ug/l	
132-64-9	Dibenzofuran	ND	2.1	0.21	ug/l	
84-74-2	Di-n-butyl phthalate	0.57	5.2	0.39	ug/l	J
117-84-0	Di-n-octyl phthalate	ND	5.2	0.75	ug/l	

ND = Not detected MDL = Method Detection Limit
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N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515-DUP		
Lab Sample ID:	MC40064-12	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

ABN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
84-66-2	Diethyl phthalate	ND	5.2	0.59	ug/l	
131-11-3	Dimethyl phthalate	ND	5.2	0.28	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.1	0.31	ug/l	
118-74-1	Hexachlorobenzene	ND	5.2	0.80	ug/l	
77-47-4	Hexachlorocyclopentadiene	ND	10	1.4	ug/l	
67-72-1	Hexachloroethane	ND	5.2	0.30	ug/l	
78-59-1	Isophorone	ND	5.2	0.24	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.8	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.2	ug/l	
98-95-3	Nitrobenzene	ND	5.2	0.27	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.2	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.2	0.54	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.2	0.81	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
367-12-4	2-Fluorophenol	52%		10-80%
4165-62-2	Phenol-d5	37%		10-72%
118-79-6	2,4,6-Tribromophenol	112%		42-134%
4165-60-0	Nitrobenzene-d5	91%		25-117%
321-60-8	2-Fluorobiphenyl	93%		24-112%
1718-51-0	Terphenyl-d14	109%		48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515-DUP		
Lab Sample ID:	MC40064-12	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8270D BY SIM SW846 3510C	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	I97056.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630
Run #2							

	Initial Volume	Final Volume
Run #1	960 ml	1.0 ml
Run #2		

BN Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	0.25	0.10	0.0078	ug/l	
208-96-8	Acenaphthylene	0.043	0.10	0.0088	ug/l	J
120-12-7	Anthracene	0.039	0.10	0.010	ug/l	J
56-55-3	Benzo(a)anthracene	ND	0.052	0.025	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.016	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.052	0.020	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	0.034	0.10	0.014	ug/l	J
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.016	ug/l	
206-44-0	Fluoranthene	0.023	0.10	0.0077	ug/l	J
86-73-7	Fluorene	0.18	0.10	0.016	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.021	ug/l	
90-12-0	1-Methylnaphthalene	5.5	2.1	0.013	ug/l	
91-57-6	2-Methylnaphthalene	8.2	2.1	0.011	ug/l	
85-01-8	Phenanthrene	0.34	0.052	0.011	ug/l	
129-00-0	Pyrene	0.053	0.10	0.0089	ug/l	J

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
4165-60-0	Nitrobenzene-d5	92%		26-121%
321-60-8	2-Fluorobiphenyl	82%		28-107%
1718-51-0	Terphenyl-d14	106%		29-129%

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range

J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	MW7-ROX-071515-DUP		
Lab Sample ID:	MC40064-12	Date Sampled:	07/15/15
Matrix:	AQ - Ground Water	Date Received:	07/16/15
Method:	SW846 8011 SW846 8011	Percent Solids:	n/a
Project:	URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL		

	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	BB63949.D	1	07/29/15	NK	07/28/15	OP43994	GBB3463
Run #2							

	Initial Volume	Final Volume
Run #1	37.6 ml	2.0 ml
Run #2		

VOA Special List

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.014	0.0057	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.014	0.0057	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	Bromofluorobenzene (S)	113%		60-140%
460-00-4	Bromofluorobenzene (S)	149% [a]		60-140%

(a) Outside control limits.Sample non-detect for target analytes.

ND = Not detected MDL = Method Detection Limit
RL = Reporting Limit
E = Indicates value exceeds calibration range
J = Indicates an estimated value
B = Indicates analyte found in associated method blank
N = Indicates presumptive evidence of a compound

New England ACCUTEST LABORATORIES

Misc. Forms

Custody Documents and Other Forms

Includes the following where applicable:

- Chain of Custody
- Sample Tracking Chronicle
- Internal Chain of Custody

LAB (LOCATION)

Lab Vendor #

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box: ENV SERVICES / MOTIVE RETAIL / SHELL RETAIL / MOTIVE SOLVENT / CONSULTANT / CORES / SHELL REFINERY / OTHER

Print Bill To Contact Name: Bob Bilma

PO #

INCIDENT # (ENV SERVICES): 9 7 2 1 6 6 4 0

SAP #: 3 4 0 0 6 1

DATE: 15 July 2015

PAGE: 1 of 2

AECOM

1001 HIGHLANDS PLAZA DRIVE WEST SUITE 300 ST. LOUIS, MO 63110

Elizabeth Kunke: Bob Bilma: Lindsay Rathbow

314-429-0100 | 314-429-0467

SITE ADDRESS: Street and City: 900 South Central Ave; ROXANA

State: IL

Roxana Quarterly GW / 60400249-21563720.03003

S. Fisher / E. Schumacher
C. Williams / D. Haxel

LAB USE ONLY: MC40064

TEMPERATURE ON RECEIPT C°

SPECIAL INSTRUCTIONS OR NOTES:

REQUESTED ANALYSIS

FIELD NOTES:

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE					NO OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
	TB-ROX-071515-HCL-A	7/15/15	0000	water	X					2	X				0.0
	TB-ROX-071515-ST-A		"						X	2		X			
	MW6A-ROX-071515		1010		X			X	X	6	X	X	X	X	
	MW6A-ROX-071515-EB		1020		X			X	X	6	X	X	X	X	
	MW23-ROX-071515		1120		X			X	X	6	X	X	X	X	
	MW22-ROX-071515		1335		X			X	X	6	X	X	X	X	
	TB-ROX-071515-HCL-B		0000		X					2	X				
	TB-ROX-071515-ST-B		"						X	2		X			
	MW25-ROX-071515		1005		X			X	X	6	X	X	X	X	
	MW8-ROX-071515		1330		X			X	X	6	X	X	X	X	

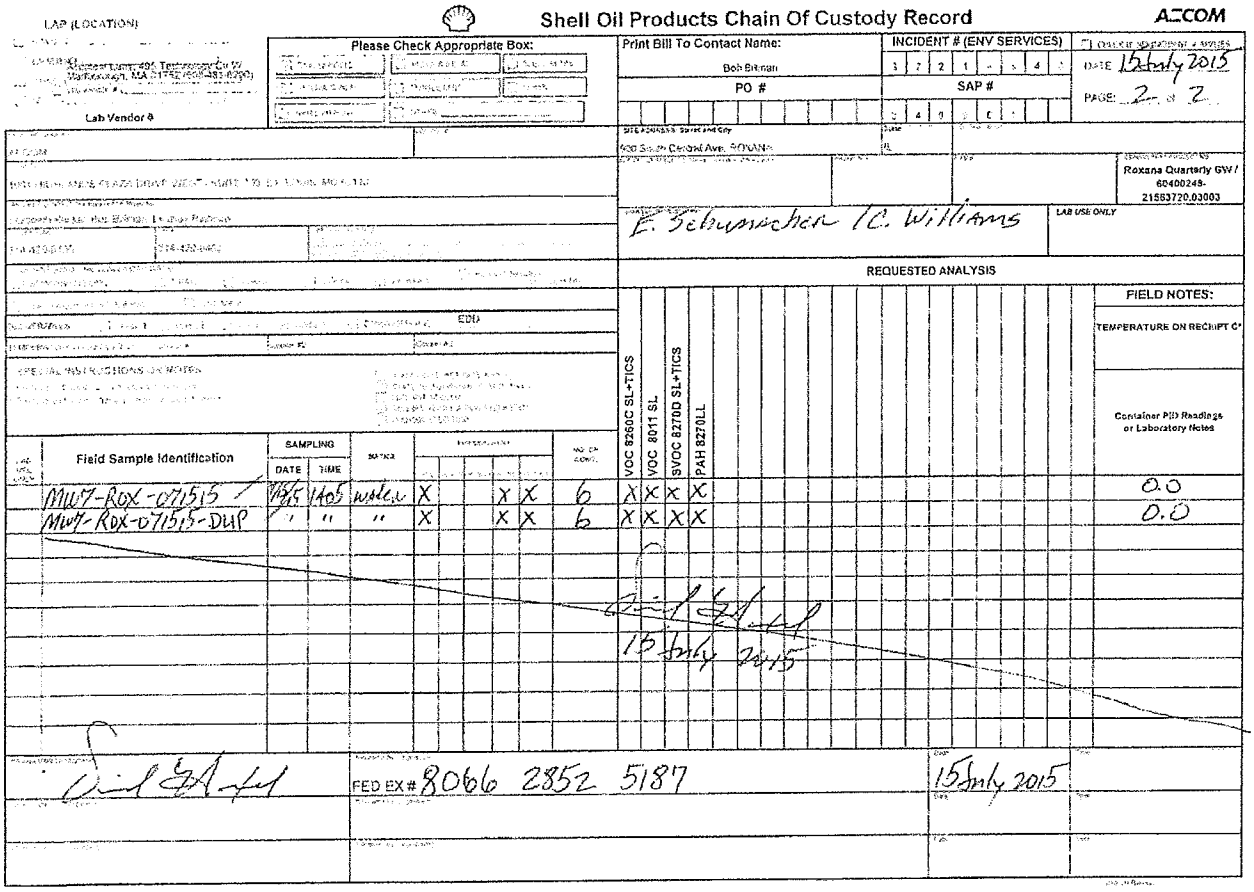
REVISED 7/16/15 BC

FED EX # 8066 2852 5187

15 July 2015

Custody seals 07/15/2015 - 01A -02A
-01B -02B

MC40064: Chain of Custody
Page 1 of 6



LAB (LOCATION)

Lab Vendor #

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:

Print Bill To Contact Name: Bob Bilman

PO #

INCIDENT # (ENV SERVICES) 3 7 2 1 - 3 4 5

SAP # 3 4 9 5 6 1

DATE 15 July 2015

PAGE: 2 of 2

SITE ADDRESS: Street and City: 900 South Central Ave. ROXANA

Roxana Quarterly GW / 60400248-21563720.03003

E. Schumacher / C. Williams

LAB USE ONLY

REQUESTED ANALYSIS

FIELD NOTES:

TEMPERATURE ON RECEIPT C°

SPECIAL INSTRUCTIONS OR NOTES

Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX						NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
MW7-ROX-071515	7/15/15	1405	water	X			X	X	6	X	X	X	X	0.0
MW7-ROX-071515-DUP	"	"	"	X			X	X	6	X	X	X	X	0.0

15 July 2015

FED EX # 8066 2852 5187

15 July 2015

5.1

5

MC40064: Chain of Custody
Page 2 of 6

LAB (LOCATION)

☐ XENCO (_____)

☐ CALSCIENCE (_____)

☑ OTHER Accutest Labs, 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200)

☐ SPL ☐ Lab Vendor # (_____)

Lab Vendor #

Shell Oil Products Chain Of Custody Record

AECOM

Please Check Appropriate Box:

☑ ENV. SERVICES ☐ MOTIVA RETAIL ☐ SHELL RETAIL

☐ MOTIVA SD&CM ☐ CONSULTANT ☐ LUBES

☐ SHELL PIPELINE ☐ OTHER _____

Print Bill To Contact Name: Bob Billman

PO #

INCIDENT # (ENV SERVICES): 9 7 2 1 8 6 4 0

☐ CHECK IF NO INCIDENT # APPLIES

DATE: 15 July 2015

SAP #: 3 4 0 0 6 1

PAGE: 1 of 2

SAMPLING COMPANY: AECOM

LOG CODE:

SITE ADDRESS: Street and City: 900 South Central Ave; ROXANA

State: IL

GLOBAL ID NO:

ADDRESS: 1001 HIGHLANDS PLAZA DRIVE WEST - SUITE 300; ST. LOUIS, MO 63110

EDF DELIVERABLE TO (Name, Company, Office Location):

PHONE NO:

E-MAIL:

CONSULTANT PROJECT NO: Roxana Quarterly GW / 60400249-21563720.03003

PROJECT CONTACT (Hardcopy or PDF Report to): Elizabeth Kunkel, Bob Billman, Lindsay Rathnow

TELEPHONE: 314-429-0100

FAX: 314-429-0462

E-mail To Contact E-MAIL: (e.g. Person@aecom.com; e.g.Person.name@aecom.com; lindsay.rathnow@aecom.com)

SAMPLER NAME(S) Printed: S. Fisher / E. Schumacher C. Williams / D. Haxel

LAB USE ONLY: MC60064 AF

TURNAROUND TIME (CALENDAR DAYS): ☑ STANDARD (10 CAY) ☐ 5 DAYS ☐ 3 DAYS ☐ 2 DAYS ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

REQUESTED ANALYSIS: MC40064

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

DELIVERABLES ☐ LEVEL 1 ☑ LEVEL 2 ☐ LEVEL 3 ☑ LEVEL 4 ☑ OTHER (SPECIFY) EDD

TEMPERATURE ON RECEIPT C°: Cooler #1 | Cooler #2 | Cooler #3

SPECIAL INSTRUCTIONS OR NOTES:

* Please include "J" values on Reports.
* Please provide sample receipt upon login.

☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMBURSEMENT RATE APPLIES
☐ EDD NOT NEEDED
☑ RECEIPT VERIFICATION REQUESTED
☐ PROVIDE LEDD DISK

FIELD NOTES:

TEMPERATURE ON RECEIPT C°

Container PID Readings or Laboratory Notes

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	Container PID Readings or Laboratory Notes
-1	TB-ROX-071515-HCL-A	7/15/15	0000	WATER	X					2	X				0.0
-2	TB-ROX-071515-ST-A		11						X	2		X			
-3	MW6A-ROX-071515		1010		X			X	X	6	X	X	X	X	
-4	MW6A-ROX-071515-EB		1020		X			X	X	6	X	X	X	X	
-5	MW28-ROX-071515		1120		X			X	X	6	X	X	X	X	
-6	MW22-ROX-071515		1335		X			X	X	6	X	X	X	X	
-7	TB-ROX-071515-HCL-B		0000		X					2	X				
-8	TB-ROX-071515-ST-B		11						X	2		X			19D, 2F2,
-9	MW25-ROX-071515		1005		X			X	X	6	X	X	X	X	
-10	MW8-ROX-071515		1330		X			X	X	6	X	X	X	X	

Relinquished by (Signature)	Received by (Signature)	Date	Time
[signature]	FED EX # 8066 2852 5187	15 July 2015	17:00
FX	[signature]	7-16-15	1000
Relinquished by (Signature)	Received by (Signature)	Date	Time

05/07/08 Revision

Custody Seals 07/15/2015 - 01A -02A - 0.6°C
-01B -02B - 1.1°C

Shell Oil Products Chain Of Custody Record

AECOM

LAB (LOCATION)
☐ XENCO (_____)
☐ CALSCIENCE (_____)
☑ OTHER Accutest Labs, 495 Technology Ctr W Marlborough, MA 01752 (508-481-6200)
☐ SPL (_____)
Lab Vendor # ☐ Lab Vendor # (_____)

Please Check Appropriate Box:
☑ ENV. SERVICES | ☐ MOTIVA RETAIL | ☐ SHELL RETAIL
☐ MOTIVA SD&CM | ☐ CONSULTANT | ☐ LUBES
☐ SHELL PIPELINE | ☐ OTHER _____

Print Bill To Contact Name: Bob Billman
PO #
INCIDENT # (ENV SERVICES): 9 7 2 1 8 6 4 0
☐ CHECK IF NO INCIDENT # APPLIES
SAP #: 3 4 0 0 6 1
DATE: 15 July 2015
PAGE: 2 of 2

SAMPLING COMPANY: AECOM
LOG CODE:
ADDRESS: 1001 HIGHLANDS PLAZA DRIVE WEST - SUITE 300; ST. LOUIS, MO 63110
PROJECT CONTACT (Hardcopy or PDF Report to): Elizabeth Kunkel, Bob Billman, Lindsay Rathnow
TELEPHONE: 314-429-0100
FAX: 314-429-0462
Bill To Contact E-MAIL: bob.billman@aecom.com; elizabeth.kunkel@aecom.com; lindsay.rathnow@aecom.com
SITE ADDRESS: Street and City: 900 South Central Ave; ROXANA
State: IL
GLOBAL ID NO.:
EDF DELIVERABLE TO (Name, Company, Office Location):
PHONE NO.:
E-MAIL:
CONSULTANT PROJECT NO.: Roxana Quarterly GW / 60400248-21563720.03003
SAMPLER(S) NAME(S) (Print): E. Schumacher / C. Williams
LAB USE ONLY: ~~MC60064~~ MC40064 AF

TURNAROUND TIME (CALENDAR DAYS)
☑ STANDARD (10 DAY) ☐ 5 DAYS ☐ 3 DAYS ☐ 2 DAYS ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND
☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:
DELIVERABLES ☐ LEVEL 1 ☑ LEVEL 2 ☐ LEVEL 3 ☑ LEVEL 4 ☑ OTHER (SPECIFY) EDD
TEMPERATURE ON RECEIPT C° Cooler #1 Cooler #2 Cooler #3

REQUESTED ANALYSIS: MC40064

SPECIAL INSTRUCTIONS OR NOTES:
* Please include "J" values on Reports.
* Please provide sample receipt upon login.
☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMBURSEMENT RATE APPLIES
☐ EDD NOT NEEDED
☑ RECEIPT VERIFICATION REQUESTED
☐ PROVIDE LEDD DISK

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	PRESERVATIVE HCL	HNO3	H2SO4	NONE	OTHER	NO. OF CONT.	VOC 8260C SL+TICS	VOC 8011 SL	SVOC 8270D SL+TICS	PAH 8270LL	FIELD NOTES: Container PID Readings or Laboratory Notes
-11	MW7-ROX-071515	7/15/15	1405	water	X			X	X	6	X	X	X	X	0.0
-12	MW7-ROX-071515-DUP	"	"	"	X			X	X	6	X	X	X	X	0.0

TEMPERATURE ON RECEIPT C°

Relinquished by: (Signature) — 15 July 2015
Received by: (Signature) FED EX # 8066 2852 5187 — Date: 15 July 2015
Relinquished by: (Signature) FX
Received by: (Signature) — Date: 7-16-15 — Time: 1000
Relinquished by: (Signature)
Received by: (Signature) — Date — Time

05/2006 Revision

-0.6°C
-1.1°C

5

MC40064: Chain of Custody
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Accutest Laboratories Sample Receipt Summary

Accutest Job Number: MC40064 **Client:** AECOM **Immediate Client Services Action Required:** No

Date / Time Received: 7/16/2015 10:00:00 AM **Delivery Method:**

Project: 900 SOUTH CENTRAL **No. Coolers:** 2 **Airbill #'s:**

Cooler Security	Y or N		Y or N
1. Custody Seals Present:	☑ ☐	3. COC Present:	☑ ☐
2. Custody Seals Intact:	☑ ☐	4. Smpl Dates/Time OK	☑ ☐

Cooler Temperature	Y or N
1. Temp criteria achieved:	☑ ☐
2. Cooler temp verification:	Infared Gun
3. Cooler media:	Ice (Bag)

Quality Control Preservation	Y	N	N/A
1. Trip Blank present / cooler:	☑	☐	
2. Trip Blank listed on COC:	☑	☐	
3. Samples preserved properly:	☑	☐	
4. VOCs headspace free:	☑	☐	☐

Sample Integrity - Documentation	Y or N
1. Sample labels present on bottles:	☑ ☐
2. Container labeling complete:	☑ ☐
3. Sample container label / COC agree:	☐ ☑

Sample Integrity - Condition	Y or N
1. Sample rec'd within HT:	☑ ☐
2. All containers accounted for:	☑ ☐
3. Condition of sample:	Intact

Sample Integrity - Instructions	Y	N	N/A
1. Analysis requested is clear:	☑	☐	
2. Bottles received for unspecified tests	☐	☑	
3. Sufficient volume rec'd for analysis:	☑	☐	
4. Compositing instructions clear:	☐	☐	☑
5. Filtering instructions clear:	☐	☐	☑

Comments

-1, -2, -7 and -8 are trip blanks, -1 and -2 should have "A" on the ID.. -7 and -8 should have "B" on the ID.... No way to tell trip blank sets apart.

Accutest Laboratories
V:508.481.6200

495 Technology Center West, Bldg One
F: 508.481.7753

Marlborough, MA
www/accutest.com

MC40064: Chain of Custody
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ACCUTEST LABORATORIES

Sample Receipt Summary - Problem Resolution

Accutest Job Number: MC40064

CSR: Jeremy Vienneau **Response Date:** 7/16/2015

Response: The client was notified that the trip blank labels did not match the COC. Accutest to proceed with analysis.

Accutest Laboratories
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Marlborough, MA
www/accutest.com

MC40064: Chain of Custody
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Internal Sample Tracking Chronicle

Shell Oil

Job No: MC40064

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC40064-1 Collected: 15-JUL-15 00:00 By: SFES			Received: 16-JUL-15 By:			
TB-ROX-071515-HCL-A						
MC40064-1	SW846 8260C	22-JUL-15 22:09	JB			V8260SL+
MC40064-2 Collected: 15-JUL-15 00:00 By: SFES			Received: 16-JUL-15 By:			
TB-ROX-071515-ST-A						
MC40064-2	SW846 8011	28-JUL-15 22:34	NK	28-JUL-15	FC	V8011SL
MC40064-3 Collected: 15-JUL-15 10:10 By: SFES			Received: 16-JUL-15 By:			
MW6A-ROX-071515						
MC40064-3	SW846 8260C	23-JUL-15 00:31	JB			V8260SL+
MC40064-3	SW846 8011	28-JUL-15 23:02	NK	28-JUL-15	FC	V8011SL
MC40064-3	SW846 8270D BY SIM	31-JUL-15 12:58	MR	20-JUL-15	AW	B8270SIMSL
MC40064-3	SW846 8270D	31-JUL-15 13:46	MR	20-JUL-15	AW	AB8270SL+
MC40064-4 Collected: 15-JUL-15 10:20 By: SFES			Received: 16-JUL-15 By:			
MW28-ROX-071515-EB						
MC40064-4	SW846 8260C	22-JUL-15 22:38	JB			V8260SL+
MC40064-4	SW846 8011	28-JUL-15 23:30	NK	28-JUL-15	FC	V8011SL
MC40064-4	SW846 8270D BY SIM	31-JUL-15 13:21	MR	20-JUL-15	AW	B8270SIMSL
MC40064-4	SW846 8270D	31-JUL-15 14:11	MR	20-JUL-15	AW	AB8270SL+
MC40064-5 Collected: 15-JUL-15 11:20 By: SFES			Received: 16-JUL-15 By:			
MW28-ROX-071515						
MC40064-5	SW846 8260C	23-JUL-15 04:19	JB			V8260SL+
MC40064-5	SW846 8011	28-JUL-15 23:58	NK	28-JUL-15	FC	V8011SL
MC40064-5	SW846 8270D BY SIM	31-JUL-15 13:45	MR	20-JUL-15	AW	B8270SIMSL
MC40064-5	SW846 8270D	31-JUL-15 14:36	MR	20-JUL-15	AW	AB8270SL+
MC40064-6 Collected: 15-JUL-15 13:35 By: SFES			Received: 16-JUL-15 By:			
MW22-ROX-071515						
MC40064-6	SW846 8260C	23-JUL-15 06:40	JB			V8260SL+
MC40064-6	SW846 8011	29-JUL-15 00:25	NK	28-JUL-15	FC	V8011SL
MC40064-6	SW846 8270D BY SIM	31-JUL-15 14:08	MR	20-JUL-15	AW	B8270SIMSL

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC40064

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC40064-6	SW846 8270D	31-JUL-15 17:17	MR	20-JUL-15	AW	AB8270SL+
MC40064-7 Collected: 15-JUL-15 00:00 By: SFES Received: 16-JUL-15 By: TB-ROX-071515-HCL-B						
MC40064-7	SW846 8260C	22-JUL-15 23:06	JB			V8260SL+
MC40064-8 Collected: 15-JUL-15 00:00 By: SFES Received: 16-JUL-15 By: TB-ROX-071515-ST-B						
MC40064-8	SW846 8011	29-JUL-15 00:53	NK	28-JUL-15	FC	V8011SL
MC40064-9 Collected: 15-JUL-15 10:05 By: SFES Received: 16-JUL-15 By: MW25-ROX-071515						
MC40064-9	SW846 8260C	23-JUL-15 04:48	JB			V8260SL+
MC40064-9	SW846 8011	29-JUL-15 01:21	NK	28-JUL-15	FC	V8011SL
MC40064-9	SW846 8270D BY SIM	31-JUL-15 14:31	MR	20-JUL-15	AW	B8270SIMSL
MC40064-9	SW846 8270D	31-JUL-15 15:26	MR	20-JUL-15	AW	AB8270SL+
MC40064-10 Collected: 15-JUL-15 13:30 By: SFES Received: 16-JUL-15 By: MW8-ROX-071515						
MC40064-10	SW846 8260C	23-JUL-15 05:16	JB			V8260SL+
MC40064-10	SW846 8011	29-JUL-15 02:17	NK	28-JUL-15	FC	V8011SL
MC40064-10	SW846 8270D BY SIM	31-JUL-15 14:54	MR	20-JUL-15	AW	B8270SIMSL
MC40064-10	SW846 8270D	31-JUL-15 17:41	MR	20-JUL-15	AW	AB8270SL+
MC40064-11 Collected: 15-JUL-15 14:05 By: ESCW Received: 16-JUL-15 By: MW7-ROX-071515						
MC40064-11	SW846 8260C	23-JUL-15 05:44	JB			V8260SL+
MC40064-11	SW846 8011	29-JUL-15 02:45	NK	28-JUL-15	FC	V8011SL
MC40064-11	SW846 8270D BY SIM	31-JUL-15 15:21	MR	20-JUL-15	AW	B8270SIMSL
MC40064-11	SW846 8270D	31-JUL-15 18:06	MR	20-JUL-15	AW	AB8270SL+
MC40064-12 Collected: 15-JUL-15 14:05 By: ESCW Received: 16-JUL-15 By: MW7-ROX-071515-DUP						
MC40064-12	SW846 8260C	23-JUL-15 06:12	JB			V8260SL+

Internal Sample Tracking Chronicle

Shell Oil

Job No: MC40064

URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Project No: 60400249

Sample Number	Method	Analyzed	By	Prepped	By	Test Codes
MC40064-12	SW846 8011	29-JUL-15 03:13	NK	28-JUL-15	FC	V8011SL
MC40064-12	SW846 8270D BY SIM	31-JUL-15 15:44	MR	20-JUL-15	AW	B8270SIMSL
MC40064-12	SW846 8270D	31-JUL-15 18:31	MR	20-JUL-15	AW	AB8270SL+

Accutest Internal Chain of Custody

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/16/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC40064-1.1	VOC Ref #2	Jaclyn Bergeron	07/22/15 14:23	Retrieve from Storage
MC40064-1.1	Jaclyn Bergeron	GCMSV	07/22/15 14:23	Load on Instrument
MC40064-1.1	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40064-1.1	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40064-2.1	VOC Ref #2	Elizabeth Stefanik	07/28/15 09:40	Retrieve from Storage
MC40064-2.1	Elizabeth Stefanik		07/28/15 12:58	Depleted
MC40064-3.2	Walk In Ref #22	Forrest Thompson	07/20/15 16:08	Retrieve from Storage
MC40064-3.2	Forrest Thompson		07/23/15 16:31	Depleted
MC40064-3.3	VOC Ref #2	Jaclyn Bergeron	07/22/15 14:23	Retrieve from Storage
MC40064-3.3	Jaclyn Bergeron	GCMSV	07/22/15 14:23	Load on Instrument
MC40064-3.3	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40064-3.3	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40064-3.5	VOC Ref #2	Elizabeth Stefanik	07/28/15 09:40	Retrieve from Storage
MC40064-3.5	Elizabeth Stefanik		07/28/15 12:58	Depleted
MC40064-4.1	Walk In Ref #22	Forrest Thompson	07/20/15 16:08	Retrieve from Storage
MC40064-4.1	Forrest Thompson		07/23/15 16:31	Depleted
MC40064-4.3	VOC Ref #2	Jaclyn Bergeron	07/22/15 14:23	Retrieve from Storage
MC40064-4.3	Jaclyn Bergeron	GCMSV	07/22/15 14:23	Load on Instrument
MC40064-4.3	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40064-4.3	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40064-4.5	VOC Ref #2	Elizabeth Stefanik	07/28/15 09:40	Retrieve from Storage
MC40064-4.5	Elizabeth Stefanik		07/28/15 12:58	Depleted
MC40064-5.1	Walk In Ref #22	Forrest Thompson	07/20/15 16:08	Retrieve from Storage
MC40064-5.1	Forrest Thompson		07/23/15 16:31	Depleted
MC40064-5.4	VOC Ref #2	Jaclyn Bergeron	07/22/15 14:23	Retrieve from Storage
MC40064-5.4	Jaclyn Bergeron	GCMSV	07/22/15 14:23	Load on Instrument
MC40064-5.4	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40064-5.4	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40064-5.6	VOC Ref #2	Elizabeth Stefanik	07/28/15 09:40	Retrieve from Storage
MC40064-5.6	Elizabeth Stefanik		07/28/15 12:58	Depleted
MC40064-6.2	Walk In Ref #22	Forrest Thompson	07/20/15 16:08	Retrieve from Storage
MC40064-6.2	Forrest Thompson		07/23/15 16:31	Depleted

Accutest Internal Chain of Custody

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/16/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC40064-6.4	VOC Ref #2	Jaclyn Bergeron	07/22/15 14:23	Retrieve from Storage
MC40064-6.4	Jaclyn Bergeron	GCMSV	07/22/15 14:23	Load on Instrument
MC40064-6.4	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40064-6.4	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40064-6.6	VOC Ref #2	Elizabeth Stefanik	07/28/15 09:40	Retrieve from Storage
MC40064-6.6	Elizabeth Stefanik		07/28/15 12:58	Depleted
MC40064-7.1	VOC Ref #2	Jaclyn Bergeron	07/22/15 14:23	Retrieve from Storage
MC40064-7.1	Jaclyn Bergeron	GCMSV	07/22/15 14:23	Load on Instrument
MC40064-7.1	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40064-7.1	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40064-8.1	VOC Ref #2	Elizabeth Stefanik	07/28/15 09:40	Retrieve from Storage
MC40064-8.1	Elizabeth Stefanik		07/28/15 12:58	Depleted
MC40064-9.1	Walk In Ref #22	Forrest Thompson	07/20/15 16:08	Retrieve from Storage
MC40064-9.1	Forrest Thompson		07/23/15 16:31	Depleted
MC40064-9.4	VOC Ref #2	Jaclyn Bergeron	07/22/15 14:23	Retrieve from Storage
MC40064-9.4	Jaclyn Bergeron	GCMSV	07/22/15 14:23	Load on Instrument
MC40064-9.4	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40064-9.4	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40064-9.6	VOC Ref #2	Elizabeth Stefanik	07/28/15 09:40	Retrieve from Storage
MC40064-9.6	Elizabeth Stefanik		07/28/15 12:58	Depleted
MC40064-10.1	Walk In Ref #22	Forrest Thompson	07/20/15 16:08	Retrieve from Storage
MC40064-10.1	Forrest Thompson		07/23/15 16:31	Depleted
MC40064-10.3	VOC Ref #2	Jaclyn Bergeron	07/22/15 14:23	Retrieve from Storage
MC40064-10.3	Jaclyn Bergeron	GCMSV	07/22/15 14:23	Load on Instrument
MC40064-10.3	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40064-10.3	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40064-10.5	VOC Ref #2	Elizabeth Stefanik	07/28/15 09:40	Retrieve from Storage
MC40064-10.5	Elizabeth Stefanik		07/28/15 12:58	Depleted
MC40064-11.2	Walk In Ref #22	Forrest Thompson	07/20/15 16:08	Retrieve from Storage
MC40064-11.2	Forrest Thompson		07/23/15 16:31	Depleted
MC40064-11.3	VOC Ref #2	Jaclyn Bergeron	07/22/15 14:23	Retrieve from Storage
MC40064-11.3	Jaclyn Bergeron	GCMSV	07/22/15 14:23	Load on Instrument
MC40064-11.3	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument

Accutest Internal Chain of Custody

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL
Received: 07/16/15

Sample.Bottle Number	Transfer FROM	Transfer TO	Date/Time	Reason
MC40064-11.3	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40064-11.6	VOC Ref #2	Elizabeth Stefanik	07/28/15 09:40	Retrieve from Storage
MC40064-11.6	Elizabeth Stefanik		07/28/15 12:58	Depleted
MC40064-12.1	Walk In Ref #22	Forrest Thompson	07/20/15 16:08	Retrieve from Storage
MC40064-12.1	Forrest Thompson		07/23/15 16:31	Depleted
MC40064-12.3	VOC Ref #2	Jaclyn Bergeron	07/22/15 14:23	Retrieve from Storage
MC40064-12.3	Jaclyn Bergeron	GCMSV	07/22/15 14:23	Load on Instrument
MC40064-12.3	GCMSV	Jaclyn Bergeron	07/23/15 09:54	Unload from Instrument
MC40064-12.3	Jaclyn Bergeron	VOC Ref #2	07/23/15 09:55	Return to Storage
MC40064-12.6	VOC Ref #2	Elizabeth Stefanik	07/28/15 09:40	Retrieve from Storage
MC40064-12.6	Elizabeth Stefanik		07/28/15 12:58	Depleted

New England ACCUTEST LABORATORIES

GC/MS Volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1492-MB	V41298.D	1	07/22/15	JB	n/a	n/a	MSV1492

The QC reported here applies to the following samples: Method: SW846 8260C

MC40064-1, MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-7, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	10	2.0	ug/l	
107-02-8	Acrolein	ND	25	11	ug/l	
107-13-1	Acrylonitrile	ND	5.0	2.3	ug/l	
71-43-2	Benzene	ND	0.50	0.27	ug/l	
108-86-1	Bromobenzene	ND	5.0	0.26	ug/l	
74-97-5	Bromochloromethane	ND	5.0	0.37	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.18	ug/l	
75-25-2	Bromoform	ND	1.0	0.39	ug/l	
74-83-9	Bromomethane	ND	2.0	0.79	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	3.0	ug/l	
104-51-8	n-Butylbenzene	ND	5.0	0.50	ug/l	
135-98-8	sec-Butylbenzene	ND	5.0	0.50	ug/l	
98-06-6	tert-Butylbenzene	ND	5.0	0.57	ug/l	
75-15-0	Carbon disulfide	ND	5.0	0.19	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.34	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.24	ug/l	
75-00-3	Chloroethane	ND	2.0	0.49	ug/l	
110-75-8	2-Chloroethyl vinyl ether	ND	5.0	1.3	ug/l	
67-66-3	Chloroform	ND	1.0	0.40	ug/l	
74-87-3	Chloromethane	ND	2.0	0.49	ug/l	
95-49-8	o-Chlorotoluene	ND	5.0	0.60	ug/l	
106-43-4	p-Chlorotoluene	ND	5.0	0.46	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.22	ug/l	
95-50-1	1,2-Dichlorobenzene	ND	1.0	0.24	ug/l	
541-73-1	1,3-Dichlorobenzene	ND	1.0	0.24	ug/l	
106-46-7	1,4-Dichlorobenzene	ND	1.0	0.37	ug/l	
75-71-8	Dichlorodifluoromethane	ND	2.0	0.53	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.28	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.31	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.28	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.31	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.48	ug/l	
78-87-5	1,2-Dichloropropane	ND	2.0	0.21	ug/l	
142-28-9	1,3-Dichloropropane	ND	5.0	0.29	ug/l	
594-20-7	2,2-Dichloropropane	ND	5.0	1.7	ug/l	
563-58-6	1,1-Dichloropropene	ND	5.0	0.23	ug/l	

Method Blank Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1492-MB	V41298.D	1	07/22/15	JB	n/a	n/a	MSV1492

The QC reported here applies to the following samples: Method: SW846 8260C

MC40064-1, MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-7, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	Result	RL	MDL	Units	Q
10061-01-5	cis-1,3-Dichloropropene	ND	0.50	0.27	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	0.50	0.43	ug/l	
123-91-1	1,4-Dioxane	ND	25	20	ug/l	
97-63-2	Ethyl methacrylate	ND	5.0	0.50	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.24	ug/l	
87-68-3	Hexachlorobutadiene	ND	5.0	0.45	ug/l	
591-78-6	2-Hexanone	ND	5.0	2.7	ug/l	
98-82-8	Isopropylbenzene	ND	5.0	0.27	ug/l	
99-87-6	p-Isopropyltoluene	ND	5.0	0.32	ug/l	
1634-04-4	Methyl Tert Butyl Ether	ND	1.0	0.35	ug/l	
108-10-1	4-Methyl-2-pentanone (MIBK)	ND	5.0	0.77	ug/l	
74-95-3	Methylene bromide	ND	5.0	0.30	ug/l	
75-09-2	Methylene chloride	ND	2.0	0.27	ug/l	
91-20-3	Naphthalene	ND	5.0	0.61	ug/l	
103-65-1	n-Propylbenzene	ND	5.0	0.29	ug/l	
100-42-5	Styrene	ND	5.0	0.28	ug/l	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.0	0.25	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.50	0.29	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.21	ug/l	
108-88-3	Toluene	ND	1.0	0.29	ug/l	
87-61-6	1,2,3-Trichlorobenzene	ND	5.0	0.78	ug/l	
120-82-1	1,2,4-Trichlorobenzene	ND	5.0	0.74	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.42	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.32	ug/l	
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-69-4	Trichlorofluoromethane	ND	1.0	0.47	ug/l	
96-18-4	1,2,3-Trichloropropane	ND	5.0	0.39	ug/l	
95-63-6	1,2,4-Trimethylbenzene	ND	5.0	0.29	ug/l	
108-67-8	1,3,5-Trimethylbenzene	ND	5.0	0.20	ug/l	
108-05-4	Vinyl Acetate	ND	5.0	1.4	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.45	ug/l	
	m,p-Xylene	ND	1.0	0.47	ug/l	
95-47-6	o-Xylene	ND	1.0	0.22	ug/l	
1330-20-7	Xylene (total)	ND	1.0	0.22	ug/l	

Method Blank Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1492-MB	V41298.D	1	07/22/15	JB	n/a	n/a	MSV1492

The QC reported here applies to the following samples: Method: SW846 8260C

MC40064-1, MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-7, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Surrogate Recoveries		Limits
1868-53-7	Dibromofluoromethane	106%	72-133%
2037-26-5	Toluene-D8	101%	85-114%
460-00-4	4-Bromofluorobenzene	101%	70-134%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Volatile		0	ug/l	

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1492-BS	V41295.D	1	07/22/15	JB	n/a	n/a	MSV1492
MSV1492-BSD	V41296.D	1	07/22/15	JB	n/a	n/a	MSV1492

The QC reported here applies to the following samples: Method: SW846 8260C

MC40064-1, MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-7, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
67-64-1	Acetone	50	73.2	146	72.3	145	1	14-172/25
107-02-8	Acrolein	250	418	167	405	162	3	10-168/25
107-13-1	Acrylonitrile	50	60.4	121	59.5	119	2	41-158/25
71-43-2	Benzene	50	52.7	105	55.2	110	5	68-127/25
108-86-1	Bromobenzene	50	49.5	99	51.9	104	5	74-124/25
74-97-5	Bromochloromethane	50	53.0	106	54.3	109	2	68-135/25
75-27-4	Bromodichloromethane	50	49.7	99	50.1	100	1	72-144/25
75-25-2	Bromoform	50	48.2	96	47.9	96	1	59-147/25
74-83-9	Bromomethane	50	60.9	122	61.8	124	1	34-175/25
78-93-3	2-Butanone (MEK)	50	68.6	137	64.8	130	6	43-147/25
104-51-8	n-Butylbenzene	50	57.4	115	60.6	121	5	77-136/25
135-98-8	sec-Butylbenzene	50	54.5	109	57.8	116	6	75-134/25
98-06-6	tert-Butylbenzene	50	55.8	112	60.0	120	7	74-132/25
75-15-0	Carbon disulfide	50	68.5	137	68.8	138	0	34-171/25
56-23-5	Carbon tetrachloride	50	60.8	122	63.0	126	4	55-153/25
108-90-7	Chlorobenzene	50	48.8	98	50.6	101	4	71-123/25
75-00-3	Chloroethane	50	62.3	125	62.7	125	1	58-175/25
110-75-8	2-Chloroethyl vinyl ether	50	50.9	102	50.9	102	0	44-169/25
67-66-3	Chloroform	50	51.1	102	53.2	106	4	67-136/25
74-87-3	Chloromethane	50	60.0	120	59.6	119	1	25-182/25
95-49-8	o-Chlorotoluene	50	53.2	106	56.3	113	6	72-130/25
106-43-4	p-Chlorotoluene	50	53.2	106	56.0	112	5	73-127/25
124-48-1	Dibromochloromethane	50	47.9	96	48.3	97	1	73-139/25
95-50-1	1,2-Dichlorobenzene	50	49.5	99	51.1	102	3	77-125/25
541-73-1	1,3-Dichlorobenzene	50	49.0	98	51.8	104	6	77-124/25
106-46-7	1,4-Dichlorobenzene	50	47.3	95	49.2	98	4	73-128/25
75-71-8	Dichlorodifluoromethane	50	48.4	97	50.6	101	4	23-157/25
75-34-3	1,1-Dichloroethane	50	53.5	107	56.1	112	5	63-145/25
107-06-2	1,2-Dichloroethane	50	53.6	107	54.0	108	1	58-145/25
75-35-4	1,1-Dichloroethene	50	66.1	132	66.0	132	0	56-158/25
156-59-2	cis-1,2-Dichloroethene	50	56.1	112	58.7	117	5	67-133/25
156-60-5	trans-1,2-Dichloroethene	50	53.0	106	55.5	111	5	66-136/25
78-87-5	1,2-Dichloropropane	50	50.4	101	51.9	104	3	75-133/25
142-28-9	1,3-Dichloropropane	50	51.5	103	52.3	105	2	70-127/25
594-20-7	2,2-Dichloropropane	50	56.2	112	57.9	116	3	52-163/25
563-58-6	1,1-Dichloropropene	50	51.7	103	53.8	108	4	77-140/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1492-BS	V41295.D	1	07/22/15	JB	n/a	n/a	MSV1492
MSV1492-BSD	V41296.D	1	07/22/15	JB	n/a	n/a	MSV1492

The QC reported here applies to the following samples: Method: SW846 8260C

MC40064-1, MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-7, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
10061-01-5	cis-1,3-Dichloropropene	50	62.0	124	63.2	126	2	74-141/25
10061-02-6	trans-1,3-Dichloropropene	50	55.1	110	55.2	110	0	77-143/25
123-91-1	1,4-Dioxane	250	230	92	232	93	1	30-182/25
97-63-2	Ethyl methacrylate	50	57.0	114	57.1	114	0	64-131/25
100-41-4	Ethylbenzene	50	52.2	104	54.2	108	4	71-129/25
87-68-3	Hexachlorobutadiene	50	47.7	95	48.5	97	2	64-146/25
591-78-6	2-Hexanone	50	69.2	138	67.7	135	2	22-163/25
98-82-8	Isopropylbenzene	50	55.6	111	59.3	119	6	72-133/25
99-87-6	p-Isopropyltoluene	50	56.6	113	59.9	120	6	77-134/25
1634-04-4	Methyl Tert Butyl Ether	50	60.2	120	60.0	120	0	46-151/25
108-10-1	4-Methyl-2-pentanone (MIBK)	50	61.5	123	59.5	119	3	47-145/25
74-95-3	Methylene bromide	50	51.4	103	51.4	103	0	70-132/25
75-09-2	Methylene chloride	50	54.1	108	54.3	109	0	55-146/25
91-20-3	Naphthalene	50	42.2	84	39.1	78	8	39-176/25
103-65-1	n-Propylbenzene	50	53.9	108	57.4	115	6	74-134/25
100-42-5	Styrene	50	57.4	115	59.6	119	4	71-134/25
630-20-6	1,1,1,2-Tetrachloroethane	50	49.1	98	50.7	101	3	70-137/25
79-34-5	1,1,2,2-Tetrachloroethane	50	49.0	98	49.2	98	0	58-145/25
127-18-4	Tetrachloroethene	50	47.4	95	49.7	99	5	63-137/25
108-88-3	Toluene	50	51.1	102	53.0	106	4	75-126/25
87-61-6	1,2,3-Trichlorobenzene	50	54.5	109	50.6	101	7	27-181/25
120-82-1	1,2,4-Trichlorobenzene	50	48.8	98	47.0	94	4	40-176/25
71-55-6	1,1,1-Trichloroethane	50	55.5	111	57.4	115	3	68-144/25
79-00-5	1,1,2-Trichloroethane	50	52.2	104	52.7	105	1	72-133/25
79-01-6	Trichloroethene	50	50.5	101	52.2	104	3	73-126/25
75-69-4	Trichlorofluoromethane	50	56.0	112	55.8	112	0	43-152/25
96-18-4	1,2,3-Trichloropropane	50	55.6	111	55.8	112	0	58-141/25
95-63-6	1,2,4-Trimethylbenzene	50	56.1	112	59.4	119	6	76-129/25
108-67-8	1,3,5-Trimethylbenzene	50	57.1	114	60.4	121	6	71-127/25
108-05-4	Vinyl Acetate	50	60.2	120	61.0	122	1	10-170/25
75-01-4	Vinyl chloride	50	58.9	118	59.4	119	1	36-167/25
	m,p-Xylene	100	107	107	111	111	4	68-130/25
95-47-6	o-Xylene	50	53.9	108	56.9	114	5	69-126/25
1330-20-7	Xylene (total)	150	161	107	168	112	4	67-129/25

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
MSV1492-BS	V41295.D	1	07/22/15	JB	n/a	n/a	MSV1492
MSV1492-BSD	V41296.D	1	07/22/15	JB	n/a	n/a	MSV1492

The QC reported here applies to the following samples: Method: SW846 8260C

MC40064-1, MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-7, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
1868-53-7	Dibromofluoromethane	101%	100%	72-133%
2037-26-5	Toluene-D8	103%	103%	85-114%
460-00-4	4-Bromofluorobenzene	102%	102%	70-134%

* = Outside of Control Limits.

Volatile Internal Standard Area Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSV1492-CC1479	Injection Date:	07/22/15
Lab File ID:	V41293.D	Injection Time:	19:19
Instrument ID:	GCMSV	Method:	SW846 8260C

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
Check Std	969212	6.57	1504822	7.76	729002	11.09	774388	13.30	133656	3.54
Upper Limit [a]	1938424	7.07	3009644	8.26	1458004	11.59	1548776	13.80	267312	4.04
Lower Limit [b]	484606	6.07	752411	7.26	364501	10.59	387194	12.80	66828	3.04
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT
MSV1492-BS	1029043	6.57	1636688	7.76	787639	11.09	812498	13.30	161157	3.55
MSV1492-BSD	1010168	6.57	1611172	7.76	765506	11.09	774187	13.30	143381	3.54
MSV1492-MB	932904	6.58	1493247	7.76	672071	11.09	668580	13.30	121357	3.54
MC40064-1	846607	6.57	1395686	7.75	653491	11.09	652196	13.30	132681	3.54
MC40064-4	836450	6.57	1386452	7.76	644906	11.09	636168	13.30	123651	3.54
MC40064-7	861309	6.57	1446132	7.75	675920	11.08	667314	13.30	139240	3.54
ZZZZZZ	901336	6.58	1470792	7.76	695837	11.09	682352	13.30	119817	3.55
ZZZZZZ	819265	6.57	1363672	7.75	654547	11.08	649340	13.30	124752	3.54
MC40064-3	823474	6.57	1370665	7.75	649405	11.08	654945	13.30	137574	3.54
ZZZZZZ	789085	6.57	1333070	7.75	643200	11.08	648570	13.30	119955	3.54
ZZZZZZ	792470	6.57	1350913	7.75	639763	11.08	625791	13.30	112841	3.54
ZZZZZZ	789521	6.57	1356744	7.75	649628	11.08	641853	13.30	126502	3.54
ZZZZZZ	783114	6.57	1298276	7.75	627083	11.08	615922	13.30	123510	3.53
ZZZZZZ	786728	6.57	1321649	7.75	632694	11.08	629273	13.30	133132	3.53
ZZZZZZ	756629	6.56	1291264	7.75	614032	11.08	617235	13.30	107603	3.53
ZZZZZZ	779893	6.57	1309764	7.75	629141	11.08	623086	13.30	105338	3.54
MC40064-5	794699	6.56	1339503	7.75	646038	11.08	633061	13.30	128498	3.52
MC40064-9	807664	6.57	1404717	7.75	647152	11.08	628124	13.30	111909	3.54
MC40064-10	794982	6.57	1385607	7.75	647916	11.08	641294	13.30	108567	3.54
MC40064-11	834061	6.57	1451935	7.75	675340	11.08	662403	13.30	113810	3.54
MC40064-12	749370	6.57	1334134	7.75	612647	11.08	594452	13.29	104386	3.53
MC40064-6	901598	6.56	1427329	7.75	702050	11.08	689392	13.29	130276	3.53

IS 1 = Pentafluorobenzene
IS 2 = 1,4-Difluorobenzene
IS 3 = Chlorobenzene-D5
IS 4 = 1,4-Dichlorobenzene-d4
IS 5 = Tert Butyl Alcohol-D9

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

Volatile Surrogate Recovery Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8260C Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC40064-1	V41299.D	110	101	99
MC40064-3	V41304.D	114	102	100
MC40064-4	V41300.D	113	101	99
MC40064-5	V41312.D	113	104	102
MC40064-6	V41317.D	102	107	103
MC40064-7	V41301.D	115	101	98
MC40064-9	V41313.D	115	99	98
MC40064-10	V41314.D	117	101	98
MC40064-11	V41315.D	117	102	99
MC40064-12	V41316.D	116	100	99
MSV1492-BS	V41295.D	101	103	102
MSV1492-BSD	V41296.D	100	103	102
MSV1492-MB	V41298.D	106	101	101

Surrogate Compounds	Recovery Limits
S1 = Dibromofluoromethane	72-133%
S2 = Toluene-D8	85-114%
S3 = 4-Bromofluorobenzene	70-134%

6.4.1

New England ACCUTEST LABORATORIES

GC/MS Semi-volatiles

QC Data Summaries

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Internal Standard Area Summaries
- Surrogate Recovery Summaries

Method Blank Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43885-MB	W23143.D	1	07/31/15	MR	07/20/15	OP43885	MSW981

The QC reported here applies to the following samples: Method: SW846 8270D

MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	Result	RL	MDL	Units	Q
65-85-0	Benzoic Acid	ND	10	2.5	ug/l	
95-57-8	2-Chlorophenol	ND	5.0	0.29	ug/l	
59-50-7	4-Chloro-3-methyl phenol	ND	10	0.37	ug/l	
120-83-2	2,4-Dichlorophenol	ND	10	0.28	ug/l	
105-67-9	2,4-Dimethylphenol	ND	10	0.50	ug/l	
51-28-5	2,4-Dinitrophenol	ND	20	2.5	ug/l	
534-52-1	4,6-Dinitro-o-cresol	ND	10	1.9	ug/l	
95-48-7	2-Methylphenol	ND	10	0.21	ug/l	
	3&4-Methylphenol	ND	10	0.47	ug/l	
88-75-5	2-Nitrophenol	ND	10	0.41	ug/l	
100-02-7	4-Nitrophenol	ND	20	2.5	ug/l	
87-86-5	Pentachlorophenol	ND	10	0.30	ug/l	
108-95-2	Phenol	ND	5.0	0.25	ug/l	
95-95-4	2,4,5-Trichlorophenol	ND	10	0.34	ug/l	
88-06-2	2,4,6-Trichlorophenol	ND	10	0.30	ug/l	
62-53-3	Aniline	ND	10	2.5	ug/l	
101-55-3	4-Bromophenyl phenyl ether	ND	5.0	0.82	ug/l	
85-68-7	Butyl benzyl phthalate	ND	5.0	0.21	ug/l	
100-51-6	Benzyl Alcohol	ND	10	0.51	ug/l	
91-58-7	2-Chloronaphthalene	ND	5.0	0.16	ug/l	
106-47-8	4-Chloroaniline	ND	10	0.54	ug/l	
111-91-1	bis(2-Chloroethoxy)methane	ND	5.0	0.24	ug/l	
111-44-4	bis(2-Chloroethyl)ether	ND	5.0	0.42	ug/l	
108-60-1	bis(2-Chloroisopropyl)ether	ND	5.0	0.24	ug/l	
7005-72-3	4-Chlorophenyl phenyl ether	ND	5.0	0.21	ug/l	
122-66-7	1,2-Diphenylhydrazine	ND	5.0	0.24	ug/l	
121-14-2	2,4-Dinitrotoluene	ND	10	1.5	ug/l	
606-20-2	2,6-Dinitrotoluene	ND	10	2.3	ug/l	
91-94-1	3,3'-Dichlorobenzidine	ND	5.0	0.37	ug/l	
132-64-9	Dibenzofuran	ND	2.0	0.20	ug/l	
84-74-2	Di-n-butyl phthalate	ND	5.0	0.37	ug/l	
117-84-0	Di-n-octyl phthalate	ND	5.0	0.72	ug/l	
84-66-2	Diethyl phthalate	ND	5.0	0.57	ug/l	
131-11-3	Dimethyl phthalate	ND	5.0	0.27	ug/l	
117-81-7	bis(2-Ethylhexyl)phthalate	ND	2.0	0.30	ug/l	
118-74-1	Hexachlorobenzene	ND	5.0	0.77	ug/l	

Method Blank Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43885-MB	W23143.D	1	07/31/15	MR	07/20/15	OP43885	MSW981

The QC reported here applies to the following samples: Method: SW846 8270D

MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	Result	RL	MDL	Units	Q
77-47-4	Hexachlorocyclopentadiene	ND	10	1.3	ug/l	
67-72-1	Hexachloroethane	ND	5.0	0.29	ug/l	
78-59-1	Isophorone	ND	5.0	0.23	ug/l	
88-74-4	2-Nitroaniline	ND	10	3.6	ug/l	
99-09-2	3-Nitroaniline	ND	10	2.1	ug/l	
100-01-6	4-Nitroaniline	ND	10	3.1	ug/l	
98-95-3	Nitrobenzene	ND	5.0	0.26	ug/l	
62-75-9	n-Nitrosodimethylamine	ND	5.0	1.3	ug/l	
621-64-7	N-Nitroso-di-n-propylamine	ND	5.0	0.52	ug/l	
86-30-6	N-Nitrosodiphenylamine	ND	5.0	0.77	ug/l	
110-86-1	Pyridine	ND	10	1.3	ug/l	

CAS No.	Surrogate Recoveries		Limits
367-12-4	2-Fluorophenol	52%	10-80%
4165-62-2	Phenol-d5	41%	10-72%
118-79-6	2,4,6-Tribromophenol	107%	42-134%
4165-60-0	Nitrobenzene-d5	90%	25-117%
321-60-8	2-Fluorobiphenyl	81%	24-112%
1718-51-0	Terphenyl-d14	109%	48-133%

CAS No.	Tentatively Identified Compounds	R.T.	Est. Conc.	Units	Q
	Total TIC, Semi-Volatile		0	ug/l	

Method Blank Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43886-MB	I97043.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	Result	RL	MDL	Units	Q
83-32-9	Acenaphthene	ND	0.10	0.0075	ug/l	
208-96-8	Acenaphthylene	ND	0.10	0.0084	ug/l	
120-12-7	Anthracene	ND	0.10	0.0098	ug/l	
56-55-3	Benzo(a)anthracene	ND	0.050	0.024	ug/l	
50-32-8	Benzo(a)pyrene	ND	0.10	0.015	ug/l	
205-99-2	Benzo(b)fluoranthene	ND	0.050	0.019	ug/l	
191-24-2	Benzo(g,h,i)perylene	ND	0.10	0.013	ug/l	
207-08-9	Benzo(k)fluoranthene	ND	0.10	0.010	ug/l	
218-01-9	Chrysene	ND	0.10	0.013	ug/l	
53-70-3	Dibenzo(a,h)anthracene	ND	0.10	0.015	ug/l	
206-44-0	Fluoranthene	ND	0.10	0.0074	ug/l	
86-73-7	Fluorene	ND	0.10	0.015	ug/l	
193-39-5	Indeno(1,2,3-cd)pyrene	ND	0.10	0.020	ug/l	
90-12-0	1-Methylnaphthalene	ND	2.0	0.012	ug/l	
91-57-6	2-Methylnaphthalene	0.020	2.0	0.011	ug/l	J
85-01-8	Phenanthrene	ND	0.050	0.011	ug/l	
129-00-0	Pyrene	ND	0.10	0.0085	ug/l	

CAS No.	Surrogate Recoveries		Limits
4165-60-0	Nitrobenzene-d5	88%	26-121%
321-60-8	2-Fluorobiphenyl	76%	28-107%
1718-51-0	Terphenyl-d14	108%	29-129%

7.1.2

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Blank Spike Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43885-BS	X06591.D	1	07/31/15	DRY	07/20/15	OP43885	MSX207

The QC reported here applies to the following samples: Method: SW846 8270D

MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	Limits
65-85-0	Benzoic Acid	50	50.6	101* [a]	10-70
95-57-8	2-Chlorophenol	50	40.5	81	39-100
59-50-7	4-Chloro-3-methyl phenol	50	45.3	91	43-112
120-83-2	2,4-Dichlorophenol	50	44.6	89	44-113
105-67-9	2,4-Dimethylphenol	50	39.0	78	21-108
51-28-5	2,4-Dinitrophenol	50	46.9	94	22-128
534-52-1	4,6-Dinitro-o-cresol	50	49.9	100	42-132
95-48-7	2-Methylphenol	50	39.3	79	34-91
	3&4-Methylphenol	100	76.7	77	31-90
88-75-5	2-Nitrophenol	50	43.5	87	40-118
100-02-7	4-Nitrophenol	50	29.6	59	10-71
87-86-5	Pentachlorophenol	50	48.1	96	33-123
108-95-2	Phenol	50	25.3	51	11-57
95-95-4	2,4,5-Trichlorophenol	50	47.8	96	50-122
88-06-2	2,4,6-Trichlorophenol	50	45.4	91	48-118
62-53-3	Aniline	50	24.2	48	18-90
101-55-3	4-Bromophenyl phenyl ether	50	43.3	87	55-126
85-68-7	Butyl benzyl phthalate	50	44.7	89	56-124
100-51-6	Benzyl Alcohol	50	36.8	74	13-106
91-58-7	2-Chloronaphthalene	50	41.4	83	45-123
106-47-8	4-Chloroaniline	50	39.1	78	35-111
111-91-1	bis(2-Chloroethoxy)methane	50	41.8	84	41-117
111-44-4	bis(2-Chloroethyl)ether	50	40.5	81	31-114
108-60-1	bis(2-Chloroisopropyl)ether	50	45.8	92	33-135
7005-72-3	4-Chlorophenyl phenyl ether	50	43.7	87	52-124
122-66-7	1,2-Diphenylhydrazine	50	45.4	91	45-119
121-14-2	2,4-Dinitrotoluene	50	42.6	85	52-128
606-20-2	2,6-Dinitrotoluene	50	41.8	84	50-126
91-94-1	3,3'-Dichlorobenzidine	50	36.7	73	46-134
132-64-9	Dibenzofuran	50	42.0	84	51-118
84-74-2	Di-n-butyl phthalate	50	43.6	87	57-120
117-84-0	Di-n-octyl phthalate	50	45.1	90	58-125
84-66-2	Diethyl phthalate	50	43.3	87	40-125
131-11-3	Dimethyl phthalate	50	42.7	85	10-145
117-81-7	bis(2-Ethylhexyl)phthalate	50	45.0	90	60-126
118-74-1	Hexachlorobenzene	50	42.0	84	53-127

* = Outside of Control Limits.

Blank Spike Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43885-BS	X06591.D	1	07/31/15	DRY	07/20/15	OP43885	MSX207

The QC reported here applies to the following samples: Method: SW846 8270D

MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	Limits
77-47-4	Hexachlorocyclopentadiene	50	25.2	50	10-75
67-72-1	Hexachloroethane	50	25.1	50	15-98
78-59-1	Isophorone	50	40.0	80	36-106
88-74-4	2-Nitroaniline	50	43.8	88	52-130
99-09-2	3-Nitroaniline	50	41.2	82	47-120
100-01-6	4-Nitroaniline	50	39.7	79	51-121
98-95-3	Nitrobenzene	50	39.9	80	27-120
62-75-9	n-Nitrosodimethylamine	50	31.7	63	10-87
621-64-7	N-Nitroso-di-n-propylamine	50	40.5	81	37-123
86-30-6	N-Nitrosodiphenylamine	50	42.0	84	50-112
110-86-1	Pyridine	50	5.0	10	10-72

CAS No.	Surrogate Recoveries	BSP	Limits
367-12-4	2-Fluorophenol	62%	10-80%
4165-62-2	Phenol-d5	49%	10-72%
118-79-6	2,4,6-Tribromophenol	94%	42-134%
4165-60-0	Nitrobenzene-d5	88%	25-117%
321-60-8	2-Fluorobiphenyl	71%	24-112%
1718-51-0	Terphenyl-d14	104%	48-133%

(a) Outside control limits. Associated samples are non-detect for this compound.

* = Outside of Control Limits.

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43886-BS	I97044.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630
OP43886-BSD	I97045.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
83-32-9	Acenaphthene	50	38.1	76	40.1	80	5	45-116/30
208-96-8	Acenaphthylene	50	34.2	68	35.9	72	5	34-110/30
120-12-7	Anthracene	50	41.2	82	45.0	90	9	50-117/30
56-55-3	Benzo(a)anthracene	50	39.7	79	43.0	86	8	55-139/30
50-32-8	Benzo(a)pyrene	50	43.7	87	49.7	99	13	48-131/30
205-99-2	Benzo(b)fluoranthene	50	40.5	81	49.0	98	19	49-141/30
191-24-2	Benzo(g,h,i)perylene	50	43.4	87	47.8	96	10	60-130/30
207-08-9	Benzo(k)fluoranthene	50	48.0	96	50.0	100	4	49-133/30
218-01-9	Chrysene	50	39.7	79	43.5	87	9	52-128/30
53-70-3	Dibenzo(a,h)anthracene	50	46.0	92	49.7	99	8	60-136/30
206-44-0	Fluoranthene	50	42.0	84	44.2	88	5	46-132/30
86-73-7	Fluorene	50	35.8	72	37.7	75	5	53-120/30
193-39-5	Indeno(1,2,3-cd)pyrene	50	44.3	89	47.7	95	7	57-134/30
90-12-0	1-Methylnaphthalene	50	31.7	63	32.8	66	3	41-105/30
91-57-6	2-Methylnaphthalene	50	34.7	69	35.2	70	1	36-111/30
85-01-8	Phenanthrene	50	39.2	78	41.7	83	6	50-120/30
129-00-0	Pyrene	50	38.7	77	43.2	86	11	48-127/30

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
4165-60-0	Nitrobenzene-d5	91%	84%	26-121%
321-60-8	2-Fluorobiphenyl	65%	65%	28-107%
1718-51-0	Terphenyl-d14	94%	106%	29-129%

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43885-MS	X06592.D	1	07/31/15	DRY	07/20/15	OP43885	MSX207
OP43885-MSD	X06593.D	1	07/31/15	DRY	07/20/15	OP43885	MSX207
MC40121-3	X06596.D	1	07/31/15	DRY	07/20/15	OP43885	MSX207

The QC reported here applies to the following samples: Method: SW846 8270D

MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	MC40121-3 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
65-85-0	Benzoic Acid	ND		51	70.5	138* [a]	51	70.1	137* [a]	1	10-69/20
95-57-8	2-Chlorophenol	ND		51	43.6	85	51	43.6	85	0	35-104/20
59-50-7	4-Chloro-3-methyl phenol	ND		51	45.4	89	51	43.3	85	5	43-115/20
120-83-2	2,4-Dichlorophenol	ND		51	46.2	91	51	46.9	92	2	42-116/20
105-67-9	2,4-Dimethylphenol	ND		51	42.0	82	51	41.7	82	1	26-109/20
51-28-5	2,4-Dinitrophenol	ND		51	57.7	113	51	38.4	75	40* [b]	19-140/20
534-52-1	4,6-Dinitro-o-cresol	ND		51	54.7	107	51	43.2	85	23* [b]	45-136/20
95-48-7	2-Methylphenol	ND		51	41.4	81	51	40.7	80	2	31-94/20
	3&4-Methylphenol	ND		102	80.8	79	102	78.8	77	3	30-91/20
88-75-5	2-Nitrophenol	ND		51	42.9	84	51	42.1	83	2	38-121/20
100-02-7	4-Nitrophenol	ND		51	29.1	57	51	27.0	53	7	18-57/20
87-86-5	Pentachlorophenol	ND		51	59.2	116	51	33.1	65	57* [b]	41-126/20
108-95-2	Phenol	ND		51	24.5	48	51	24.2	47	1	16-51/20
95-95-4	2,4,5-Trichlorophenol	ND		51	53.2	104	51	50.5	99	5	50-124/20
88-06-2	2,4,6-Trichlorophenol	ND		51	51.4	101	51	48.3	95	6	43-123/20
62-53-3	Aniline	ND		51	19.8	39	51	19.0	37	4	17-89/20
101-55-3	4-Bromophenyl phenyl ether	ND		51	46.2	91	51	44.5	87	4	54-128/20
85-68-7	Butyl benzyl phthalate	ND		51	47.5	93	51	45.4	89	5	55-125/20
100-51-6	Benzyl Alcohol	ND		51	37.9	74	51	37.8	74	0	13-106/20
91-58-7	2-Chloronaphthalene	ND		51	45.5	89	51	43.4	85	5	40-126/20
106-47-8	4-Chloroaniline	ND		51	29.0	57	51	30.7	60	6	32-109/20
111-91-1	bis(2-Chloroethoxy)methane	ND		51	37.9	74	51	37.5	73	1	40-117/20
111-44-4	bis(2-Chloroethyl)ether	ND		51	42.7	84	51	43.0	84	1	34-111/20
108-60-1	bis(2-Chloroisopropyl)ether	ND		51	48.0	94	51	47.4	93	1	33-133/20
7005-72-3	4-Chlorophenyl phenyl ether	ND		51	46.7	92	51	44.3	87	5	48-128/20
122-66-7	1,2-Diphenylhydrazine	ND		51	48.0	94	51	46.2	91	4	46-116/20
121-14-2	2,4-Dinitrotoluene	ND		51	45.6	89	51	42.9	84	6	53-130/20
606-20-2	2,6-Dinitrotoluene	ND		51	45.1	88	51	43.2	85	4	41-134/20
91-94-1	3,3'-Dichlorobenzidine	ND		51	ND	0* [c]	51	ND	0* [c]	nc	29-140/20
132-64-9	Dibenzofuran	ND		51	44.9	88	51	42.7	84	5	48-121/20
84-74-2	Di-n-butyl phthalate	ND		51	45.8	90	51	44.1	86	4	55-121/20
117-84-0	Di-n-octyl phthalate	ND		51	48.5	95	51	46.1	90	5	56-126/20
84-66-2	Diethyl phthalate	ND		51	45.6	89	51	43.9	86	4	42-125/20
131-11-3	Dimethyl phthalate	ND		51	45.6	89	51	43.6	85	4	11-144/20
117-81-7	bis(2-Ethylhexyl)phthalate	ND		51	49.9	98	51	48.5	95	3	55-130/20
118-74-1	Hexachlorobenzene	ND		51	44.8	88	51	43.4	85	3	53-129/20

* = Outside of Control Limits.

7.4.1

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Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43885-MS	X06592.D	1	07/31/15	DRY	07/20/15	OP43885	MSX207
OP43885-MSD	X06593.D	1	07/31/15	DRY	07/20/15	OP43885	MSX207
MC40121-3	X06596.D	1	07/31/15	DRY	07/20/15	OP43885	MSX207

The QC reported here applies to the following samples: Method: SW846 8270D

MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-9, MC40064-10, MC40064-11, MC40064-12

7.4.1

7

CAS No.	Compound	MC40121-3 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
77-47-4	Hexachlorocyclopentadiene	ND		51	31.3	61	51	30.3	59	3	10-75/20
67-72-1	Hexachloroethane	ND		51	27.7	54	51	26.7	52	4	10-104/20
78-59-1	Isophorone	ND		51	39.4	77	51	39.2	77	1	35-106/20
88-74-4	2-Nitroaniline	ND		51	46.9	92	51	46.1	90	2	50-132/20
99-09-2	3-Nitroaniline	ND		51	34.9	68	51	32.4	64	7	43-121/20
100-01-6	4-Nitroaniline	ND		51	29.4	58	51	28.6	56	3	41-129/20
98-95-3	Nitrobenzene	ND		51	39.6	78	51	39.4	77	1	25-122/20
62-75-9	n-Nitrosodimethylamine	ND		51	31.2	61	51	32.3	63	3	10-88/20
621-64-7	N-Nitroso-di-n-propylamine	ND		51	42.6	83	51	42.2	83	1	36-120/20
86-30-6	N-Nitrosodiphenylamine	ND		51	45.4	89	51	44.3	87	2	50-113/20
110-86-1	Pyridine	ND		51	11.1	22	51	8.6	17	25* [b]	10-73/20

CAS No.	Surrogate Recoveries	MS	MSD	MC40121-3	Limits
367-12-4	2-Fluorophenol	60%	62%	53%	10-80%
4165-62-2	Phenol-d5	47%	47%	39%	10-72%
118-79-6	2,4,6-Tribromophenol	105%	101%	105%	42-134%
4165-60-0	Nitrobenzene-d5	85%	87%	92%	25-117%
321-60-8	2-Fluorobiphenyl	74%	73%	95%	24-112%
1718-51-0	Terphenyl-d14	108%	103%	110%	48-133%

(a) Outside control limits. Associated samples are non-detect for this compound.
(b) High RPD due to possible matrix interference and/or sample non-homogeneity.
(c) Outside control limits due to possible matrix interference. Refer to Blank Spike.

* = Outside of Control Limits.

Matrix Spike/Matrix Spike Duplicate Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43886-MS	I97046.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630
OP43886-MSD	I97047.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630
MC40000-5	I97048.D	1	07/31/15	MR	07/20/15	OP43886	MSI3630

The QC reported here applies to the following samples: Method: SW846 8270D BY SIM

MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-9, MC40064-10, MC40064-11, MC40064-12

7.4.2

7

CAS No.	Compound	MC40000-5 ug/l	Q	Spike ug/l	MS ug/l	MS %	Spike ug/l	MSD ug/l	MSD %	RPD	Limits Rec/RPD
83-32-9	Acenaphthene	ND		51	40.7	80	51	39.2	77	4	36-124/20
208-96-8	Acenaphthylene	ND		51	37.2	73	51	35.1	69	6	25-116/20
120-12-7	Anthracene	0.049	J	51	42.0	82	51	41.1	80	2	42-122/20
56-55-3	Benzo(a)anthracene	ND		51	42.7	84	51	40.8	80	5	45-145/20
50-32-8	Benzo(a)pyrene	ND		51	50.0	98	51	48.1	94	4	40-136/20
205-99-2	Benzo(b)fluoranthene	ND		51	45.8	90	51	45.8	90	0	41-148/20
191-24-2	Benzo(g,h,i)perylene	ND		51	46.3	91	51	44.4	87	4	48-140/20
207-08-9	Benzo(k)fluoranthene	ND		51	49.6	97	51	46.1	90	7	45-131/20
218-01-9	Chrysene	ND		51	41.4	81	51	40.4	79	2	41-135/20
53-70-3	Dibenzo(a,h)anthracene	ND		51	48.3	95	51	46.6	91	4	49-144/20
206-44-0	Fluoranthene	ND		51	43.2	85	51	41.8	82	3	38-136/20
86-73-7	Fluorene	ND		51	38.2	75	51	36.7	72	4	43-127/20
193-39-5	Indeno(1,2,3-cd)pyrene	ND		51	46.7	92	51	44.6	87	5	45-142/20
90-12-0	1-Methylnaphthalene	ND		51	34.9	68	51	36.8	72	5	29-116/20
91-57-6	2-Methylnaphthalene	ND		51	38.5	75	51	37.1	73	4	27-117/20
85-01-8	Phenanthrene	ND		51	40.4	79	51	39.3	77	3	41-126/20
129-00-0	Pyrene	ND		51	39.7	78	51	40.4	79	2	41-131/20

CAS No.	Surrogate Recoveries	MS	MSD	MC40000-5	Limits
4165-60-0	Nitrobenzene-d5	84%	87%	88%	26-121%
321-60-8	2-Fluorobiphenyl	67%	65%	79%	28-107%
1718-51-0	Terphenyl-d14	103%	98%	102%	29-129%

* = Outside of Control Limits.

Semivolatile Internal Standard Area Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSI3630-CC3621	Injection Date:	07/31/15
Lab File ID:	I97042.D	Injection Time:	10:11
Instrument ID:	GCMSI	Method:	SW846 8270D BY SIM

	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT
Check Std	254926	3.69	555951	4.73	267112	6.25	422849	7.57	441480	10.56	1138862	12.22
Upper Limit [a]	509852	4.19	1111902	5.23	534224	6.75	845698	8.07	882960	11.06	2277724	12.72
Lower Limit [b]	127463	3.19	277976	4.23	133556	5.75	211425	7.07	220740	10.06	569431	11.72
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43886-MB	190433	3.69	403599	4.73	189936	6.25	332662	7.57	308335	10.56	788115	12.22
OP43886-BS	200825	3.69	425176	4.73	190929	6.25	321221	7.57	320320	10.56	839389	12.22
OP43886-BSD	245494	3.69	517166	4.73	234377	6.25	377766	7.57	386166	10.56	978707	12.22
OP43886-MS	324943	3.69	715211	4.73	320666	6.25	525347	7.58	559186	10.57	1394500	12.23
OP43886-MSD	276658	3.69	577027	4.73	269612	6.25	433028	7.57	441800	10.56	1119567	12.23
MC40000-5	230783	3.69	510602	4.73	247496	6.25	368789	7.57	369907	10.56	941286	12.23
MC40064-3	419408	3.69	885144	4.73	413885	6.25	664544	7.58	632629	10.57	1575185	12.24
MC40064-4	209948	3.69	463960	4.73	220370	6.25	350540	7.57	347299	10.56	932759	12.22
MC40064-5	264372	3.69	561987	4.73	260675	6.25	409208	7.57	410830	10.56	1099214	12.22
MC40064-6	276716	3.69	575689	4.73	279432	6.25	440298	7.57	439087	10.56	1089255	12.22
MC40064-9	469228	3.69	959510	4.73	466899	6.25	781599	7.58	788712	10.56	1963586	12.23
MC40064-10	221126	3.69	495518	4.73	231126	6.25	373447	7.58	385666	10.56	990654	12.23
MC40064-11	326368	3.69	702772	4.73	319081	6.25	532390	7.58	527956	10.56	1345615	12.23
MC40064-12	303264	3.69	620883	4.73	307271	6.25	490449	7.57	494358	10.56	1290212	12.23
ZZZZZZ	172796	3.69	367408	4.73	163595	6.25	294718	7.57	302415	10.56	782263	12.22

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

Semivolatile Internal Standard Area Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSW981-CC902	Injection Date:	07/31/15
Lab File ID:	W23135.D	Injection Time:	08:20
Instrument ID:	GCMSW	Method:	SW846 8270D

	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
Check Std	178400	4.35	665872	5.46	402570	6.99	699532	8.25	780795	10.60	762913	12.12
Upper Limit [a]	356800	4.85	1331744	5.96	805140	7.49	1399064	8.75	1561590	11.10	1525826	12.62
Lower Limit [b]	89200	3.85	332936	4.96	201285	6.49	349766	7.75	390398	10.10	381457	11.62
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
ZZZZZZ	209002	4.35	784914	5.46	472844	6.98	822226	8.25	866644	10.60	863931	12.12
OP44038-MB	270750	4.35	1018008	5.46	609321	6.98	1066506	8.25	1183856	10.60	1181314	12.12
OP44038-BS	238730	4.35	884398	5.46	537566	6.99	925777	8.25	1002333	10.60	991707	12.12
OP44038-MS	254018	4.36	923995	5.47	553893	6.99	927041	8.25	989238	10.61	989313	12.12
OP44038-MSD	249330	4.36	924028	5.47	564004	6.99	961381	8.25	1023714	10.60	1026984	12.12
MC40005-3	245785	4.36	906592	5.46	550052	6.99	947330	8.25	1010933	10.60	1018645	12.12
OP43885-MB	178458	4.35	666039	5.46	406068	6.98	714929	8.25	768864	10.60	774983	12.12
MC40064-3	200023	4.35	744680	5.46	447196	6.99	761170	8.25	800741	10.61	827246	12.13
MC40064-4	191275	4.35	710953	5.46	424770	6.99	733464	8.25	761502	10.60	767275	12.12
MC40064-5	185208	4.35	691930	5.46	415032	6.98	716503	8.25	765711	10.60	773882	12.12
MC40064-9	229524	4.35	853691	5.46	514604	6.99	881010	8.25	937722	10.60	945143	12.12
MC40064-6	201729	4.35	742411	5.46	456675	6.99	805362	8.25	890050	10.60	871616	12.12
MC40064-10	198619	4.35	739804	5.46	455574	6.99	769277	8.25	834297	10.60	843527	12.13
MC40064-11	201816	4.36	736916	5.46	449975	6.98	775116	8.25	813050	10.60	816418	12.12
MC40064-12	185410	4.36	691016	5.46	416257	6.98	715907	8.25	767635	10.60	775937	12.12

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12
IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

7.5.2

Semivolatile Internal Standard Area Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSX207-CC206	Injection Date:	07/31/15
Lab File ID:	X06588.D	Injection Time:	09:28
Instrument ID:	GCMSX	Method:	SW846 8270D

	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT
Check Std	431481	3.54	1579458	4.58	881389	6.10	1507747	7.36	1443532	9.79	1272008	11.37
Upper Limit [a]	862962	4.04	3158916	5.08	1762778	6.60	3015494	7.86	2887064	10.29	2544016	11.87
Lower Limit [b]	215741	3.04	789729	4.08	440695	5.60	753874	6.86	721766	9.29	636004	10.87
Lab Sample ID	IS 1 AREA	RT	IS 2 AREA	RT	IS 3 AREA	RT	IS 4 AREA	RT	IS 5 AREA	RT	IS 6 AREA	RT
OP43885-BS	401846	3.55	1438023	4.59	801238	6.10	1382740	7.37	1347171	9.79	1165920	11.37
OP43885-MS	440083	3.55	1694671	4.59	897100	6.10	1532270	7.37	1482293	9.79	1347379	11.38
OP43885-MSD	419059	3.55	1603114	4.59	841216	6.10	1421517	7.37	1397091	9.79	1318269	11.38
ZZZZZZ	436546	3.55	1580590	4.58	882137	6.10	1447130	7.37	1317884	9.79	1248130	11.38
ZZZZZZ	455435	3.55	1631726	4.59	892847	6.10	1486077	7.37	1396120	9.79	1308050	11.38
MC40121-3	452229	3.55	1680395	4.59	895137	6.10	1455446	7.37	1414351	9.79	1352158	11.38
ZZZZZZ	431303	3.55	1546471	4.59	835935	6.10	1349448	7.37	1283466	9.79	1240850	11.38
ZZZZZZ	444006	3.55	1620269	4.59	878027	6.10	1426718	7.37	1314191	9.79	1260259	11.38
ZZZZZZ	497537	3.55	1709793	4.59	1046830	6.10	1823554	7.38	1980459	9.81	1516607	11.40
ZZZZZZ	516653	3.55	1781581	4.59	970449	6.10	1579499	7.37	1357698	9.79	1278055	11.38
ZZZZZZ	504759	3.55	1662886	4.59	924339	6.10	1518254	7.37	1367424	9.79	1333855	11.38
ZZZZZZ	475236	3.55	1660557	4.59	897285	6.10	1440664	7.37	1269553	9.79	1195589	11.38
ZZZZZZ	453897	3.55	1564785	4.59	872987	6.10	1441954	7.37	1314576	9.79	1245133	11.38
ZZZZZZ	518131	3.55	1749426	4.59	988348	6.10	1602003	7.37	1336879	9.79	1127238	11.38
ZZZZZZ	412102	3.55	1395594	4.59	795800	6.10	1323857	7.37	1219957	9.79	1146784	11.38
ZZZZZZ	411196	3.55	1452730	4.59	802396	6.10	1311522	7.37	1172012	9.79	1091779	11.38
ZZZZZZ	478155	3.55	1664339	4.59	912793	6.10	1521866	7.37	1386127	9.79	1292729	11.38
ZZZZZZ	415723	3.55	1503271	4.59	827385	6.10	1367202	7.37	1274653	9.79	1173780	11.38
ZZZZZZ	436712	3.55	1501157	4.59	833729	6.10	1389031	7.37	1288739	9.79	1181645	11.38
ZZZZZZ	423567	3.55	1458967	4.59	826594	6.10	1379242	7.37	1334364	9.79	1208791	11.38
ZZZZZZ	587631	3.55	2012056	4.58	1074530	6.10	1694758	7.37	1373652	9.79	1140571	11.38
ZZZZZZ	437907	3.55	1575945	4.59	867240	6.10	1416463	7.37	1242118	9.79	1133330	11.38
ZZZZZZ	435096	3.55	1520059	4.59	847367	6.10	1431568	7.37	1322574	9.78	1251606	11.38
ZZZZZZ	462458	3.55	1610193	4.59	896976	6.10	1484945	7.37	1335466	9.79	1254347	11.38
ZZZZZZ	463836	3.55	1648730	4.59	899449	6.10	1465034	7.37	1268280	9.79	1164400	11.38
OP43943-MB	471328	3.55	1732362	4.59	970780	6.10	1610041	7.37	1535831	9.79	1327639	11.38
OP43943-MS	468112	3.55	1649655	4.59	912626	6.10	1564097	7.37	1495032	9.79	1319380	11.38
OP43943-MSD	468986	3.55	1659126	4.59	914168	6.10	1550443	7.37	1516317	9.79	1320762	11.38
MC40117-1	486537	3.55	1765785	4.59	986406	6.10	1648313	7.37	1536640	9.78	1361846	11.38

IS 1 = 1,4-Dichlorobenzene-d4
IS 2 = Naphthalene-d8
IS 3 = Acenaphthene-D10
IS 4 = Phenanthrene-d10
IS 5 = Chrysene-d12

7.5.3

Semivolatile Internal Standard Area Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	MSX207-CC206	Injection Date:	07/31/15
Lab File ID:	X06588.D	Injection Time:	09:28
Instrument ID:	GCMSX	Method:	SW846 8270D

Lab	IS 1		IS 2		IS 3		IS 4		IS 5		IS 6	
Sample ID	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT	AREA	RT

IS 6 = Perylene-d12

(a) Upper Limit = +100% of check standard area; Retention time +0.5 minutes.
(b) Lower Limit = -50% of check standard area; Retention time -0.5 minutes.

7.5.3

7

Semivolatile Surrogate Recovery Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3	S4	S5	S6
MC40064-3	W23148.D	49	36	118	87	80	110
MC40064-4	W23149.D	50	37	90	91	87	109
MC40064-5	W23150.D	48	36	96	85	81	106
MC40064-6	W23153.D	39	36	87	80	78	96
MC40064-9	W23152.D	44	34	112	86	82	112
MC40064-10	W23154.D	44	36	116	85	81	102
MC40064-11	W23155.D	47	35	111	86	89	107
MC40064-12	W23156.D	52	37	112	91	93	109
OP43885-BS	X06591.D	62	49	94	88	71	104
OP43885-MB	W23143.D	52	41	107	90	81	109
OP43885-MS	X06592.D	60	47	105	85	74	108
OP43885-MSD	X06593.D	62	47	101	87	73	103

Surrogate Compounds	Recovery Limits
S1 = 2-Fluorophenol	10-80%
S2 = Phenol-d5	10-72%
S3 = 2,4,6-Tribromophenol	42-134%
S4 = Nitrobenzene-d5	25-117%
S5 = 2-Fluorobiphenyl	24-112%
S6 = Terphenyl-d14	48-133%

Semivolatile Surrogate Recovery Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8270D BY SIM Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1	S2	S3
MC40064-3	I97049.D	84	71	110
MC40064-4	I97050.D	90	74	101
MC40064-5	I97051.D	88	72	101
MC40064-6	I97052.D	78	66	98
MC40064-9	I97053.D	86	76	108
MC40064-10	I97054.D	80	75	99
MC40064-11	I97055.D	80	82	100
MC40064-12	I97056.D	92	82	106
OP43886-BS	I97044.D	91	65	94
OP43886-BSD	I97045.D	84	65	106
OP43886-MB	I97043.D	88	76	108
OP43886-MS	I97046.D	84	67	103
OP43886-MSD	I97047.D	87	65	98

Surrogate Compounds	Recovery Limits
S1 = Nitrobenzene-d5	26-121%
S2 = 2-Fluorobiphenyl	28-107%
S3 = Terphenyl-d14	29-129%

7.6.2

7

New England ACCUTEST LABORATORIES

GC Volatiles

QC Data Summaries

8

Includes the following where applicable:

- Method Blank Summaries
- Blank Spike Summaries
- Matrix Spike and Duplicate Summaries
- Surrogate Recovery Summaries
- GC Surrogate Retention Time Summaries

Method Blank Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43994-MB	BB63936.D	1	07/28/15	NK	07/28/15	OP43994	GBB3463

The QC reported here applies to the following samples: Method: SW846 8011

MC40064-2, MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-8, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	Result	RL	MDL	Units	Q
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.015	0.0061	ug/l	
106-93-4	1,2-Dibromoethane	ND	0.015	0.0061	ug/l	

CAS No.	Surrogate Recoveries		Limits
460-00-4	Bromofluorobenzene (S)	114%	60-140%
460-00-4	Bromofluorobenzene (S)	109%	60-140%

8.1.1

Blank Spike/Blank Spike Duplicate Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Sample	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
OP43994-BS	BB63937.D	1	07/28/15	NK	07/28/15	OP43994	GBB3463
OP43994-BSD	BB63938.D	1	07/28/15	NK	07/28/15	OP43994	GBB3463

The QC reported here applies to the following samples: Method: SW846 8011

MC40064-2, MC40064-3, MC40064-4, MC40064-5, MC40064-6, MC40064-8, MC40064-9, MC40064-10, MC40064-11, MC40064-12

CAS No.	Compound	Spike ug/l	BSP ug/l	BSP %	BSD ug/l	BSD %	RPD	Limits Rec/RPD
96-12-8	1,2-Dibromo-3-chloropropane	0.071	0.081	114	0.085	120	5	45-149/30
106-93-4	1,2-Dibromoethane	0.071	0.075	106	0.078	110	4	51-149/30

CAS No.	Surrogate Recoveries	BSP	BSD	Limits
460-00-4	Bromofluorobenzene (S)	104%	107%	60-140%
460-00-4	Bromofluorobenzene (S)	109%	99%	60-140%

* = Outside of Control Limits.

Volatile Surrogate Recovery Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Method: SW846 8011	Matrix: AQ

Samples and QC shown here apply to the above method

Lab Sample ID	Lab File ID	S1 [a]	S1 [b]
MC40064-2	BB63939.D	102	93
MC40064-3	BB63940.D	106	102
MC40064-4	BB63941.D	106	106
MC40064-5	BB63942.D	108	117
MC40064-6	BB63943.D	121	195* [c]
MC40064-8	BB63944.D	101	94
MC40064-9	BB63945.D	110	120
MC40064-10	BB63947.D	95	156* [c]
MC40064-11	BB63948.D	109	144* [c]
MC40064-12	BB63949.D	113	149* [c]
OP43994-BS	BB63937.D	104	109
OP43994-BSD	BB63938.D	107	99
OP43994-MB	BB63936.D	114	109

Surrogate Compounds	Recovery Limits
S1 = Bromofluorobenzene (S)	60-140%

(a) Recovery from GC signal #2
(b) Recovery from GC signal #1
(c) Outside control limits.Sample non-detect for target analytes.

8.3.1

GC Surrogate Retention Time Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3463-ICC3463	Injection Date:	07/28/15
Lab File ID:	BB63932.D	Injection Time:	19:16
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	6.31	7.27

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
OP43994-MB	BB63936.D	07/28/15	21:09	6.31	7.27
OP43994-BS	BB63937.D	07/28/15	21:38	6.30	7.27
OP43994-BSD	BB63938.D	07/28/15	22:06	6.31	7.27
MC40064-2	BB63939.D	07/28/15	22:34	6.31	7.28
MC40064-3	BB63940.D	07/28/15	23:02	6.30	7.27
MC40064-4	BB63941.D	07/28/15	23:30	6.30	7.27
MC40064-5	BB63942.D	07/28/15	23:58	6.30	7.26
MC40064-6	BB63943.D	07/29/15	00:25	6.30	7.25
MC40064-8	BB63944.D	07/29/15	00:53	6.31	7.28
MC40064-9	BB63945.D	07/29/15	01:21	6.30	7.27

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

8.4.1

GC Surrogate Retention Time Summary

Job Number: MC40064
Account: SHELLWIC Shell Oil
Project: URSMOSTL:Roxana 3Q15 GW/ 21563720.03003 900 South Central Avenue, Roxana, IL

Check Std:	GBB3463-CC3463	Injection Date:	07/29/15
Lab File ID:	BB63946.D	Injection Time:	01:49
Instrument ID:	GCBB	Method:	SW846 8011

	S1 [a] RT	S1 [b] RT
Check Std	6.31	7.28

Lab Sample ID	Lab File ID	Date Analyzed	Time Analyzed	S1 [a] RT	S1 [b] RT
MC40064-10	BB63947.D	07/29/15	02:17	6.30	7.26
MC40064-11	BB63948.D	07/29/15	02:45	6.30	7.26
MC40064-12	BB63949.D	07/29/15	03:13	6.30	7.26
GBB3463-ECC3463	BB63950.D	07/29/15	03:41	6.31	7.27

Surrogate Compounds

S1 = Bromofluorobenzene (S)

(a) Retention time from GC signal #2
(b) Retention time from GC signal #1

8.4.2