GZA GeoEnvironmental

Engineers and Scientists

August 22, 2012
File No. 21.0056546.00

Mr. Glenn May
NYSDEC Region 9
Division of Environmental Remediation
270 Michigan Avenue
Buffalo, New York 14203

Re: Results of April 2012 Groundwater Sampling
BCP Sites # C932138, C932139, C932140
GM Components Holdings
200 Upper Mountain Road
Lockport, NY 14094

535 Washington Street
11th Floor
Buffalo, New York
14203
716-685-2300
FAX 716-685-3629
www.gza.com

Dear Glenn:

On behalf of GM Components Holdings LLC (GMCH), GZA GeoEnvironmental of New York (GZA) has prepared this letter report to summarize the results of the April 2012 groundwater sampling event conducted at Brownfield Cleanup Program (BCP) Sites Building 7 (C932138), Building 8 (C932139) and Building 10 (C932140) at the GMCH facility located at 200 Upper Mountain Road in Lockport, New York. The groundwater sampling event was conducted from April 25th through May 3rd, 2012 and included a total of 23 monitoring wells (see Figure 1). Eleven (11) of the 23 wells are associated with the Building 7 BCP Site (MW-7-1, 7-2, &-3, 7-4, 7-5, 7-6, 7-7, 7-8, 7-A-6, 7-C-2, and 7-P-1). Eight (8) of the 23 wells are associated with the Building 8 BCP Site (MW-6-1, 6-2, 6-F-8, 8-1, 8-1, 8-3, 8-4, and 8-003-B) and four (4) are associated with the Building 10 BCP Site (MW-10-1, 10-2, 10-3, and 9-101-A).

BACKGROUND

GMCH entered into a Brownfield Cleanup Agreement (BCA) with the New York State Department of Environmental Conservation (NYSDEC), which was executed in May 2010. A BCP Remedial Investigation (RI) was conducted at Buildings 7, 8 and 10 BCP Sites from December 2010 through Spring 2011, in accordance with the NYSDEC approved RI Work Plan. The BCP Remedial Investigation Reports (RIRs; Haley & Aldrich/GZA, November 2011) for Buildings 7, 8 and 10 were approved by NYSDEC in letters dated November 29, 2011.

DRAFT Remedial Work Plans (RWPs; H&A/GZA, December 2011) were submitted to NYSDEC for BCP Sites Building 7, 8 and 10 in January 2012 and recommend monitored natural attenuation (MNA) as the remedial alternative for the groundwater at the three (3) Sites. GMCH is awaiting the NYSDEC comment and a proposed decision document based on the recommendations provided in the RWPs.

An Equal Opportunity Employer M/F/V/H

The groundwater samples from the three (3) BCP Sites were collected and analyzed for compounds of concern (COCs)[1] and monitored natural attenuation (MNA) parameters identified in the Delphi Harrison Thermal System Site (Delphi Site #932113), Site Management Plan[2] (SMP). This SMP was developed to conduct annual sampling and reporting requirements for the Delphi Site located in the eastern portion of the GMCH facility and downgradient of the Building 7, 8 and 10 BCP Sites. This SMP was approved by NYSDEC in a letter dated October 13, 2011 and will be used as the basis for developing the groundwater portion of the SMP for the three BCP Sites. In addition to the MNA parameters identified in the SMP, carbon dioxide, volatile fatty acids (VFAs), ethane and ethene were included in the sampling parameter list for this sampling event. These parameters were added to assist with evaluation of total organic carbon within the formation.

APRIL/MAY 2012 GROUNDWATER MONITORING & SAMPLING

The April/May 2012 groundwater monitoring and sampling event was conducted in accordance with the Delphi Site SMP and included a total of 23 monitoring wells from April 25th through May 3rd, 2012.

METHODOLOGY

The groundwater monitoring and sampling was performed using low flow sampling techniques with a peristaltic pump, disposable polyethylene tubing and a water quality meter with a flow-through cell to collect water quality field parameters. The sampling technique and analytical parameters were consistent with the Delphi Site SMP.

The following is the list of the analytical parameters for this sampling event:

Field Measured Parameters: temperature, specific conductance, pH, turbidity, dissolved oxygen (DO) and oxidation reduction potential (ORP).

Compounds of Concerns: tetrachloroethylene (PCE), trichloroethylene (TCE), *cis*-1,2-dichloroethylene (*cis*-DCE), *trans*-1,2-dichloroethylene (*trans*-DCE) and vinyl chloride (VC).

Natural Attenuation Parameters: methane, iron, magnesium, manganese, potassium, sodium, ammonia, alkalinity, total organic carbon, chloride, nitrate, nitrite, sulfate, sulfide, carbon dioxide, VFAs, ethane, and ethene.

Groundwater pumping rates used during monitoring/sampling varied at the monitoring

[1] These five COCs are trichloroethylene, tetrachloroethylene, *cis*-1,2-dichloroethene, *trans*-1,2-dichloroethylene, and vinyl chloride.

[2] "Delphi Harrison Thermal Systems Site, Niagara County, New York, Site Management Plan, NYSDEC Site Number 9-32-113" dated October, 2011. Prepared for the GM Components Holdings, LLC by GZA.

locations in order to establish a relatively stable water level. Once a stable water level was established within the monitoring well, flow rates were maintained during the monitoring/sampling period. Samples were collected for analysis after field-measured parameters stabilized, and a minimum of one (1) well volume was purged.

It should be noted that a stable water level could not be established at four monitoring well locations (MW-7-4, 7-8, 8-3 and 8-4). These locations were purged to dry-like conditions and allowed to recharge until the water level recovered to at least 85% of the initial water level prior to collecting the samples.

Table 1 is a summary of the analytical sample results. The Monitoring Well Observations & Groundwater Sampling Logs are included in Appendix A. Summary tables from previous sampling events are included in Appendix B and the TestAmerica Laboratories, Inc. laboratory report is provided in Appendix C. The Data Quality Assessment and Verification report is included in Appendix D.

ANALYTICAL RESULTS & DISCUSSION

Building 7

Eleven (11) monitoring wells were sampled in association with the Building 7 BCP Site (MW-7-1, -7-2, -7-3, -7-4, -7-5, -7-6, -7-7, -7-8, -7-A-6, -7-C-2, and -7-P-1; see Figure 1). The groundwater monitoring wells MW-7-2 and -7-3 were installed in 2007 and have been sampled at least twice during previous sampling events for COCs. Monitoring wells MW-7-4 was installed in 2008 and MW-7-1[3], MW-7-5 through MW-7-8 were installed in 2010 as part of the BCP RI. Monitoring wells, MW-7-A-6 and MW-7-P-1, were installed in 2006 and sampled as part of previous investigations[4] conducted by others. MW-7-C-2 was also installed in 2006 as part of the previous investigations but was not sampled for volatile organic compounds (VOCs) at that time.

The MNA parameters at these eleven (11) wells were collected for the first time during this April 2012 sampling event. The analytical results for the Building 7 BCP Site monitoring wells are summarized in Table 1. The COC concentrations for seven (7) of the eleven (11) wells are consistent with the April 2011 sampling conducted as part of the BCP RI as discussed below in order from upgradient (west of Building 7) to downgradient locations (east of Building 7).

The total COC concentrations detected at monitoring wells MW-7-8 and MW-7-A-6 located west of Building 7 are generally consistent with the 2011 BCP RI sampling and the analytical results from MW-7-A-6 are also generally consistent with the 2006 sampling conducted by others.

[3] Monitoring well, MW-7-1, was initially installed in 2007. Due to a low hydraulic conductivity the well location was abandoned and replaced with another well, also designated MW-7-1, to the southeast as part of the BCP RI in 2010. The well sampled as part of the BCP groundwater sampling event was the MW-7-1 well location installed in 2010.

[4] "Field Investigation Report, West Lockport Complex, Lockport, NY" dated January 17, 2007. Prepared for Delphi Corporation by Environmental Resource Management.

The 2012 results for MW-7-7 indicated that PCE was detected at a concentration an order of magnitude higher compared to the 2011 sample results, but is the same order of magnitude as the PCE concentrations detected at MW-10-1 located approximately 250 feet to the west and upgradient from MW-7-7. MW-10-1 is believed to be in the vicinity of a PCE source area associated with upgradient Building 10. However, the 2012 results indicated the presence of daughter compounds, *cis*-DCE and VC, which were not detected above method detection limits in the 2011 sampling event.

Results from MW-7-P-1 indicated the presence of VC only, at concentration similar to the 2011 and 2006 sampling events (see Appendix B). However, the 2011 and 2006 sampling events also had detections of other COCs which were not detected in 2012.

The 2012 results from monitoring wells MW-7-5, MW-7-6 and MW-7-C-2 are consistent with the 2011 BCP RI sampling. The COC concentrations detected are two (2) to three (3) orders of magnitude lower than COC concentrations believed to be in the vicinity of upgradient source areas near MW-7-A-6 and upgradient of MW-7-7.

The 2012 results from downgradient monitoring wells MW-7-1 and MW-7-3 are consistent with the 2011 BCP RI sampling and indicate a continued decrease in the COC concentrations in the downgradient direction. Sample results for MW-7-3 from previous sampling events in 2007 and 2008 were below method detection limits (see Appendix B).

TCE was detected at 4 parts per billion (ppb) at MW-7-2, which is below its NYSDEC Class GA criteria[5] of 5 ppb. Sample results for this location from previous sampling events in 2008 and 2011 were below method detection limits (see Appendix B).

TCE was detected at 3.6 ppb at MW-7-4, which is below its NYSDEC Class GA a criteria of 5 ppb. Sample results for this location from previous sampling events in 2007, 2008 and 2011 were below method detection limits (see Appendix B).

The significant decrease in COC concentrations (5 to 6 order of magnitude) and the presence of daughter compounds (*cis*-DCE and VC in the mid-point and downgradient portions of the plume, indicate that natural attenuation is occurring across the Building 7 BCP Site. Concentrations of COCs at the eastern downgradient property line are below the NYSDEC Class GA criteria. Natural attenuation parameters also indicate that there is adequate evidence of reductive dechlorination occurring at the Building 7 BCP Site based on the anaerobic biodegradation screening tables completed from EPA Document EPA/600/R-98/128, Technical Protocol for Evaluating Natural Attenuation of Chlorinated Solvents in Ground Water, 1998 (see tables in Appendix E).

[5] NYSDEC Class GA Groundwater criteria presented in the Division of Water Technical and Operational Guidance Series (TOGS 1.1.), dated October 1993, revised June 1998, errata January 1999 and amended April 2000 (Class GA).

Building 8

Eight (8) monitoring wells were sampled in association with the Building 8 BCP Site (MW-6-1, -6-2, -6-F-8, -8-1, -8-2, -8-3, -8-4, and -8-003-B; see Figure 1). Groundwater monitoring wells MW-8-1 through MW-8-4 were installed as part of the BCP RI investigation December 2010 and sampled for the first time April 2011. Monitoring wells MW-6-1 (2008), 6-2 (2008), 6-F-8 (2008), and 8-003-B (2006) were previously installed, as noted, and have been sampled at least twice during previous sampling events. The MNA parameters at these eight (8) wells were collected for the first time during this April 2012 sampling event. The analytical results for the Building 8 BCP Site monitoring wells are summarized in Table 1. The COC concentrations for seven (7) of the eight (8) wells are consistent with the April 2011 sampling conducted as part of the BCP RI.

The trichloroethene (TCE) concentrations detected at MW-8-003-B increased one order of magnitude from the previous sample round conducted in April 2011 but consistent with the results of the 2006 sampling event conducted as part of a prior site investigation conducted by others.

Cis-1,2-DCE was the compound detected at the highest concentration in the groundwater sample, indicating reductive dechlorination of the parent compounds (PCE and TCE) is occurring at the Building 8 BCP Site. The COC concentrations and parent and daughter compound ratios at MW-8-1, 8-2, 8-3 and 8-4 are consistent with the 2011 results (see Appendix A). The total COCs concentrations detected ranged from 0.85 ppb (MW-8-1, located in the northwestern corner of Building 8) to 10,604 ppb (MW-8-2, located on the southwest side of Building 8).

Groundwater present within the Building 8 BCP Site is migrating in an easterly direction towards the Delphi Site, which is downgradient (east) of Building 8 (see Figure 1). Natural attenuation processes are reducing the COC contamination at the Delphi Site to non-detectable levels or below the NYSDEC Class GA criteria at the GMCH facility downgradient property line. Natural attenuation parameters also indicate that there is limited evidence of reductive dechlorination occurring at the Building 8 BCP Site (see Appendix E).

No VOCs were detected above method detection limits at monitoring wells MW-6-1, MW-6-2 and MW-6-F-8. These results are consistent with previous sampling events (see Appendix A) conducted at these wells. Monitoring wells MW-6-1 and MW-6-2 are located east of the Building 8 BCP Site at the eastern downgradient property boundary. Therefore, off-site groundwater contamination does not appear to be a concern.

Building 10

Four (4) monitoring wells were sampled in association with the Building 10 BCP Site (MW-10-1, 10-2, 10-3, and -9-101-A; see Figure 1). Groundwater monitoring wells MW-10-2 and MW-10-3 were installed as part of the BCP RI investigation in December 2010 and sampled for the first time April 2011. Monitoring well MW-10-1 (2007) and

MW-9-101-A (2006) were previously installed as noted and have been sampled at least twice during previous sampling events. The MNA parameters at these four (4) wells were collected for the first time during this April 2012 sampling event. The analytical results for the Building 10 BCP Site monitoring wells are summarized in Table 1. The COC concentrations of the four (4) wells are generally consistent with the April 2011 sampling conducted as part of the BCP RI.

The total COC concentrations detected at MW-10-1, MW-10-2 and MW-10-3 during the 2012 sampling are consistent with prior sampling results (see Appendix A). Cis-1,2-DCE was the compound detected at the highest concentration in MW-10-2 and MW-10-3 indicating intrinsic reductive dechlorination of the parent compounds (PCE) is occurring.

The COCs concentrations at MW-9-101-A are non-detect, consistent with the 2011 sampling results. Analytical results from samples collected from this location as part of previous investigations in 2006 (see Appendix A) indicated concentrations of COCs below their respective NYSDEC Class GA criteria.

Groundwater at the Building 10 BCP Site appears to be migrating in an easterly direction towards Building 7. Another source of COCs is present in the groundwater down gradient (east) of Building 10 associated with the Building 7 BCP Site. However, natural attenuation appears to be occurring and reducing the COC contamination to non-detectable levels at the GMCH Facility down gradient property line. Natural attenuation parameters also indicate that there is limited evidence of reductive dechlorination occurring at the Building 10 BCP Site (see Appendix E).

CONCLUSIONS

Groundwater contamination is present within the spatial limits and downgradient of the three BCP Sites. Groundwater contamination from Building 8 BCP Site is migrating east towards the adjacent Delphi Site. However, contaminated groundwater does not appear to be migrating from the GMCH facility as the four (4) monitoring wells along the down-gradient eastern property line for the GMCH facility do not show concentrations of COCs above the laboratory detection limits or applicable NYSDEC comparison criteria. These four (4)(from north to south) include: MW-6-2, MW-6-1, MW-7-2 and MW-7-4. Therefore, it does not appear that contaminated groundwater is migrating beyond the GMCH facility property boundary in association with the three (3) BCP Sites.

RECOMMENDATIONS

GZA recommends continuing the annual groundwater sampling event utilizing 23 monitoring wells using the methodologies outlined in the Delphi Site SMP, in the Spring of 2013.

Please do not hesitate to contact the undersigned if you have any questions or require any additional information.

Sincerely,

GZA GEOENVIRONMENTAL OF NEW YORK

Christopher Boron
Senior Project Manager

Bart A. Klettke, P.E.
Associate Principal

for

I. Richard Schaffner, Jr., C.G.W.P.
Consultant Reviewer

Table 1 – Summary of Groundwater Sample Analytical Results
Figure 1 – Site Plan
Appendix A: Monitoring Well Observations & Groundwater Sampling Logs
Appendix B: Previous Sampling Event Analytical Results
Appendix C: Test America Analytical Laboratory Report
Appendix D: Data Quality Assessment and Verification Report
Appendix E: Anaerobic Biodegradation Screening Tables

TABLE

Table 1
Summary of Groundwater Sample Analytical Results
GMCH Lockport Site
Buildings 7, 8 10
Site No. C932138, C932139 C932140

Sample Location Sample Date	Class GA Criteria	BUILDING 7 BCP SITE WELLS MW-7-1 4/27/2012	Q	MW-7-2 4/26/2012	Q	MW-7-3 4/27/2012	Q	MW-7-4 4/27/2012	Q	MW-7-5 4/30/2012	Q	MW-7-6 4/30/2012	Q	MW-7-7 5/1/2012	Q	MW-7-8 5/2/2012	Q	MW-7-A-6 5/1/2012	Q	MW-7-C-2 5/3/2012	Q	MW-7-P-1 5/3/2012	Q
VOC Compounds of Concern (ug/L)																							
cis-1,2-Dichloroethene	5	<1.0		<1.0		**8.6**		<1.0		**640**		**480**		**6,000**		**67**		**22,000**		**370**		<4.0	
Tetrachloroethene	5	<1.0		<1.0		<1.0		<1.0		**8,700**		**710**		**120,000**		**220**		**140,000**		<1.0		<4.0	
trans-1,2-dichloroethene	5	<1.0		<1.0		<1.0		<1.0		<200		<10		<400		<4.0		<2,000		1.2		<4.0	
Trichloroethene	5	<1.0		4		<1.0		3.6		**760**		**290**		**2,600**		**130**		**26,000**		<1.0		<4.0	
Vinyl Chloride	2	<1.0		<1.0		**43**		<1.0		<200		**55**		**960**		<4.0		**1,800**	J	**21**		**19**	
Total VOCs	2	0		4		51.6		3.6		10,100		1,535		129,560		417		189,800		392.2		19	
Field Parameters																							
Temperature (Deg. C)	NV	10.64		10.56		11.95		9.65		12.06		10.35		10.51		11.00		12.23		14.18		20.65	
Specific Conductance (mS/cm)	NV	4.842		1.168		24.7		1.782		13.62		13.39		7.372		6.51		2.483		1.797		17.15	
Dissolved Oxygen (mg/L)	NV	0.83		3.86		0.4		1.42		0.89		0.68		1.47		0.96		0.69		2.6		4.16	
Oxygen Reduction Potential (mv)	NV	58.7		220.4		-68		241.3		135.6		67.8		-189		-130.8		29.5		-62.5		-43.6	
pH (std. units)	NV	6.75		6.97		6.56		7.05		6.55		6.74		9.46		7.18		6.7		6.64		6.03	
Turbidity (NTUs)	NV	2		35		2		9		0		0		2		>100		2		0		0	
Inorganics (mg/L)																							
Iron	0.3	0.28		0.076		**2.5**		0.27		0.12		0.16		0.080		**4.0**		**0.49**		**0.93**		**61.2**	
Magnesium	35 [Note 4]	**111**		**40.0**		**248**		34.3		**124**		**106**		**151**		**170**		**95.4**		**83.8**		**388**	
Manganese	NV	0.42		0.041		0.35		0.017		1.1		0.18		0.0089		0.15		0.92		0.084		10.1	
Potassium	NV	4.3		1.6		50.2		2.1		8.0		10.9		40.5		38.2		2.7		7.5		31.4	
Sodium	20	**563**		**109**		**4,340**		**226**		**2,530**		**2,450**		**1,030**		**896**		**226**		**126**		**358**	
Miscellaneous Water Quality Parameters																							
Methane (ug/L)	NV	9.4		<1.0		220		<1.0		25		420		530		67		1,100		82		2,800	
Ethane (ug/L)	NV	<1.5		<1.5		6.0		<1.5		1.0	J	6.3		68	J	21		14		9.6	J	52	
Ethene (ug/L)	NV	<1.5		<1.5		10		<1.5		1.3	J	1.7		130		7.8	J	160		8.0	J	14	J
Carbon Dioxide (ug/L)	NV	6800		3,700		9,100		3,900		11,000		8,200		<1,000		<1,000		19,000		4,800		25,000	
Total Organic Carbon (mg/L)	NV	0.97	J	1.6		1.3		0.68	J	1.8		1.3		14.1		0.73	J	10.5		0.67	J	2.3	
Alkalinity (mg/L)	NV	288		324		280		320		320		288		42.0		60.0		472		260		244	
Ammonia (mg/L)	NV	0.0092	J	<0.020		2.6		<0.020		0.043		0.051		1.8		0.25		0.022		0.39		170	
Chloride (mg/L)	NV	1,450		212		6,890		351		4,600		4,230		687		2,330		695		181		5,890	
Nitrate (mg/L)	NV	<0.050		0.059		0.38		0.11		0.89		0.057		0.088		<0.050		<0.050		<0.050		<0.011	
Nitrite (mg/L)	NV	<0.050		<0.050		<0.050		<0.050		0.039	J	<0.050		0.022	J	<0.050		<0.050		<0.050		<0.020	
Sulfate (mg/L)	NV	131		66.6		727		72.2		218		264		451		145		111		525		71.0	
Sulfide (mg/L)	NV	<0.10		<0.10		0.055	J	<0.10		<0.10		<0.10		1.7		<0.10		<0.10		<0.10		<0.10	
Volatile Fatty Acids (mg/L)																							
Acetic acid (mg/L)	NV	<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		6.1		<1.0		<1.0		<1.0		<1.0	
Formic acid (mg/L)	NV	<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0	
Lactic acid (mg/L)	NV	<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0	
n-Butyric acid (mg/L)	NV	<0.16		<0.16		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0	
Propionic acid (mg/L)	NV	<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		1.5		<1.0		<1.0		<1.0		<1.0	
Pyruvic acid (mg/L)	NV	<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0	

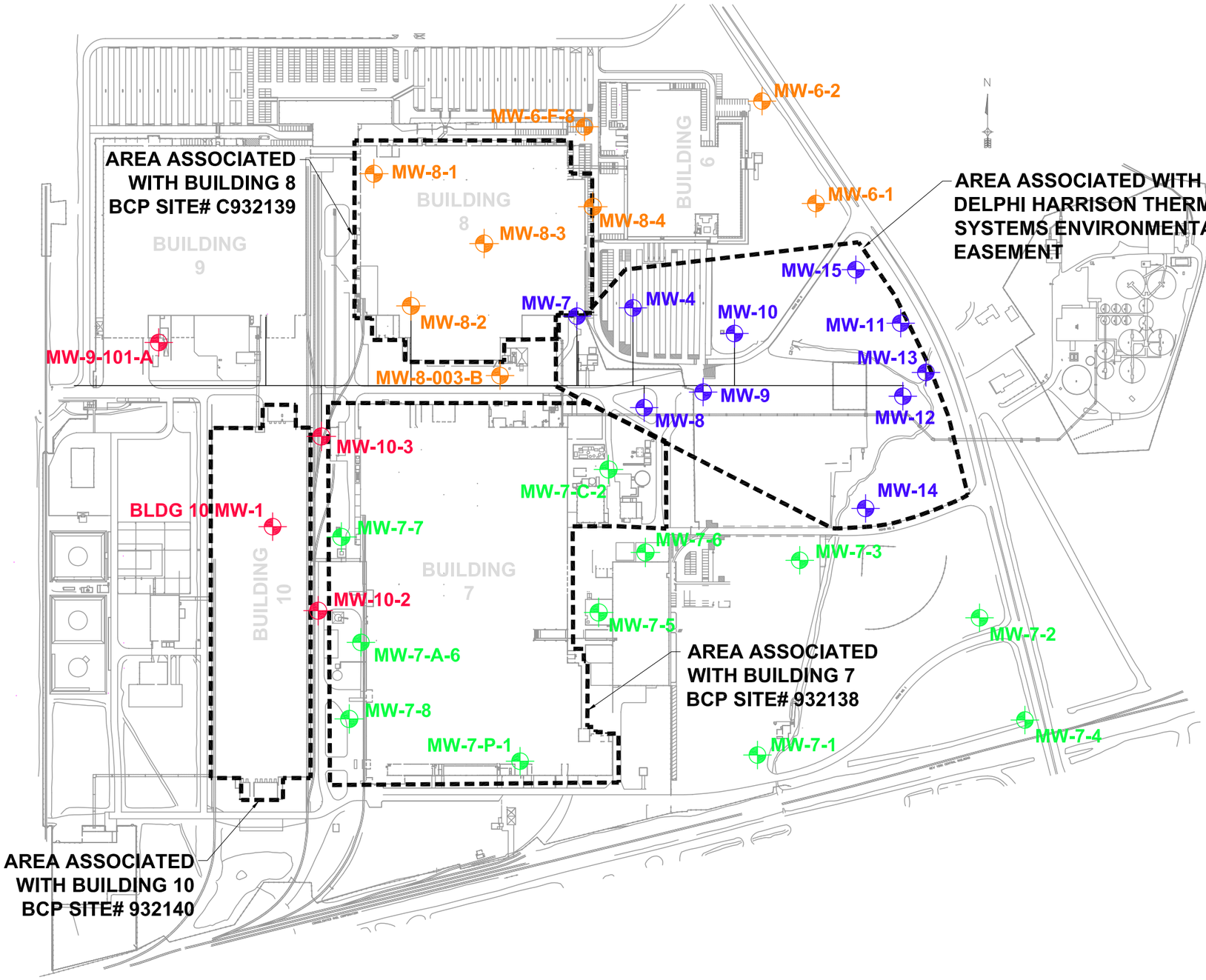
Notes:
1. Only compounds detected in one or more of the groundwater samples are presented in this table.
2. "<" indicates compound was not detected above the reporting limit.
3. Analytical testing completed by TestAmerica.
4. Criteria is a guidance value.
5. Laboratory qualifiers: B = compound was found in the blank and sample; J = result is les than the RL but greater than or equal to the MDL and the concentration is an approximation; * - LCS or LCSD exceeds the control limits.
6. mg/L = parts per million; ug/L = parts per billion
7. NYSDEC Class GA Groundwater Criteria as promulgated in 6 NYCRR 703; Table 1 in Technical and Operational Guidance Series (1.1.1): Ambient Water Quality Standards and Guidance Values and Groundwater Effluent Limitations, dated October 1993; revised June 1998; errata dated January 1999; addendum dated April 2000.
8. NV = no value
9. Shaded concentrations exceed Class GA criteria.
10. Results presented for MW-6-2 are the higher of this sample and its respective duplicate.

Table 1
Summary of Groundwater Sample Analytical Results
GMCH Lockport Site
Buildings 7, 8 10
Site No. C932138, C932139 C932140

Sample Location Sample Date	Class GA Criteria	BUILDING 8 BCP SITE WELLS																BUILDING 10 BCP SITE WELLS							
		MW-6-1 4/25/2012	Q	MW-6-2 4/25/2012	Q	MW-6-F-8 4/25/2012	Q	MW-8-1 4/30/2012	Q	MW-8-2 5/3/2012	Q	MW-8-3 5/1/2012	Q	MW-8-4 5/1/2012	Q	MW-8-003-B 4/30/2012	Q	MW-9-101A 5/3/2012	Q	BLDG-10-MW-1 5/2/2012	Q	MW-10-2 5/2/2012	Q	MW-10-3 5/2/2012	Q
VOC Compounds of Concern (ug/L)																									
cis-1,2-Dichloroethene	5	<1.0		<1.0		<1.0		0.85	J	**10,000**		**5.3**		**55**		**830**		<4.0		<2,000		**2,100**		**14**	
Tetrachloroethene	5	<1.0		<1.0		<1.0		<1.0		<1.0		0.84	J	<1.0		**1,600**		<4.0		**150,000**		**330**		**14**	
trans-1,2-dichloroethene	5	<1.0		<1.0		<1.0		<1.0		**34**		<1.0		<1.0		<5.0		<4.0		<2,000		**26**		<1.0	
Trichloroethene	5	<1.0		<1.0		<1.0		<1.0		**190**		**5.9**		**15**		**440**		<4.0		**2,500**		**810**		**7**	
Vinyl Chloride	2	<1.0		<1.0		<1.0		<1.0		**380**		<1.0		**18**		**73**		<4.0		<2,000		**60**		<1.0	
Total VOCs	2	0		0		0		0.85		10,604		12.04		88		2,943		0		152,500		3,326		35	
Field Parameters																									
Temperature (Deg. C)	NV	10.23		12.12		12.57		13.5		20.38		20.59		13.81		11.88		14.1		19.73		13.05		11.09	
Specific Conductance (mS/cm)	NV	3.97		10.7		13		6.616		1.992		5.912		12.2		13.62		6.243		1.953		9.288		0.729	
Dissolved Oxygen (mg/L)	NV	0		0		0		0.49		3.47		2.81		0		0.74		6.9		3.16		2.13		7.67	
Oxygen Reduction Potential (mv)	NV	-94		42		84		-132.4		-98.5		46.8		-53		150.1		351.5		-21.7		221.4		340.4	
pH (std. units)	NV	6.97		6.94		6.96		6.73		6.78		6.59		7.02		7.27		5.82		6.55		6.41		6.81	
Turbidity (NTUs)	NV	46		0		2		10		1		19		18		2		0		1		3		2	
Inorganics (mg/L)																									
Iron	0.3	**16.5**		0.15		0.11		0.19		0.20		0.11		**1.0**		0.14		<0.050		**1.2**		0.15		0.075	
Magnesium	35 [Note 4]	**67.7**		**89.0**		**175**		**122**		**47.3**		**42.6**		**272**		**41.2**		**137**		**80.8**		**92.7**		17.5	
Manganese	NV	2.6		0.79		1.2		0.16		0.021		4.1		1.9		0.38		0.0023	J	0.32		0.27		0.00094	J
Potassium	NV	2.4		4.0		5		19.4		17.1		519		8.5		9.8		21.5		4.7		10.8		2.4	
Sodium	20	**459**		**1,700**		**2,160**		**838**		**286**		**386**		**1,760**		**3,060**		**748**		**76.8**		**1,610**		**44.7**	
Miscellaneous Water Quality Parameters																									
Methane (ug/L)	NV	17		0.46	J B	32		86		260		1.6		75		46		<1.0		12		130		<1.0	
Ethane (ug/L)	NV	<1.5		<1.5		<1.5		9.2		11	J	1.4	J	<1.5		1.3	J	<1.5		2.6		10	J	<1.5	
Ethene (ug/L)	NV	<1.5		<1.5		<1.5		3.5		9.7	J	2.4		<1.5		6.4		<1.5		7.7		8.4	J	<1.5	
Carbon Dioxide (ug/L)	NV	13,000		8,700		9,000		8,000		6,800		6,300		5,700		<1,000		4,200		7,900		4,100		<1,000	
Total Organic Carbon (mg/L)	NV	3.8		2.3		1.9		0.60	J	1.5		6.4		1.6		1.3		3		4.4		1.2		0.52	J
Alkalinity (mg/L)	NV	392		388		368		304		372		360		300		160		200		320		240		128	
Ammonia (mg/L)	NV	0.45		<0.020		<0.020		1.2		1.2		1.5		0.12		0.16		<0.020		0.18		0.52		<0.020	
Chloride (mg/L)	NV	1,130		3,800		3,730		475		338		1,580		3,820		4,640		1,440		115		1,110		91	
Nitrate (mg/L)	NV	<0.050		0.13		<0.050		<0.050		<0.050		<0.050		<0.050		0.50		<0.050		<0.050		<0.050		1.5	
Nitrite (mg/L)	NV	<0.050		<0.050		<0.050		<0.050		<0.050		<0.050		<0.050		<0.050		6.3		<0.050		<0.050		<0.050	
Sulfate (mg/L)	NV	104		185		208		613		243		105		259		154		1,170		195		147		74	
Sulfide (mg/L)	NV	<0.10	J	<0.10	J	<0.10	J	2.1		0.6		<0.10		<0.10	J	<0.10		<0.052		<0.10		<0.052		<0.052	
Volatile Fatty Acids (mg/L)																									
Acetic acid (mg/L)	NV	<1.0		<0.15		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		0.67	J	<1.0		<1.0	
Formic acid (mg/L)	NV	<1.0		<0.11		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0	
Lactic acid (mg/L)	NV	<1.0		<0.14		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0	
n-Butyric acid (mg/L)	NV	<1.0		<0.16		<1.0	J	<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0	
Propionic acid (mg/L)	NV	<1.0		<0.17		<1.0	J	<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0	
Pyruvic acid (mg/L)	NV	<1.0		<0.080		<1.0	J	<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0		<1.0	

Notes:
1. Only compounds detected in one or more of the groundwater samples are presented in this table.
3. NT indicates compound was not tested.
4. Analytical testing completed by TestAmerica.
5. Criteria is a guidance value.
6. Laboratory qualifiers: B = compound was found in the blank and sample; J = result is les than the RL but greater than or equal to the MDL and the concentration is an approximation; * - LCS or LCSD exceeds the control limits.
7. mg/L = parts per million; ug/L = parts per billion
8. NYSDEC Class GA Groundwater Criteria as promulgated in 6 NYCRR 703; Table 1 in Technical and Operational Guidance Series (1.1.1): Ambient Water Quality Standards and Guidance Values and Groundwater Effluent Limitations, dated October 1993; revised June 1998; errata dated January 1999; addendum dated April 2000.
9. NV = no value
10. Shaded concentrations exceed Class GA criteria.
11. Results presented for MW-6-2 are the higher of this sample and its respective duplicate.

FIGURE



LEGEND:

- MW-11 — APPROXIMATE LOCATION AND DESIGNATION OF MONITORING WELLS WITHIN THE DELPHI HARRISON THERMAL SYSTEMS SITE
- MW-7-1 — APPROXIMATE LOCATION AND DESIGNATION OF MONITORING WELLS ASSOCIATED WITH THE BUILDING 7 BCP SITE AREA
- MW-6-1 — APPROXIMATE LOCATION AND DESIGNATION OF MONITORING WELLS ASSOCIATED WITH THE BUILDING 8 BCP SITE AREA
- MW-10-2 — APPROXIMATE LOCATION AND DESIGNATION OF MONITORING WELLS ASSOCIATED WITH THE BUILDING 10 BCP SITE AREA

NOTES:

1. BASE MAP ADAPTED FROM A DRAWING PROVIDED BY DELPHI THERMAL AND INTERIOR SYSTEMS SEPT. 2007.

2. THE SIZE AND LOCATION OF EXISTING SITE FEATURES SHOULD BE CONSIDERED APPROXIMATE.

DRAWN BY: DEW

DATE: JULY 2012

GZA GeoEnvironmental of New York

APPROXIMATE SCALE IN FEET

0 200 400 800

GM COMPONENTS HOLDINGS, LLC
LOCKPORT FACILITY
200 UPPER MOUNTAIN ROAD
LOCKPORT, NEW YORK
BCP SITE GROUNDWATER MONITORING

SITE AND GROUNDWATER MONITORING WELL LOCATION PLAN

PROJECT No.
21.0056546.00

FIGURE No.
1

© 2011 GZA GeoEnvironmental of New York

GZA–T:\PROJECTS\56500s\56546 GM Component LLC\BCP Groungwater Monitoring\2012\Figure 1 Site Wells.dwg [FIGURE 1] July 26, 2012 – 2:38pm daniel.wulf

APPENDIX A

MONITORING WELL OBSERVATION &
GROUNDWATER SAMPLING LOGS

SAMPLE COLLECTION DATA SHEET - GROUNDWATER SAMPLING PROGRAM

PROJECT NAME: Bldg 7 BCP Site 9-32-138 | PROJECT NO.: 56546.24

SAMPLING CREW MEMBERS: T. Bohlen | SUPERVISOR: C. Boron

DATE OF SAMPLE COLLECTION: 4/26/12 - 5/3/12

[Note: For 2" dia. well, 1 ft. = 0.14 gal (imp) or 0.16 gal (us)]

Sample I.D. Number	Well No.	Measuring Point Elev. (ft. AMSL)	Bottom Depth (ft. btoc)	Water Depth (ft. btoc)	Water Elevation (ft. AMSL)	Well Volume (gallons)	Bailer Volume No. Bails	Volume Purged (gallons)	Field pH	Field Temp.	Field Cond.	Time	Sample Description & Analysis
MW-7-2-042612-1415	MW-7-2	592.57	21.66	4.29	588.28	17.37' / 2.8		7.0	6.97	10.56	1.168	1243	MW-7-2 GW
MW-7-4-042712-1415	MW-7-4	593.53	21.45	11.56	581.97	9.89' / 1.6		2.0	7.05	9.65	1.782	1541	MW-7-4 GW
MW-7-1-042712-1000	MW-7-1	597.67	22.49	3.74	593.93	18.75' / 3.1		4.0	6.75	10.64	1.842	1000	MW-7-1 GW
MW-7-3-042712-1330	MW-7-3	594.04	25.09	3.40	590.64	21.69 / 3.5		5.5	6.56	11.95	24.70	1325	MW-7-3 GW
MW-7-6-043012-900 MS/MSD	MW-7-6	606.30	16.51	3.70	602.60	12.81' / 2.1		3.8	6.74	10.35	13.39	903	MW-7-6 GW
MW-7-5-043012-1130	MW-7-5	610.96	21.92	8.75	602.21	13.17' / 2.1		3.5	6.55	12.06	13.62	1122	MW-7-5 GW
MW-7-A-6-050112-0900	MW-7-A-6	612.13	14.31	2.28	609.85	12.03' / 2.0		4.0	6.70	12.23	2.493	902	MW-7-A-6 GW
MW-7-7-050112-1330	MW-7-7	610.24	17.80	1.76	608.48	16.04' / 2.6		9.0	9.46	10.51	7.372	1315	MW-7-7 GW

Additional Comments:

Copies to:

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

SAMPLE COLLECTION DATA SHEET - GROUNDWATER SAMPLING PROGRAM

PROJECT NAME: Bldg 7 BCP Site 9-32-138 | PROJECT NO.: 56546.24

SAMPLING CREW MEMBERS: T. Bohlen | SUPERVISOR: C. Boron

DATE OF SAMPLE COLLECTION: 4/26/12 - 5/3/12

[Note: For 2" dia. well, 1 ft. = 0.14 gal (imp) or 0.16 gal (us)]

Sample I.D. Number	Well No.	Measuring Point Elev. (ft. AMSL)	Bottom Depth (ft. btoc)	Water Depth (ft. btoc)	Water Elevation (ft. AMSL)	Well Volume (gallons)	Bailer Volume No. Bails	Volume Purged (gallons)	Field pH	Field Temp.	Field Cond.	Time	Sample Description & Analysis
MW-7-8-050212-0730	MW-7-8	610.92	19.42	0.95	609.97	18.48' / 3.0		2.3	7.18	11.00	6.510	5/1/12 1450	MW-7-8 GW
MW-7-C-2 050312-1015	MW-7C-2	609.42	24.60	5.51	603.91	19.09' / 3.1		4.2	6.64	14.18	1.777	1003	MW-7-C-2 GW
MW-7-P-1 050312-1530	MW-7-P-1	615.09	19.89	9.55	605.54	10.34 / 1.7		4.0	6.03	20.65	17.15	1527	MW-7-P-1 GW

Additional Comments:

Copies to:

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7 BCP Site 9-32-138
Ref. No.: 56346.24

Date: 4/27/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-1 1of2
Measurement Point: TOR
Constructed Well Depth (ft): 23.7
Measured Well Depth (ft): 22.49
Depth of Sediment (ft): 1.2

Screen Length (ft): 10'
Depth to Pump Intake (ft)[1]: 17'
Well Diameter, D (in): 2
Well Screen Volume, V_s (mL)[2]: 3,099
Initial Depth to Water (ft): 3.74

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, Vp (mL)	No. of Well Screen Volumes Purged[4]
810	151	4.36	0.62	6.67	10.23	4.457	246.2	2.19	32.2	0	
815		4.58	0.84	6.76	10.67	4.666	131.3	1.23	27.1	0.2	
820		4.61	0.87	6.76	10.66	4.720	89.3	1.33	12.1	0.3	
825		4.61		6.77	10.55	4.725	74.0	1.34	13.0	0.5	
830		4.61		6.75	10.69	4.738	68.8	1.29	15.8	0.7	
835		4.61		6.75	10.52	4.772	65.6	1.20	10.9	0.9	
840		4.61		6.77	10.47	4.770	63.6	1.14	13.8	1.0	
845		4.61		6.75	10.50	4.765	62.0	1.12	11.4	1.1	
850		4.61		6.76	10.49	4.770	61.0	1.10	10.0	1.3	
900		4.61		6.76	10.59	4.784	60.7	1.00	9.1	1.6	
910		4.61		6.77	11.28	4.789	59.3	0.96	8.9	1.9	
920		4.61		6.75	11.06	4.831	58.8	0.89	8.2	2.2	
930	↓	4.61	↓	6.76	11.78	4.813	57.7	0.92	8.5	2.4	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing;). No. of Well Screen Volumes Purged= Vp/Vs.

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7 BCP Site 9-32-138
Ref. No.: 56-546.24

Date: 4/27/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-1 2 of 2
Measurement Point: TOR
Constructed Well Depth (ft): 23.7
Measured Well Depth (ft): 22.49
Depth of Sediment (ft): 1.2

Screen Length (ft): 10'
Depth to Pump Intake (ft)[1]: 17'
Well Diameter, D (in): 2"
Well Screen Volume, V_s (~~ml~~)[2]: 3.1 gal
Initial Depth to Water (ft): 3.79

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
940	151	4.61	0.87	6.76	10.92	4.842	57.6	0.88	3.7	2.7	
950	↓	4.61	↓	6.75	10.94	4.845	58.1	0.83	2.6	3.0	
1000	↓	4.61	↓	6.75	10.64	7.842	58.7	0.83	2.1	3.3	1

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 6 - 2 4

SITE/PROJECT NAME: Bldg 7 BCP Site 9-32-138

WELL# MW - 7 - 1

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES / GALLONS)	ACTUAL VOLUME PURGED (LITRES / GALLONS)
04 27 12	04 27 12	3	40

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ... DEDICATED ... Y (N) (CIRCLE ONE)

SAMPLING EQUIPMENT ... DEDICATED ... (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP	D - GAS LIFT PUMP	G - BAILER	X- PURGING OTHER (SPECIFY)
		B - PERISTALTIC PUMP	F - PURGE PUMP	H - WATERRAS	
SAMPLING DEVICE	B	C - BLADDER PUMP	K - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - PVC		X- PURGING OTHER (SPECIFY)
		B - STAINLESS STEEL	E - POLYETHYLENE		
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - POLYPROPYLENE	F - SILICONE	X- PURGING OTHER (SPECIFY)
		B - TYGON	E - POLYETHYLENE	G - COMBINATION TEFLON/POLYPROPYLENE	
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	5 9 7 9 8 (mbTD)	GROUNDWATER ELEVATION	5 9 4 2 4 (mbTD)
DEPTH TO WATER	3 7 4 (mbTD)	WELL DEPTH	2 2 4 9 (mbTD)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: Clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED: 10-15 WIND DIR: NW PRECIPITATION Y/N OUTLOOK: Overcast

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING TECHNIQUES WERE IN ACCORDANCE WITH THE APPROVED SAP AND FSP PROTOCOLS

4/27/12 DATE | Thomas Bohlen PRINT | Thomas Bohlen SIGNATURE

ANY MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7 BCP Site 9-32.138
Ref. No.: 58546.24

Date: 4/26/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-2 1of2
Measurement Point: TOR
Constructed Well Depth (ft): 20'
Measured Well Depth (ft): 21.66'
Depth of Sediment (ft): NA

Screen Length (ft): 10'-20' = 10'
Depth to Pump Intake (ft)[1]: 17'
Well Diameter, D (in): 2"
Well Screen Volume, V_s ~~(mL)~~[2]: 2.8 gal
Initial Depth to Water (ft): 4.29

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p ~~(mL)~~ gal	No. of Well Screen Volumes Purged[4]
853	0	5.28	0.99	7.56	9.75	0.860	80	0.75	2.5	0	
858	76	6.53	2.24	7.46	10.11	0.828	88	0.00	1.1	0.1	
903	↓	7.03	2.74	7.45	10.35	0.831	89	0.00	1.9	0.2	
908	↓	7.53	3.24	7.44	10.40	0.833	90	0.00	2.8	0.3	
913	227	8.18	3.89	7.44	10.43	0.829	91	0.00	4.0	0.5	
918	↓	8.63	4.34	7.44	10.41	0.827	90	0.00	0.0	0.8	
923	↓	9.11	4.82	7.44	10.44	0.825	90	0.00	0.0	1.0	
928	↓	9.48	5.19	7.44	10.39	0.824	91	0.00	0.0	1.1	
935	↓	10.09	5.80	7.44	10.36	0.825	91	0.00	0.0	1.3	
945	↓	10.82	6.53	7.43	10.37	0.830	90	0.00	0.0	1.8	
956	↓	11.60	7.31	7.43	10.39	0.832	83	0.00	0.0	2.1	
1005	↓	12.09	7.80	7.43	10.51	0.837	74	0.00	0.0	2.3	
1015	↓	12.23		7.42	10.72	0.837	64	0.00	0.0	2.7	

PID = 0.0 ppm

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p^*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7 BCP Site 9-32-138
Ref. No.: 56346.24

Date: 4/26/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-2 2 of 2
Measurement Point: TOR
Constructed Well Depth (ft): 20'
Measured Well Depth (ft): 21.66'
Depth of Sediment (ft): NA

Screen Length (ft): 10'-20' = 10'
Depth to Pump Intake (ft)[1]: 12'/17'
Well Diameter, D (in): 2"
Well Screen Volume, V_s (mL)[2]: 2,840
Initial Depth to Water (ft): 4.29

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p ~~(mL)~~ (L)	No. of Well ~~Screen~~ Volumes Purged[4]
1025	227	12.64	8.35	7.41	10.85	0.853	48	0.00	0.0	3.1	1
1036		13.13	8.84	7.39	11.00	0.863	29	0.00	0.0	3.4	
1045		13.48	9.19	7.39	10.90	0.875	24	0.00	0.0	3.8	
1055		13.86		7.38	11.20	0.935	36	0.00	11.4	4.2	
1117		13.16		7.46	12.03	1.07	68	5.34	2.9	4.6	
1123		13.44		7.37	11.64	1.16	60	2.42	4.1	4.8	
1128		13.70		7.36	11.47	1.17	54	0.36	4.7	5.0	
1212		15.53		7.43/6.71	10.99/11.00	1.00/1.165	73/251.4	0.1/3.36	19.3/3.9	6.2	2
1218		15.66		7.40/6.84	10.99/10.72	1.02/1.183	67/243.3	0.0/2.81	38.7/8.0	6.3	
1223		15.77		7.43/6.87	11.01/10.68	1.03/1.201	63/234.1	0.0/2.73	61.8/14.3	6.5	
1228		15.87		7.43/6.91	11.04/10.74	1.03/1.201	62/232.0	0.0/2.83	46.9/15.2	6.8	
1233		15.97		7.43/6.94	11.10/10.81	1.03/1.191	60/227.9	0.0/2.95	31.7/26.8	7.0	
1243 *		16.46		7.43/6.97	10.85/10.56	1.00/1.168	62/220.4	0.0/3.86	35.9/35.1	7.4	

Horiba / YSI Readings

Notes: * - pump off

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

setup YSI & Horiba in series
Wait dry, inc. depth

1410 7.92'

WELL PURGING FIELD INFORMATION FORM

JOB# 56546 - 24

SITE/PROJECT NAME: Bldg. 7 BCP Site 9-32-138 WELL# MW-7-2

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
04/26/12	04/26/12	2.8	7.0

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQIPMENT DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP B - PERISTALTIC PUMP	D - GAS LIFT PUMP F - PURGE PUMP	G - BAILER H - WATERRAS	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - STAINLESS STEEL	D - PVC E - POLYETHYLENE		X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - TYGON	D - POLYPROPYLENE E - POLYETHYLENE	F - SILICONE G - COMBINATION TEFLON/POLYPROPYLENE	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	599.97 (m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	4.29 (m/ft)	WELL DEPTH	20.10 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: Clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED: 05 WIND DIR: SW PRECIPITATION: YES OR (NO) pm rain forcasted

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE SOPS AND PROTOCOLS

DATE	PRINT	SIGNATURE
4/26/12	Thomas Bohlen	Thomas Bohlen

SMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7 BCP Site 9-32-138
Ref. No.: 56546.24

Date: 4/27/12
Personnel: T Bohlen

Monitoring Well Data:

Well No.: MW-7-3 1of2
Measurement Point: TOR
Constructed Well Depth (ft): 25'
Measured Well Depth (ft): 25.09
Depth of Sediment (ft): -

Screen Length (ft): 15' - 25' = 10'
Depth to Pump Intake (ft)[1]: 20'
Well Diameter, D (in): 2
Well Screen Volume, V_s (~~ml~~)[2]: 3.5 gal
Initial Depth to Water (ft): 3.40

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, Vp (mL)	No. of Well ~~Screen~~ Volumes Purged[4]
1100	151	4.48	1.08	6.59	11.55	18.32	153.4	2.98	27.9	0	
1105	↓	5.96	2.56	6.49	11.60	18.47	147.4	0.76	23.0	0.2	
1110	530	7.63	4.23	6.47	11.63	18.42	139.6	0.57	29.7	0.3	
1115	↓	9.43	6.03	6.48	11.73	18.35	116.3	0.48	17.7	1	
1120	227	11.05	7.65	6.48	11.83	18.22	79.9	0.44	12.5	1.3	
1125	↓	11.36	7.96	6.46	11.59	18.27	51.0	0.45	13.7	1.6	
1130	76	11.36	↓	6.52	11.43	18.41	28.0	0.44	7.7	1.7	
1135	227	11.36		6.54	11.18	19.59	-11.9	0.43	1.0	1.9	
1150	↓	11.36		6.55	10.99	22.06	-49.7	0.42	1.0	2.2	
1200		11.36		6.53	11.26	23.02	-56.3	0.40	-1.4	2.5	
1210		11.36		6.55	11.27	23.17	-58.5	0.42	-1.0	2.8	
1220		11.36		6.55	11.43	23.90	-60.2	0.41	-3.0	3.1	
1234	↓	11.36	↓	6.55	11.69	23.92	-64.4	0.40	-1.3	3.6	1

PID = 0.0ppm Road Box lid needs repair (broken bolt)

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = \pi*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7 BCP Site 9-32-138
Ref. No.: 56-546.24

Date: 4/27/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-3 2of2
Measurement Point: TOR
Constructed Well Depth (ft): 25
Measured Well Depth (ft): 25.09
Depth of Sediment (ft): -

Screen Length (ft): 15'-25' = 10'
Depth to Pump Intake (ft)[1]: 20'
Well Diameter, D (in): 2
Well Screen Volume, V_s ~~(mL)~~[2]: 3.5 gal
Initial Depth to Water (ft): 3.40

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well ~~Screen~~ Volumes Purged[4]
1240	227	11.36	7.96	6.54	11.58	23.94	-66.1	0.40	-3.1	3.8	
1250	↓	11.36	7.96	6.54	11.83	24.39	-68.5	0.40	-3.3	4.1	
1300		11.36	7.96	6.54	11.82	24.34	-68.2	0.40	-3.9	4.3	
1310		11.36	7.96	6.54	11.95	24.76	-68.8	0.40	-2.5	4.7	
1320		11.36	7.96	6.54	11.93	24.66	-68.3	0.39	-2.2	5.0	
1325		11.36	7.96	6.56	11.95	24.70	-68.0	0.40	-2.3	5.2	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= V_p/V_s

WELL PURGING FIELD INFORMATION FORM

JOB# 56546 - 04

SITE/PROJECT NAME: Bldg 7 BCP Site 9-32-138 WELL# MW-7-3

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
04/27/12	04/27/12	35	55

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT DEDICATED Y (Y) (CIRCLE ONE)

SAMPLING EQUIPMENT DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP B - PERISTALTIC PUMP	D - GAS LIFT PUMP F - PURGE PUMP	G - BAILER H - WATERRAS	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	B	A - TEFLON B - STAINLESS STEEL	D - PVC E - POLYETHYLENE		X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - TYGON	D - POLYPROPYLENE E - POLYETHYLENE	F - SILICONE G - COMBINATION TEFLON/POLYPROPYLENE	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	594.04 (m/ft)	GROUNDWATER ELEVATION	590.64 (m/ft)
DEPTH TO WATER	3.40 (m/ft)	WELL DEPTH	25.09 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: None COLOR: Clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED: 10-15 WIND DIR (°): NW PRECIPITATION Y/N OUTLOOK: Overcast

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING PROCEDURES WERE IN CONFORMANCE WITH APPLICABLE PROTOCOLS

4/27/12 DATE — Thomas Bohlen PRINT — Thomas Bohlen SIGNATURE

ANY MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7 BCP Site 9-32-138
Ref. No.: 55546.24

Date: 4/26/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-4
Measurement Point: TOR
Constructed Well Depth (ft): 19'
Measured Well Depth (ft): 21.45
Depth of Sediment (ft): NA

Screen Length (ft): 9'-19' = 10'
Depth to Pump Intake (ft)[1]: 17'
Well Diameter, D (in): 2"
Well Screen Volume, V_s ~~(mL)~~[2]: 1.6 gal
Initial Depth to Water (ft): 11.56

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
1511	75	12.81	0.54	7.53/7.07	10.47/9.97	1.71/1.767	124/240.8	0.53/3.44	6.3/0	0	
1516	↓	13.24	1.68	7.51/7.12	10.98/10.01	1.71/1.779	103/240.5	0/2.34	7.6/0	0.1	
1521	↓	13.65	2.09	7.52/7.07	10.46/9.99	1.72/1.785	121/239.2	0/2.39	18.4/2.7	0.2	
1526	277	14.55	2.99	7.51/7.12	10.40/9.75	1.73/1.781	120/239.4	0/2.75	16.7/4.9	0.3	
1531	↓	15.78	4.22	7.51/7.12	10.38/9.63	1.72/1.781	119/240.4	0/2.79	9.5/3.8	0.6	
1536	↓	17.05	5.49	7.49/7.07	10.37/9.65	1.71/1.786	120/241.3	0/1.90	7.1/1.9	1	
Dry 1541	↓	18.15	6.59	7.48/7.05	10.43/9.65	1.71/1.782	118/241.3	0/1.42	8.5/1.9	1.4	
4/27/12 * 1405		12.84	0.57								

Horiba / YSI

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = \pi * (D/2)^2 * (5*12) * (2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

*: well went dry on 4/26/12; sampled 4/27/12

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 6 - 2 4

SITE/PROJECT NAME: Bldg 7 BCP Site 9-32-138

WELL# M W - 7 - 4

WELL PURGING INFORMATION

PURGE DATE (MM/DD/YY)	SAMPLE DATE (MM/DD/YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
04/26/12	04/27/12	1.6	20

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT DEDICATED Y (CIRCLE ONE)

SAMPLING EQIPMENT DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP	D - GAS LIFT PUMP	G - BAILER	X- PURGING OTHER (SPECIFY)
		B - PERISTALTIC PUMP	F - PURGE PUMP	H - WATERRAS	
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - PVC		X- PURGING OTHER (SPECIFY)
		B - STAINLESS STEEL	E - POLYETHYLENE		
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - POLYPROPYLENE	F - SILICONE	X- PURGING OTHER (SPECIFY)
		B - TYGON	E - POLYETHYLENE	G - COMBINATION TEFLON/POLYPROPYLENE	
SAMPLING DEVICE	E	C - ROPE X- (SPECIFY)			X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - INLINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	5 9 3 5 3 (m/ft)	GROUNDWATER ELEVATION	5 8 1 9 7 (m/ft)
DEPTH TO WATER	1 1 5 6 (m/ft)	WELL DEPTH	1 9 0 0 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: None OIL: clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED 0-5 DIRECTION: SW PRECIPITATION Y/N OUTLOOK: light rain

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPROVED SAMPLING PROTOCOLS

DATE: 4/26/12 PRINT: Thomas Bohlen SIGNATURE: Thomas Bohlen

ANY MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7, BCP Site 9-32-138
Ref. No.: 56546.24

Date: 4/30/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-5
Measurement Point: TOR
Constructed Well Depth (ft): 22'
Measured Well Depth (ft): 21.92
Depth of Sediment (ft): 0.08

Screen Length (ft): 15-22'
Depth to Pump Intake (ft)[1]: 18'
Well Diameter, D (in): 2
Well ~~Screen~~ Volume, V_s ~~(mL)~~[2]: 2.1 gal
Initial Depth to Water (ft): 8.75'

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
1037		9.62		6.76	11.53	11.84	157.3	4.35	32.4	0	
1042		9.70		6.55	11.54	12.94	153.5	1.17	27.2	0.2	
1047		9.72		6.54	11.63	13.01	147.8	1.13	18.3	0.4	
1052		9.72		6.57	11.63	12.96	142.1	1.27	14.4	0.8	
1057		9.72		6.56	11.82	13.22	137.6	1.17	2.6	1.1	
1102		9.72		6.56	11.92	13.37	136.4	1.10	0.0	1.3	
1107		9.72		6.54	12.04	13.57	135.6	0.99	0.0	1.6	
1112		9.72		6.53	12.06	13.59	135.7	0.90	0.0	1.9	
1117		9.72		6.54	12.08	13.58	135.9	0.91	0.0	2.1	
1122		9.72		6.55	12.06	13.62	135.6	0.89	0.0	2.3	

Notes: PID = 0.2 ppm

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

WELL PURGING FIELD INFORMATION FORM

JOB# 56546 - 24

SITE/PROJECT NAME: Bldg 7 BCP Site 9-32-138 WELL# MW-7-5

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
04 30 12	04 30 12	2.1	3.5

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT DEDICATED Y (Ø) (CIRCLE ONE)

SAMPLING EQUIPMENT DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP; B - PERISTALTIC PUMP	D - GAS LIFT PUMP; F - PURGE PUMP	G - BAILER; H - WATERRAS	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON; B - STAINLESS STEEL	D - PVC; E - POLYETHYLENE		X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON; B - TYGON	D - POLYPROPYLENE; E - POLYETHYLENE	F - SILICONE; G - COMBINATION TEFLON/POLYPROPYLENE	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	611.24 (m/ft)	GROUNDWATER ELEVATION	602.49 (m/ft)
DEPTH TO WATER	8.75 (m/ft)	WELL DEPTH	21.92 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: None COLOR: Clear TURBIDITY: Cloudy→Clear

WEATHER CONDITIONS: WIND SPEED: 05 WIND DIR'N: NW PRECIPITATION/SUN OUTLOOK: rain only forecasted

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPROVED SAMPLE PLAN

4/30/12 DATE | Thomas Bohlen PRINT | Thomas Bohlen SIGNATURE

ANY MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg7 BCP Site 9-32-138
Ref. No.: 58546.24
Date: 4/30/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-6 MS/MSD
Measurement Point: TOR
Constructed Well Depth (ft): 16.9'
Measured Well Depth (ft): 16.51'
Depth of Sediment (ft): 0.39'
Screen Length (ft): 9.9-16.9' = 7'
Depth to Pump Intake (ft)[1]: 13'
Well Diameter, D (in): 2"
Well ~~Screen~~ Volume, V_s ~~(mL)~~[2]: 2.1 gal
Initial Depth to Water (ft): 3.70

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, Vp (mL)	No. of Well Screen Volumes Purged[4]
803	151	4.60	0.9	6.99	10.25	12.76	121.4	4.80	0.0	0	
808		4.85	1.15	6.76	10.47	13.18	94.0	1.30	0.0	0.2	
813		4.89	1.19	6.75	10.46	13.09	78.7	1.20	0.0	0.4	
818		4.89	1.19	6.75	10.36	13.18	74.4	1.08	0.0	0.6	
823		4.89	1.19	6.74	10.32	13.24	73.2	1.00	0.0	0.8	
828		4.89	1.19	6.74	10.31	13.32	71.7	0.86	0.0	1.1	
833		4.89	1.19	6.74	10.31	13.35	70.3	0.77	0.0	1.3	
838		4.89	1.19	6.74	10.40	13.37	68.5	0.77	0.0	1.4	
843		4.89	1.19	6.74	10.34	13.37	67.2	0.70	0.0	1.6	
848		4.89	1.19	6.74	10.32	13.34	67.1	0.75	0.0	1.9	
853		4.89	1.19	6.74	10.34	13.40	67.4	0.71	0.0	2.1	1
858		4.89	1.19	6.74	10.36	13.40	67.9	0.69	0.0	2.3	
903	↓	4.89	1.19	6.74	10.35	13.39	67.8	0.68	0.0	2.5	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

WELL PURGING FIELD INFORMATION FORM

JOB# 56546-24

SITE/PROJECT NAME: Bldg 7 DCP Site 9-30-138

WELL# MW-7-16

WELL PURGING INFORMATION

PURGE DATE (MM/DD/YY)	SAMPLE DATE (MM/DD/YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
04/30/12	04/30/12	2.1	3.8

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT DEDICATED: Y (O) (CIRCLE ONE)

SAMPLING EQUIPMENT DEDICATED: (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP	D - GAS LIFT PUMP	G - BAILER	X- PURGING OTHER (SPECIFY)
		B - PERISTALTIC PUMP	F - PURGE PUMP	H - WATERRA®	
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON®	D - PVC		X- PURGING OTHER (SPECIFY)
		B - STAINLESS STEEL	E - POLYETHYLENE		
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON®	D - POLYPROPYLENE	F - SILICONE	X- PURGING OTHER (SPECIFY)
		B - TYGON®	E - POLYETHYLENE	G - COMBINATION TEFLON/POLYPROPYLENE	
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	(m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	(m/ft)	WELL DEPTH	(m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µs/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µs/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µs/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µs/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µs/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOUR: None COLOUR: Clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED: 0-5 RAIN: Y/N N PRECIPITATION Y/N OUTLOOK: Rain forecast

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING WAS CARRIED OUT IN ACCORDANCE WITH THE APPROVED ADMP PROTOCOLS

DATE	PRINT	SIGNATURE
4/30/12	Thomas Bohlen	Thomas Bohlen

ANY MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7 BCP Site 9-32-138
Ref. No.: 56546.24

Date: 5/1/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-7 1 of 2
Measurement Point: TOR
Constructed Well Depth (ft): 20.7'
Measured Well Depth (ft): 17.80
Depth of Sediment (ft): 4.9

Screen Length (ft): 12.7' - 20.7' = 10'
Depth to Pump Intake (ft)[1]: 15'
Well Diameter, D (in): 2"
Well ~~Screen~~ Volume, V_s ~~(mL)~~[2]: 2.6 gal
Initial Depth to Water (ft): 1.76'

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
1043	151	2.58	0.82	11.65	10.91	2.575	88.8	11.47	73.9	0	
1048	76	2.91	1.15	11.55	10.86	2.661	82.6	10.92	81.7	0.2	
1053	151	2.98	1.22	11.45	10.81	2.818	64.0	9.60	112.3	0.3	
1058	↓	3.17	1.41	11.15	10.72	3.277	24.3	7.39	94.1	0.5	
1103	227	3.27	1.51	10.96	10.70	3.688	2.4	6.39	183.1	0.8	
1108	151	3.37	1.61	10.82	10.76	4.096	-18.1	5.72	84.9	1.0	
1113	↓	3.51	1.75	10.69	10.76	4.639	-43.0	4.94	119.0	1.2	
1118	↓	3.64	1.88	10.64	10.68	4.965	-56.6	4.50	120.6	1.3	
1123	76	3.77	1.17	10.60	10.67	5.244	-69.8	4.08	145.8	1.4	
1128	↓	3.89	2.13	10.56	10.59	5.515	-83.6	3.66	147.0	1.6	
1133	151	3.97	2.21	10.52	10.61	5.723	-93.4	3.34	127.2	1.8	
1143	↓	4.18	2.42	10.42	10.77	6.152	-110.0	2.75	86.2	2.2	
1153	76	4.33	2.57	10.35	10.70	6.499	-123.6	2.30	46.4	2.4	

Notes: PID = 0.2 ppm

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= V_p/V_s

Sand in flow through cell; kept pump running

Cleaned & emptied flow through cell

Inc. pump rate

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg. 7 BCP Site 9-32-138
Ref. No.: 56546.24

Date: 5/1/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-7 2 of 2
Measurement Point: TOR
Constructed Well Depth (ft): 22.7'
Measured Well Depth (ft): 17.8'
Depth of Sediment (ft): 4.9'

Screen Length (ft): 10'
Depth to Pump Intake (ft)[1]: 15'
Well Diameter, D (in): 2"
Well ~~Screen~~ Volume, V_s ~~(mL)~~[2]: 2.6 gal
Initial Depth to Water (ft): 1.76

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
1203	114	4.53	2.77	10.27	10.79	6.747	-134.7	2.02	27.0	2.7	1
1220	↓	4.82	3.06	10.03	10.81	7.131	-123.8	3.16	19.1	3.6*	
1225	227	5.37	3.61	9.97	10.42	7.188	-153.4	2.07	19.7	3.9	
1230		5.81	4.05	10.16	10.37	6.829	-165.8	2.39	32.7	4.2	
1235		6.22	4.46	10.31	10.42	6.701	-163.8	2.87	26.3	4.7	
1240		6.62	4.86	10.16	10.15	6.946	-168.2	2.48	15.9	5.0	
1245	↓	6.80	5.04	10.07	10.48	7.028	-171.7	2.31	9.4	5.3	2
1255		7.23	5.47	9.82	10.49	7.192	-179.9	1.91	6.8	6.2	
1305		7.62	5.86	9.59	10.53	7.330	-185.9	1.63	3.8	7.1	
1310		7.74		9.49	10.52	7.368	-188.1	1.53	1.9	7.6	
1315		7.89		9.46	10.51	7.372	-189.0	1.47	1.5	8.0	3

Notes: * inc. volume from flow through cell contents

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = \pi * (D/2)^2 * (5*12) * (2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= V_p/V_s.

WELL PURGING FIELD INFORMATION FORM

JOB# 56546 - 24

SITE/PROJECT NAME: Bldg 7 BCP Site 9-30-138 WELL# MW-7-7

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
05/01/12	05/01/12	2.6	9.0

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ... DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQUIPMENT ... DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP	D - GAS LIFT PUMP	G - BAILER	X- PURGING OTHER (SPECIFY)
		B - PERISTALTIC PUMP	E - PURGE PUMP	H - WATERRA®	
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - PVC		X- PURGING OTHER (SPECIFY)
		B - STAINLESS STEEL	E - POLYETHYLENE		
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - POLYPROPYLENE	F - SILICONE	X- PURGING OTHER (SPECIFY)
		B - TYGON	E - POLYETHYLENE	G - COMBINATION TEFLON/POLYPROPYLENE	
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	610.97 (m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	1.76 (m/ft)	WELL DEPTH	22.70 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmicm) AT 25°C	(mV)	(mg/l)	(°C)
(std)	(ntu)	(µmicm) AT 25°C	(mV)	(mg/l)	(°C)
(std)	(ntu)	(µmicm) AT 25°C	(mV)	(mg/l)	(°C)
(std)	(ntu)	(µmicm) AT 25°C	(mV)	(mg/l)	(°C)
(std)	(ntu)	(µmicm) AT 25°C	(mV)	(mg/l)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: clear TURBIDITY: cloudy → clear

WEATHER CONDITIONS: WIND SPEED: 0-5 DIRECTION: SW PRECIPITATION Y/N OUTDOOR: rain am

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE GM PROTOCOLS

DATE	PRINT	SIGNATURE
5/1/12	Thomas Bohler	Thomas Bohler

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7 BCP Site 9-32-138
Ref. No.: 56346.24

Date: 5/11/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-8
Measurement Point: TOR
Constructed Well Depth (ft): 19.7
Measured Well Depth (ft): 19.42
Depth of Sediment (ft): 0.28

Screen Length (ft): 12.7' - 19.7'
Depth to Pump Intake (ft)[1]: 15'
Well Diameter, D (in): 2
Well ~~Screen~~ Volume, V_s ~~(mL)~~[2]: 3.0 gal
Initial Depth to Water (ft): 0.95

	Time	Pumping Rate (ml/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
5/11/12	1430		1.91		7.78	11.35	6.516	-161.8	5.17	25.7	0	
	1435		3.50		7.38	11.14	6.545	-151.5	1.47	43.1	0.2	
	1440		6.75		7.28	11.01	6.513	-127.9	1.03	86.7	0.8	
	1445		10.40		7.15	11.09	6.497	-126.7	0.99	97.0	1.5	
	1450		11.39		7.18	11.00	6.510	-130.8	0.96	487.0	2.0	
	DRY @ 1454											
5/13/12												
	728		1.92									

PID = 4.0 ppm

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 6 - 2 4

SITE/PROJECT NAME: Bldg 7 BCP Site 9-30-138 WELL# MW-7-8

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
05/11/12	05/21/12	3.0	2.3

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ... DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQUIPMENT ... DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP B - PERISTALTIC PUMP	D - GAS LIFT PUMP E - PURGE PUMP	G - BAILER H - WATERRA®	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - STAINLESS STEEL	D - PVC E - POLYETHYLENE		X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - TYGON	D - POLYPROPYLENE E - POLYETHYLENE	F - SILICONE G - COMBINATION TEFLON/POLYPROPYLENE	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - ROPE X- (SPECIFY)			X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	611.35 (m/ft)	GROUNDWATER ELEVATION	609.97 (m/ft)
DEPTH TO WATER	09.95 (m/ft)	WELL DEPTH	19.42 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: Yellow TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED 0-5 DIRECTION: W PRECIPITATION Y/N OUTDOOR: overcast

SPECIFIC COMMENTS:

purged dry 5/11/12 - purge H2O brown, very cloudy / turbid.

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE CSP PROTOCOLS

5/21/12 DATE — Thomas Bohlen PRINT — Thomas Bohlen SIGNATURE

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7 BCP Site 9-32-138
Ref. No.: 56546.24

Date: 5/3/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-C-2
Measurement Point: TOR
Constructed Well Depth (ft): 24'
Measured Well Depth (ft): 24.60
Depth of Sediment (ft): -

Screen Length (ft):
Depth to Pump Intake (ft)[1]: 21'
Well Diameter, D (in): 2
Well ~~Screen~~ Volume, V_s ~~(mL)~~[2]: 3.1
Initial Depth to Water (ft): 5.51

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p ~~(mL)~~ gal	No. of Well Screen Volumes Purged[4]
838	151	5.84	0.33	7.11	13.69	1.986	-78.4	6.62	11.1	0	
843	76	6.40	0.89	6.79	13.64	1.940	-86.3	2.92	3.7	0.2	
848	↓	6.40		6.77	13.87	1.856	-82.7	2.65	0.0	0.3	
853	151	6.40		6.76	13.89	1.850	-80.7	2.54	0.0	0.5	
858		6.40		6.73	13.81	1.798	-77.9	2.57	0.0	0.8	
903		6.40		6.72	13.77	1.804	-78.0	2.52	0.0	1.0	
908		6.40		6.72	13.86	1.800	-76.6	2.52	0.0	1.2	
913		6.40		6.72	14.08	1.788	-73.7	2.53	0.0	1.3	
923		6.40		6.70	14.17	1.795	-69.3	2.53	0.0	1.7	
933		6.40		6.65	14.10	1.800	-65.0	2.55	0.0	2.1	
943		6.40		6.64	13.97	1.800	-61.7	2.51	0.0	2.4	
953		6.40		6.64	14.07	1.799	-62.2	2.63	0.0	2.9	
958		6.40		6.64	14.20	1.791	-62.1	2.61	0.0	3.1	1
1003	↓	6.40	↓	6.64	14.18	1.797	-62.5	2.60	0.0	3.3	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length, $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

ENG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

WELL PURGING FIELD INFORMATION FORM

JOB# 56546-24

SITE/PROJECT NAME: Bldg 7BCP Site 9-32-138 WELL# MW-7-R2

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
05 03 12	05 03 12	3	12

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ... DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQUIPMENT ... DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP B - PERISTALTIC PUMP	D - GAS LIFT PUMP E - PURGE PUMP	G - BAILER H - WATERRA®	X= PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X= SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - STAINLESS STEEL	D - PVC E - POLYETHYLENE		X= PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - POLYPROPYLENE			X= SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - TYGON	D - POLYPROPYLENE E - POLYETHYLENE	F - SILICONE G - COMBINATION TEFLON/POLYPROPYLENE	X= PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - ROPE X= (SPECIFY)			X= SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	(m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	5.51 (m/ft)	WELL DEPTH	24.60 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: Clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED: 0-5 DIRECTION: SW PRECIPITATION Y/N OUTLOOK: AM showers & storm forecasted

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE CAL PROTOCOLS

5/3/12 DATE | Thomas Bohlen PRINT | Thomas Bohlen SIGNATURE

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7 BCA Site 9-32-138
Ref No.: 56546.24

Date: 5/3/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-P-1 2 of 2
Measurement Point: TOR
Constructed Well Depth (ft): 20'
Measured Well Depth (ft): 19.89'
Depth of Sediment (ft): -

Screen Length (ft)
Depth to Pump Intake (ft)[1]: 17'
Well Diameter, D (in): 2
Well ~~Screen~~ Volume, V_s (~~ml~~ gal)[2]: 1.7
Initial Depth to Water (ft): 9.55

Time	Pumping Rate (ml/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, Vp (~~ml~~ gal)	No. of Well Screen Volumes Purged[4]
1457	114	10.09	2.54	6.02	20.62	17.49	-42.4	4.26	0.0	2.9	
1502		10.09		6.03	20.68	17.13	-43.0	4.20	0.0	3.1	
1512		10.09		6.03	20.67	17.14	-43.0	4.18	0.0	3.3	
1517		10.09		6.03	20.67	17.15	-43.5	4.18	0.0	3.4	
1522		10.09		6.03	20.65	17.14	-43.5	4.17	0.0	3.6	
1527	↓	10.09	↓	6.03	20.65	17.15	-43.6	4.16	0.0	3.8	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = \pi * (D/2)^2 * (5*12) * (2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stabilization criteria and appear to be stabilizing). No. of Well Screen Volumes Purged= Vp/Vs

ENG 60 DEVIATIONS SHALL BE APPROVED BY A CH2M HILL REQUEST FORM APPROVED BY THE PROJECT MANAGER.

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 7 BCA Site 9-32-138
Ref. No.: 56546.24

Date: 5/3/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-P-1 1 of 2
Measurement Point: TOR
Constructed Well Depth (ft): 20'
Measured Well Depth (ft): 19.89'
Depth of Sediment (ft): -

Screen Length (ft): -
Depth to Pump Intake (ft)[1]: 17'
Well Diameter, D (in): 2
Well ~~Screen~~ Volume, V_s ~~(mL)~~ gal[2]: 1.7
Initial Depth to Water (ft): 9.55

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
1332	76	10.19	0.64	5.91	21.24	24.82	-70.0	5.93	1.2	0	
1337	↓	10.62	1.07	5.88	20.95	24.78	-67.9	5.02	0.0	0.1	
1342	227	11.08	1.53	5.91	20.73	24.69	-70.6	4.91	1.0	0.2	
1347	↓	11.45	1.90	5.94	20.63	24.20	-68.3	4.79	0.9	0.5	
1352	151	11.51	1.96	5.95	20.72	23.67	-64.7	4.79	0.2	0.7	
1357	302	12.09	2.54	5.95	20.56	21.13	-44.9	4.92	0.0	1.1	
1402	76	12.09		5.97	20.67	20.96	-44.4	4.90	0.0	1.2	
1407	↓	12.09		5.98	20.67	20.68	-44.8	4.86	0.0	1.3	
1412	227	12.09		6.00	20.67	20.67	-45.3	4.78	0.0	1.4	
1417	↓	12.09		6.01	20.67	20.53	-45.0	4.68	0.0	1.7	1
1427	114	12.09		6.01	20.66	19.75	-45.0	4.59	0.0	2.0	
1437	↓	12.09		6.02	20.64	18.59	-43.4	4.48	0.0	2.2	
1447	↓	12.09	↓	6.02	20.67	18.05	-41.7	4.37	0.0	2.5	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p^*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= V_p/V_s

WELL PURGING FIELD INFORMATION FORM

JOB# 56546-24

SITE/PROJECT NAME: Bldg 7BCA Site 9-32-138

WELL# MW-7-A1

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES / GALLONS)	ACTUAL VOLUME PURGED (LITRES / GALLONS)
05 03 12	05 03 12	1.7	40

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQIPMENT DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP B - PERISTALTIC PUMP	D - GAS LIFT PUMP E - PURGE PUMP	G - BAILER H - WATERRA®	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - STAINLESS STEEL	D - PVC E - POLYETHYLENE		X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - TYGON	D - POLYPROPYLENE E - POLYETHYLENE	F - SILICONE G - COMBINATION TEFLON/POLYPROPYLENE	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	(m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	9.55 (m/ft)	WELL DEPTH	20.00 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: Clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED: 0-5 DIRECTION: SW PRECIPITATION Y/N OUTLOOK: pm showers/t. storms forecasted

SPECIFIC COMMENTS: - interior location

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE GM PROTOCOLS

DATE	PRINT	SIGNATURE
5/3/12	Thomas Bohlen	Thomas Bohlen

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg. 7 BCP Site 9-32-138
Ref. No.: 56346.24

Date: 5/1/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-7-A-6
Measurement Point: TOR
Constructed Well Depth (ft): 14.25
Measured Well Depth (ft): 14.31
Depth of Sediment (ft): NA

Screen Length (ft):
Depth to Pump Intake (ft)[1]: 12'
Well Diameter, D (in): 2"
Well ~~Screen~~ Volume, V_s ~~(mL)~~[2]: 2.0 gal
Initial Depth to Water (ft): 2.28

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p ~~(mL)~~ (gal)	No. of Well ~~Screen~~ Volumes Purged[4]
812		2.61	0.33	6.77	11.95	2.944	93.0	4.74	24.2	0	
817		2.70	0.42	6.69	11.96	2.511	64.1	1.19	13.2	0.2	
822		2.70		6.70	11.94	2.190	59.2	1.10	17.3	0.5	
827		2.70		6.70	11.97	2.168	51.8	0.94	8.1	0.9	
832		2.70		6.70	12.03	2.262	43.5	0.85	6.3	1.2	
837		2.70		6.70	12.05	2.311	39.0	0.81	5.0	1.4	
842		2.70		6.70	12.07	2.358	35.2	0.78	4.8	1.7	
847		2.70		6.70	12.15	2.428	31.4	0.72	2.5	2.0	1
852		2.70		6.70	12.19	2.470	29.7	0.71	2.1	2.2	
857		2.70		6.70	12.21	2.481	29.2	0.70	1.9	2.4	
902		2.70		6.70	12.23	2.483	29.5	0.69	1.8	2.7	

PID = 1001ppm

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

WELL PURGING FIELD INFORMATION FORM

JOB# 56546 - 24

SITE/PROJECT NAME: Bldg. 7 BCP Site 9-32-138 WELL# MW-7-A-6

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
05/1/12	05/1/12	20	40

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ... DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQUIPMENT ... DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP	D - GAS LIFT PUMP	G - BAILER	X- PURGING OTHER (SPECIFY)
		B - PERISTALTIC PUMP	E - PURGE PUMP	H - WATERRA®	
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - PVC		X- PURGING OTHER (SPECIFY)
		B - STAINLESS STEEL	E - POLYETHYLENE		
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - POLYPROPYLENE	F - SILICONE	X- PURGING OTHER (SPECIFY)
		B - TYGON	E - POLYETHYLENE	G - COMBINATION TEFLON/POLYPROPYLENE	
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	(m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	22.8 (m/ft)	WELL DEPTH	143.1 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µm/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µm/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µm/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µm/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µm/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: Clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED: 0-5 DIRECTION: SW PRECIPITATION Y/N OUTDOOR: am rain

SPECIFIC COMMENTS: slight sheen in purge water

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE GUIDANCE/PROTOCOLS

DATE	PRINT	SIGNATURE
5/1/12	Thomas Bohlen	Thomas Bohlen

EMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.2
Client Contact: Mr. Christopher Boron	Phone: 716 655-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page ~~2 of 4~~
Company: GZA GeoEnvironmental, Inc.				Job #:

Address: 535 Washington Street 11th Floor	Due Date Requested:	Analysis Requested	Preservation Codes:
City: Buffalo	TAT Requested (days):		A - HCL M - Hexane B - NaOH N - None C - Zn Acetate O - AsNaO2 D - Nitric Acid P - Na2O4S E - NaHSO4 Q - Na2SO3 F - MeOH R - Na2S2SO3 G - Amchlor S - H2SO4 H - Ascorbic Acid T - TSP Dodecahydrate I - Ice U - Acetone J - DI Water V - MCAA K - EDTA W - ph 4-5 L - EDA Z - other (specify) Other:
State, Zip: NY, 14203			
Phone:	PO #: 4047065		
Email: christopher.boron@gza.com	WO #: 58507		
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014		
Site: Bldg 7 BCP Site 9-32-138	SSOW#:		

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N						
MW-7-2-04262-1415	4/26/12	1415	G	Water			X	X	X	X	X	X	X	X	X	X						
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by: Thomas Bohlen	Date/Time: 4/26/12 1750	Company: GZA	Received by:	Date/Time: 4/26/12 1750	Company: TAB-BUFF
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

estAmerica Buffalo
) Hazelwood Drive
nherst, NY 14228-2298
none (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

lient Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.3
ent Contact: r. Christopher Boron	Phone: 716 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 3 of 4
mpany: ZA GeoEnvironmental, Inc.				Job #:
ldress: 35 Washington Street 11th Floor	Due Date Requested:			
ty: uffalo	TAT Requested (days):			
ate, Zip: Y, 14203				
none:	PO #: 4047065			
nail: hristopher.boron@gza.com	WO #: 58507			
oject Name: 58507, GM-Lockport Groundwater Sampling	Project #: 48004014			
te: Bldg 7 BKP Site 9-30-13.8	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

ample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N					
MW-7-1-042712-1000	4/27/12	1000	G	Water			X	X	X	X	X	X	X	X	X	X					
MW-7-3-042712-1330	↓	1330	↓	Water			↓	↓	↓	↓	↓	↓	↓	↓	↓	↓					
MW-7-4-042712-1415	↓	1415	↓	Water			↓	↓	↓	↓	↓	↓	↓	↓	↓	↓					
				Water																	
Trip Blank				Water																	
				Water																	
				Water																	
				Water																	
				Water																	
				Water																	
				Water																	

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:				
Relinquished by: Thomas Bohlen	Date/Time: 4/27/12 1720	Company GZA	Received by:	Date/Time: 4/27/12 1720	Company TRUFFACO
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page ~~1 of 1~~
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg. 7 BCP Site 9-32-138	SSOW#:			

Analysis Requested

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N					
MW-7-6-043012-0900 MS/MSD	4/30/12	900	G	Water			X	X	X	X	X	X	X	X	X	X					Only run VOCs 8260B for MS/MSD ~~+HOLD~~
MW-7-5-043012-1130	4/30/12	1130	G	↓			X	X	X	X	X	X	X	X	X	X					all other SM
Trip Blank																					

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Thomas Bohlen	4/30/12 / 7:30				
Relinquished by: Joseph Mahl	Date/Time: 4/30/12 / 19:30	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: ~~Page 4 of~~ 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 7 BCP Site 9-32-138	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N						
MW-7-A-6-050112-0900	05/1/12	900	G	Water			X	X	X	X	X	X	X	X	X	X					2	
MW-7-7-050112-1330	"	1330	G	↓			X	X	X	X	X	X	X	X	X	X					↓	
Trip Blank																						

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
1	Thomas Bohlen	5/1/12 17:17			5-1-12 10:17	BCJ
2	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
3	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.: | Cooler Temperature(s) °C and Other Remarks: 4.2 #1

10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTIN

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 4 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 7 BCP Site 9-32-138	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2SO3, S - H2SO4, T - TSP Dodecahydrat, U - Acetone, V - MCAA, W - ph 4-5, Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OI_M04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N					
MW-7-8-050212-0730	5/2/12	7.30	G	Water			X	X	X	X	X	X	X	X	X	X					20	
Trip Blank																						

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Thomas Bohlen	5/2/12 / 1800	GZA	Zachary J Robison	5/2/12 1800	GUF
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716-685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 4 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 7 BCP Site 9-32-138	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2SO3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - ph 4-5, Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity	Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N		
MW-7-C-2-050312-1015	5/3/12	1015	G	Water			X	X	X	X	X	X	X	X	X	X	3	
MW-7-P-1-050312-1530	↓	1530	↓				X	X	X	X	X	X	X	X	X	X	↓	
Trip Blank																		

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Thomas Bohlen	5/3/12 /				
Relinquished by: James Trudeau	Date/Time: 5/3/12 14:46	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Form FMG 8.0-01

INSTRUMENT CALIBRATION RECORD

PROJECT: Bldg 7 BCP Site 9-32-138 | PROJECT MANAGER: C. Baron
LOCATION: Lockport, NY | FIELD REP.: T. Bohlen
CLIENT: | DATE:

Instrument	Date Calibrated	By	Standard Used	Decontamination, Maintenance, or Repair Performed	Remarks
Horiba U-52	4/26/12	VB	Cal Sol.	Cleaning & Cal.	OK
Mini Rae 3000 PID	"	"	Cal Gas	Cal.	OK
YSI	"	"	Cal. Solutions	Cal.	OK
Mini Rae 3000 PID	4/27/12	VB	Cal. Gas	Cal.	OK
YSI	"	"	Cal Solutions	Cleaning & Cal.	OK
Mine Rae 3000 PID	4/30/12	"	Cal. Gas	Cal	OK
YSI	"	"	Cal Solutions	cleaning & Cal.	OK
Mini Rae 3000 PID	5/1/12	VB	Cal Gas.	Cal	OK
YSI	"	"	Cal. Solutions	Cleaning & Cal	OK
Mini Rae 3000 PID	5/2/12	VB	Cal Gas	Cal	OK
YSI	"	"	Cal Solutions	Cleaning & Cal	OK

Other Remarks:

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

Form FMG 8.0-01

INSTRUMENT CALIBRATION RECORD

PROJECT	Bldg 7 BCP Site 9-32-138	PROJECT MANAGER	C. Boron
LOCATION	Lockport, NY	FIELD REP.	T. Bohlen
CLIENT		DATE	

Instrument	Date Calibrated	By	Standard Used	Decontamination, Maintenance, or Repair Performed	Remarks
Mini Rae 3000 PID	5/3/12	YB	Cal Gas	Cal	OK
YSI	"	"	Cal Sol.	Cleaning & Cal.	OK

Other Remarks:

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

INSTRUMENT CALIBRATION REPORT

Pine Environmental Services, Inc.

1900 Brewerton Road
Mattydale, NY 13211
Toll-free: (877) 903-PINE (7463)

Pine Environmental Services, Inc.

Instrument ID 5781
Description YSI 6920
Calibrated 4/25/2012

Manufacturer YSI
Model Number 6920
Serial Number/ Lot Number 04E8620AA
Location New York
Department

State Certified
Status Pass
Temp °C 19.3
Humidity % 41

Calibration Specifications

Group # 1
Group Name PH
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
7.00 / 7.00	PH	7.00	PH	7.00	7.00	0.00%	Pass
4.00 / 4.00	PH	4.00	PH	4.00	4.00	0.00%	Pass
10.00 / 10.00	PH	10.00	PH	9.94	9.98	-0.20%	Pass

Group # 2
Group Name Turbidity
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
0.00 / 0.00	NTU	0.00	NTU	0.00	0.00	0.00%	Pass
126.00 / 126.00	NTU	126.00	NTU	126.00	126.00	0.00%	Pass

Group # 3
Group Name Conductivity
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.000

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
1.413 / 1.413	ms/cm	1.413	ms/cm	1.413	1.413	0.00%	Pass

Group # 4
Group Name Redox (ORP)
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
240.00 / 240.00	mv	240.00	mv	240.00	240.00	0.00%	Pass

Group # 5
Group Name Disolved Oxygen Span
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail

INSTRUMENT CALIBRATION REPORT

Pine Environmental Services, Inc.

1900 Brewerton Road
Mattydale, NY 13211
Toll-free: (877) 903-PINE (7463)

Pine Environmental Services, Inc.

Instrument ID 5781
Description YSI 6920
Calibrated 4/25/2012

Group # 5 — **Range Acc %** 0.0000
Group Name Disolved Oxygen Span — **Reading Acc %** 3.0000
Stated Accy Pct of Reading — **Plus/Minus** 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
100.00 / 100.00	%	100.00	%	100.00	100.00	0.00%	Pass

Group # 6
Group Name Disolved Oxygen Zero
Test Performed: No **As Found Result: Not Entered** **As Left Result: Not Entered**

Test Instruments Used During the Calibration **(As Of Cal Entry Date)**

Test Standard ID	Description	Manufacturer	Model Number	Serial Number / Lot Number	Last Cal Date/ Opened Date	Next Cal Date / Expiration Date
NY COND 1.413 9084	NY COND 1.413	Aurical	SL20014-5G	9084		7/12/2012
NY ORP 240 MV 2981	NY ORP 240 mV	Hanna	SL50005-500	2981		1/31/2016
NY PH 10 2101326	NY PH 10	VWR	SL10010-5G	2101326		7/31/2012
NY PH 4	NY PH 4	VWR	SL10004-5G	2010169		9/30/2012
NY PH 7	NY PH 7	VWR	SL1007-5G	2011038		10/31/2012

Notes about this calibration

Calibration Result Calibration Successful
Who Calibrated Joe Filippi

All instruments are calibrated by Pine Environmental Services, Inc. according to the manufacturer's specifications, but it is the customer's responsibility to calibrate and maintain this unit in accordance with the manufacturer's specifications and/or the customer's own specific needs.

Notify Pine Environmental Services, Inc. of any defect within 24 hours of receipt of equipment
Please call 866-960-7463 for Technical Assistance

INSTRUMENT CALIBRATION REPORT

Pine Environmental Services, Inc.

2225 Tomlynn Street
Richmond, Va. 23230
Toll-free: (866) 801-PINE (7463)

Pine Environmental Services, Inc.

Instrument ID 15020
Description MiniRae 3000
Calibrated 4/23/2012

Manufacturer Rae Systems
Model Number PGM-7320
Serial Number/ Lot Number 592-902204
Location Virginia
Department

State Certified
Status Pass
Temp °C 18
Humidity % 34

Calibration Specifications

Group # 1
Group Name Isobutylene
Stated Accy Pct of Reading

Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
100.00 / 100.00	PPM	100.00	PPM	100.00	100.00	0.00%	Pass

Test Instruments Used During the Calibration (As Of Cal Entry Date)

Test Standard ID	Description	Manufacturer	Model Number	Serial Number / Lot Number	Last Cal Date/ Opened Date	Next Cal Date / Expiration Date
NY ISO 100 LOT# 0319FD12	NY ISO 100	American Gas Group	GP11015	0319FD12		4/30/2016

Notes about this calibration

Calibration Result Calibration Successful
Who Calibrated Timothy Walsh

All instruments are calibrated by Pine Environmental Services, Inc. according to the manufacturer's specifications, but it is the customer's responsibility to calibrate and maintain this unit in accordance with the manufacturer's specifications and/or the customer's own specific needs.

Notify Pine Environmental Services, Inc. of any defect within 24 hours of receipt of equipment
Please call 866-960-7463 for Technical Assistance

SAMPLE COLLECTION DATA SHEET - GROUNDWATER SAMPLING PROGRAM

PROJECT NAME: Bldg 8 BCP Site 9-32-139 — PROJECT NO.: 56546

SAMPLING CREW MEMBERS: T. Bohlen — SUPERVISOR: C. Boron

DATE OF SAMPLE COLLECTION: 4/25/12 - 5/3/12

[Note: For 2" dia. well, 1 ft. = 0.14 gal (imp) or 0.16 gal (us)]

Sample I.D. Number	Well No.	Measuring Point Elev. (ft. AMSL)	Bottom Depth (ft. btoc)	Water Depth (ft. btoc)	Water Elevation (ft. AMSL)	Well Volume (gallons)	Bailer Volume No. Bails	Volume Purged (gallons)	Field pH	Field Temp.	Field Cond.	Time	Sample Description & Analysis
MW-6-1-042512-0915	MW-6-1	598.23	18.82	2.23	596.00	16.59' / 2.7		3.6	6.97	10.23	3.97	915	MW-6-1 GW
MW-6-2-042512-1130	MW-6-2	609.33	26.12	3.52	605.81	22.6' / 3.7		6.0	6.94	11.12	10.7	1130	MW-6-1 GW
MW-8-4-042512-1800	MW-8-4	613.42	21.39	6.67	606.75	14.75' / 2.4		6.0	7.02	13.81	12.2	1511	MW-8-4 GW
MW-6-F-8-042512-1730	MW-6-F-8	613.22	14.32	2.46	610.76	11.86 / 1.9		3.0	6.96	10.57	13.0	1730	MW-6-F-8 GW
DUP	MW-6-2												
MW-8-3-050112-1540	MW-8-3	615.06	22.02	8.76	606.30	13.26 / 2.2		3.7	6.59	20.59	5.912	1758	MW-8-3 GW
MW-8-003-B-043012-1400	MW-8-003B	610.94	14.36	4.85	606.09	9.51' / 1.6		3.8	7.27	11.88	13.62	1355	MW-8-003-B GW
MW-8-1-043012-1700	MW-8-1	615.11	20.26	5.42	609.69	14.84' / 2.4		4.0	6.73	13.50	6.616	1657	MW-8-1 GW

Additional Comments:

Copies to:

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

SAMPLE COLLECTION DATA SHEET - GROUNDWATER SAMPLING PROGRAM

PROJECT NAME: Bldg 8 BCP Site 9-32-139 — PROJECT NO.: 56546.24

SAMPLING CREW MEMBERS: T. Bohlen — SUPERVISOR: C. Boron

DATE OF SAMPLE COLLECTION: 4/25/12 - 5/3/12

[Note: For 2" dia. well, 1 ft. = 0.14 gal (imp) or 0.16 gal (us)]

Sample I.D. Number	Well No.	Measuring Point Elev. (ft. AMSL)	Bottom Depth (ft. btoc)	Water Depth (ft. btoc)	Water Elevation (ft. AMSL)	Well Volume (gallons)	Bailer Volume No. Bails	Volume Purged (gallons)	Field pH	Field Temp.	Field Cond.	Time	Sample Description & Analysis
MW-8-2-050312-1830	MW-8-2	615.14	22.69	7.70	607.44	14.99 / 2.4		4.2	6.78	20.38	1.992	1815	MW-8-2 GW

Additional Comments:

Copies to:

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 8 BCP Site 9-32-139
Ref. No.: 57546

Date: 4/25/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-6-1
Measurement Point: TOR
Constructed Well Depth (ft): 17' bgs
Measured Well Depth (ft): 18.82'
Depth of Sediment (ft): -

Screen Length (ft): 7-17'
Depth to Pump Intake (ft)[1]: 15'
Well Diameter, D (in): 2"
Well Screen Volume, V_s (~~ml~~ L)[2]: 2.7
Initial Depth to Water (ft): 2.23'

OVM = 0

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
819	78	3.08	0.85	6.62	9.57	3.59	-42	1.35	136	0.1	
824	↓	3.47	1.24	6.90	9.84	3.66	-84	0.00	57.8	0.2	
829	240 *	3.49	1.26	6.95	9.89	3.67	-91	0.00	34.8	0.3	
834		3.49	1.26	6.96	9.96	3.72	-94	0.00	35.8	1	
839		3.49	1.26	6.96	10.00	3.78	-94	0.00	34.0	1.2	
844		3.49	1.26	6.97	10.04	3.83	-94	0.00	37.7	1.6	
849		3.49	1.26	6.97	10.11	3.88	-94	0.00	39.8	2.0	
853		3.49	1.26	6.96	10.11	3.92	-94	0.00	46.5	2.2	
857		3.49	1.26	6.97	10.13	3.93	-94	0.00	39.5	2.5	
902		3.49	1.26	6.97	10.15	3.96	-94	0.00	39.8	2.9	1
907	↓	3.49	1.26	6.97	10.13	3.97	-94	0.00	46.3	3.1	

* - calculated using 2L bottle & stopwatch

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 3 - [ ]

SITE/PROJECT NAME: Bldg 8 BCP Site 9-32-139 WELL# MW-6-1

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
04 25 12	04 25 12	2.7	3.6

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ... DEDICATED Y (O) (CIRCLE ONE)

SAMPLING EQIPMENT ... DEDICATED (O) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP	D - GAS LIFT PUMP	G - BAILER	X-	PURGING OTHER (SPECIFY)
		B - PERISTALTIC PUMP	E - PURGE PUMP	H - WATERRA®		
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X-	SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - PVC		X-	PURGING OTHER (SPECIFY)
		B - STAINLESS STEEL	E - POLYETHYLENE			
SAMPLING DEVICE	E	C - POLYPROPYLENE			X-	SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - POLYPROPYLENE	F - SILICONE	X-	PURGING OTHER (SPECIFY)
		B - TYGON	E - POLYETHYLENE	G - COMBINATION TEFLON/POLYPROPYLENE		
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X-	SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45	[ ]	A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM		

FIELD MEASUREMENTS

WELL ELEVATION	5 9 8 2 3 (m/ft)	GROUNDWATER ELEVATION	5 9 6 0 0 (m/ft)
DEPTH TO WATER	2 2 3 (m/ft)	WELL DEPTH	1 7 0 0 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µs/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µs/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µs/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µs/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µs/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: None COLOR: Yellow-Clear TURBIDITY: Cloudy-Clear

WEATHER CONDITIONS: WIND SPEED: 0-5 DIRECTION: SW PRECIPITATION Y/N OUTLOOK: N

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE CAMP PROTOCOLS

DATE	PRINT	SIGNATURE
4/25/12	Thomas Bohler	Thomas Bohler

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 8 RCP site 9-32-139
Ref. No.: 56543

Date: 4/25/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-6-2 DUP
Measurement Point: TOR
Constructed Well Depth (ft): 24.6
Measured Well Depth (ft): 26.12
Depth of Sediment (ft): -

Screen Length (ft): 14.6'-24.6'
Depth to Pump Intake (ft)[1]: 19'
Well Diameter, D (in): 2"
Well Screen Volume, V_s ~~(mL)~~[2]: 3.7 gal
Initial Depth to Water (ft): 3.52

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
1013		3.95	0.43	7.06	11.71	6.00	78	3.11	4.6	0	
1018		4.02	0.50	7.03	11.68	8.52	53	0.00	2.5	0.2	
1023		4.04	0.52	6.95	11.83	10.6	13	0.00	2.3	0.9	
1028		4.04	0.52	6.95	11.85	10.7	16	0.00	1.7	1.1	
1032		4.04	0.52	6.94	11.87	10.8	20	0.00	1.1	1.3	
1037	250	4.05	0.53	6.95	11.92	10.8	23	0.00	0.0	1.8	
1042	↓	4.05	↓	6.95	11.93	10.7	25	0.00	0.0	2.1	
1047		4.05		6.94	11.96	10.7	27	0.00	0.0	2.5	
1058		4.05		6.94	11.98	10.7	34	0.00	0.0	3.2	
1108		4.05		6.95	12.02	10.7	36	0.00	0.0	4.0	1
1120		4.05		6.94	12.06	10.7	41	0.00	0.0	4.6	
1131		4.05		6.93	12.10	10.7	40	0.00	0.0	5.2	
1136		4.05		6.94	12.12	10.7	42	0.00	0.0	5.5	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= V_p/V_s

WELL PURGING FIELD INFORMATION FORM

JOB# 565461

SITE/PROJECT NAME: Bldg 8 BCP Site 9-32-139

WELL# MW-6-2

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITERS/GALLONS)	ACTUAL VOLUME PURGED (LITERS/GALLONS)
04 25 12	04 25 12	37	60

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQUIPMENT DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP	D - GAS LIFT PUMP	G - BAILER	X- PURGING OTHER (SPECIFY)
		B - PERISTALTIC PUMP	E - PURGE PUMP	H - WATERRAS	
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - PVC		X- PURGING OTHER (SPECIFY)
		B - STAINLESS STEEL	E - POLYETHYLENE		
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - POLYPROPYLENE	F - SILICONE	X- PURGING OTHER (SPECIFY)
		B - TYGON	E - POLYETHYLENE	G - COMBINATION TEFLON/POLYPROPYLENE	
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - DISPOSABLE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	607.60 (msl)	GROUNDWATER ELEVATION	605.81 (msl/ft)
DEPTH TO WATER	35.2 TOR (B)	WELL DEPTH	214.60 (msl/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: Clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED: 5-10 RAIN: (IN 24 HRS) N PRECIPITATION Y/N OUTDOOR: N

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE SOP REQUIREMENTS

4/25/12 Thomas Bohlen Thomas Bohlen

DATE PRINT SIGNATURE

EMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM AND APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 8 BCP Site 9-32-139
Ref. No.: 56546

Date: 4/25/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-6-F-8
Measurement Point: TOR
Constructed Well Depth (ft): 15.4
Measured Well Depth (ft): 14.32
Depth of Sediment (ft):

Screen Length (ft): 8-15.4
Depth to Pump Intake (ft)[1]: 12'
Well Diameter, D (in): 2
Well Screen Volume, V_s (mL)[2]: 1,900 1
Initial Depth to Water (ft): 2.46

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (~~mL~~ gal)	No. of Well Screen Volumes Purged[4]
1644	227	2.82		6.97	13.00	14.3	66	0.68	83.7	0	
1649	↓	2.84		6.92	12.69	14.2	76	0.00	27.3	0.3	
1654		2.84		6.91	12.67	14.0	79	0.00	15.5	0.6	
1701		2.84		6.93	12.60	13.9	82	0.00	8.3	1	
1706		2.84		6.94	12.63	13.7	83	0.00	5.9	1.3	
1711		2.84		6.95	13.60	13.6	84	0.00	2.2	1.5	
1716		2.84		6.97	12.56	13.1	84	0.00	1.9	2	1
1721		2.84		6.96	12.57	13.0	84	0.00	2.0	2.2	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 6 - 2 4

SITE/PROJECT NAME: _____

WELL# M W 6 - F - 8

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
0 4 2 5 1 2	0 4 2 5 1 2	1 . 9	3 0

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT DEDICATED Y (O) N (CIRCLE ONE)

SAMPLING EQUIPMENT DEDICATED (O) Y N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP; B - PERISTALTIC PUMP	D - GAS LIFT PUMP; F - PURGE PUMP	G - BAILER; H - WATERRAS	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON; B - STAINLESS STEEL	D - PVC; E - POLYETHYLENE		X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON; B - TYGON	D - POLYPROPYLENE; E - POLYETHYLENE	F - SILICONE; G - COMBINATION TEFLON/POLYPROPYLENE	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - ROPE X- (SPECIFY)			X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	6 1 3 2 2 (m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	2 4 6 (m/ft)	WELL DEPTH	1 5 4 0 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOUR: clear TURBIDITY: clear

WEATHER CONDITIONS: WIND SPEED 5-10 DIRECTION NW PRECIPITATION Y/N QUANTITY N

SPECIFIC COMMENTS: _____

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE SPECIFICATIONS

DATE	PRINT	SIGNATURE
4/25/12	Thomas Bohlen	Thomas Bohlen

ANY MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM AND APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 8 BCP Site 9-32-139
Ref. No.: 56346.24

Date: 4/30/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-8-1 1of2
Measurement Point: TOR
Constructed Well Depth (ft): 22.5'
Measured Well Depth (ft): 20.26
Depth of Sediment (ft):

Screen Length (ft): 15.5' - 22.5'
Depth to Pump Intake (ft)[1]: 17'
Well Diameter, D (in): 2"
Well ~~Screen~~ Volume, V_s ~~(mL)~~[2]: 2.4 gal
Initial Depth to Water (ft): 5.42

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, Vp (mL)	No. of Well Screen Volumes Purged[4]
1512		5.84	0.42	7.15	13.30	6.278	71.0	3.51	134.0	0	
1517		5.93	0.51	6.81	13.53	6.543	-53.8	1.22	55.0	0.2	
1522		5.96	0.54	6.75	13.56	6.624	-74.1	0.79	41.6	0.4	
1527		5.98	0.56	6.73	13.56	6.646	-83.7	0.67	38.8	0.8	
1532		6.06	0.64	6.74	13.56	6.643	-90.0	0.63	32.4	1.0	
1537		6.06		6.73	13.53	6.652	-94.0	0.60	30.5	1.1	
1542		6.06		6.71	13.52	6.662	-96.8	0.54	25.8	1.2	
1547		6.06		6.74	13.49	6.665	-100.5	0.52	20.0	1.4	
1552		6.06		6.74	13.48	6.663	-102.2	0.51	18.3	1.7	
1557		6.06		6.71	13.45	6.660	-106.2	0.51	13.7	1.9	
1602		6.06		6.71	13.44	6.659	-107.9	0.49	15.6	2.1	
1612		6.06		6.71	13.46	6.641	-112.5	0.51	16.0	2.2	
1622		6.06	↓	6.74	13.45	6.635	-119.4	0.51	11.7	2.4	1

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 8 BCP Site 9-32-139
Ref. No.: 36546.24

Date: 4/30/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-8-1 2 of 2
Measurement Point: TOR
Constructed Well Depth (ft): 21.5'
Measured Well Depth (ft): 20.06'
Depth of Sediment (ft):

Screen Length (ft): 15.5' - 20.5'
Depth to Pump Intake (ft)[1]: 17'
Well Diameter, D (in): 2"
Well ~~Screen~~ Volume, V_s (~~mL~~)[2]: 2.4 gal
Initial Depth to Water (ft): 5.42

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
1632		6.06	0.64	6.72	13.45	6.622	-127.7	0.48	12.8	2.7	1
1642		6.06	0.64	6.72	13.47	6.618	-128.1	0.50	10.5	3.1	
1647		6.06	0.64	6.72	13.49	6.618	-130.2	0.49	11.0	3.2	
1652		6.06	0.64	6.72	13.48	6.619	-130.9	0.49	10.1	3.3	
1657		6.06	0.64	6.73	13.50	6.616	-132.4	0.49	9.8	3.4	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 6 - 2 4

SITE/PROJECT NAME: Bldg 8 BCP site 9-32-139

WELL# MW - 8 - 1

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL. IN CASING (LITRES / GALLONS)	ACTUAL VOLUME PURGED (LITRES / GALLONS)
04 30 12	04 30 12	24	40

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ..... DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQUIPMENT ..... DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP B - PERISTALTIC PUMP	D - GAS LIFT PUMP E - PURGE PUMP	G - BAILER H - WATERRA®	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - STAINLESS STEEL	D - PVC E - POLYETHYLENE		X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - TYGON	D - POLYPROPYLENE E - POLYETHYLENE	F - SILICONE G - COMBINATION TEFLON/POLYPROPYLENE	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - ROPE X- (SPECIFY)			X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	615.11 (m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	54.2 (m/ft)	WELL DEPTH	20.26 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmhos) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: organic COLOR: clear TURBIDITY: Cloudy & Clear

WEATHER CONDITIONS: WIND SPEED: 0-5 DIRECTION: NW PRECIPITATION Y/N OUTLOOK: light rain

SPECIFIC COMMENTS: Container location

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE SAMPLING PROTOCOLS

DATE	PRINT	SIGNATURE
4/30/12	Thomas Bohlen	Thomas Bohlen

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 8 RCP Site 9-32-139
Ref. No.: 56346.24

Date: 5/3/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-8-2 1 of 2
Measurement Point: TOR
Constructed Well Depth (ft): 23.0
Measured Well Depth (ft): 22.69
Depth of Sediment (ft):

Screen Length (ft): 7
Depth to Pump Intake (ft)[1]: 19
Well Diameter, D (in): 2
Well ~~Screen~~ Volume, V_s ~~(1 bl)~~ gal[2]: 2.4
Initial Depth to Water (ft): 7.70

Time	Pumping Rate (ml/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p ~~(mL)~~ gal	No. of Well Screen Volumes Purged[4]
1655	76	8.88		7.59	20.77	2.094	146.4	7.65	59	0	
1700	↓	10.00		7.42	20.33	1.867	174.0	6.07	2.7	0.2	
1705	151	10.00		7.36	20.46	1.850	158.6	5.62	1.0	0.3	
1710		10.00		7.19	20.42	1.871	66.4	5.13	1.0	0.5	
1715		10.00		7.14	20.39	1.868	27.9	4.92	0.2	0.7	
1720		10.00		6.99	20.37	1.859	-19.3	4.53	0.0	0.9	
1725		10.00		6.94	20.38	1.867	-44.6	4.27	0.8	1.1	
1730		10.00		6.92	20.39	1.894	-57.7	4.11	1.0	1.3	
1740		10.00		6.87	20.38	1.935	-74.2	3.84	2.2	1.4	
1750		10.00		6.81	20.40	1.966	-82.7	3.59	0.5	1.9	
1800		10.00		6.80	20.40	1.985	-98.3	3.51	0.7	2.1	
1805		10.00		6.79	20.38	1.989	-98.5	3.49	0.4	2.3	
1810	↓	10.00		6.79	20.38	1.990	-99.0	3.48	0.3	2.5	

PID = 4.17 ppm

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= V_p/V_s

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 8 BCP Site 9-32-139
Ref. No.: 36546.24

Date: 5/3/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-8-2 2 of 2
Measurement Point: TOR
Constructed Well Depth (ft): 23.0
Measured Well Depth (ft): 22.69
Depth of Sediment (ft):

Screen Length (ft): 7
Depth to Pump Intake (ft)[1]: 19
Well Diameter, D (in): 2
Well ~~Screen~~ Volume, V_s (~~mL~~ gal)[2]: 2.4
Initial Depth to Water (ft): 7.70

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, Vp ~~(mL)~~ (gal)	No. of Well Screen Volumes Purged[4]
1815		10.00		6.78	20.38	1.992	-98.5	3.47	0.3	2.7	

Notes

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p^*(D/2)^{2*}(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 6 - 2 4

SITE/PROJECT NAME: Bldg 8 BCP Site 9-32-139 WELL# MW-8-2

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
05 03 12	05 03 12	12.4	42

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ..... DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQUIPMENT ..... DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP	D - GAS LIFT PUMP	G - BAILER	X- PURGING OTHER (SPECIFY)
		B - PERISTALTIC PUMP	E - PURGE PUMP	H - WATERRA®	
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - PVC		X- PURGING OTHER (SPECIFY)
		B - STAINLESS STEEL	E - POLYETHYLENE		
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - POLYPROPYLENE	F - SILICONE	X- PURGING OTHER (SPECIFY)
		B - TYGON	E - POLYETHYLENE	G - COMBINATION TEFLON/POLYPROPYLENE	
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	61.54 (m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	7.70 (m/ft)	WELL DEPTH	23.00 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmS/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmS/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmS/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmS/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmS/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: Organic COLOR: Clear TURBIDITY:

WEATHER CONDITIONS: WIND SPEED: 0-5 DIRECTION: SW PRECIPITATION Y/N OUTLOOK: Sunny ~75°F

SPECIFIC COMMENTS: - interior location

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE SOP PROTOCOLS

DATE	PRINT	SIGNATURE
5/3/12	Thomas Bohlen	Thomas Bohlen

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 8 BCP Site 9-32-139
Ref. No.: 56546.27

Date: 4/27/12 /
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-8-3
Measurement Point: TOR
Constructed Well Depth (ft): 22.4
Measured Well Depth (ft): 22.02
Depth of Sediment (ft): 0.08

Screen Length (ft): 15.4 - 22.4 = 7'
Depth to Pump Intake (ft)[1]: 18'
Well Diameter, D (in): 2
Well ~~Screen~~ Volume, V_s (~~ml~~)[2]: 2.2 gal
Initial Depth to Water (ft): 8.76'

Time	Pumping Rate (ml/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p ~~(ml)~~ gal	No. of Well ~~Screen~~ Volumes Purged[4]
4/27/12											
1548		9.84		7.08	20.20	7.826	-98.7	3.26	21.8	0	
1553		10.69		7.06	20.44	6.213	-65.3	2.74	10.3	0.3	
1558		15.86		6.98	20.50	6.058	-13.6	2.72	6.3	1.1	
1603		17.25		6.84	20.57	6.022	7.8	1.89	9.3	1.6	
DRY	on 4/27/12									2.0	
4/30/12											
1744		10.05		6.74	19.91	6.805	3.7	4.22	80.5	0	
1749		13.38		6.59	20.45	5.934	31.6	2.83	1.9	0.5	
1754		15.98		6.58	20.52	5.913	40.8	2.77	0.2	1.1	
1758		17.59		6.59	20.59	5.912	46.8	2.81	19.0	1.7	
DRY on 4/30/12											
5/1/12											
1536		10.44	- Sampled @ 15:40 on 5/1/12								

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 6 - 2 4

SITE/PROJECT NAME: Bldg 8 BCP Site 9-32-139

WELL# MW - 8 - 3

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
10/30/12	10/1/12	22	37

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ... DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQIPMENT ... DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP B - PERISTALTIC PUMP	D - GAS LIFT PUMP E - PURGE PUMP	G - BAILER H - WATERRA®	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - STAINLESS STEEL	D - PVC E - POLYETHYLENE		X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - TYGON	D - POLYPROPYLENE E - POLYETHYLENE	F - SILICONE G - COMBINATION TEFLON/POLYPROPYLENE	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - ROPE X- (SPECIFY)			X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	161.506 (m/ft)	GROUNDWATER ELEVATION	160.630 (m/ft)
DEPTH TO WATER	8.76 (m/ft)	WELL DEPTH	22.40 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmS/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmS/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmS/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmS/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmS/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: none TURBIDITY: clear

WEATHER CONDITIONS: WIND SPEED: NA DIRECTION: NA PRECIPITATION Y/N OUTDOOR: NA

SPECIFIC COMMENTS: Interior location

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE CAMP PROTOCOLS

DATE	PRINT	SIGNATURE
5/1/12	Thomas Bohler	Thomas Bohler

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

3785

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 8 BCP Site 9-32-139
Ref. No.: 56546
Date: 4/25/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-8-4 1of2
Measurement Point: TOR
Constructed Well Depth (ft): 21.8'
Measured Well Depth (ft): 21.39'
Depth of Sediment (ft): 0.41'
Screen Length (ft): 14.8-21.8 = 7'
Depth to Pump Intake (ft)[1]: 18'
Well Diameter, D (in): 2
Well Screen Volume, V_s (mL)[2]: 2.40
Initial Depth to Water (ft): 6.67

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
1350	116	7.91	1.24	7.14	13.94	12.8	-46	1.38	1.3	0	
1358	↓	9.58	2.91	7.04	13.77	13.2	-48	0.00	1.5	0.3	
1403	227	10.20	3.53	7.12	13.82	12.2	-48	0.00	1.3	0.4	
1408	↓	10.46	3.79	7.15	13.85	11.9	-48	0.00	0.7	0.5	
1413	↓	10.95	4.28	7.21	13.83	11.8	-49	0.00	1.5	0.8	
1418	103	11.32	4.65	7.20	13.79	11.5	-50	0.08	1.0	1.0	
1423	↓	11.62	4.95	7.18	13.66	11.6	-51	0.10	1.1	1.1	
1428	↓	11.91	5.24	7.16	13.74	11.7	-51	0.05	0.3	1.2	
1433	↓	12.17	5.50	7.13	13.79	11.8	-52	0.00	0.3	1.3	
1438	↓	12.38	5.71	7.11	13.79	12.0	-53	0.00	0.2	1.5	
1446	↓	12.71	6.04	7.08	13.86	12.1	-53	0.00	0.0	1.8	
1454	↓	13.07	6.40	7.06	13.81	12.2	-54	0.00	0.0	2.1	
1503	↓	13.81	7.14	7.05	13.81	12.2	-54	0.00	0.0	2.3	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 8 BRP Site 9-32-139
Ref. No.: 58546
Date: 4/25/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-8-4 2 of 2
Measurement Point: TOR
Constructed Well Depth (ft): 21.8
Measured Well Depth (ft): 21.39
Depth of Sediment (ft): 0.41'
Screen Length (ft): 14.8 - 21.8 = 7'
Depth to Pump Intake (ft)[1]: 17.42'
~~Well~~ Diameter, D (in): 2
~~Well~~ Screen Volume, V_s (~~ml~~)[2]: 2.4 gal
Initial Depth to Water (ft): 6.67

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
1511	103	13.49	6.82	7.02	13.81	12.2	-53	0.00	0.0	2.8	1
1534	505	13.89		7.00	13.91	12.1	-52	0.00	0.0	3.1	
1540	↓	14.85		6.96	13.55	12.2	-46	0.00	0.0	3.9	
1550		15.35		6.96	13.41	12.0	-41	0.00	10.9	4.7	
1558		17.42		7.03	13.65	12.0	-48	0.00	18.5	6.0	
1802		7.65									

Dry

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 6 - 2 4

SITE/PROJECT NAME: Bldg 8 BCP Site 9-32-139

WELL# M W - 8 - 4

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
04 25 12	04 25 12	24	60

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT DEDICATED Y (O) N (CIRCLE ONE)

SAMPLING EQUIPMENT DEDICATED (O) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP B - PERISTALTIC PUMP	D - GAS LIFT PUMP E - PURGE PUMP	G - BAILER H - WATERRAS	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - STAINLESS STEEL	D - PVC E - POLYETHYLENE		X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - VITON	D - POLYPROPYLENE E - POLYETHYLENE	F - SILICONE G - COMBINATION TEFLON/POLYPROPYLENE	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	6 1 3 8 2 (m/ft)	GROUNDWATER ELEVATION	6 0 6 7 5 (m/ft)
DEPTH TO WATER	6 6 7 (m/ft) DR	WELL DEPTH	2 1 8 0 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmho) AT 25°C	(mV)	(%) (mg/L)	(°C)
(std)	(ntu)	(µmho) AT 25°C	(mV)	(%) (mg/L)	(°C)
(std)	(ntu)	(µmho) AT 25°C	(mV)	(%) (mg/L)	(°C)
(std)	(ntu)	(µmho) AT 25°C	(mV)	(%) (mg/L)	(°C)
(std)	(ntu)	(µmho) AT 25°C	(mV)	(%) (mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: Clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED: 0-5 DUSTY?: N PRECIPITATION Y/N COMMENTS: N

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE AUTHORIZATIONS

4/25/12 Thomas Bohler Thomas Bohler

DATE PRINT SIGNATURE

ANY MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 8 BCP Site 9-32-139
Ref. No.: 50346.24

Date: 4/30/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-8-003-B
Measurement Point: TOR
Constructed Well Depth (ft): 15'
Measured Well Depth (ft): 14.36'
Depth of Sediment (ft):

Screen Length (ft):
Depth to Pump Intake (ft)[1]: 12'
Well Diameter, D (in): 2"
Well ~~Screen~~ Volume, V_s ~~(mL)~~[2]: 1.6 gal
Initial Depth to Water (ft): 4.83

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
1314	151	5.02	0.17	7.83	12.40	4.533	159.4	4.81	37.8	0	
1319	454	5.02		7.46	12.03	7.132	176.5	1.68	27.5	0.2	
1324	303	5.02		7.35	12.06	9.705	183.6	1.26	17.3	0.8	
1329	↓	5.02		7.31	12.03	11.11	181.8	1.03	12.2	1.2	
1334		5.02		7.29	12.01	11.92	176.0	0.95	8.8	1.6	
1339		5.02		7.27	11.92	11.97	164.3	0.82	4.1	2.0	
1344		5.02		7.27	11.84	13.26	156.0	0.77	2.9	2.4	
1349		5.02		7.27	11.86	13.58	151.7	0.72	2.3	2.7	
1355	↓	5.02	↓	7.27	11.88	13.62	150.1	0.74	2.2	3.1	

Notes: PID = 2.1 ppm bailer in well

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 6 . 2 4

SITE/PROJECT NAME: Bldg 8 BCP Site 9-32-139 WELL# MW-8-03-B

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
04 30 12	04 30 12	1.6	3.8

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ... DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQUIPMENT ... DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP B - PERISTALTIC PUMP	D - GAS LIFT PUMP F - PURGE PUMP	G - BAILER H - WATERRAS	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - STAINLESS STEEL	D - PVC E - POLYETHYLENE		X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - TYGON	D - POLYPROPYLENE E - POLYETHYLENE	F - SILICONE G - COMBINATION TEFLON/POLYPROPYLENE	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PEPPERSAC	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	6 10.94 (m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	4.85 (m/ft)	WELL DEPTH	14.36 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmhos/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: Clear TURBIDITY: Cloudy → Clear

WEATHER CONDITIONS: WIND SPEED: 0-5 WIND DIR: NW PRECIPITATION Y/N OUTLOOK: light rain

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH THE APPROVED WORK PLAN AND SITE SPECIFIC MODIFICATIONS.

DATE	PRINT	SIGNATURE
4/30/12	Thomas Bohlen	Thomas Bohlen

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM AND APPROVED BY THE PROJECT MANAGER

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: Thomas Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.1
Client Contact: Mr. Christopher Boron	Phone: 716 844-7046	E-Mail: melissa.deyo@testamericainc.com		Page: Page 1 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 8 BCP Site 9-32-139	SSOW#:			

Analysis Requested

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity	Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N		
MW-6-1-042512-0915	4/25/12	915	G	Water			X	X	X	X	X	X	X	X	X	X		
MW-6-2-042512-1130		1130	G	Water														
MW-8-4-042512-1800		1800	G	Water														
MW-6-F-8-042512-1730		1730	G	Water														
DUP			G	Water														
				Water														
Trip Blank				Water														
				Water														
				Water														
				Water														
				Water														

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:		
Relinquished by: Thomas Bohlen	Date/Time: 4/25/12 / 1910	Company GZA	Received by:	Date/Time: 04/25/12 1910	Company TAB Buffalo
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.:

Cooler Temperature(s) °C and Other Remarks:

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page ~~1 of~~ 1
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 8 BCP Site 9-32-139	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N						
MW-8-003-B-043012-1400	4/30/12	1400	G	Water			X	X	X	X	X	X	X	X	X	X					
MW-8-1-043012-1700	↓	1700	G	↓			X	X	X	X	X	X	X	X	X	X					
Trip Blank																					

Possible Hazard Identification
☐ *Non-Hazard* ☐ *Flammable* ☐ *Skin Irritant* ☐ *Poison B* ☐ *Unknown* ☐ *Radiological*

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Thomas Bohlen	4/30/12 / 7:30	GZA			
Relinquished by: Jason Mielnik	Date/Time: 4/30/12 / 19:30	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page ~~1 of~~ 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 8 BCP Site 9-32-139	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N					
MW-8-3-050112-1540	5/1/12	1540	G	Water			X	X	X	X	X	X	X	X	X	X				20	
Trip Blank																					

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:		Date:		Time:		Method of Shipment:	
Relinquished by: Thomas Bohlen	Date/Time: 5/1/12 / 17:17	Company	Received by:	Date/Time: 5-1-12 17:17	Company BCE		
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company		
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company		

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks: 4.2 #

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 4 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 8 BCP Site 9-30-139	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity	Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N		
MW-8-2-050312-~~1830~~ 1830	050312	1830	G	Water			X	X	X	X	X	X	X	X	X	X	12	
Trip Blank																		

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
1	Thomas Bohlen	5/3/12 /				
2	[illegible]	5/3/12 19:45				
3						

Custody Seals Intact:	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:
Δ Yes Δ No		

Form FMG 8.0-01

INSTRUMENT CALIBRATION RECORD

PROJECT	Bldg 8 BCP Site 9-32-139	PROJECT MANAGER	C. Boron
LOCATION	Lockport, NY	FIELD REP.	T. Bohlen
CLIENT		DATE	4/25/12 -

Instrument	Date Calibrated	By	Standard Used	Decontamination, Maintenance, or Repair Performed	Remarks
Horiba U-52	4/25/12	TB	Cal Solution	Cleaning & Calibration	OK
Mini Rae 3000 PID	"	"	Isobutylene Gas	Calibration	OK
"	4/27/12	"	"	"	OK
YSI	"	"	Cal Solutions	Cleaning & Calibration	OK
Mini Rae 3000 PID	4/30/12	"	Cal Gas	Cal.	OK
YSI	"	"	Cal Solutions	Cleaning & Cal	OK
Mini Rae 3000 PID	5/3/12	"	Cal Gas	Cal.	OK
YSI	"	"	Cal Sol.	Cal.	OK

Other Remarks:

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

INSTRUMENT CALIBRATION REPORT

Pine Environmental Services, Inc.

1900 Brewerton Road
Mattydale, NY 13211
Toll-free: (877) 903-PINE (7463)

Pine Environmental Services, Inc.

Instrument ID 5781
Description YSI 6920
Calibrated 4/25/2012

Manufacturer YSI
Model Number 6920
Serial Number/ Lot Number 04E8620AA
Location New York
Department

State Certified
Status Pass
Temp °C 19.3
Humidity % 41

Calibration Specifications

Group # 1
Group Name PH
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
7.00 / 7.00	PH	7.00	PH	7.00	7.00	0.00%	Pass
4.00 / 4.00	PH	4.00	PH	4.00	4.00	0.00%	Pass
10.00 / 10.00	PH	10.00	PH	9.94	9.98	-0.20%	Pass

Group # 2
Group Name Turbidity
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
0.00 / 0.00	NTU	0.00	NTU	0.00	0.00	0.00%	Pass
126.00 / 126.00	NTU	126.00	NTU	126.00	126.00	0.00%	Pass

Group # 3
Group Name Conductivity
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.000

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
1.413 / 1.413	ms/cm	1.413	ms/cm	1.413	1.413	0.00%	Pass

Group # 4
Group Name Redox (ORP)
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
240.00 / 240.00	mv	240.00	mv	240.00	240.00	0.00%	Pass

Group # 5
Group Name Disolved Oxygen Span
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail

INSTRUMENT CALIBRATION REPORT

Pine Environmental Services, Inc.
1900 Brewerton Road
Mattydale, NY 13211
Toll-free: (877) 903-PINE (7463)

Pine Environmental Services, Inc.

Instrument ID 5781
Description YSI 6920
Calibrated 4/25/2012

Group # 5
Group Name Disolved Oxygen Span
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
100.00 / 100.00	%	100.00	%	100.00	100.00	0.00%	Pass

Group # 6
Group Name Disolved Oxygen Zero
Test Performed: No **As Found Result: Not Entered** **As Left Result: Not Entered**

Test Instruments Used During the Calibration **(As Of Cal Entry Date)**

Test Standard ID	Description	Manufacturer	Model Number	Serial Number / Lot Number	Last Cal Date/ Opened Date	Next Cal Date / Expiration Date
NY COND 1.413 9084	NY COND 1.413	Aurical	SL20014-5G	9084		7/12/2012
NY ORP 240 MV 2981	NY ORP 240 mV	Hanna	SL50005-500	2981		1/31/2016
NY PH 10 2101326	NY PH 10	VWR	SL10010-5G	2101326		7/31/2012
NY PH 4	NY PH 4	VWR	SL10004-5G	2010169		9/30/2012
NY PH 7	NY PH 7	VWR	SL1007-5G	2011038		10/31/2012

Notes about this calibration

Calibration Result Calibration Successful
Who Calibrated Joe Filippi

All instruments are calibrated by Pine Environmental Services, Inc. according to the manufacturer's specifications, but it is the customer's responsibility to calibrate and maintain this unit in accordance with the manufacturer's specifications and/or the customer's own specific needs.

Notify Pine Environmental Services, Inc. of any defect within 24 hours of receipt of equipment
Please call 866-960-7463 for Technical Assistance

INSTRUMENT CALIBRATION REPORT

Pine Environmental Services, Inc.

2225 Tomlynn Street
Richmond, Va. 23230
Toll-free: (866) 801-PINE (7463)

Pine Environmental Services, Inc.

Instrument ID 15020
Description MiniRae 3000
Calibrated 4/23/2012

Manufacturer Rae Systems
Model Number PGM-7320
Serial Number/ Lot Number 592-902204
Location Virginia
Department

State Certified
Status Pass
Temp °C 18
Humidity % 34

Calibration Specifications

Group # 1
Group Name Isobutylene
Stated Accy Pct of Reading

Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
100.00 / 100.00	PPM	100.00	PPM	100.00	100.00	0.00%	Pass

Test Instruments Used During the Calibration (As Of Cal Entry Date)

Test Standard ID	Description	Manufacturer	Model Number	Serial Number / Lot Number	Last Cal Date/ Opened Date	Next Cal Date / Expiration Date
NY ISO 100 LOT# 0319FD12	NY ISO 100	American Gas Group	GP11015	0319FD12		4/30/2016

Notes about this calibration

Calibration Result Calibration Successful
Who Calibrated Timothy Walsh

All instruments are calibrated by Pine Environmental Services, Inc. according to the manufacturer's specifications, but it is the customer's responsibility to calibrate and maintain this unit in accordance with the manufacturer's specifications and/or the customer's own specific needs.

Notify Pine Environmental Services, Inc. of any defect within 24 hours of receipt of equipment
Please call 866-960-7463 for Technical Assistance

SAMPLE COLLECTION DATA SHEET - GROUNDWATER SAMPLING PROGRAM

PROJECT NAME: Bldg 10 BCP Site 9-32-140 — PROJECT NO.: 56546.24

SAMPLING CREW MEMBERS: T. Bohlen — SUPERVISOR: C. Boron

DATE OF SAMPLE COLLECTION: 5/2/12 - 5/3/12

[Note: For 2" dia. well, 1 ft. = 0.14 gal (imp) or 0.16 gal (us)]

Sample I.D. Number	Well No.	Measuring Point Elev. (ft. AMSL)	Bottom Depth (ft. btoc)	Water Depth (ft. btoc)	Water Elevation (ft. AMSL)	Well Volume (gallons)	Bailer Volume No. Bails	Volume Purged (gallons)	Field pH	Field Temp.	Field Cond.	Time	Sample Description & Analysis
MW-10-2-050212-1200	MW-10-2	610.96	16.09	2.74	608.22	13.35' / 2.2		4.2	6.41	13.05	9.288	1158	MW-10-2 GW
MW-10-3 050212-1400	MW-10-3	610.40	15.40	2.81	607.59	12.59' / 2.1		4.2	6.81	11.09	0.729	1352	MW-10-3 GW
BLDG-10-MW1 050212-1620	BLDG-10-MW-1	615.05	15.58	5.85	609.20	9.73' / 1.6		2.2	6.55	19.73	1.953	1618	BLDG-10-MW1 GW
MW-9-101-A 050312-1215	MW-9-101A	615.00	12.54	5.12	609.88	7.42 / 1.2		1.7	5.82	14.10	6.043	1210	MW-9-101-A GW

Additional Comments:

Copies to:

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Alda ID BCP Site 9-32-140
Ref. No.: 56546.26

Date: 5/3/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-9-101-A
Measurement Point: TOR
Constructed Well Depth (ft): 12.54
Measured Well Depth (ft): 9.22 - possible bailer in well
Depth of Sediment (ft): -

Screen Length (ft): 5
Depth to Pump Intake (ft)[1]: 8'
Well Diameter, D (in): 2
Well ~~Screen~~ Volume, V_s ~~(mL)~~ 991 [2]: 1.2
Initial Depth to Water (ft): 5.12

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL) 991	No. of Well Screen Volumes Purged[4]
1140	151	5.20	0.08	6.57	15.22	6.280	146.3	8.63	0.0	0	
1145	↓	5.20		6.22	14.31	6.255	216.4	7.04	0.0	0.2	
1150	76	5.20		6.07	14.32	6.250	274.8	6.95	0.0	0.3	
1155	↓	5.20		5.94	13.99	6.259	320.8	7.00	0.0	0.4	
1200	303	5.20		5.89	14.09	6.243	350.9	6.95	0.0	0.8	
1205	151	5.20		5.87	14.10	6.240	351.1	6.93	0.0	1.0	
1210	↓	5.20	↓	5.82	14.10	6.243	351.5	6.90	0.0	1.2	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = \pi * (D/2)^2 * (5*12) * (2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= V_p/V_s

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 6 - 2 4

SITE/PROJECT NAME: Bldg 10 BCT Site 9-32-140

WELL# MW-9-101-A

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
05/03/12	05/03/12	12	17

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ..... DEDICATED: Y (CIRCLE ONE)

SAMPLING EQIPMENT ..... DEDICATED: (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP B - PERISTALTIC PUMP C - BLADDER PUMP	D - GAS LIFT PUMP E - PURGE PUMP F - DIPPER BOTTLE	G - BAILER H - WATERRA®	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B				X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - STAINLESS STEEL C - POLYPROPYLENE	D - PVC E - POLYETHYLENE		X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E				X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - TYGON C - ROPE	D - POLYPROPYLENE E - POLYETHYLENE	F - SILICONE G - COMBINATION TEFLON/ POLYPROPYLENE	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	X- (SPECIFY)			X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	(m/ ft)	GROUNDWATER ELEVATION	(m/ ft)
DEPTH TO WATER 5 1 2	(m/ ft)	WELL DEPTH 1 2 5 4	(m/ ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: Clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED 0-5 DIRECTION: SW PRECIPITATION Y/N OUTLOOK: PM showers / + storms forecasted

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE CM PROTOCOLS

5/3/12 DATE

Thomas Bohlen PRINT

Thomas Bohlen SIGNATURE

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 10 RCP Site 9-32-140
Ref. No.: 56346.24

Date: 5/2/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: BLDG-10-MW-1
Measurement Point: TOR
Constructed Well Depth (ft): 16.0'
Measured Well Depth (ft): 15.58'
Depth of Sediment (ft):

Screen Length (ft): 11'-16' = 5'
Depth to Pump Intake (ft)[1]: 13'
Well Diameter, D (in): 2"
Well ~~Screen~~ Volume, V_s ~~(mL)~~ gal.[2]: 1.6
Initial Depth to Water (ft): 5.85

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
1518	151	6.63	0.48	6.60	19.83	2.000	-0.2	3.75	6.5	0	
1523	76	7.05	1.20	6.53	19.75	1.974	-16.3	3.01	10.4	0.2	
1528	227	7.09	1.24	6.54	19.74	1.969	-19.4	3.20	7.8	0.3	
1533	151	7.09	1.24	6.56	19.74	1.958	-20.3	3.30	4.0	0.6	
1538	↓	7.09	1.24	6.56	19.73	1.955	-20.5	3.29	3.9	0.8	
1543		7.09	1.24	6.56	19.73	1.951	-20.0	3.25	2.7	1.0	
1548		7.09	1.24	6.56	19.74	1.955	-20.7	3.23	2.1	1.2	
1553		7.09	1.24	6.56	19.74	1.953	-21.1	3.22	1.2	1.3	
1558		7.09	1.24	6.55	19.73	1.952	-21.3	3.19	1.0	1.4	
1603		7.09	1.24	6.55	19.76	1.952	-21.4	3.15	0.4	1.5	
1608		7.09	1.24	6.55	19.73	1.953	-21.7	3.16	0.2	1.7	1
1613		7.09	1.24	6.55	19.72	1.952	-21.8	3.16	0.3	1.9	
1618		7.09	1.24	6.55	19.73	1.953	-21.7	3.16	0.1	2.1	

PID Background = 1.1 ppm PID TOR = 598 ppm peak

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= V_p/V_s

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 6 - 0 4

SITE/PROJECT NAME: Bldg 10 BCP Site 9-32-140 WELL# BLDG-10-MW-1

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES/GALLONS)	ACTUAL VOLUME PURGED (LITRES/GALLONS)
05 02 12	05 02 12	1.6	2.2

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ... DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQUIPMENT ... DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP	D - GAS LIFT PUMP	G - BAILER	X- PURGING OTHER (SPECIFY)
		B - PERISTALTIC PUMP	F - PURGE PUMP	H - WATERRA®	
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - PVC		X- PURGING OTHER (SPECIFY)
		B - STAINLESS STEEL	E - POLYETHYLENE		
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - POLYPROPYLENE	F - SILICONE	X- PURGING OTHER (SPECIFY)
		B - TYGON	E - POLYETHYLENE	G - COMBINATION TEFLON/POLYPROPYLENE	
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	615.50 (m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	5.85 (m/ft)	WELL DEPTH	16.0 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: Chemical COLOR: Clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED: NA DIRECTION: NA PRECIPITATION Y/N OUTLOOK: NA

SPECIFIC COMMENTS: - Interior location

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE CAP PROTOCOLS

5/2/12 DATE | Thomas Bohlen PRINT | Thomas Bohlen SIGNATURE

EMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 10 BCP Site 9-32-140
Ref. No.: 56546.24

Date: 5/2/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-10-2 1of2
Measurement Point: TOR
Constructed Well Depth (ft): 16.80
Measured Well Depth (ft): 16.09
Depth of Sediment (ft): 0.71

Screen Length (ft): 9.8' - 16.8' = 7.0'
Depth to Pump Intake (ft)[1]: 14'
Well Diameter, D (in): 2"
Well ~~Screen~~ Volume, V_s (~~mL~~)[2]: 2.2 gal
Initial Depth to Water (ft): 2.74'

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (~~mL~~) gal	No. of Well Screen Volumes Purged[4]
1044	76	3.97	1.23	8.38	12.46	10.78	96.3	5.00	15.1	0	
1049	↓	4.71	1.97	7.77	12.94	10.46	-42.8	2.20	9.1	0.1	
1054	↓	5.82	3.08	7.77	12.54	7.961	-46.3	3.14	24.8	0.2	
1059	303	7.85	5.11	8.64	12.23	6.478	-0.9	5.52	22.0	0.9	
1104	↓	9.55	6.81	8.96	12.23	5.932	44.9	7.14	16.3	1.3	
1109	227	9.75	7.01	8.69	12.88	6.119	91.8	6.65	17.4	1.6	
1114	151	9.75	7.01	8.35	13.13	6.581	130.6	6.74	15.8	1.8	
1119	↓	9.75	7.01	7.82	13.12	7.435	171.3	5.69	15.8	2.1	
1124		9.75	7.01	7.23	13.13	8.178	205.6	4.88	14.3	2.3	1
1129		9.75	7.01	6.83	13.15	8.726	231.0	3.73	10.6	2.5	
1134		9.75	7.01	6.67	13.18	8.958	236.9	3.06	23.6	2.7	
1139		9.75	7.01	6.56	12.97	9.104	248.4	2.88	26.9	3.0	
1144	↓	9.75	7.01	6.51	13.15	9.195	248.0	2.54	14.1	3.2	

inc. pump rate

dec. pump rate

PID = 0.0 ppm

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = \pi * (D/2)^2 * (5 * 12) * (2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stabilizing). No. of Well Screen Volumes Purged= $V_p : V_s$

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 10 BCP Site 9-32-140
Ref No.: 56546.24

Date: 5/2/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-10-2 2 of 2
Measurement Point: TOR
Constructed Well Depth (ft): 16.80
Measured Well Depth (ft): 16.09
Depth of Sediment (ft): 0.71

Screen Length (ft): 7'
Depth to Pump Intake (ft)[1]: 14'
Well Diameter, D (in): 2"
Well ~~Screen~~ Volume, V_s ~~(mL)~~[2]: 2.2 gal
Initial Depth to Water (ft): 2.74

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, V_p (mL)	No. of Well Screen Volumes Purged[4]
1149	151	9.75	7.01	6.45	13.07	9.242	228.9	2.26	2.0	3.4	
1154	↓	9.75	7.01	6.44	13.07	9.284	225.4	2.21	2.2	3.6	
1158	↓	9.75	7.01	6.41	13.05	9.288	221.4	2.13	2.5	3.8	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= V_p/V_s

EMR MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

WELL PURGING FIELD INFORMATION FORM

JOB# 5 6 5 4 6 - 2 4

SITE/PROJECT NAME: Bldg 10 BCP Site 9-32-140 WELL# MW-10-2

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES / GALLONS)	ACTUAL VOLUME PURGED (LITRES / GALLONS)
05/02/12	05/02/12	22	42

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT DEDICATED Y (Ø) (CIRCLE ONE)

SAMPLING EQUIPMENT DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP B - PERISTALTIC PUMP	D - GAS LIFT PUMP E - PURGE PUMP	G - BAILER H - WATERRA®	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - STAINLESS STEEL	D - PVC E - POLYETHYLENE		X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON B - TYGON	D - POLYPROPYLENE E - POLYETHYLENE	F - SILICONE G - COMBINATION TEFLON/POLYPROPYLENE	X- PURGING OTHER (SPECIFY)
SAMPLING DEVICE	E	C - ROPE X- (SPECIFY)			X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	61.26 (m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	27.4 (m/ft)	WELL DEPTH	168.0 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: Clear TURBIDITY: Clear

WEATHER CONDITIONS: WIND SPEED: 0-5 DIRECTION: SW PRECIPITATION Y/N OUTLOOK: overcast

SPECIFIC COMMENTS

purge H2O initially brown

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE FMG PROTOCOLS

DATE	PRINT	SIGNATURE
5/2/12	Thomas Bohlen	Thomas Bohlen

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

MONITORING WELL RECORD FOR LOW-FLOW PURGING

Project Data:

Project Name: Bldg 10 BCP Site 9-32-140
Ref. No.: 56-546.04

Date: 5/2/12
Personnel: T. Bohlen

Monitoring Well Data:

Well No.: MW-10-3
Measurement Point: TOR
Constructed Well Depth (ft): 15.80
Measured Well Depth (ft): 15.40
Depth of Sediment (ft): 0.4

Screen Length (ft): 8.8' - 15.8' = 7.0'
Depth to Pump Intake (ft)[1]: 13'
Well Diameter, D (in): 2"
Well Screen Volume, V_s (mL)[2]: 1.1 gal
Initial Depth to Water (ft): 2.85

Time	Pumping Rate (mL/min)	Depth to Water (ft)	Drawdown from Initial Water Level[3] (ft)	pH	Temperature °C	Conductivity (mS/cm)	ORP (mV)	DO (mg/L)	Turbidity (NTU)	Volume Purged, Vp (mL)	No. of Well Screen Volumes Purged[4]
1302	227	4.08	1.22	7.20	11.62	1.085	157.0	8.21	1.0	0	
1307	76	5.25	2.44	6.63	10.80	1.065	207.4	6.92	0.0	0.3	
1312	↓	5.25	2.44	6.58	11.09	1.065	271.2	6.66	0.0	0.4	
1317	227	5.25	2.44	6.55	11.18	1.033	286.5	6.56	0.0	0.8	
1322		5.25	2.44	6.53	11.24	0.955	313.6	6.33	0.0	1.1	
1327		5.25	2.44	6.66	11.04	0.835	328.4	7.20	0.7	1.3	
1332		5.25	2.44	6.66	11.13	0.817	331.8	6.91	1.3	1.5	
1337		5.25	2.44	6.69	11.05	0.766	337.8	7.19	0.0	1.8	
1342		5.25	2.44	6.74	11.14	0.738	338.1	7.72	1.2	2.1	1
1347		5.25	2.44	6.79	11.10	0.732	340.1	7.68	1.3	2.3	
1352	↓	5.25	2.44	6.81	11.09	0.729	340.4	7.67	1.3	2.5	

Notes:

(1) The pump intake will be placed at the well screen mid-point or at a minimum of 2 ft above any sediment accumulated at the well bottom.

(2) The well screen volume will be based on a 5-foot screen length. $V_s = p*(D/2)^2*(5*12)*(2.54)^3$

(3) The drawdown from the initial water level should not exceed 0.3 ft.

(4) Purging will continue until stabilization is achieved or until 20 well screen volumes have been purged (unless purge water remains visually turbid and appears to be clearing, or unless stabilization parameters are varying slightly outside of the stablization criteria and appear to be stablizing). No. of Well Screen Volumes Purged= Vp/Vs.

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

WELL PURGING FIELD INFORMATION FORM

JOB# 565416 - 24

SITE/PROJECT NAME: Bldg 10 BCP Site

WELL# MW-10-3

WELL PURGING INFORMATION

PURGE DATE (MM DD YY)	SAMPLE DATE (MM DD YY)	WATER VOL IN CASING (LITRES / GALLONS)	ACTUAL VOLUME PURGED (LITRES / GALLONS)
05 02 12	05 02 12	2.1	4.2

PURGING AND SAMPLING EQUIPMENT

PURGING EQUIPMENT ... DEDICATED Y (N) (CIRCLE ONE)

SAMPLING EQUIPMENT ... DEDICATED (Y) N (CIRCLE ONE)

PURGING DEVICE	B	A - SUBMERSIBLE PUMP	D - GAS LIFT PUMP	G - BAILER	X- PURGING OTHER (SPECIFY)
		B - PERISTALTIC PUMP	E - PURGE PUMP	H - WATERRA®	
SAMPLING DEVICE	B	C - BLADDER PUMP	F - DIPPER BOTTLE		X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - PVC		X- PURGING OTHER (SPECIFY)
		B - STAINLESS STEEL	E - POLYETHYLENE		
SAMPLING DEVICE	E	C - POLYPROPYLENE			X- SAMPLING OTHER (SPECIFY)
PURGING DEVICE	E	A - TEFLON	D - POLYPROPYLENE	F - SILICONE	X- PURGING OTHER (SPECIFY)
		B - TYGON	E - POLYETHYLENE	G - COMBINATION TEFLON/POLYPROPYLENE	
SAMPLING DEVICE	E	C - ROPE	X- (SPECIFY)		X- SAMPLING OTHER (SPECIFY)
FILTERING DEVICES 0.45		A - IN-LINE DISPOSABLE	B - PRESSURE	C - VACUUM	

FIELD MEASUREMENTS

WELL ELEVATION	610.71 (m/ft)	GROUNDWATER ELEVATION	(m/ft)
DEPTH TO WATER	2.81 (m/ft)	WELL DEPTH	15.80 (m/ft)

pH	TURBIDITY	CONDUCTIVITY	ORP	DO	SAMPLE TEMPERATURE
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)
(std)	(ntu)	(µmho/cm) AT 25°C	(mV)	(mg/L)	(°C)

FIELD COMMENTS

SAMPLE APPEARANCE: Good ODOR: none COLOR: clear TURBIDITY: clear

WEATHER CONDITIONS: WIND SPEED: 0-5 DIRECTION: SW PRECIPITATION Y/N OUTLOOK: p. cloudy

SPECIFIC COMMENTS:

I CERTIFY THAT SAMPLING PROCEDURES WERE IN ACCORDANCE WITH APPLICABLE SMP PROTOCOLS

DATE	PRINT	SIGNATURE
5/2/12	Thomas Bohlen	Thomas Bohlen

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 4 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 10 BCP Site 9-32-140	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N						
MW-10-2-050212-1200	5/2/12	1200	G	Water			X	X	X	X	X	X	X	X	X	X					20	
MW-10-3-050212-1400	↓	1400	↓	↓			↓	↓	↓	↓	↓	↓	↓	↓	↓	↓					↓	
BLDG-10-MW-1-050212-1620	↓	1620	↓	↓			↓	↓	↓	↓	↓	↓	↓	↓	↓	↓					↓	
Trip Blank																						

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Thomas Bohlen	5/2/12 / 1800	GZA	Zachary J Robison	5/2/12 1800	BUF
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716-685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 4 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:

Address: 535 Washington Street 11th Floor	Due Date Requested:
City: Buffalo	TAT Requested (days):
State, Zip: NY, 14203	
Phone:	PO #: 4047065
Email: christopher.boron@gza.com	WO #: 58507
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014
Site: Bldg 10 BCP Site 9-32-140	SSOW#:

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2SO3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - ph 4-5, Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2; 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity	Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N		
MW-9-101-A-050312-1215	5/3/12	1215	G	Water			Y	X	X	X	X	X	X	X	X	X	20	
Trip Blank																		

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by: Thomas Bohlen	Date/Time: 5/3/12	Company	Received by:	Date/Time:	Company
Relinquished by: Jean Nolan	Date/Time: 5/3/12 19:45	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Form FMG 8.0-01

INSTRUMENT CALIBRATION RECORD

PROJECT: Bldg 10 BCP Site 9-32-140
PROJECT MANAGER: L. Boron
LOCATION: Lockport, NY
FIELD REP.: T. Bohlen
CLIENT:
DATE: 5/2/12-

Instrument	Date Calibrated	By	Standard Used	Decontamination, Maintenance, or Repair Performed	Remarks
Mini Rae 3000 PID	5/2/12	TB	Cal Gas	Cal.	OK
YSI	"	"	Cal Solutions	Cleaning & Cal	OK
Mini Rae 3000 PID	"	TB	Cal Gal	Cal	OK
YSI	"	"	Cal Solutions	Cleaning & Cal	OK
Mini Rae 3000 PID	5/3/12	"	Cal Gas	Cal	OK
YSI	"	"	Cal Sol	Cleaning & Cal	OK

Other Remarks:

FMG MODIFICATIONS MUST BE ACCOMPANIED BY A REVISION REQUEST FORM APPROVED BY THE PROJECT MANAGER

INSTRUMENT CALIBRATION REPORT

Pine Environmental Services, Inc.

1900 Brewerton Road
Mattydale, NY 13211
Toll-free: (877) 903-PINE (7463)

Pine Environmental Services, Inc.

Instrument ID 5781
Description YSI 6920
Calibrated 4/25/2012

Manufacturer YSI
Model Number 6920
Serial Number/ Lot Number 04E8620AA
Location New York
Department

State Certified
Status Pass
Temp °C 19.3
Humidity % 41

Calibration Specifications

Group # 1
Group Name PH
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
7.00 / 7.00	PH	7.00	PH	7.00	7.00	0.00%	Pass
4.00 / 4.00	PH	4.00	PH	4.00	4.00	0.00%	Pass
10.00 / 10.00	PH	10.00	PH	9.94	9.98	-0.20%	Pass

Group # 2
Group Name Turbidity
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
0.00 / 0.00	NTU	0.00	NTU	0.00	0.00	0.00%	Pass
126.00 / 126.00	NTU	126.00	NTU	126.00	126.00	0.00%	Pass

Group # 3
Group Name Conductivity
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.000

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
1.413 / 1.413	ms/cm	1.413	ms/cm	1.413	1.413	0.00%	Pass

Group # 4
Group Name Redox (ORP)
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
240.00 / 240.00	mv	240.00	mv	240.00	240.00	0.00%	Pass

Group # 5
Group Name Disolved Oxygen Span
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail

INSTRUMENT CALIBRATION REPORT

Pine Environmental Services, Inc.
1900 Brewerton Road
Mattydale, NY 13211
Toll-free: (877) 903-PINE (7463)

Pine Environmental Services, Inc.

Instrument ID 5781
Description YSI 6920
Calibrated 4/25/2012

Group # 5
Group Name Disolved Oxygen Span
Stated Accy Pct of Reading
Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
100.00 / 100.00	%	100.00	%	100.00	100.00	0.00%	Pass

Group # 6
Group Name Disolved Oxygen Zero
Test Performed: No **As Found Result: Not Entered** **As Left Result: Not Entered**

Test Instruments Used During the Calibration **(As Of Cal Entry Date)**

Test Standard ID	Description	Manufacturer	Model Number	Serial Number / Lot Number	Last Cal Date/ Opened Date	Next Cal Date / Expiration Date
NY COND 1.413 9084	NY COND 1.413	Aurical	SL20014-5G	9084		7/12/2012
NY ORP 240 MV 2981	NY ORP 240 mV	Hanna	SL50005-500	2981		1/31/2016
NY PH 10 2101326	NY PH 10	VWR	SL10010-5G	2101326		7/31/2012
NY PH 4	NY PH 4	VWR	SL10004-5G	2010169		9/30/2012
NY PH 7	NY PH 7	VWR	SL1007-5G	2011038		10/31/2012

Notes about this calibration

Calibration Result Calibration Successful
Who Calibrated Joe Filippi

All instruments are calibrated by Pine Environmental Services, Inc. according to the manufacturer's specifications, but it is the customer's responsibility to calibrate and maintain this unit in accordance with the manufacturer's specifications and/or the customer's own specific needs.

Notify Pine Environmental Services, Inc. of any defect within 24 hours of receipt of equipment
Please call 866-960-7463 for Technical Assistance

INSTRUMENT CALIBRATION REPORT

Pine Environmental Services, Inc.

2225 Tomlynn Street
Richmond, Va. 23230
Toll-free: (866) 801-PINE (7463)

Pine Environmental Services, Inc.

Instrument ID 15020
Description MiniRae 3000
Calibrated 4/23/2012

Manufacturer Rae Systems
Model Number PGM-7320
Serial Number/ Lot Number 592-902204
Location Virginia
Department

State Certified
Status Pass
Temp °C 18
Humidity % 34

Calibration Specifications

Group # 1
Group Name Isobutylene
Stated Accy Pct of Reading

Range Acc % 0.0000
Reading Acc % 3.0000
Plus/Minus 0.00

Nom In Val / In Val	In Type	Out Val	Out Type	Fnd As	Lft As	Dev%	Pass/Fail
100.00 / 100.00	PPM	100.00	PPM	100.00	100.00	0.00%	Pass

Test Instruments Used During the Calibration (As Of Cal Entry Date)

Test Standard ID	Description	Manufacturer	Model Number	Serial Number / Lot Number	Last Cal Date/ Opened Date	Next Cal Date / Expiration Date
NY ISO 100 LOT# 0319FD12	NY ISO 100	American Gas Group	GP11015	0319FD12		4/30/2016

Notes about this calibration

Calibration Result Calibration Successful
Who Calibrated Timothy Walsh

All instruments are calibrated by Pine Environmental Services, Inc. according to the manufacturer's specifications, but it is the customer's responsibility to calibrate and maintain this unit in accordance with the manufacturer's specifications and/or the customer's own specific needs.

Notify Pine Environmental Services, Inc. of any defect within 24 hours of receipt of equipment
Please call 866-960-7463 for Technical Assistance

APPENDIX B

PREVIOUS SAMPLING EVENT ANALYTICAL RESULTS

TABLE 3

ANALYTICAL RESULTS SUMMARY
BCP INVESTIGATIONS, BUILDING 7 GROUNDWATER
GM-LOCKPORT
LOCKPORT, NEW YORK
APRIL 2011

	Location ID:	*MW-7-1*	*MW-7-2*	*MW-7-3*	*MW-7-4*	*MW-7-5*
	Sample Name:	*MW-7-1-042711-1235*	*MW-7-2-042711-1410*	*MW-7-3-042711-1049*	*MW-7-4-042711-1550*	*DUP-042811-001*
	Sample Date:	*4/27/2011*	*4/27/2011*	*4/27/2011*	*4/27/2011*	*4/28/2011*
						(Duplicate)
Parameters						
Volatile Organic Compounds	*Units*					
cis-1,2-Dichloroethene	µg/L	1.0 U	1.0 U	8.6	1.0 U	640
Tetrachloroethene	µg/L	1.0 U	1.0 U	1.0 U	1.0 U	8800
trans-1,2-Dichloroethene	µg/L	1.0 U	1.0 U	1.0 U	1.0 U	200 U
Trichloroethene	µg/L	1.0 U	1.0 U	1.0 U	1.0 U	870
Vinyl chloride	µg/L	1.0 U	1.0 U	46	1.0 U	200 U

TABLE 3

ANALYTICAL RESULTS SUMMARY
BCP INVESTIGATIONS, BUILDING 7 GROUNDWATER
GM-LOCKPORT
LOCKPORT, NEW YORK
APRIL 2011

	Location ID:	***MW-7-5***	***MW-7-6***	***MW-7-7***	***MW-7-8***
	Sample Name:	***MW-7-5-042811-1040***	***MW-7-6-042711-1500***	***MW-7-7-042811-1505***	***MW-7-8-042811-1035***
	Sample Date:	***4/28/2011***	***4/27/2011***	***4/28/2011***	***4/28/2011***
Parameters					
Volatile Organic Compounds	***Units***				
cis-1,2-Dichloroethene	µg/L	680	350	200 U	29
Tetrachloroethene	µg/L	8900	470	26000	290
trans-1,2-Dichloroethene	µg/L	7.4	2.7	200 U	4.0 U
Trichloroethene	µg/L	890	240	200 U	100
Vinyl chloride	µg/L	5.8	35	200 U	4.0 U

TABLE 3

ANALYTICAL RESULTS SUMMARY
BCP INVESTIGATIONS, BUILDING 7 GROUNDWATER
GM-LOCKPORT
LOCKPORT, NEW YORK
APRIL 2011

	Location ID:	*MW-7-A-6*	*MW-7-C-2*	*MW-7-P-1*
	Sample Name:	*MW-7-A-6-042811-1235*	*MW-7-G2-042911-1610*	*MW-7-P-1-042811-1340*
	Sample Date:	*4/28/2011*	*4/29/2011*	*4/28/2011*
Parameters				
Volatile Organic Compounds	*Units*			
cis-1,2-Dichloroethene	µg/L	16000	230	6.2
Tetrachloroethene	µg/L	140000	1.0 U	0.57 J
trans-1,2-Dichloroethene	µg/L	2000 U	1.0 U	4.9
Trichloroethene	µg/L	19000	1.0 U	2.1
Vinyl chloride	µg/L	2000 U	12	27

Notes:

J - Estimated.
U - Not detected.

TABLE 3

ANALYTICAL RESULTS SUMMARY
BCP INVESTIGATIONS, BUILDING 8 GROUNDWATER
GM-LOCKPORT, NEW YORK
APRIL 2011

Location ID:		*MW-6-1*	*MW-6-2*	*MW-6-F-8*	*MW-8-1*	*MW-8-2*	*MW-8-3*	*MW-8-3*	*MW-8-003-B*	*MW-8-4*
Sample Name:		*MW-6-1-042711-0945*	*MW-6-2-042711-1145*	*MW-6-F-8-042711-1320*	*MW-8-1-042911-0915*	*MW-8-2-042911-1130*	*DUP-050211-001*	*MW-8-3-050211-1245*	*MW-8-003-B-042811-1515*	*MW-8-4-050211-1330*
Sample Date:		*4/27/2011*	*4/27/2011*	*4/27/2011*	*4/29/2011*	*4/29/2011*	*5/2/2011*	*5/2/2011*	*4/28/2011*	*5/2/2011*
							(Duplicate)			
Volatile Organic Compounds	*Units*									
cis-1,2-Dichloroethene	µg/L	1.0 U	1.0 U	1.0 U	0.86 J	9300	5.0	4.3	190	68
Tetrachloroethene	µg/L	1.0 U	1.0 U	1.0 U	1.0 U	40 U	1.9	1.7	300	1.0 U
trans-1,2-Dichloroethene	µg/L	1.0 U	1.0 U	1.0 U	1.0 U	40 U	1.0 U	1.0 U	5.0 U	1.0 U
Trichloroethene	µg/L	1.0 U	1.0 U	1.0 U	1.0 U	660	9.3	6.0	110	12
Vinyl chloride	µg/L	1.0 U	1.0 U	1.0 U	1.0 U	270	1.0 U	1.0 U	19	17

Notes:
J = Estimated.
U = Not detected.

TABLE 3

ANALYTICAL RESULTS SUMMARY
BCP INVESTIGATIONS, BUILDING 10 GROUNDWATER
GM-LOCKPORT, NEW YORK
APRIL 2011

Location ID:		*Bldg10*	*MW-9-101-A*	*MW-10-2*	*MW-10-3*	*MW-10-3*
Sample Name:		*BLDG-10-MW-1-042911-1640*	*MW-9-101-A-042911-0900*	*MW-10-2-042911-1400*	*DUP-042911-001*	*MW-10-3-042911-1100*
Sample Date:		*4/29/2011*	*4/29/2011*	*4/29/2011*	*4/29/2011 (Duplicate)*	*4/29/2011*
Volatile Organic Compounds	*Units*					
cis-1,2-Dichloroethene	µg/L	2000 U	4.0 U	1100	11	11
Tetrachloroethene	µg/L	120000	4.0 U	1100	13	13
trans-1,2-Dichloroethene	µg/L	16	4.0 U	10	1.0 U	1.0 U
Trichloroethene	µg/L	2800	4.0 U	1200	6.0	5.8
Vinyl chloride	µg/L	100	4.0 U	66	1.0 U	1.0 U

Notes:
U = Not detected.

TABLE 4
SUMMARY OF GROUND WATER INVESTIGATION ANALYTICAL RESULTS
ALL GROUND WATER DATA
DELPHI CORPORATION - WEST LOCKPORT COMPLEX, LOCKPORT, NY
ERM PROJECT NUMBER 0056607

	SAMPLE DESIGNATION									NYSDEC Ambient Water Quality Standards and Guidance Values TOGS 1.1.1 (µg/L)
sample designation	**MW-6-F-1**	**MW-6-F-5**	**TK-4**	**TK-6**	**MW-7-A-6**	**MW-7-C-2**	**MW-7-P-1**	**MW-8-03-B**	**MW-9-101-A**	
date	**11/8/2006**	**11/8/2006**	**11/8/2006**	**11/8/2006**	**11/10/2006**	**11/10/2006**	**11/14/2006**	**11/11/2006**	**11/10/2006**	
VOCs (µg/L)										
Acetone	39	20	----	----	----	NA	11	----	16	50.0
Benzene	**33**	**800 D**	----	----	----	NA	----	----	**1.1**	1.0
2-Butanone	5.5	11	----	----	----	NA	8.5	----	----	NS
Carbon Disulfide	----	----	----	----	----	NA	0.62 J	----	----	NS
Chloroform	----	----	----	----	----	NA	----	----	0.53 J	7.0
Cyclohexane	----	31	----	----	----	NA	----	----	1.8	NS
1,1-Dichloroethane	----	----	----	----	----	NA	0.85 J	----	----	5.0
1,1-Dichloroethene	----	----	----	----	**270 J**	NA	----	**2.4**	----	0.7
Cis-1,2-Dichloroethene	----	----	----	----	**2,600**	NA	**120 D**	**630 D**	1.3	5.0
Trans-1,2-Dichloroethene	----	----	----	----	----	NA	4.9	4.8	----	5.0
Ethylbenzene	**1500 D**	**3800 D**	----	----	----	NA	----	----	1.8	5.0
Isopropylbenzene	**91**	**130 D**	----	----	----	NA	----	----	1.3	5.0
Methylcyclohexane	33	12	----	----	----	NA	----	----	1.0	NS
Methylene Chloride	----	----	----	----	**300 BJ**	NA	----	----	0.78 BJ	5.0
Methyl tert-butyl ether	16.0	6000 D	----	----	----	NA	----	----	----	NS
Tetrachloroethene	----	----	----	----	**150000 D**	NA	----	**970 BD**	**1.7**	0.7
Toluene	**23**	**1200 D**	----	----	----	NA	----	----	1.6	5.0
1,1,2-Trichloroethane	----	----	----	----	**220 J**	NA	----	----	----	1.0
1,1,2-Trichloro-1,2,2-trifluoreth	----	----	----	2.2	----	NA	----	----	----	5.0
Trichloroethene	----	----	----	----	**38000 D**	NA	2.1	**390 D**	0.74 J	5.0
Vinyl Chloride	----	----	----	----	**2,500**	NA	**22**	**91**	----	2.0
Total Xylenes	**7400 D**	**14000 D**	----	----	----	NA	----	----	1.8 J	5.0
SVOCs (µg/L)										
Acenapthene	----	4 J	----	----	0.4 J	----	NA	0.3 J	2 J	20.0
Acenapthylene	----	----	----	----	----	----	NA	----	0.4 J	NS
Anthracene	----	----	----	----	0.3 J	----	NA	----	0.4 J	50.0
Benzo (a) anthracene	----	----	----	----	0.4 J	----	NA	----	----	0.002
Benzo (a) pyrene	----	----	----	----	0.2 J	----	NA	----	----	ND
Chrysene	----	----	----	----	**0.3 J**	----	NA	----	----	0.002
2,4-Dimethylphenol	----	**210 D**	----	----	----	----	NA	----	----	50.0
Di-n-octyl phthalate	----	0.6 BJ	0.5 BJ	----	----	----	NA	----	----	50.0
Fluoranthene	----	0.5 J	----	----	0.5 J	----	NA	----	0.5 J	50.0
Fluorene	----	----	----	----	----	----	NA	----	2 J	50.0
2-Methylnapthalene	----	320 D	----	----	2 J	----	NA	----	4 J	NS
2-Methylphenol	----	8 J	----	----	----	----	NA	----	----	NS
4-Methylphenol	----	59	----	----	----	----	NA	----	----	NS
Napthalene	----	**1300 D**	----	----	4 J	----	NA	----	6 J	10.0
Phenanthrene	----	2 J	----	----	0.9 J	----	NA	----	2 J	50.0
Pyrene	----	----	----	----	0.4 J	----	NA	----	0.4 J	50.0
Metals (µg/L)										
Total Arsenic	12	**40**	----	----	----	----	----	----	----	25
Total Barium	180	510	51	30	840	13	**14,400**	100	81	1,000
Total Calcium	----	115,000	93,100	NA	NA	NA	NA	NA	NA	NS
Total Chromium	----	----	----	----	----	----	7.9	----	----	50
Total Copper	----	**650**	----	NA	NA	NA	NA	NA	NA	200
Total Hexavalent Chromium	----	----	----	----	----	----	----	----	----	50
Total Iron	----	**22,400**	----	NA	NA	220	NA	NA	NA	300
Total Lead	----	**58**	----	----	----	----	----	----	5.1	25
Total Magnesium	----	14,200	27,300	NA	NA	NA	NA	NA	NA	35,000
Total Manganese	----	**570**	27	NA	NA	NA	NA	NA	NA	300
Total Nickel	----	37	----	NA	NA	NA	NA	NA	NA	100
Total Potassium	----	7,900	----	NA	NA	NA	NA	NA	NA	NS
Total Sodium	----	**512,000**	**436,000**	NA	NA	NA	NA	NA	NA	20,000
Total Zinc	----	420	----	NA	NA	NA	NA	NA	NA	2,000
Other Analyses (µg/L)										
Sulfate	NA	NA	NA	NA	NA	**972,000**	NA	NA	NA	250,000
PCBs	NA	---- *	---- *	NA	NA	NA	NA	NA	NA	0.09

NOTES:

NYSDEC Ambient Water Quality Standards and Guidance Values - TOGS 1.1.1

VOCs - Volatile organic compounds determined by USEPA Method 8260

SVOCs - Semivolatile organic compounds determined by USEPA Method 8270

NA - Not Analyzed

NS - No Standard or Guidance Value given in TOGS 1.1.1

ND - Not Detected

BJ - Estimated value and analyte found in sample and associated blank.

D - Compound identified in an analysis at the secondary dilution factor.

J - Estimated value.

---- - Below the Reportable Limit

----* - Reportable Limit is Above the TOGS 1.1.1 Standard

µg/L - Micrograms per Liter

BOLD - Concentrations above the NYDEC Ambient Water Quality Standards and Guidance Values.

Table 1
Groundwater Analytical Testing Results Summary
Additional Downgradient Groundwater Monitoring Wells
Delphi Lockport Complex
Lockport, New York

Parameter	NYSDEC Class GA Criteria	MW-6-1			MW-6-2					MW-7-1		MW-7-2			MW-7-3		MW-7-4
		Aug-08	Feb-08	Nov-07	Aug-08	Apr-08	Apr-08	Feb-08	Nov-07	Feb-08	Nov-07	Aug-08	Feb-08	Nov-07	Feb-08	Nov-07	Aug-08
VOC - EPA Method 8260 TCL (ug/L)						**Delphi**	**NYSDEC**										
Benzene	1										**3**						
1,2-Dichloroethenes (total)	5										**8**						
Trichloroethylene	5					4	4.2		**25**	**56**	**110**						
Toluene	5										**7**						

Notes:
1. Compounds detected in one or more samples are presented on this table.
2. Analytical testing completed by Free-Col Laboratory except the NYSDEC April 2008 split sample which was tested by Test America.
   Samples were analyzed for volatile organic compounds (VOCs) via EPA Method 8260 Target Compound List (TCL), only.
3. NYSDEC Class GA criteria obtained from Division of Water Technical
   and Operational Guidance Series (TOGS 1.1.1), June 1998.
4. ug/L = part per billion (ppb).
5. Blank indicates compound was not detected.
6. **BOLD** values exceeding guidance criteria.

Table 4
Groundwater Sample Analytical Testing Results Summary
Focused Environmental Assessment
Delphi Thermal Building 10
Lockport, New York

Parameter	NYSDEC Class GA Criteria	BLDG 10 MW-1
VOC - EPA Method 8260 (ug/l)		
Benzene	1	5
Acetone	50	20
4-methyl-2-pentanone	NV	59
1,1-Dichloroethene	5	480
1,2-Dichloroethenes (Total)	5	230
Toluene	5	44
Ethylbenzene	5	4
o-Xylene	5	15
m,p-xylene	5	46
Methylene Chloride	5	200
1,1,2,2-Tetrachloroethane	5	6
1,3-Dichlorobenzene	3	3
Tetrachloroethene	5	114,000
Trichloroethylene	5	200
Vinyl Chloride	1	220
cis-1,2-Dichloroethene	5	220
trans-1,2-Dichloroethene	5	15
1,1,2-Trichloroethane	1	77

Notes:
1. Compounds detected in one or more samples are presented on this table.
2. Analytical testing completed by Free-Col Laboratories.
3. NYSDEC Class GA criteria obtained from Division of Water Technical and Operational Guidance Series (TOGS 1.1.1), dated October 1993, revised June 1998, January 1999 errata sheet, and April 2000 addendum.
4. ug/kg = part per billion (ppb).
5. Blank indicates compound was not detected.
6. Shading indicates values exceeding guidance criteria.

APPENDIX C

TEST AMERICA ANALYTICAL LABORATORY REPORT

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

ANALYTICAL REPORT

TestAmerica Laboratories, Inc.
TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Tel: (716)691-2600

TestAmerica Job ID: 480-19202-1

Client Project/Site: 058507, GM-Lockport Groundwater Sampling

For:

Conestoga-Rovers & Associates, Inc.
2055 Niagara Falls Blvd., Suite 3
Niagara Falls, New York 14304

Attn: Kathleen Willy

Melissa Deyo

Authorized for release by:
5/22/2012 10:11:19 AM

Melissa Deyo
Project Manager I
melissa.deyo@testamericainc.com

LINKS

Review your project results through TotalAccess

Have a Question? Ask The Expert

Visit us at: www.testamericainc.com

The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

Table of Contents

Cover Page 1
Table of Contents 2
Definitions/Glossary 3
Case Narrative 5
Detection Summary 10
Client Sample Results 15
Surrogate Summary 27
QC Sample Results 28
QC Association Summary 56
Lab Chronicle 67
Certification Summary 73
Method Summary 74
Sample Summary 75
Chain of Custody 76
Receipt Checklists 82

Qualifiers

GC/MS VOA

Qualifier	Qualifier Description
F	MS or MSD exceeds the control limits
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
4	MS, MSD: The analyte present in the original sample is 4 times greater than the matrix spike concentration; therefore, control limits are not applicable.
E	Result exceeded calibration range.

GC VOA

Qualifier	Qualifier Description
*	LCS or LCSD exceeds the control limits
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.
*	LCS or LCSD exceeds the control limits
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
*	LCS or LCSD exceeds the control limits
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.

Metals

Qualifier	Qualifier Description
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
4	MS, MSD: The analyte present in the original sample is 4 times greater than the matrix spike concentration; therefore, control limits are not applicable.

General Chemistry

Qualifier	Qualifier Description
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.
F	MS or MSD exceeds the control limits
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
F	MS or MSD exceeds the control limits
F	RPD of the MS and MSD exceeds the control limits
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.
F	MS or MSD exceeds the control limits
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
☼	Listed under the "D" column to designate that the result is reported on a dry weight basis

Glossary (Continued)

Abbreviation	These commonly used abbreviations may or may not be present in this report.
%R	Percent Recovery
CNF	Contains no Free Liquid
DL, RA, RE, IN	Indicates a Dilution, Reanalysis, Re-extraction, or additional Initial metals/anion analysis of the sample
EDL	Estimated Detection Limit
EPA	United States Environmental Protection Agency
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RL	Reporting Limit
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

Job ID: 480-19202-1

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative
480-19202-1

Receipt
The sample was received on 4/26/2012 5:50 PM; the sample arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 2.1º C.

GC/MS VOA
No analytical or quality issues were noted.

IC
No analytical or quality issues were noted.

GC VOA
Method RSK-175: The method blank for batch 62347 contained Ethane, Ethene and Methane above the method detection limit. These target analyte concentrations were less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

Method RSK-175: The laboratory control sample (LCS) and laboratory control sample duplicate (LSCD) for batch 62347 had recoveries outside on control limits. Since the results were biased high and the associated sample had no detections above the reporting limit, no corrective action was necessary.

No other analytical or quality issues were noted.

Metals
Method 6010B: The method blank for preparation batch 61766 contained Manganese above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of sample was not performed.

No other analytical or quality issues were noted.

General Chemistry
Method 353.2: The method blank for batch 61789 contained Nitrite above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

Method 9038: The method blank for batch 63103 contained Sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Job ID: 480-19297-1

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative
480-19297-1

Receipt
The samples were received on 4/27/2012 5:20 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 2.8º C.

GC/MS VOA
No analytical or quality issues were noted.

IC

Job ID: 480-19297-1 (Continued)

Laboratory: TestAmerica Buffalo (Continued)

Method VFA-IC: The matrix spike / matrix spike duplicate (MS/MSD) recoveries associated with batch 63702 were outside control limits: (480-19297-3 MS). Matrix interference was suspected.

No other analytical or quality issues were noted.

GC VOA

Method RSK-175: The method blank for batch 62347 contained Ethane, Ethene and Methane above the method detection limit. These target analyte concentrations were less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

Method RSK-175: The laboratory control sample (LCS) and laboratory control sample duplicate (LSCD) for batch 62347 had recoveries outside on control limits. Since the results were biased high and the associated sample had no detections above the reporting limit, no corrective action was necessary.

No other analytical or quality issues were noted.

Metals

Method 6010B: The method blank for preparation batch 62005 contained Manganese above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

General Chemistry

Method 9038: The method blanks for batch 63103 contained Sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

Method SM 4500 Cl- E: The method blank for batch 63758 contained Chloride above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

Method SM 4500 S2 D: The matrix spike (MS) recovery for batch 62436 was outside control limits. The associated laboratory control sample (LCS) recovery met acceptance criteria.

No other analytical or quality issues were noted.

Job ID: 480-19365-2

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative
480-19365-2

Receipt

The samples were received on 4/30/2012 7:30 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperatures of the 2 coolers at receipt time were 2.4º C and 2.9º C.

GC/MS VOA

Method 8260B: The following samples submitted for volatiles analysis were received with insufficient preservation (pH >2): MW-7-5-043012-1130 (480-19365-4) and TRIP BLANK (480-19365-5).

Method 8260B: The following samples was diluted due to the abundance of target analytes: MW-7-6-043012-0900 (480-19365-3), MW-7-6-043012-0900 (480-19365-3 MS), MW-7-6-043012-0900 (480-19365-3 MSD) and MW-7-5-043012-1130 (480-19365-4). Elevated reporting limits (RLs) are provided.

Method 8260B: The matrix spike duplicate (MSD) recoveries for batch 63572 were outside control limits. The associated laboratory control sample (LCS) recovery met acceptance criteria.

Job ID: 480-19365-2 (Continued)

Laboratory: TestAmerica Buffalo (Continued)

No other analytical or quality issues were noted.

IC

Method VFA-IC: The matrix spike / matrix spike duplicate (MS/MSD) recoveries associated with batch 64493 were outside control limits: (480-19365-4 MS) and (480-19365-4 MSD). Matrix interference was suspected.

No other analytical or quality issues were noted.

GC VOA

Method RSK-175: The following sample was diluted due to the abundance of the target analyte Methane: MW-7-6-043012-0900 (480-19365-3). Elevated reporting limits (RLs) are provided.

Method RSK-175: The method blank for batch 62604 contained Methane above the method detection limit. These target analyte concentrations were less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Metals

No analytical or quality issues were noted.

General Chemistry

Method 9038: The method blanks for batch 63649 contained Sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Job ID: 480-19420-1

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative
480-19420-1

Receipt

The samples were received on 5/1/2012 5:17 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 4.2º C.

GC/MS VOA

Method 8260B: The following samples were diluted due to the abundance of target analytes: MW-7-A-6-050112-0900 (480-19420-1), MW-7-7-050112-1330 (480-19420-2), MW-7-7-050112-1330 (480-19420-2 DL), (480-19420-2 MS) and (480-19420-2 MSD). Elevated reporting limits (RLs) are provided.

No other analytical or quality issues were noted.

IC

No analytical or quality issues were noted.

GC VOA

Method RSK-175: The following samples were diluted due to the abundance of target analytes: MW-7-A-6-050112-0900 (480-19420-1 DL) and MW-7-7-050112-1330 (480-19420-2). Elevated reporting limits (RLs) are provided.

Method RSK-175: The laboratory control sample duplicate (LSCD) for batch 62926 had recoveries outside on control limits. The associated laboratory control sample (LCS) recovery met acceptance criteria.

No other analytical or quality issues were noted.

Job ID: 480-19420-1 (Continued)

Laboratory: TestAmerica Buffalo (Continued)

Metals
No analytical or quality issues were noted.

General Chemistry
Method 9038: The method blanks for batch 64501 contained Sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Job ID: 480-19497-2

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative
480-19497-2

Receipt
The samples were received on 5/2/2012 6:00 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 6.9º C.

GC/MS VOA
Method 8260B: The following sample was diluted due to the abundance of target analytes: MW-7-8-050212-0730 (480-19497-5). Elevated reporting limits (RLs) are provided.

No other analytical or quality issues were noted.

IC
Method VFA-IC: The matrix spike (MS) recoveries associated with batch 64493 were outside control limits. Matrix interference was suspected.

No other analytical or quality issues were noted.

GC VOA
Method RSK-175: The following samples were diluted due to the abundance of target analytes: MW-7-8-050212-0730 (480-19497-5). Elevated reporting limits (RLs) are provided.

Method RSK-175: The method blank for batch 63265 contained Methane above the method detection limit. These target analyte concentrations were less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Metals
No analytical or quality issues were noted.

General Chemistry
Method 9038: The method blank for batch 64501 contained Sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

Method SM 4500 S2 D: The matrix spike (MS) recovery for batch 62917 was outside control limits. The associated laboratory control sample (LCS) recovery met acceptance criteria.

No other analytical or quality issues were noted.

Job ID: 480-19600-2

Laboratory: TestAmerica Buffalo

Job ID: 480-19600-2 (Continued)

Laboratory: TestAmerica Buffalo (Continued)

Narrative

Job Narrative
480-19600-2

Receipt
The samples were received on 5/3/2012 7:45 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 3.8º C.

GC/MS VOA
Method 8260B: The following sample was diluted due to the abundance of target analytes: MW-7-C-2-050312-1015 (480-19600-2 DL). Elevated reporting limits (RLs) are provided.

Method 8260B: The following volatiles sample was diluted due to foaming at the time of purging during the original sample analysis: MW-7-D-1-050312-1530 (480-19600-3). Elevated reporting limits (RLs) are provided.

No other analytical or quality issues were noted.

IC
No analytical or quality issues were noted.

GC VOA
Method RSK-175: The following samples were diluted due to the abundance of target analytes: MW-7-C-2-050312-1015 (480-19600-2) and MW-7-D-1-050312-1530 (480-19600-3). Elevated reporting limits (RLs) are provided.

Method RSK-175: The method blank for batch 63265 contained Methane above the method detection limit. These target analyte concentrations were less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Metals
No analytical or quality issues were noted.

General Chemistry
Method 350.1: The method blank for batch 63137 contained Ammonia above the reporting limit (RL). The associated samples contained detections for this analyte at concentrations greater than 10 time the value found in the method blank; therefore, re-extraction and/or re-analysis of samples was not performed.

Method 9038: The method blank for batch 64026 contained Sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-analysis of samples was not performed.

Method SM4500 Cl-E: The method blank for batch 64027 contained sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Detection Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19202-1

Client Sample ID: MW-7-2-042612-1415 — Lab Sample ID: 480-19202-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Trichloroethene	4.0		1.0	0.46	ug/L	1		8260B	Total/NA
Methane	0.85	J B *	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	0.076		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	40.0		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.041	B	0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	1.6		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	109		1.0	0.32	mg/L	1		6010B	Total/NA
Nitrate	0.059		0.050	0.011	mg/L	1		353.2	Total/NA
Sulfate	66.6	B	25.0	7.5	mg/L	5		9038	Total/NA
Total Organic Carbon	1.6		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	324		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	212		5.0	2.3	mg/L	5		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	3700		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: MW-7-1-042712-1000 — Lab Sample ID: 480-19297-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Ethane	0.81	J B *	1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	0.64	J B *	1.5	0.52	ug/L	1		RSK-175	Total/NA
Methane	9.4	B *	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	0.28		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	111		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.42	B	0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	4.3		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	563		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	0.0092	J	0.020	0.0090	mg/L	1		350.1	Total/NA
Sulfate	131	B	100	30.0	mg/L	20		9038	Total/NA
Total Organic Carbon	0.97	J	1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	288		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	1450		30.0	13.8	mg/L	30		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	6800		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: MW-7-3-042712-1330 — Lab Sample ID: 480-19297-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	8.6		1.0	0.81	ug/L	1		8260B	Total/NA
Vinyl chloride	43		1.0	0.90	ug/L	1		8260B	Total/NA
Ethane	6.0	B *	1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	10	B *	1.5	0.52	ug/L	1		RSK-175	Total/NA
Methane	220	B *	100	22	ug/L	100		RSK-175	Total/NA
Iron	2.5		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	248		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.35	B	0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	50.2		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	4340		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	2.6		0.040	0.018	mg/L	2		350.1	Total/NA
Nitrate	0.38		0.050	0.011	mg/L	1		353.2	Total/NA
Sulfate	727	B	250	75.0	mg/L	50		9038	Total/NA
Total Organic Carbon	1.3		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	280		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	6890	B	500	230	mg/L	500		SM 4500 Cl- E	Total/NA

Client Sample ID: MW-7-3-042712-1330 (Continued)

Lab Sample ID: 480-19297-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Sulfide	0.055	J	0.10	0.052	mg/L	1		SM 4500 S2 D	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	9100		2000	2000	ug/L	2		RSK-175	Total/NA

Client Sample ID: MW-7-4-042712-1415

Lab Sample ID: 480-19297-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Trichloroethene	3.6		1.0	0.46	ug/L	1		8260B	Total/NA
Ethane	0.81	J B *	1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	0.65	J B *	1.5	0.52	ug/L	1		RSK-175	Total/NA
Iron	0.27		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	34.3		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.017	B	0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	2.1		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	226		1.0	0.32	mg/L	1		6010B	Total/NA
Nitrate	0.11		0.050	0.011	mg/L	1		353.2	Total/NA
Sulfate	72.2	B	25.0	7.5	mg/L	5		9038	Total/NA
Total Organic Carbon	0.68	J	1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	320		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	351		15.0	6.9	mg/L	15		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	3900		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19297-4

No Detections

Client Sample ID: MW-7-6-043012-0900

Lab Sample ID: 480-19365-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	480		10	8.1	ug/L	10		8260B	Total/NA
Tetrachloroethene	710		10	3.6	ug/L	10		8260B	Total/NA
Trichloroethene	290		10	4.6	ug/L	10		8260B	Total/NA
Vinyl chloride	55		10	9.0	ug/L	10		8260B	Total/NA
Ethane	6.3		1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	1.7		1.5	0.52	ug/L	1		RSK-175	Total/NA
Methane	420	B	100	22	ug/L	100		RSK-175	Total/NA
Iron	0.16		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	106		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.18		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	10.9		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	2450		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	0.051		0.020	0.0090	mg/L	1		350.1	Total/NA
Nitrate	0.057		0.050	0.011	mg/L	1		353.2	Total/NA
Sulfate	264	B	150	45.0	mg/L	30		9038	Total/NA
Total Organic Carbon	1.3		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	288		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	4230		121	55.7	mg/L	121		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	8200		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: MW-7-5-043012-1130

Lab Sample ID: 480-19365-4

Client Sample ID: MW-7-5-043012-1130 (Continued)

Lab Sample ID: 480-19365-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	640		200	160	ug/L	200		8260B	Total/NA
Tetrachloroethene	8700		200	72	ug/L	200		8260B	Total/NA
Trichloroethene	760		200	92	ug/L	200		8260B	Total/NA
Ethane	1.0	J	1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	1.3	J	1.5	0.52	ug/L	1		RSK-175	Total/NA
Methane	25	B	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	0.12		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	124		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	1.1		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	8.0		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	2530		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	0.043		0.020	0.0090	mg/L	1		350.1	Total/NA
Nitrate	0.89		0.050	0.011	mg/L	1		353.2	Total/NA
Nitrite	0.039	J	0.050	0.020	mg/L	1		353.2	Total/NA
Sulfate	218	B	75.0	22.5	mg/L	15		9038	Total/NA
Total Organic Carbon	1.8		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	320		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	4600		121	55.7	mg/L	121		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	11000		2000	2000	ug/L	2		RSK-175	Total/NA

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19365-5

No Detections

Client Sample ID: MW-7-A-6-050112-0900

Lab Sample ID: 480-19420-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	22000		2000	1600	ug/L	2000		8260B	Total/NA
Tetrachloroethene	140000		2000	720	ug/L	2000		8260B	Total/NA
Trichloroethene	26000		2000	920	ug/L	2000		8260B	Total/NA
Vinyl chloride	1800	J	2000	1800	ug/L	2000		8260B	Total/NA
Ethane	14	*	1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	160	*	1.5	0.52	ug/L	1		RSK-175	Total/NA
Methane - DL	1100	*	50	11	ug/L	50		RSK-175	Total/NA
Iron	0.49		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	95.4		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.92		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	2.7		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	226		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	0.022		0.020	0.0090	mg/L	1		350.1	Total/NA
Sulfate	111	B	25.0	7.5	mg/L	5		9038	Total/NA
Total Organic Carbon	10.5		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	472		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	695		30.0	13.8	mg/L	30		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	19000		2000	2000	ug/L	2		RSK-175	Total/NA

Client Sample ID: MW-7-7-050112-1330

Lab Sample ID: 480-19420-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	6000		400	320	ug/L	400		8260B	Total/NA
Trichloroethene	2600		400	180	ug/L	400		8260B	Total/NA

Client Sample ID: MW-7-7-050112-1330 (Continued)

Lab Sample ID: 480-19420-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Vinyl chloride	960		400	360	ug/L	400		8260B	Total/NA
Tetrachloroethene - DL	120000		2000	720	ug/L	2000		8260B	Total/NA
Ethane	68	J *	75	25	ug/L	50		RSK-175	Total/NA
Ethene	130	*	75	26	ug/L	50		RSK-175	Total/NA
Methane	530	*	50	11	ug/L	50		RSK-175	Total/NA
Iron	0.080		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	151		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.0089		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	40.5		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	1030		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	1.8		0.020	0.0090	mg/L	1		350.1	Total/NA
Nitrate	0.088		0.050	0.011	mg/L	1		353.2	Total/NA
Nitrite	0.022	J	0.050	0.020	mg/L	1		353.2	Total/NA
Sulfate	451	B	150	45.0	mg/L	30		9038	Total/NA
Total Organic Carbon	14.1		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	42.0		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	687		30.0	13.8	mg/L	30		SM 4500 Cl- E	Total/NA
Sulfide	1.7		0.20	0.10	mg/L	2		SM 4500 S2 D	Total/NA
Acetic acid	6.1		1.0	0.15	mg/L	1		VFA-IC	Total/NA
Propionic acid	1.5		1.0	0.17	mg/L	1		VFA-IC	Total/NA

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19420-4

No Detections

Client Sample ID: MW-7-8-050212-0730

Lab Sample ID: 480-19497-5

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	67		4.0	3.2	ug/L	4		8260B	Total/NA
Tetrachloroethene	220		4.0	1.4	ug/L	4		8260B	Total/NA
Trichloroethene	130		4.0	1.8	ug/L	4		8260B	Total/NA
Ethane	21		15	4.9	ug/L	10		RSK-175	Total/NA
Ethene	7.8	J	15	5.2	ug/L	10		RSK-175	Total/NA
Methane	67	B	10	2.2	ug/L	10		RSK-175	Total/NA
Iron	4.0		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	170		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.15		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	38.2		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	896		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	0.25		0.020	0.0090	mg/L	1		350.1	Total/NA
Sulfate	145	B	25.0	7.5	mg/L	5		9038	Total/NA
Total Organic Carbon	0.73	J	1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	60.0		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	2330		50.0	23.0	mg/L	50		SM 4500 Cl- E	Total/NA

Client Sample ID: MW-7-C-2-050312-1015

Lab Sample ID: 480-19600-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
trans-1,2-Dichloroethene	1.2		1.0	0.90	ug/L	1		8260B	Total/NA
Vinyl chloride	21		1.0	0.90	ug/L	1		8260B	Total/NA
cis-1,2-Dichloroethene - DL	370		5.0	4.1	ug/L	5		8260B	Total/NA
Ethane	9.6	J	15	4.9	ug/L	10		RSK-175	Total/NA
Ethene	8.0	J	15	5.2	ug/L	10		RSK-175	Total/NA
Methane	82	B	10	2.2	ug/L	10		RSK-175	Total/NA

Client Sample ID: MW-7-C-2-050312-1015 (Continued)

Lab Sample ID: 480-19600-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Iron	0.93		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	83.8		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.084		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	7.5		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	126		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	0.39		0.020	0.0090	mg/L	1		350.1	Total/NA
Sulfate	525	B	100	30.0	mg/L	20		9038	Total/NA
Total Organic Carbon	0.67	J	1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	260		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	181		10.0	4.6	mg/L	10		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	4800		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: MW-7-D-1-050312-1530

Lab Sample ID: 480-19600-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Vinyl chloride	19		4.0	3.6	ug/L	4		8260B	Total/NA
Ethane	52		15	4.9	ug/L	10		RSK-175	Total/NA
Ethene	14	J	15	5.2	ug/L	10		RSK-175	Total/NA
Methane	2800	B	100	22	ug/L	100		RSK-175	Total/NA
Iron	61.2		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	388		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	10.1		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	31.4		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	358		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	170	B	2.0	0.90	mg/L	100		350.1	Total/NA
Sulfate	71.0	B	25.0	7.5	mg/L	5		9038	Total/NA
Total Organic Carbon	2.3		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	244		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	5890		121	55.7	mg/L	121		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	25000		5000	5000	ug/L	5		RSK-175	Total/NA

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19202-1

Client Sample ID: MW-7-2-042612-1415

Lab Sample ID: 480-19202-1

Date Collected: 04/26/12 14:15

Matrix: Water

Date Received: 04/26/12 17:50

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/06/12 15:37	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/06/12 15:37	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/06/12 15:37	1
Trichloroethene	**4.0**		1.0	0.46	ug/L			05/06/12 15:37	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/06/12 15:37	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*103*		*66 - 137*		*05/06/12 15:37*	*1*
4-Bromofluorobenzene (Surr)	*100*		*73 - 120*		*05/06/12 15:37*	*1*
Toluene-d8 (Surr)	*106*		*71 - 126*		*05/06/12 15:37*	*1*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	ND	*	1.5	0.49	ug/L			04/30/12 18:17	1
Ethene	ND	*	1.5	0.52	ug/L			04/30/12 18:17	1
Methane	**0.85**	**J B ***	1.0	0.22	ug/L			04/30/12 18:17	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**3700**		1000	1000	ug/L			05/04/12 10:00	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.076**		0.050	0.019	mg/L		04/27/12 08:40	04/27/12 18:05	1
Magnesium	**40.0**		0.20	0.043	mg/L		04/27/12 08:40	04/27/12 18:05	1
Manganese	**0.041**	**B**	0.0030	0.00040	mg/L		04/27/12 08:40	04/27/12 18:05	1
Potassium	**1.6**		0.50	0.10	mg/L		04/27/12 08:40	04/27/12 18:05	1
Sodium	**109**		1.0	0.32	mg/L		04/27/12 08:40	04/27/12 18:05	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			04/28/12 13:40	1
Nitrate	**0.059**		0.050	0.011	mg/L			04/27/12 01:06	1
Nitrite	ND		0.050	0.020	mg/L			04/27/12 01:06	1
Sulfate	**66.6**	**B**	25.0	7.5	mg/L			05/03/12 22:02	5
Total Organic Carbon	**1.6**		1.0	0.43	mg/L			05/01/12 10:41	1
Total Alkalinity	**324**		5.0	0.79	mg/L			04/30/12 13:10	1
Chloride	**212**		5.0	2.3	mg/L			05/03/12 22:07	5
Sulfide	ND		0.10	0.052	mg/L			05/01/12 07:30	1
Acetic acid	ND		1.0	0.15	mg/L			04/30/12 04:52	1
Formic-acid	ND		1.0	0.11	mg/L			04/30/12 04:52	1
Lactic acid	ND		1.0	0.14	mg/L			04/30/12 04:52	1
n-Butyric Acid	ND		1.0	0.16	mg/L			04/30/12 04:52	1
Propionic acid	ND		1.0	0.17	mg/L			04/30/12 04:52	1
Pyruvic Acid	ND		1.0	0.080	mg/L			04/30/12 04:52	1

Client Sample ID: MW-7-1-042712-1000

Lab Sample ID: 480-19297-1

Date Collected: 04/27/12 10:00

Matrix: Water

Date Received: 04/27/12 17:20

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/08/12 01:03	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/08/12 01:03	1

Client Sample ID: MW-7-1-042712-1000

Lab Sample ID: 480-19297-1

Date Collected: 04/27/12 10:00

Matrix: Water

Date Received: 04/27/12 17:20

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/08/12 01:03	1
Trichloroethene	ND		1.0	0.46	ug/L			05/08/12 01:03	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/08/12 01:03	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*95*		*66 - 137*		*05/08/12 01:03*	*1*
4-Bromofluorobenzene (Surr)	*102*		*73 - 120*		*05/08/12 01:03*	*1*
Toluene-d8 (Surr)	*103*		*71 - 126*		*05/08/12 01:03*	*1*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**0.81**	**J B ***	1.5	0.49	ug/L			04/30/12 18:34	1
Ethene	**0.64**	**J B ***	1.5	0.52	ug/L			04/30/12 18:34	1
Methane	**9.4**	**B ***	1.0	0.22	ug/L			04/30/12 18:34	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**6800**		1000	1000	ug/L			05/04/12 09:09	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.28**		0.050	0.019	mg/L		04/28/12 08:45	04/28/12 16:41	1
Magnesium	**111**		0.20	0.043	mg/L		04/28/12 08:45	04/28/12 16:41	1
Manganese	**0.42**	**B**	0.0030	0.00040	mg/L		04/28/12 08:45	04/28/12 16:41	1
Potassium	**4.3**		0.50	0.10	mg/L		04/28/12 08:45	04/28/12 16:41	1
Sodium	**563**		1.0	0.32	mg/L		04/28/12 08:45	04/28/12 16:41	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	**0.0092**	**J**	0.020	0.0090	mg/L			05/01/12 13:06	1
Nitrate	ND		0.050	0.011	mg/L			04/27/12 21:28	1
Nitrite	ND		0.050	0.020	mg/L			04/27/12 21:28	1
Sulfate	**131**	**B**	100	30.0	mg/L			05/03/12 22:32	20
Total Organic Carbon	**0.97**	**J**	1.0	0.43	mg/L			04/30/12 21:00	1
Total Alkalinity	**288**		5.0	0.79	mg/L			04/30/12 13:10	1
Chloride	**1450**		30.0	13.8	mg/L			05/03/12 22:37	30
Sulfide	ND		0.10	0.052	mg/L			05/01/12 07:30	1
Acetic acid	ND		1.0	0.15	mg/L			05/10/12 02:27	1
Formic-acid	ND		1.0	0.11	mg/L			05/10/12 02:27	1
Lactic acid	ND		1.0	0.14	mg/L			05/10/12 02:27	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/10/12 02:27	1
Propionic acid	ND		1.0	0.17	mg/L			05/10/12 02:27	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/10/12 02:27	1

Client Sample ID: MW-7-3-042712-1330

Lab Sample ID: 480-19297-2

Date Collected: 04/27/12 13:30

Matrix: Water

Date Received: 04/27/12 17:20

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	**8.6**		1.0	0.81	ug/L			05/08/12 01:28	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/08/12 01:28	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/08/12 01:28	1
Trichloroethene	ND		1.0	0.46	ug/L			05/08/12 01:28	1

Client Sample ID: MW-7-3-042712-1330

Lab Sample ID: 480-19297-2

Date Collected: 04/27/12 13:30

Matrix: Water

Date Received: 04/27/12 17:20

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Vinyl chloride	43		1.0	0.90	ug/L			05/08/12 01:28	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*93*		*66 - 137*		*05/08/12 01:28*	*1*
4-Bromofluorobenzene (Surr)	*102*		*73 - 120*		*05/08/12 01:28*	*1*
Toluene-d8 (Surr)	*101*		*71 - 126*		*05/08/12 01:28*	*1*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	6.0	B *	1.5	0.49	ug/L			04/30/12 18:51	1
Ethene	10	B *	1.5	0.52	ug/L			04/30/12 18:51	1
Methane	220	B *	100	22	ug/L			04/30/12 19:40	100

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	9100		2000	2000	ug/L			05/04/12 09:49	2

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	2.5		0.050	0.019	mg/L		04/28/12 08:45	04/28/12 16:44	1
Magnesium	248		0.20	0.043	mg/L		04/28/12 08:45	04/28/12 16:44	1
Manganese	0.35	B	0.0030	0.00040	mg/L		04/28/12 08:45	04/28/12 16:44	1
Potassium	50.2		0.50	0.10	mg/L		04/28/12 08:45	04/28/12 16:44	1
Sodium	4340		1.0	0.32	mg/L		04/28/12 08:45	04/28/12 16:44	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	2.6		0.040	0.018	mg/L			05/01/12 14:21	2
Nitrate	0.38		0.050	0.011	mg/L			04/27/12 22:29	1
Nitrite	ND		0.050	0.020	mg/L			04/27/12 22:29	1
Sulfate	727	B	250	75.0	mg/L			05/03/12 22:31	50
Total Organic Carbon	1.3		1.0	0.43	mg/L			04/30/12 22:01	1
Total Alkalinity	280		5.0	0.79	mg/L			04/30/12 13:10	1
Chloride	6890	B	500	230	mg/L			05/09/12 17:54	500
Sulfide	0.055	J	0.10	0.052	mg/L			05/01/12 07:30	1
Acetic acid	ND		1.0	0.15	mg/L			05/10/12 02:56	1
Formic-acid	ND		1.0	0.11	mg/L			05/10/12 02:56	1
Lactic acid	ND		1.0	0.14	mg/L			05/10/12 02:56	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/10/12 02:56	1
Propionic acid	ND		1.0	0.17	mg/L			05/10/12 02:56	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/10/12 02:56	1

Client Sample ID: MW-7-4-042712-1415

Lab Sample ID: 480-19297-3

Date Collected: 04/27/12 14:15

Matrix: Water

Date Received: 04/27/12 17:20

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/08/12 01:53	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/08/12 01:53	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/08/12 01:53	1
Trichloroethene	3.6		1.0	0.46	ug/L			05/08/12 01:53	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/08/12 01:53	1

Client Sample ID: MW-7-4-042712-1415

Lab Sample ID: 480-19297-3

Date Collected: 04/27/12 14:15

Matrix: Water

Date Received: 04/27/12 17:20

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*94*		*66 - 137*		*05/08/12 01:53*	*1*
4-Bromofluorobenzene (Surr)	*103*		*73 - 120*		*05/08/12 01:53*	*1*
Toluene-d8 (Surr)	*102*		*71 - 126*		*05/08/12 01:53*	*1*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**0.81**	**J B ***	1.5	0.49	ug/L			04/30/12 19:08	1
Ethene	**0.65**	**J B ***	1.5	0.52	ug/L			04/30/12 19:08	1
Methane	ND	*	1.0	0.22	ug/L			04/30/12 19:08	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**3900**		1000	1000	ug/L			05/04/12 09:38	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.27**		0.050	0.019	mg/L		04/28/12 08:45	04/28/12 16:50	1
Magnesium	**34.3**		0.20	0.043	mg/L		04/28/12 08:45	04/28/12 16:50	1
Manganese	**0.017**	**B**	0.0030	0.00040	mg/L		04/28/12 08:45	04/28/12 16:50	1
Potassium	**2.1**		0.50	0.10	mg/L		04/28/12 08:45	04/28/12 16:50	1
Sodium	**226**		1.0	0.32	mg/L		04/28/12 08:45	04/28/12 16:50	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/01/12 13:08	1
Nitrate	**0.11**		0.050	0.011	mg/L			04/27/12 22:30	1
Nitrite	ND		0.050	0.020	mg/L			04/27/12 22:30	1
Sulfate	**72.2**	**B**	25.0	7.5	mg/L			05/03/12 22:11	5
Total Organic Carbon	**0.68**	**J**	1.0	0.43	mg/L			05/01/12 00:00	1
Total Alkalinity	**320**		5.0	0.79	mg/L			04/30/12 13:10	1
Chloride	**351**		15.0	6.9	mg/L			05/03/12 22:39	15
Sulfide	ND		0.10	0.052	mg/L			05/01/12 07:30	1
Acetic acid	ND		1.0	0.15	mg/L			05/10/12 03:25	1
Formic-acid	ND		1.0	0.11	mg/L			05/10/12 03:25	1
Lactic acid	ND		1.0	0.14	mg/L			05/10/12 03:25	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/10/12 03:25	1
Propionic acid	ND		1.0	0.17	mg/L			05/10/12 03:25	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/10/12 03:25	1

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19297-4

Date Collected: 04/27/12 00:00

Matrix: Water

Date Received: 04/27/12 17:20

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/08/12 02:17	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/08/12 02:17	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/08/12 02:17	1
Trichloroethene	ND		1.0	0.46	ug/L			05/08/12 02:17	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/08/12 02:17	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*94*		*66 - 137*		*05/08/12 02:17*	*1*
4-Bromofluorobenzene (Surr)	*100*		*73 - 120*		*05/08/12 02:17*	*1*

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19202-1

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19297-4

Date Collected: 04/27/12 00:00
Matrix: Water
Date Received: 04/27/12 17:20

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Toluene-d8 (Surr)	*100*		*71 - 126*		*05/08/12 02:17*	*1*

Client Sample ID: MW-7-6-043012-0900

Lab Sample ID: 480-19365-3

Date Collected: 04/30/12 09:00
Matrix: Water
Date Received: 04/30/12 19:30

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	**480**		10	8.1	ug/L			05/09/12 00:47	10
Tetrachloroethene	**710**		10	3.6	ug/L			05/09/12 00:47	10
trans-1,2-Dichloroethene	ND		10	9.0	ug/L			05/09/12 00:47	10
Trichloroethene	**290**		10	4.6	ug/L			05/09/12 00:47	10
Vinyl chloride	**55**		10	9.0	ug/L			05/09/12 00:47	10

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	*88*		*66 - 137*		*05/09/12 00:47*	*10*
4-Bromofluorobenzene (Surr)	*105*		*73 - 120*		*05/09/12 00:47*	*10*
Toluene-d8 (Surr)	*100*		*71 - 126*		*05/09/12 00:47*	*10*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**6.3**		1.5	0.49	ug/L			05/02/12 16:39	1
Ethene	**1.7**		1.5	0.52	ug/L			05/02/12 16:39	1
Methane	**420**	**B**	100	22	ug/L			05/02/12 15:02	100

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**8200**		1000	1000	ug/L			05/04/12 10:12	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.16**		0.050	0.019	mg/L		05/02/12 08:00	05/02/12 19:56	1
Magnesium	**106**		0.20	0.043	mg/L		05/02/12 08:00	05/02/12 19:56	1
Manganese	**0.18**		0.0030	0.00040	mg/L		05/02/12 08:00	05/02/12 19:56	1
Potassium	**10.9**		0.50	0.10	mg/L		05/02/12 08:00	05/02/12 19:56	1
Sodium	**2450**		1.0	0.32	mg/L		05/02/12 08:00	05/02/12 19:56	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	**0.051**		0.020	0.0090	mg/L			05/02/12 11:15	1
Nitrate	**0.057**		0.050	0.011	mg/L			05/01/12 23:06	1
Nitrite	ND		0.050	0.020	mg/L			05/01/12 23:06	1
Sulfate	**264**	**B**	150	45.0	mg/L			05/08/12 18:06	30
Total Organic Carbon	**1.3**		1.0	0.43	mg/L			05/05/12 07:37	1
Total Alkalinity	**288**		5.0	0.79	mg/L			05/02/12 13:44	1
Chloride	**4230**		121	55.7	mg/L			05/08/12 17:46	121
Sulfide	ND		0.10	0.052	mg/L			05/03/12 12:10	1
Acetic acid	ND		1.0	0.15	mg/L			05/16/12 02:34	1
Formic-acid	ND		1.0	0.11	mg/L			05/16/12 02:34	1
Lactic acid	ND		1.0	0.14	mg/L			05/16/12 02:34	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/16/12 02:34	1
Propionic acid	ND		1.0	0.17	mg/L			05/16/12 02:34	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/16/12 02:34	1

Client Sample ID: MW-7-5-043012-1130

Lab Sample ID: 480-19365-4

Date Collected: 04/30/12 11:30

Matrix: Water

Date Received: 04/30/12 19:30

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	640		200	160	ug/L			05/08/12 16:09	200
Tetrachloroethene	8700		200	72	ug/L			05/08/12 16:09	200
trans-1,2-Dichloroethene	ND		200	180	ug/L			05/08/12 16:09	200
Trichloroethene	760		200	92	ug/L			05/08/12 16:09	200
Vinyl chloride	ND		200	180	ug/L			05/08/12 16:09	200

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*92*		*66 - 137*		*05/08/12 16:09*	*200*
4-Bromofluorobenzene (Surr)	*111*		*73 - 120*		*05/08/12 16:09*	*200*
Toluene-d8 (Surr)	*109*		*71 - 126*		*05/08/12 16:09*	*200*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	1.0	J	1.5	0.49	ug/L			05/02/12 16:56	1
Ethene	1.3	J	1.5	0.52	ug/L			05/02/12 16:56	1
Methane	25	B	1.0	0.22	ug/L			05/02/12 16:56	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	11000		2000	2000	ug/L			05/04/12 10:28	2

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	0.12		0.050	0.019	mg/L		05/02/12 08:00	05/02/12 20:09	1
Magnesium	124		0.20	0.043	mg/L		05/02/12 08:00	05/02/12 20:09	1
Manganese	1.1		0.0030	0.00040	mg/L		05/02/12 08:00	05/02/12 20:09	1
Potassium	8.0		0.50	0.10	mg/L		05/02/12 08:00	05/02/12 20:09	1
Sodium	2530		1.0	0.32	mg/L		05/02/12 08:00	05/02/12 20:09	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	0.043		0.020	0.0090	mg/L			05/02/12 11:20	1
Nitrate	0.89		0.050	0.011	mg/L			05/01/12 23:07	1
Nitrite	0.039	J	0.050	0.020	mg/L			05/01/12 23:07	1
Sulfate	218	B	75.0	22.5	mg/L			05/08/12 17:05	15
Total Organic Carbon	1.8		1.0	0.43	mg/L			05/05/12 08:07	1
Total Alkalinity	320		5.0	0.79	mg/L			05/02/12 13:47	1
Chloride	4600		121	55.7	mg/L			05/08/12 17:46	121
Sulfide	ND		0.10	0.052	mg/L			05/03/12 12:10	1
Acetic acid	ND		1.0	0.15	mg/L			05/16/12 03:03	1
Formic-acid	ND		1.0	0.11	mg/L			05/16/12 03:03	1
Lactic acid	ND		1.0	0.14	mg/L			05/16/12 03:03	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/16/12 03:03	1
Propionic acid	ND		1.0	0.17	mg/L			05/16/12 03:03	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/16/12 03:03	1

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19365-5

Date Collected: 04/30/12 00:00

Matrix: Water

Date Received: 04/30/12 19:30

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/08/12 16:32	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/08/12 16:32	1

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19365-5

Date Collected: 04/30/12 00:00
Matrix: Water
Date Received: 04/30/12 19:30

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/08/12 16:32	1
Trichloroethene	ND		1.0	0.46	ug/L			05/08/12 16:32	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/08/12 16:32	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*98*		*66 - 137*		*05/08/12 16:32*	*1*
4-Bromofluorobenzene (Surr)	*115*		*73 - 120*		*05/08/12 16:32*	*1*
Toluene-d8 (Surr)	*109*		*71 - 126*		*05/08/12 16:32*	*1*

Client Sample ID: MW-7-A-6-050112-0900

Lab Sample ID: 480-19420-1

Date Collected: 05/01/12 09:00
Matrix: Water
Date Received: 05/01/12 17:17

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	**22000**		2000	1600	ug/L			05/09/12 18:52	2000
Tetrachloroethene	**140000**		2000	720	ug/L			05/09/12 18:52	2000
trans-1,2-Dichloroethene	ND		2000	1800	ug/L			05/09/12 18:52	2000
Trichloroethene	**26000**		2000	920	ug/L			05/09/12 18:52	2000
Vinyl chloride	**1800**	**J**	2000	1800	ug/L			05/09/12 18:52	2000

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*117*		*66 - 137*		*05/09/12 18:52*	*2000*
4-Bromofluorobenzene (Surr)	*90*		*73 - 120*		*05/09/12 18:52*	*2000*
Toluene-d8 (Surr)	*103*		*71 - 126*		*05/09/12 18:52*	*2000*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**14**	*	1.5	0.49	ug/L			05/03/12 16:36	1
Ethene	**160**	*	1.5	0.52	ug/L			05/03/12 16:36	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**19000**		2000	2000	ug/L			05/14/12 13:30	2

Method: RSK-175 - Dissolved Gases (GC) - DL

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Methane	**1100**	*	50	11	ug/L			05/03/12 17:55	50

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.49**		0.050	0.019	mg/L		05/03/12 08:15	05/03/12 17:45	1
Magnesium	**95.4**		0.20	0.043	mg/L		05/03/12 08:15	05/03/12 17:45	1
Manganese	**0.92**		0.0030	0.00040	mg/L		05/03/12 08:15	05/03/12 17:45	1
Potassium	**2.7**		0.50	0.10	mg/L		05/03/12 08:15	05/03/12 17:45	1
Sodium	**226**		1.0	0.32	mg/L		05/03/12 08:15	05/03/12 17:45	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	**0.022**		0.020	0.0090	mg/L			05/03/12 12:24	1
Nitrate	ND		0.050	0.011	mg/L			05/02/12 19:59	1
Nitrite	ND		0.050	0.020	mg/L			05/02/12 19:59	1
Sulfate	**111**	**B**	25.0	7.5	mg/L			05/14/12 14:51	5
Total Organic Carbon	**10.5**		1.0	0.43	mg/L			05/05/12 08:37	1

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19202-1

Client Sample ID: MW-7-A-6-050112-0900

Lab Sample ID: 480-19420-1

Date Collected: 05/01/12 09:00
Matrix: Water
Date Received: 05/01/12 17:17

General Chemistry (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Alkalinity	**472**		5.0	0.79	mg/L			05/02/12 14:03	1
Chloride	**695**		30.0	13.8	mg/L			05/08/12 17:40	30
Sulfide	ND		0.10	0.052	mg/L			05/03/12 12:10	1
Acetic acid	ND		1.0	0.15	mg/L			05/15/12 18:47	1
Formic-acid	ND		1.0	0.11	mg/L			05/15/12 18:47	1
Lactic acid	ND		1.0	0.14	mg/L			05/15/12 18:47	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/15/12 18:47	1
Propionic acid	ND		1.0	0.17	mg/L			05/15/12 18:47	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/15/12 18:47	1

Client Sample ID: MW-7-7-050112-1330

Lab Sample ID: 480-19420-2

Date Collected: 05/01/12 13:30
Matrix: Water
Date Received: 05/01/12 17:17

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	**6000**		400	320	ug/L			05/09/12 19:20	400
trans-1,2-Dichloroethene	ND		400	360	ug/L			05/09/12 19:20	400
Trichloroethene	**2600**		400	180	ug/L			05/09/12 19:20	400
Vinyl chloride	**960**		400	360	ug/L			05/09/12 19:20	400

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*110*		*66 - 137*		*05/09/12 19:20*	*400*
4-Bromofluorobenzene (Surr)	*89*		*73 - 120*		*05/09/12 19:20*	*400*
Toluene-d8 (Surr)	*102*		*71 - 126*		*05/09/12 19:20*	*400*

Method: 8260B - Volatile Organic Compounds (GC/MS) - DL

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Tetrachloroethene	**120000**		2000	720	ug/L			05/10/12 00:07	2000

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*110*		*66 - 137*		*05/10/12 00:07*	*2000*
4-Bromofluorobenzene (Surr)	*89*		*73 - 120*		*05/10/12 00:07*	*2000*
Toluene-d8 (Surr)	*103*		*71 - 126*		*05/10/12 00:07*	*2000*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**68**	**J ***	75	25	ug/L			05/03/12 16:53	50
Ethene	**130**	*	75	26	ug/L			05/03/12 16:53	50
Methane	**530**	*	50	11	ug/L			05/03/12 16:53	50

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	ND		1000	1000	ug/L			05/14/12 12:45	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.080**		0.050	0.019	mg/L		05/03/12 08:15	05/03/12 17:48	1
Magnesium	**151**		0.20	0.043	mg/L		05/03/12 08:15	05/03/12 17:48	1
Manganese	**0.0089**		0.0030	0.00040	mg/L		05/03/12 08:15	05/03/12 17:48	1
Potassium	**40.5**		0.50	0.10	mg/L		05/03/12 08:15	05/03/12 17:48	1
Sodium	**1030**		1.0	0.32	mg/L		05/03/12 08:15	05/03/12 17:48	1

Client Sample ID: MW-7-7-050112-1330

Lab Sample ID: 480-19420-2

Date Collected: 05/01/12 13:30

Matrix: Water

Date Received: 05/01/12 17:17

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	**1.8**		0.020	0.0090	mg/L			05/03/12 12:25	1
Nitrate	**0.088**		0.050	0.011	mg/L			05/02/12 22:14	1
Nitrite	**0.022**	**J**	0.050	0.020	mg/L			05/02/12 22:14	1
Sulfate	**451**	**B**	150	45.0	mg/L			05/14/12 16:41	30
Total Organic Carbon	**14.1**		1.0	0.43	mg/L			05/05/12 09:08	1
Total Alkalinity	**42.0**		5.0	0.79	mg/L			05/02/12 14:07	1
Chloride	**687**		30.0	13.8	mg/L			05/08/12 17:40	30
Sulfide	**1.7**		0.20	0.10	mg/L			05/03/12 12:10	2
Acetic acid	**6.1**		1.0	0.15	mg/L			05/15/12 19:17	1
Formic-acid	ND		1.0	0.11	mg/L			05/15/12 19:17	1
Lactic acid	ND		1.0	0.14	mg/L			05/15/12 19:17	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/15/12 19:17	1
Propionic acid	**1.5**		1.0	0.17	mg/L			05/15/12 19:17	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/15/12 19:17	1

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19420-4

Date Collected: 05/01/12 00:00

Matrix: Water

Date Received: 05/01/12 17:17

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/09/12 20:16	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/09/12 20:16	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/09/12 20:16	1
Trichloroethene	ND		1.0	0.46	ug/L			05/09/12 20:16	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/09/12 20:16	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*115*		*66 - 137*		*05/09/12 20:16*	*1*
4-Bromofluorobenzene (Surr)	*87*		*73 - 120*		*05/09/12 20:16*	*1*
Toluene-d8 (Surr)	*103*		*71 - 126*		*05/09/12 20:16*	*1*

Client Sample ID: MW-7-8-050212-0730

Lab Sample ID: 480-19497-5

Date Collected: 05/02/12 07:30

Matrix: Water

Date Received: 05/02/12 18:00

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	**67**		4.0	3.2	ug/L			05/10/12 16:18	4
Tetrachloroethene	**220**		4.0	1.4	ug/L			05/10/12 16:18	4
trans-1,2-Dichloroethene	ND		4.0	3.6	ug/L			05/10/12 16:18	4
Trichloroethene	**130**		4.0	1.8	ug/L			05/10/12 16:18	4
Vinyl chloride	ND		4.0	3.6	ug/L			05/10/12 16:18	4

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*115*		*66 - 137*		*05/10/12 16:18*	*4*
4-Bromofluorobenzene (Surr)	*101*		*73 - 120*		*05/10/12 16:18*	*4*
Toluene-d8 (Surr)	*121*		*71 - 126*		*05/10/12 16:18*	*4*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**21**		15	4.9	ug/L			05/07/12 11:29	10

Client Sample ID: MW-7-8-050212-0730

Lab Sample ID: 480-19497-5

Date Collected: 05/02/12 07:30

Matrix: Water

Date Received: 05/02/12 18:00

Method: RSK-175 - Dissolved Gases (GC) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethene	**7.8**	**J**	15	5.2	ug/L			05/07/12 11:29	10
Methane	**67**	**B**	10	2.2	ug/L			05/07/12 11:29	10

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	ND		1000	1000	ug/L			05/14/12 14:40	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**4.0**		0.050	0.019	mg/L		05/03/12 10:15	05/03/12 20:48	1
Magnesium	**170**		0.20	0.043	mg/L		05/03/12 10:15	05/03/12 20:48	1
Manganese	**0.15**		0.0030	0.00040	mg/L		05/03/12 10:15	05/03/12 20:48	1
Potassium	**38.2**		0.50	0.10	mg/L		05/03/12 10:15	05/03/12 20:48	1
Sodium	**896**		1.0	0.32	mg/L		05/03/12 10:15	05/03/12 20:48	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	**0.25**		0.020	0.0090	mg/L			05/07/12 14:15	1
Nitrate	ND		0.050	0.011	mg/L			05/02/12 20:50	1
Nitrite	ND		0.050	0.020	mg/L			05/02/12 20:50	1
Sulfate	**145**	**B**	25.0	7.5	mg/L			05/14/12 14:51	5
Total Organic Carbon	**0.73**	**J**	1.0	0.43	mg/L			05/07/12 21:41	1
Total Alkalinity	**60.0**		5.0	0.79	mg/L			05/07/12 14:40	1
Chloride	**2330**		50.0	23.0	mg/L			05/11/12 18:48	50
Sulfide	ND		0.10	0.052	mg/L			05/03/12 12:10	1
Acetic acid	ND		1.0	0.15	mg/L			05/15/12 21:42	1
Formic-acid	ND		1.0	0.11	mg/L			05/15/12 21:42	1
Lactic acid	ND		1.0	0.14	mg/L			05/15/12 21:42	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/15/12 21:42	1
Propionic acid	ND		1.0	0.17	mg/L			05/15/12 21:42	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/15/12 21:42	1

Client Sample ID: MW-7-C-2-050312-1015

Lab Sample ID: 480-19600-2

Date Collected: 05/03/12 10:15

Matrix: Water

Date Received: 05/03/12 19:45

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Tetrachloroethene	ND		1.0	0.36	ug/L			05/11/12 13:01	1
trans-1,2-Dichloroethene	**1.2**		1.0	0.90	ug/L			05/11/12 13:01	1
Trichloroethene	ND		1.0	0.46	ug/L			05/11/12 13:01	1
Vinyl chloride	**21**		1.0	0.90	ug/L			05/11/12 13:01	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*117*		*66 - 137*		*05/11/12 13:01*	*1*
4-Bromofluorobenzene (Surr)	*110*		*73 - 120*		*05/11/12 13:01*	*1*
Toluene-d8 (Surr)	*111*		*71 - 126*		*05/11/12 13:01*	*1*

Method: 8260B - Volatile Organic Compounds (GC/MS) - DL

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	**370**		5.0	4.1	ug/L			05/13/12 11:16	5

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*112*		*66 - 137*		*05/13/12 11:16*	*5*

Client Sample ID: MW-7-C-2-050312-1015

Lab Sample ID: 480-19600-2

Date Collected: 05/03/12 10:15

Matrix: Water

Date Received: 05/03/12 19:45

Method: 8260B - Volatile Organic Compounds (GC/MS) - DL (Continued)

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*100*		*73 - 120*		*05/13/12 11:16*	*5*
Toluene-d8 (Surr)	*102*		*71 - 126*		*05/13/12 11:16*	*5*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**9.6**	**J**	15	4.9	ug/L			05/07/12 13:51	10
Ethene	**8.0**	**J**	15	5.2	ug/L			05/07/12 13:51	10
Methane	**82**	**B**	10	2.2	ug/L			05/07/12 13:51	10

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**4800**		1000	1000	ug/L			05/14/12 12:58	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.93**		0.050	0.019	mg/L		05/07/12 07:20	05/07/12 17:57	1
Magnesium	**83.8**		0.20	0.043	mg/L		05/07/12 07:20	05/07/12 17:57	1
Manganese	**0.084**		0.0030	0.00040	mg/L		05/07/12 07:20	05/07/12 17:57	1
Potassium	**7.5**		0.50	0.10	mg/L		05/07/12 07:20	05/07/12 17:57	1
Sodium	**126**		1.0	0.32	mg/L		05/07/12 07:20	05/07/12 17:57	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	**0.39**		0.020	0.0090	mg/L			05/04/12 13:52	1
Nitrate	ND		0.050	0.011	mg/L			05/04/12 20:21	1
Nitrite	ND		0.050	0.020	mg/L			05/04/12 20:21	1
Sulfate	**525**	**B**	100	30.0	mg/L			05/10/12 16:33	20
Total Organic Carbon	**0.67**	**J**	1.0	0.43	mg/L			05/06/12 13:01	1
Total Alkalinity	**260**		5.0	0.79	mg/L			05/07/12 14:40	1
Chloride	**181**		10.0	4.6	mg/L			05/10/12 16:23	10
Sulfide	ND		0.10	0.052	mg/L			05/08/12 08:45	1
Acetic acid	ND		1.0	0.15	mg/L			05/16/12 11:47	1
Formic-acid	ND		1.0	0.11	mg/L			05/16/12 11:47	1
Lactic acid	ND		1.0	0.14	mg/L			05/16/12 11:47	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/16/12 11:47	1
Propionic acid	ND		1.0	0.17	mg/L			05/16/12 11:47	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/16/12 11:47	1

Client Sample ID: MW-7-D-1-050312-1530

Lab Sample ID: 480-19600-3

Date Collected: 05/03/12 15:30

Matrix: Water

Date Received: 05/03/12 19:45

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		4.0	3.2	ug/L			05/11/12 13:24	4
Tetrachloroethene	ND		4.0	1.4	ug/L			05/11/12 13:24	4
trans-1,2-Dichloroethene	ND		4.0	3.6	ug/L			05/11/12 13:24	4
Trichloroethene	ND		4.0	1.8	ug/L			05/11/12 13:24	4
Vinyl chloride	**19**		4.0	3.6	ug/L			05/11/12 13:24	4

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*115*		*66 - 137*		*05/11/12 13:24*	*4*
4-Bromofluorobenzene (Surr)	*112*		*73 - 120*		*05/11/12 13:24*	*4*

Client Sample ID: MW-7-D-1-050312-1530
Date Collected: 05/03/12 15:30
Date Received: 05/03/12 19:45

Lab Sample ID: 480-19600-3
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Toluene-d8 (Surr)	*112*		*71 - 126*		*05/11/12 13:24*	*4*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	52		15	4.9	ug/L			05/07/12 14:08	10
Ethene	14	J	15	5.2	ug/L			05/07/12 14:08	10
Methane	2800	B	100	22	ug/L			05/07/12 15:23	100

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	25000		5000	5000	ug/L			05/14/12 13:35	5

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	61.2		0.050	0.019	mg/L		05/07/12 07:20	05/07/12 17:59	1
Magnesium	388		0.20	0.043	mg/L		05/07/12 07:20	05/08/12 14:45	1
Manganese	10.1		0.0030	0.00040	mg/L		05/07/12 07:20	05/07/12 17:59	1
Potassium	31.4		0.50	0.10	mg/L		05/07/12 07:20	05/07/12 17:59	1
Sodium	358		1.0	0.32	mg/L		05/07/12 07:20	05/07/12 17:59	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	170	B	2.0	0.90	mg/L			05/04/12 14:24	100
Nitrate	ND		0.050	0.011	mg/L			05/04/12 20:22	1
Nitrite	ND		0.050	0.020	mg/L			05/04/12 20:22	1
Sulfate	71.0	B	25.0	7.5	mg/L			05/10/12 16:33	5
Total Organic Carbon	2.3		1.0	0.43	mg/L			05/06/12 13:32	1
Total Alkalinity	244		5.0	0.79	mg/L			05/07/12 14:40	1
Chloride	5890		121	55.7	mg/L			05/10/12 17:01	121
Sulfide	ND		0.10	0.052	mg/L			05/08/12 08:45	1
Acetic acid	ND		1.0	0.15	mg/L			05/16/12 12:16	1
Formic-acid	ND		1.0	0.11	mg/L			05/16/12 12:16	1
Lactic acid	ND		1.0	0.14	mg/L			05/16/12 12:16	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/16/12 12:16	1
Propionic acid	ND		1.0	0.17	mg/L			05/16/12 12:16	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/16/12 12:16	1

Surrogate Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19202-1

Method: 8260B - Volatile Organic Compounds (GC/MS)

Matrix: Water

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)		
		12DCE	BFB	TOL
Lab Sample ID	Client Sample ID	(66-137)	(73-120)	(71-126)
480-19202-1	MW-7-2-042612-1415	103	100	106
480-19297-1	MW-7-1-042712-1000	95	102	103
480-19297-2	MW-7-3-042712-1330	93	102	101
480-19297-3	MW-7-4-042712-1415	94	103	102
480-19297-4	TRIP BLANK	94	100	100
480-19365-3	MW-7-6-043012-0900	88	105	100
480-19365-3 MS	MW-7-6-043012-0900	94	104	102
480-19365-3 MSD	MW-7-6-043012-0900	93	108	102
480-19365-4	MW-7-5-043012-1130	92	111	109
480-19365-5	TRIP BLANK	98	115	109
480-19420-1	MW-7-A-6-050112-0900	117	90	103
480-19420-2	MW-7-7-050112-1330	110	89	102
480-19420-2 - DL	MW-7-7-050112-1330	110	89	103
480-19420-2 MS	MW-7-7-050112-1330	106	92	104
480-19420-2 MSD	MW-7-7-050112-1330	104	94	104
480-19420-4	TRIP BLANK	115	87	103
480-19497-5	MW-7-8-050212-0730	115	101	121
480-19600-2	MW-7-C-2-050312-1015	117	110	111
480-19600-2 - DL	MW-7-C-2-050312-1015	112	100	102
480-19600-3	MW-7-D-1-050312-1530	115	112	112
LCS 480-63255/28	Lab Control Sample	100	103	105
LCS 480-63414/31	Lab Control Sample	93	103	101
LCS 480-63474/4	Lab Control Sample	90	106	106
LCS 480-63572/4	Lab Control Sample	92	106	103
LCS 480-63640/3	Lab Control Sample	101	99	105
LCS 480-63732/3	Lab Control Sample	104	99	107
LCS 480-63819/4	Lab Control Sample	109	97	118
LCS 480-64020/4	Lab Control Sample	110	115	116
LCS 480-64247/5	Lab Control Sample	105	101	99
MB 480-63255/7	Method Blank	102	100	105
MB 480-63414/30	Method Blank	94	101	101
MB 480-63474/5	Method Blank	92	110	107
MB 480-63572/5	Method Blank	93	107	104
MB 480-63640/4	Method Blank	122	92	100
MB 480-63732/4	Method Blank	111	90	104
MB 480-63819/5	Method Blank	115	99	121
MB 480-64020/5	Method Blank	112	111	113
MB 480-64247/6	Method Blank	106	97	98

Surrogate Legend

12DCE = 1,2-Dichloroethane-d4 (Surr)

BFB = 4-Bromofluorobenzene (Surr)

TOL = Toluene-d8 (Surr)

Method: 8260B - Volatile Organic Compounds (GC/MS)

Lab Sample ID: MB 480-63255/7
Matrix: Water
Analysis Batch: 63255

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/06/12 12:02	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/06/12 12:02	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/06/12 12:02	1
Trichloroethene	ND		1.0	0.46	ug/L			05/06/12 12:02	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/06/12 12:02	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*102*		*66 - 137*		*05/06/12 12:02*	*1*
4-Bromofluorobenzene (Surr)	*100*		*73 - 120*		*05/06/12 12:02*	*1*
Toluene-d8 (Surr)	*105*		*71 - 126*		*05/06/12 12:02*	*1*

Lab Sample ID: LCS 480-63255/28
Matrix: Water
Analysis Batch: 63255

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	28.3		ug/L		113	74 - 124
Tetrachloroethene	25.0	29.0		ug/L		116	74 - 122
trans-1,2-Dichloroethene	25.0	30.1		ug/L		120	73 - 127
Trichloroethene	25.0	27.8		ug/L		111	74 - 123

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*100*		*66 - 137*
4-Bromofluorobenzene (Surr)	*103*		*73 - 120*
Toluene-d8 (Surr)	*105*		*71 - 126*

Lab Sample ID: MB 480-63414/30
Matrix: Water
Analysis Batch: 63414

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/07/12 23:49	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/07/12 23:49	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/07/12 23:49	1
Trichloroethene	ND		1.0	0.46	ug/L			05/07/12 23:49	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/07/12 23:49	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*94*		*66 - 137*		*05/07/12 23:49*	*1*
4-Bromofluorobenzene (Surr)	*101*		*73 - 120*		*05/07/12 23:49*	*1*
Toluene-d8 (Surr)	*101*		*71 - 126*		*05/07/12 23:49*	*1*

Lab Sample ID: LCS 480-63414/31
Matrix: Water
Analysis Batch: 63414

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	27.3		ug/L		109	74 - 124
Tetrachloroethene	25.0	27.1		ug/L		108	74 - 122

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 480-63414/31
Matrix: Water
Analysis Batch: 63414

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
trans-1,2-Dichloroethene			25.0	28.5		ug/L		114	73 - 127		
Trichloroethene			25.0	26.5		ug/L		106	74 - 123		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*93*		*66 - 137*
4-Bromofluorobenzene (Surr)	*103*		*73 - 120*
Toluene-d8 (Surr)	*101*		*71 - 126*

Lab Sample ID: MB 480-63474/5
Matrix: Water
Analysis Batch: 63474

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/08/12 12:03	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/08/12 12:03	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/08/12 12:03	1
Trichloroethene	ND		1.0	0.46	ug/L			05/08/12 12:03	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/08/12 12:03	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*92*		*66 - 137*		*05/08/12 12:03*	*1*
4-Bromofluorobenzene (Surr)	*110*		*73 - 120*		*05/08/12 12:03*	*1*
Toluene-d8 (Surr)	*107*		*71 - 126*		*05/08/12 12:03*	*1*

Lab Sample ID: LCS 480-63474/4
Matrix: Water
Analysis Batch: 63474

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
cis-1,2-Dichloroethene			25.0	25.9		ug/L		104	74 - 124		
Tetrachloroethene			25.0	28.9		ug/L		116	74 - 122		
trans-1,2-Dichloroethene			25.0	27.3		ug/L		109	73 - 127		
Trichloroethene			25.0	24.8		ug/L		99	74 - 123		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*90*		*66 - 137*
4-Bromofluorobenzene (Surr)	*106*		*73 - 120*
Toluene-d8 (Surr)	*106*		*71 - 126*

Lab Sample ID: MB 480-63572/5
Matrix: Water
Analysis Batch: 63572

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/08/12 23:15	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/08/12 23:15	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/08/12 23:15	1
Trichloroethene	ND		1.0	0.46	ug/L			05/08/12 23:15	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/08/12 23:15	1

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 480-63572/5
Matrix: Water
Analysis Batch: 63572

Client Sample ID: Method Blank
Prep Type: Total/NA

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	93		66 - 137		05/08/12 23:15	1
4-Bromofluorobenzene (Surr)	107		73 - 120		05/08/12 23:15	1
Toluene-d8 (Surr)	104		71 - 126		05/08/12 23:15	1

Lab Sample ID: LCS 480-63572/4
Matrix: Water
Analysis Batch: 63572

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
cis-1,2-Dichloroethene			25.0	25.1		ug/L		100	74 - 124		
Tetrachloroethene			25.0	27.2		ug/L		109	74 - 122		
trans-1,2-Dichloroethene			25.0	25.5		ug/L		102	73 - 127		
Trichloroethene			25.0	23.9		ug/L		96	74 - 123		

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	92		66 - 137
4-Bromofluorobenzene (Surr)	106		73 - 120
Toluene-d8 (Surr)	103		71 - 126

Lab Sample ID: 480-19365-3 MS
Matrix: Water
Analysis Batch: 63572

Client Sample ID: MW-7-6-043012-0900
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
cis-1,2-Dichloroethene	480		250	700		ug/L		88	74 - 124		
Tetrachloroethene	710		250	898		ug/L		75	74 - 122		
trans-1,2-Dichloroethene	ND		250	271		ug/L		108	73 - 127		
Trichloroethene	290		250	522		ug/L		93	74 - 123		

Surrogate	MS %Recovery	MS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	94		66 - 137
4-Bromofluorobenzene (Surr)	104		73 - 120
Toluene-d8 (Surr)	102		71 - 126

Lab Sample ID: 480-19365-3 MSD
Matrix: Water
Analysis Batch: 63572

Client Sample ID: MW-7-6-043012-0900
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
cis-1,2-Dichloroethene	480		250	720		ug/L		96	74 - 124	3	15
Tetrachloroethene	710		250	863	F	ug/L		61	74 - 122	4	20
trans-1,2-Dichloroethene	ND		250	266		ug/L		106	73 - 127	2	20
Trichloroethene	290		250	531		ug/L		97	74 - 123	2	16

Surrogate	MSD %Recovery	MSD Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	93		66 - 137
4-Bromofluorobenzene (Surr)	108		73 - 120
Toluene-d8 (Surr)	102		71 - 126

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 480-63640/4
Matrix: Water
Analysis Batch: 63640

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/09/12 11:23	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/09/12 11:23	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/09/12 11:23	1
Trichloroethene	ND		1.0	0.46	ug/L			05/09/12 11:23	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/09/12 11:23	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*122*		*66 - 137*		*05/09/12 11:23*	*1*
4-Bromofluorobenzene (Surr)	*92*		*73 - 120*		*05/09/12 11:23*	*1*
Toluene-d8 (Surr)	*100*		*71 - 126*		*05/09/12 11:23*	*1*

Lab Sample ID: LCS 480-63640/3
Matrix: Water
Analysis Batch: 63640

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	26.7		ug/L		107	74 - 124
Tetrachloroethene	25.0	24.6		ug/L		98	74 - 122
trans-1,2-Dichloroethene	25.0	27.3		ug/L		109	73 - 127
Trichloroethene	25.0	26.5		ug/L		106	74 - 123

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*101*		*66 - 137*
4-Bromofluorobenzene (Surr)	*99*		*73 - 120*
Toluene-d8 (Surr)	*105*		*71 - 126*

Lab Sample ID: 480-19420-2 MS
Matrix: Water
Analysis Batch: 63640

Client Sample ID: MW-7-7-050112-1330
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	6000		10000	15700		ug/L		97	74 - 124
Tetrachloroethene	170000		10000	157000	E 4	ug/L		-102	74 - 122
trans-1,2-Dichloroethene	ND		10000	10600		ug/L		106	73 - 127
Trichloroethene	2600		10000	13000		ug/L		104	74 - 123

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*106*		*66 - 137*
4-Bromofluorobenzene (Surr)	*92*		*73 - 120*
Toluene-d8 (Surr)	*104*		*71 - 126*

Lab Sample ID: 480-19420-2 MSD
Matrix: Water
Analysis Batch: 63640

Client Sample ID: MW-7-7-050112-1330
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
cis-1,2-Dichloroethene	6000		10000	16900		ug/L		109	74 - 124	7	15
Tetrachloroethene	170000		10000	166000	E 4	ug/L		-10	74 - 122	6	20
trans-1,2-Dichloroethene	ND		10000	11100		ug/L		111	73 - 127	4	20

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 480-19420-2 MSD
Matrix: Water
Analysis Batch: 63640

Client Sample ID: MW-7-7-050112-1330
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Trichloroethene	2600		10000	13400		ug/L		108	74 - 123	3	16

Surrogate	*MSD %Recovery*	*MSD Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*104*		*66 - 137*
4-Bromofluorobenzene (Surr)	*94*		*73 - 120*
Toluene-d8 (Surr)	*104*		*71 - 126*

Lab Sample ID: MB 480-63732/4
Matrix: Water
Analysis Batch: 63732

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/09/12 23:04	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/09/12 23:04	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/09/12 23:04	1
Trichloroethene	ND		1.0	0.46	ug/L			05/09/12 23:04	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/09/12 23:04	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*111*		*66 - 137*		*05/09/12 23:04*	*1*
4-Bromofluorobenzene (Surr)	*90*		*73 - 120*		*05/09/12 23:04*	*1*
Toluene-d8 (Surr)	*104*		*71 - 126*		*05/09/12 23:04*	*1*

Lab Sample ID: LCS 480-63732/3
Matrix: Water
Analysis Batch: 63732

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	27.9		ug/L		112	74 - 124
Tetrachloroethene	25.0	26.9		ug/L		108	74 - 122
trans-1,2-Dichloroethene	25.0	29.0		ug/L		116	73 - 127
Trichloroethene	25.0	28.0		ug/L		112	74 - 123

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*104*		*66 - 137*
4-Bromofluorobenzene (Surr)	*99*		*73 - 120*
Toluene-d8 (Surr)	*107*		*71 - 126*

Lab Sample ID: MB 480-63819/5
Matrix: Water
Analysis Batch: 63819

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/10/12 11:24	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/10/12 11:24	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/10/12 11:24	1
Trichloroethene	ND		1.0	0.46	ug/L			05/10/12 11:24	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/10/12 11:24	1

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 480-63819/5
Matrix: Water
Analysis Batch: 63819

Client Sample ID: Method Blank
Prep Type: Total/NA

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	*115*		*66 - 137*		*05/10/12 11:24*	*1*
4-Bromofluorobenzene (Surr)	*99*		*73 - 120*		*05/10/12 11:24*	*1*
Toluene-d8 (Surr)	*121*		*71 - 126*		*05/10/12 11:24*	*1*

Lab Sample ID: LCS 480-63819/4
Matrix: Water
Analysis Batch: 63819

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	25.3		ug/L		101	74 - 124
Tetrachloroethene	25.0	27.2		ug/L		109	74 - 122
trans-1,2-Dichloroethene	25.0	26.7		ug/L		107	73 - 127
Trichloroethene	25.0	25.4		ug/L		102	74 - 123

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	*109*		*66 - 137*
4-Bromofluorobenzene (Surr)	*97*		*73 - 120*
Toluene-d8 (Surr)	*118*		*71 - 126*

Lab Sample ID: MB 480-64020/5
Matrix: Water
Analysis Batch: 64020

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/11/12 11:17	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/11/12 11:17	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/11/12 11:17	1
Trichloroethene	ND		1.0	0.46	ug/L			05/11/12 11:17	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/11/12 11:17	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	*112*		*66 - 137*		*05/11/12 11:17*	*1*
4-Bromofluorobenzene (Surr)	*111*		*73 - 120*		*05/11/12 11:17*	*1*
Toluene-d8 (Surr)	*113*		*71 - 126*		*05/11/12 11:17*	*1*

Lab Sample ID: LCS 480-64020/4
Matrix: Water
Analysis Batch: 64020

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	26.8		ug/L		107	74 - 124
Tetrachloroethene	25.0	27.3		ug/L		109	74 - 122
trans-1,2-Dichloroethene	25.0	26.2		ug/L		105	73 - 127
Trichloroethene	25.0	26.6		ug/L		106	74 - 123

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	*110*		*66 - 137*
4-Bromofluorobenzene (Surr)	*115*		*73 - 120*

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 480-64020/4
Matrix: Water
Analysis Batch: 64020

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Surrogate	LCS %Recovery	LCS Qualifier	Limits
Toluene-d8 (Surr)	*116*		*71 - 126*

Lab Sample ID: MB 480-64247/6
Matrix: Water
Analysis Batch: 64247

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/13/12 10:35	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/13/12 10:35	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/13/12 10:35	1
Trichloroethene	ND		1.0	0.46	ug/L			05/13/12 10:35	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/13/12 10:35	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	*106*		*66 - 137*		*05/13/12 10:35*	*1*
4-Bromofluorobenzene (Surr)	*97*		*73 - 120*		*05/13/12 10:35*	*1*
Toluene-d8 (Surr)	*98*		*71 - 126*		*05/13/12 10:35*	*1*

Lab Sample ID: LCS 480-64247/5
Matrix: Water
Analysis Batch: 64247

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	29.9		ug/L		120	74 - 124
Tetrachloroethene	25.0	27.4		ug/L		110	74 - 122
trans-1,2-Dichloroethene	25.0	31.1		ug/L		124	73 - 127
Trichloroethene	25.0	29.2		ug/L		117	74 - 123

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	*105*		*66 - 137*
4-Bromofluorobenzene (Surr)	*101*		*73 - 120*
Toluene-d8 (Surr)	*99*		*71 - 126*

Method: RSK-175 - Dissolved Gases (GC)

Lab Sample ID: MB 200-38245/3
Matrix: Water
Analysis Batch: 38245

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	ND		1000	1000	ug/L			05/04/12 08:23	1

Lab Sample ID: LCS 200-38245/2
Matrix: Water
Analysis Batch: 38245

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Carbon dioxide	5010	5150		ug/L		103	70 - 130

Method: RSK-175 - Dissolved Gases (GC) (Continued)

Lab Sample ID: MB 200-38628/4
Matrix: Water
Analysis Batch: 38628

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	ND		1000	1000	ug/L			05/14/12 11:34	1

Lab Sample ID: LCS 200-38628/3
Matrix: Water
Analysis Batch: 38628

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Carbon dioxide	5010	5330		ug/L		106	70 - 130

Lab Sample ID: MB 480-62347/2
Matrix: Water
Analysis Batch: 62347

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	0.845	J	1.5	0.49	ug/L			04/30/12 17:16	1
Ethene	0.670	J	1.5	0.52	ug/L			04/30/12 17:16	1
Methane	0.511	J	1.0	0.22	ug/L			04/30/12 17:16	1

Lab Sample ID: LCS 480-62347/3
Matrix: Water
Analysis Batch: 62347

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethane	7.19	13.7	*	ug/L		191	71 - 147
Ethene	6.73	12.8	*	ug/L		190	71 - 147
Methane	3.88	7.21	*	ug/L		186	48 - 174

Lab Sample ID: LCSD 480-62347/4
Matrix: Water
Analysis Batch: 62347

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ethane	7.19	13.6	*	ug/L		189	71 - 147	1	50
Ethene	6.73	12.9	*	ug/L		192	71 - 147	1	50
Methane	3.88	7.37	*	ug/L		190	48 - 174	2	50

Lab Sample ID: MB 480-62604/3
Matrix: Water
Analysis Batch: 62604

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	ND		1.5	0.49	ug/L			05/02/12 08:32	1
Ethene	ND		1.5	0.52	ug/L			05/02/12 08:32	1
Methane	0.522	J	1.0	0.22	ug/L			05/02/12 08:32	1

Lab Sample ID: LCS 480-62604/4
Matrix: Water
Analysis Batch: 62604

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethane	7.19	8.33		ug/L		116	71 - 147

Method: RSK-175 - Dissolved Gases (GC) (Continued)

Lab Sample ID: LCS 480-62604/4
Matrix: Water
Analysis Batch: 62604

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethene	6.73	7.84		ug/L		116	71 - 147
Methane	3.88	4.65		ug/L		120	48 - 174

Lab Sample ID: LCSD 480-62604/5
Matrix: Water
Analysis Batch: 62604

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ethane	7.19	8.43		ug/L		117	71 - 147	1	50
Ethene	6.73	7.90		ug/L		117	71 - 147	1	50
Methane	3.88	4.60		ug/L		119	48 - 174	1	50

Lab Sample ID: MB 480-62926/3
Matrix: Water
Analysis Batch: 62926

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	ND		1.5	0.49	ug/L			05/03/12 15:53	1
Ethene	ND		1.5	0.52	ug/L			05/03/12 15:53	1
Methane	ND		1.0	0.22	ug/L			05/03/12 15:53	1

Lab Sample ID: LCS 480-62926/2
Matrix: Water
Analysis Batch: 62926

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethane	14.4	16.0		ug/L		111	71 - 147
Ethene	13.5	15.2		ug/L		113	71 - 147
Methane	7.76	8.49		ug/L		109	48 - 174

Lab Sample ID: LCSD 480-62926/4
Matrix: Water
Analysis Batch: 62926

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ethane	7.19	14.1	*	ug/L		196	71 - 147	13	50
Ethene	6.73	13.2	*	ug/L		196	71 - 147	14	50
Methane	3.88	7.92	*	ug/L		204	48 - 174	7	50

Lab Sample ID: MB 480-63265/2
Matrix: Water
Analysis Batch: 63265

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	ND		1.5	0.49	ug/L			05/07/12 07:56	1
Ethene	ND		1.5	0.52	ug/L			05/07/12 07:56	1
Methane	0.523	J	1.0	0.22	ug/L			05/07/12 07:56	1

Method: RSK-175 - Dissolved Gases (GC) (Continued)

Lab Sample ID: LCS 480-63265/3
Matrix: Water
Analysis Batch: 63265

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethane	7.19	8.44		ug/L		117	71 - 147
Ethene	6.73	7.81		ug/L		116	71 - 147
Methane	3.88	4.65		ug/L		120	48 - 174

Lab Sample ID: LCSD 480-63265/4
Matrix: Water
Analysis Batch: 63265

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ethane	7.19	8.44		ug/L		117	71 - 147	0	50
Ethene	6.73	7.76		ug/L		115	71 - 147	1	50
Methane	3.88	4.73		ug/L		122	48 - 174	2	50

Method: 6010B - Metals (ICP)

Lab Sample ID: MB 480-61766/1-A
Matrix: Water
Analysis Batch: 62075

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 61766

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		04/27/12 08:40	04/27/12 17:10	1
Magnesium	ND		0.20	0.043	mg/L		04/27/12 08:40	04/27/12 17:10	1
Manganese	0.000760	J	0.0030	0.00040	mg/L		04/27/12 08:40	04/27/12 17:10	1
Potassium	ND		0.50	0.10	mg/L		04/27/12 08:40	04/27/12 17:10	1
Sodium	ND		1.0	0.32	mg/L		04/27/12 08:40	04/27/12 17:10	1

Lab Sample ID: LCS 480-61766/2-A
Matrix: Water
Analysis Batch: 62075

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 61766

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	10.0	9.49		mg/L		95	80 - 120
Magnesium	10.0	9.58		mg/L		96	80 - 120
Manganese	0.200	0.201		mg/L		100	80 - 120
Potassium	10.0	9.78		mg/L		98	80 - 120
Sodium	10.0	9.78		mg/L		98	80 - 120

Lab Sample ID: MB 480-62005/1-A
Matrix: Water
Analysis Batch: 62217

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 62005

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		04/28/12 08:45	04/28/12 15:43	1
Magnesium	ND		0.20	0.043	mg/L		04/28/12 08:45	04/28/12 15:43	1
Manganese	0.000880	J	0.0030	0.00040	mg/L		04/28/12 08:45	04/28/12 15:43	1
Potassium	ND		0.50	0.10	mg/L		04/28/12 08:45	04/28/12 15:43	1
Sodium	ND		1.0	0.32	mg/L		04/28/12 08:45	04/28/12 15:43	1

Method: 6010B - Metals (ICP) (Continued)

Lab Sample ID: LCS 480-62005/2-A
Matrix: Water
Analysis Batch: 62217

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 62005

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	10.0	10.15		mg/L		101	80 - 120
Magnesium	10.0	10.07		mg/L		101	80 - 120
Manganese	0.200	0.207		mg/L		103	80 - 120
Potassium	10.0	10.24		mg/L		102	80 - 120
Sodium	10.0	10.35		mg/L		103	80 - 120

Lab Sample ID: MB 480-62531/1-A
Matrix: Water
Analysis Batch: 62800

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 62531

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		05/02/12 08:00	05/02/12 19:40	1
Magnesium	ND		0.20	0.043	mg/L		05/02/12 08:00	05/02/12 19:40	1
Manganese	ND		0.0030	0.00040	mg/L		05/02/12 08:00	05/02/12 19:40	1
Potassium	ND		0.50	0.10	mg/L		05/02/12 08:00	05/02/12 19:40	1
Sodium	ND		1.0	0.32	mg/L		05/02/12 08:00	05/02/12 19:40	1

Lab Sample ID: LCS 480-62531/2-A
Matrix: Water
Analysis Batch: 62800

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 62531

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	10.0	9.58		mg/L		96	80 - 120
Magnesium	10.0	9.24		mg/L		92	80 - 120
Manganese	0.200	0.196		mg/L		98	80 - 120
Potassium	10.0	9.43		mg/L		94	80 - 120
Sodium	10.0	9.34		mg/L		93	80 - 120

Lab Sample ID: 480-19365-3 MS
Matrix: Water
Analysis Batch: 62800

Client Sample ID: MW-7-6-043012-0900
Prep Type: Total/NA
Prep Batch: 62531

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	0.16		10.0	9.53		mg/L		94	75 - 125
Magnesium	106		10.0	113.8	4	mg/L		79	75 - 125
Manganese	0.18		0.200	0.372		mg/L		95	75 - 125
Potassium	10.9		10.0	21.33		mg/L		104	75 - 125
Sodium	2450		10.0	2443	4	mg/L		-61	75 - 125

Lab Sample ID: 480-19365-3 MSD
Matrix: Water
Analysis Batch: 62800

Client Sample ID: MW-7-6-043012-0900
Prep Type: Total/NA
Prep Batch: 62531

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Iron	0.16		10.0	9.77		mg/L		96	75 - 125	2	20
Magnesium	106		10.0	116.0	4	mg/L		101	75 - 125	2	20
Manganese	0.18		0.200	0.379		mg/L		99	75 - 125	2	20
Potassium	10.9		10.0	21.75		mg/L		108	75 - 125	2	20
Sodium	2450		10.0	2496	4	mg/L		464	75 - 125	2	20

Method: 6010B - Metals (ICP) (Continued)

Lab Sample ID: MB 480-62755/1-A
Matrix: Water
Analysis Batch: 63017

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 62755

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		05/03/12 08:15	05/03/12 17:12	1
Magnesium	ND		0.20	0.043	mg/L		05/03/12 08:15	05/03/12 17:12	1
Manganese	ND		0.0030	0.00040	mg/L		05/03/12 08:15	05/03/12 17:12	1
Potassium	ND		0.50	0.10	mg/L		05/03/12 08:15	05/03/12 17:12	1
Sodium	ND		1.0	0.32	mg/L		05/03/12 08:15	05/03/12 17:12	1

Lab Sample ID: LCS 480-62755/2-A
Matrix: Water
Analysis Batch: 63017

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 62755

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	10.0	10.33		mg/L		103	80 - 120
Magnesium	10.0	10.09		mg/L		101	80 - 120
Manganese	0.200	0.204		mg/L		102	80 - 120
Potassium	10.0	10.25		mg/L		102	80 - 120
Sodium	10.0	10.22		mg/L		102	80 - 120

Lab Sample ID: MB 480-62828/1-A
Matrix: Water
Analysis Batch: 63029

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 62828

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		05/03/12 10:15	05/03/12 19:39	1
Magnesium	ND		0.20	0.043	mg/L		05/03/12 10:15	05/03/12 19:39	1
Manganese	ND		0.0030	0.00040	mg/L		05/03/12 10:15	05/03/12 19:39	1
Potassium	ND		0.50	0.10	mg/L		05/03/12 10:15	05/03/12 19:39	1
Sodium	ND		1.0	0.32	mg/L		05/03/12 10:15	05/03/12 19:39	1

Lab Sample ID: LCS 480-62828/2-A
Matrix: Water
Analysis Batch: 63029

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 62828

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	10.0	9.75		mg/L		98	80 - 120
Magnesium	10.0	9.54		mg/L		95	80 - 120
Manganese	0.200	0.205		mg/L		103	80 - 120
Potassium	10.0	9.33		mg/L		93	80 - 120
Sodium	10.0	9.43		mg/L		94	80 - 120

Lab Sample ID: MB 480-63214/1-A
Matrix: Water
Analysis Batch: 63452

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 63214

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		05/07/12 07:20	05/07/12 16:59	1
Magnesium	ND		0.20	0.043	mg/L		05/07/12 07:20	05/07/12 16:59	1
Manganese	ND		0.0030	0.00040	mg/L		05/07/12 07:20	05/07/12 16:59	1
Potassium	ND		0.50	0.10	mg/L		05/07/12 07:20	05/07/12 16:59	1
Sodium	ND		1.0	0.32	mg/L		05/07/12 07:20	05/07/12 16:59	1

Method: 6010B - Metals (ICP) (Continued)

Lab Sample ID: LCS 480-63214/2-A
Matrix: Water
Analysis Batch: 63452

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 63214

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	10.0	10.10		mg/L		101	80 - 120
Magnesium	10.0	10.01		mg/L		100	80 - 120
Manganese	0.200	0.205		mg/L		103	80 - 120
Potassium	10.0	9.77		mg/L		98	80 - 120
Sodium	10.0	9.72		mg/L		97	80 - 120

Method: 350.1 - Nitrogen, Ammonia

Lab Sample ID: MB 480-62155/147
Matrix: Water
Analysis Batch: 62155

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			04/28/12 13:36	1

Lab Sample ID: LCS 480-62155/148
Matrix: Water
Analysis Batch: 62155

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	0.978		mg/L		98	90 - 110

Lab Sample ID: MB 480-62524/147
Matrix: Water
Analysis Batch: 62524

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/01/12 14:08	1

Lab Sample ID: MB 480-62524/75
Matrix: Water
Analysis Batch: 62524

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/01/12 12:53	1

Lab Sample ID: LCS 480-62524/148
Matrix: Water
Analysis Batch: 62524

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	0.996		mg/L		100	90 - 110

Lab Sample ID: LCS 480-62524/76
Matrix: Water
Analysis Batch: 62524

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	1.00		mg/L		100	90 - 110

Method: 350.1 - Nitrogen, Ammonia (Continued)

Lab Sample ID: MB 480-62682/3
Matrix: Water
Analysis Batch: 62682

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/02/12 11:08	1

Lab Sample ID: LCS 480-62682/4
Matrix: Water
Analysis Batch: 62682

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	0.961		mg/L		96	90 - 110

Lab Sample ID: 480-19365-3 MS
Matrix: Water
Analysis Batch: 62682

Client Sample ID: MW-7-6-043012-0900
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	0.051		0.200	0.232		mg/L		90	54 - 150

Lab Sample ID: 480-19365-3 DU
Matrix: Water
Analysis Batch: 62682

Client Sample ID: MW-7-6-043012-0900
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Ammonia	0.051		0.0478		mg/L		7	20

Lab Sample ID: MB 480-62905/3
Matrix: Water
Analysis Batch: 62905

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/03/12 12:21	1

Lab Sample ID: LCS 480-62905/4
Matrix: Water
Analysis Batch: 62905

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	0.988		mg/L		99	90 - 110

Lab Sample ID: MB 480-63137/147
Matrix: Water
Analysis Batch: 63137

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	0.0166	J	0.020	0.0090	mg/L			05/04/12 14:13	1

Lab Sample ID: LCS 480-63137/148
Matrix: Water
Analysis Batch: 63137

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	1.01		mg/L		101	90 - 110

Method: 350.1 - Nitrogen, Ammonia (Continued)

Lab Sample ID: MB 480-63387/3
Matrix: Water
Analysis Batch: 63387

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/07/12 14:12	1

Lab Sample ID: LCS 480-63387/4
Matrix: Water
Analysis Batch: 63387

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	0.964		mg/L		96	90 - 110

Method: 353.2 - Nitrogen, Nitrite

Lab Sample ID: MB 480-61789/27
Matrix: Water
Analysis Batch: 61789

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrite	0.0224	J	0.050	0.020	mg/L			04/27/12 00:35	1

Lab Sample ID: MB 480-61789/51
Matrix: Water
Analysis Batch: 61789

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrite	ND		0.050	0.020	mg/L			04/27/12 01:00	1

Lab Sample ID: LCS 480-61789/28
Matrix: Water
Analysis Batch: 61789

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrite	1.50	1.50		mg/L		100	90 - 110

Lab Sample ID: LCS 480-61789/52
Matrix: Water
Analysis Batch: 61789

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrite	1.50	1.51		mg/L		101	90 - 110

Lab Sample ID: MB 480-62012/3
Matrix: Water
Analysis Batch: 62012

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrite	ND		0.050	0.020	mg/L			04/27/12 22:12	1

Method: 353.2 - Nitrogen, Nitrite (Continued)

Lab Sample ID: LCS 480-62012/4
Matrix: Water
Analysis Batch: 62012

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrite	1.50	1.51		mg/L		101	90 - 110

Lab Sample ID: MB 480-62595/3
Matrix: Water
Analysis Batch: 62595

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrite	ND		0.050	0.020	mg/L			05/01/12 23:00	1

Lab Sample ID: LCS 480-62595/4
Matrix: Water
Analysis Batch: 62595

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrite	1.50	1.54		mg/L		103	90 - 110

Lab Sample ID: MB 480-62778/3
Matrix: Water
Analysis Batch: 62778

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrite	ND		0.050	0.020	mg/L			05/02/12 22:12	1

Lab Sample ID: LCS 480-62778/4
Matrix: Water
Analysis Batch: 62778

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrite	1.50	1.42		mg/L		95	90 - 110

Method: 9038 - Sulfate, Turbidimetric

Lab Sample ID: MB 480-63103/138
Matrix: Water
Analysis Batch: 63103

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.73	J	5.0	1.5	mg/L			05/03/12 21:51	1

Lab Sample ID: MB 480-63103/150
Matrix: Water
Analysis Batch: 63103

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.71	J	5.0	1.5	mg/L			05/03/12 22:31	1

Method: 9038 - Sulfate, Turbidimetric (Continued)

Lab Sample ID: LCS 480-63103/137
Matrix: Water
Analysis Batch: 63103

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	30.80		mg/L		103	90 - 110

Lab Sample ID: LCS 480-63103/149
Matrix: Water
Analysis Batch: 63103

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	30.71		mg/L		102	90 - 110

Lab Sample ID: MB 480-63649/25
Matrix: Water
Analysis Batch: 63649

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.69	J	5.0	1.5	mg/L			05/08/12 16:58	1

Lab Sample ID: MB 480-63649/44
Matrix: Water
Analysis Batch: 63649

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.84	J	5.0	1.5	mg/L			05/08/12 18:06	1

Lab Sample ID: LCS 480-63649/24
Matrix: Water
Analysis Batch: 63649

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	29.50		mg/L		98	90 - 110

Lab Sample ID: LCS 480-63649/43
Matrix: Water
Analysis Batch: 63649

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	30.28		mg/L		101	90 - 110

Lab Sample ID: MB 480-64026/28
Matrix: Water
Analysis Batch: 64026

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	ND		5.0	1.5	mg/L			05/10/12 12:50	1

Lab Sample ID: MB 480-64026/36
Matrix: Water
Analysis Batch: 64026

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.83	J	5.0	1.5	mg/L			05/10/12 14:26	1

Method: 9038 - Sulfate, Turbidimetric (Continued)

Lab Sample ID: MB 480-64026/7
Matrix: Water
Analysis Batch: 64026

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	ND		5.0	1.5	mg/L			05/10/12 11:47	1

Lab Sample ID: LCS 480-64026/35
Matrix: Water
Analysis Batch: 64026

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	31.68		mg/L		106	90 - 110

Lab Sample ID: LCS 480-64026/6
Matrix: Water
Analysis Batch: 64026

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	31.50		mg/L		105	90 - 110

Lab Sample ID: MB 480-64501/60
Matrix: Water
Analysis Batch: 64501

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	2.38	J	5.0	1.5	mg/L			05/14/12 14:41	1

Lab Sample ID: MB 480-64501/82
Matrix: Water
Analysis Batch: 64501

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	2.05	J	5.0	1.5	mg/L			05/14/12 16:38	1

Lab Sample ID: LCS 480-64501/59
Matrix: Water
Analysis Batch: 64501

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	31.45		mg/L		105	90 - 110

Lab Sample ID: LCS 480-64501/81
Matrix: Water
Analysis Batch: 64501

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	31.80		mg/L		106	90 - 110

Method: 9060 - Organic Carbon, Total (TOC)

Lab Sample ID: MB 480-62648/27
Matrix: Water
Analysis Batch: 62648

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Organic Carbon	ND		1.0	0.43	mg/L			05/01/12 01:50	1

Lab Sample ID: LCS 480-62648/28
Matrix: Water
Analysis Batch: 62648

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	60.0	54.44		mg/L		91	90 - 110

Lab Sample ID: 480-19202-1 DU
Matrix: Water
Analysis Batch: 62648

Client Sample ID: MW-7-2-042612-1415
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Total Organic Carbon	1.6		1.61		mg/L		1	20

Lab Sample ID: MB 480-62649/3
Matrix: Water
Analysis Batch: 62649

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Organic Carbon	ND		1.0	0.43	mg/L			04/30/12 18:02	1

Lab Sample ID: LCS 480-62649/4
Matrix: Water
Analysis Batch: 62649

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	60.0	60.60		mg/L		101	90 - 110

Lab Sample ID: 480-19297-1 DU
Matrix: Water
Analysis Batch: 62649

Client Sample ID: MW-7-1-042712-1000
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Total Organic Carbon	0.97	J	0.940	J	mg/L		3	20

Lab Sample ID: MB 480-63238/3
Matrix: Water
Analysis Batch: 63238

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Organic Carbon	ND		1.0	0.43	mg/L			05/05/12 02:13	1

Lab Sample ID: LCS 480-63238/4
Matrix: Water
Analysis Batch: 63238

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	60.0	57.93		mg/L		97	90 - 110

Method: 9060 - Organic Carbon, Total (TOC) (Continued)

Lab Sample ID: MB 480-63278/3
Matrix: Water
Analysis Batch: 63278

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Organic Carbon	ND		1.0	0.43	mg/L			05/06/12 06:12	1

Lab Sample ID: LCS 480-63278/4
Matrix: Water
Analysis Batch: 63278

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	60.0	59.91		mg/L		100	90 - 110

Lab Sample ID: 480-19600-3 DU
Matrix: Water
Analysis Batch: 63278

Client Sample ID: MW-7-D-1-050312-1530
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Total Organic Carbon	2.3		2.45		mg/L		6	20

Lab Sample ID: MB 480-63638/3
Matrix: Water
Analysis Batch: 63638

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Organic Carbon	ND		1.0	0.43	mg/L			05/07/12 19:14	1

Lab Sample ID: LCS 480-63638/4
Matrix: Water
Analysis Batch: 63638

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	60.0	57.35		mg/L		96	90 - 110

Method: SM 2320B - Alkalinity

Lab Sample ID: MB 480-62526/3
Matrix: Water
Analysis Batch: 62526

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Alkalinity	ND		5.0	0.79	mg/L			04/30/12 13:10	1

Lab Sample ID: LCS 480-62526/4
Matrix: Water
Analysis Batch: 62526

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Alkalinity	1000	936.0		mg/L		94	90 - 110

Method: SM 2320B - Alkalinity (Continued)

Lab Sample ID: MB 480-62729/3
Matrix: Water
Analysis Batch: 62729

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Alkalinity	ND		5.0	0.79	mg/L			05/02/12 13:21	1

Lab Sample ID: LCS 480-62729/4
Matrix: Water
Analysis Batch: 62729

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Alkalinity	1000	956.0		mg/L		96	90 - 110

Lab Sample ID: MB 480-63392/3
Matrix: Water
Analysis Batch: 63392

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Alkalinity	ND		5.0	0.79	mg/L			05/07/12 14:40	1

Lab Sample ID: LCS 480-63392/4
Matrix: Water
Analysis Batch: 63392

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Alkalinity	1000	952.0		mg/L		95	90 - 110

Method: SM 4500 Cl- E - Chloride, Total

Lab Sample ID: MB 480-63105/100
Matrix: Water
Analysis Batch: 63105

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/03/12 17:32	1

Lab Sample ID: MB 480-63105/130
Matrix: Water
Analysis Batch: 63105

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/03/12 21:56	1

Lab Sample ID: MB 480-63105/74
Matrix: Water
Analysis Batch: 63105

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/03/12 16:14	1

Method: SM 4500 Cl- E - Chloride, Total (Continued)

Lab Sample ID: LCS 480-63105/129
Matrix: Water
Analysis Batch: 63105

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	26.83		mg/L		107	90 - 110

Lab Sample ID: LCS 480-63105/99
Matrix: Water
Analysis Batch: 63105

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	26.80		mg/L		107	90 - 110

Lab Sample ID: MB 480-63648/50
Matrix: Water
Analysis Batch: 63648

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/08/12 17:00	1

Lab Sample ID: MB 480-63648/73
Matrix: Water
Analysis Batch: 63648

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/08/12 17:40	1

Lab Sample ID: LCS 480-63648/72
Matrix: Water
Analysis Batch: 63648

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	24.91		mg/L		100	90 - 110

Lab Sample ID: MB 480-63758/7
Matrix: Water
Analysis Batch: 63758

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	0.504	J	1.0	0.46	mg/L			05/09/12 17:52	1

Lab Sample ID: LCS 480-63758/6
Matrix: Water
Analysis Batch: 63758

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	26.88		mg/L		108	90 - 110

Lab Sample ID: MB 480-64027/135
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/10/12 19:30	1

Method: SM 4500 Cl- E - Chloride, Total (Continued)

Lab Sample ID: MB 480-64027/141
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/10/12 20:00	1

Lab Sample ID: MB 480-64027/30
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	0.722	J	1.0	0.46	mg/L			05/10/12 14:29	1

Lab Sample ID: MB 480-64027/55
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/10/12 15:55	1

Lab Sample ID: MB 480-64027/83
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/10/12 17:01	1

Lab Sample ID: LCS 480-64027/140
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	26.47		mg/L		106	90 - 110

Lab Sample ID: LCS 480-64027/54
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	26.16		mg/L		105	90 - 110

Lab Sample ID: LCS 480-64027/82
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	26.18		mg/L		105	90 - 110

Lab Sample ID: MB 480-64319/13
Matrix: Water
Analysis Batch: 64319

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/11/12 17:52	1

Method: SM 4500 Cl- E - Chloride, Total (Continued)

Lab Sample ID: LCS 480-64319/12
Matrix: Water
Analysis Batch: 64319

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	26.82		mg/L		107	90 - 110

Method: SM 4500 S2 D - Sulfide, Total

Lab Sample ID: MB 480-62436/3
Matrix: Water
Analysis Batch: 62436

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfide	ND		0.10	0.052	mg/L			05/01/12 07:30	1

Lab Sample ID: LCS 480-62436/4
Matrix: Water
Analysis Batch: 62436

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfide	0.750	0.717		mg/L		96	90 - 110

Lab Sample ID: 480-19297-3 MS
Matrix: Water
Analysis Batch: 62436

Client Sample ID: MW-7-4-042712-1415
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfide	ND		0.500	0.570	F	mg/L		114	90 - 110

Lab Sample ID: 480-19297-2 DU
Matrix: Water
Analysis Batch: 62436

Client Sample ID: MW-7-3-042712-1330
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Sulfide	0.055	J	ND		mg/L		NC	20

Lab Sample ID: MB 480-62917/3
Matrix: Water
Analysis Batch: 62917

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfide	ND		0.10	0.052	mg/L			05/03/12 12:10	1

Lab Sample ID: LCS 480-62917/4
Matrix: Water
Analysis Batch: 62917

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfide	0.750	0.703		mg/L		94	90 - 110

Method: SM 4500 S2 D - Sulfide, Total (Continued)

Lab Sample ID: 480-19497-5 MS
Matrix: Water
Analysis Batch: 62917

Client Sample ID: MW-7-8-050212-0730
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfide	ND		0.500	0.301	F	mg/L		60	90 - 110

Lab Sample ID: 480-19497-5 DU
Matrix: Water
Analysis Batch: 62917

Client Sample ID: MW-7-8-050212-0730
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Sulfide	ND		ND		mg/L		NC	20

Lab Sample ID: MB 480-63515/3
Matrix: Water
Analysis Batch: 63515

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfide	ND		0.10	0.052	mg/L			05/08/12 08:45	1

Lab Sample ID: LCS 480-63515/4
Matrix: Water
Analysis Batch: 63515

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfide	0.750	0.726		mg/L		97	90 - 110

Lab Sample ID: 480-19600-2 MS
Matrix: Water
Analysis Batch: 63515

Client Sample ID: MW-7-C-2-050312-1015
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfide	ND		0.500	0.518		mg/L		104	90 - 110

Method: VFA-IC - Volatile Fatty Acids, Ion Chromatography

Lab Sample ID: MB 480-61976/28
Matrix: Water
Analysis Batch: 61976

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acetic acid	ND		1.0	0.15	mg/L			04/29/12 23:03	1
Formic-acid	ND		1.0	0.11	mg/L			04/29/12 23:03	1
Lactic acid	ND		1.0	0.14	mg/L			04/29/12 23:03	1
n-Butyric Acid	ND		1.0	0.16	mg/L			04/29/12 23:03	1
Propionic acid	ND		1.0	0.17	mg/L			04/29/12 23:03	1
Pyruvic Acid	ND		1.0	0.080	mg/L			04/29/12 23:03	1

Lab Sample ID: LCS 480-61976/27
Matrix: Water
Analysis Batch: 61976

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	10.0	9.51		mg/L		95	80 - 120
Formic-acid	10.0	9.40		mg/L		94	80 - 120

Method: VFA-IC - Volatile Fatty Acids, Ion Chromatography (Continued)

Lab Sample ID: LCS 480-61976/27
Matrix: Water
Analysis Batch: 61976

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Lactic acid	10.0	9.73		mg/L		97	80 - 120
n-Butyric Acid	10.0	9.57		mg/L		96	80 - 120
Propionic acid	10.0	9.76		mg/L		98	80 - 120
Pyruvic Acid	10.0	10.20		mg/L		102	80 - 120

Lab Sample ID: MB 480-63702/4
Matrix: Water
Analysis Batch: 63702

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acetic acid	ND		1.0	0.15	mg/L			05/09/12 18:41	1
Formic-acid	ND		1.0	0.11	mg/L			05/09/12 18:41	1
Lactic acid	ND		1.0	0.14	mg/L			05/09/12 18:41	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/09/12 18:41	1
Propionic acid	ND		1.0	0.17	mg/L			05/09/12 18:41	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/09/12 18:41	1

Lab Sample ID: LCS 480-63702/3
Matrix: Water
Analysis Batch: 63702

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	10.0	9.84		mg/L		98	80 - 120
Formic-acid	10.0	9.94		mg/L		99	80 - 120
Lactic acid	10.0	9.63		mg/L		96	80 - 120
n-Butyric Acid	10.0	9.82		mg/L		98	80 - 120
Propionic acid	10.0	9.81		mg/L		98	80 - 120
Pyruvic Acid	10.0	10.30		mg/L		103	80 - 120

Lab Sample ID: 480-19297-3 MS
Matrix: Water
Analysis Batch: 63702

Client Sample ID: MW-7-4-042712-1415
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	ND		25.0	23.40		mg/L		94	80 - 120
Formic-acid	ND		25.0	23.60		mg/L		94	80 - 120
Lactic acid	ND		25.0	21.30		mg/L		85	80 - 120
n-Butyric Acid	ND		25.0	21.20		mg/L		85	80 - 120
Propionic acid	ND		25.0	17.50	F	mg/L		70	80 - 120
Pyruvic Acid	ND		25.0	27.80		mg/L		111	80 - 120

Lab Sample ID: 480-19297-3 MSD
Matrix: Water
Analysis Batch: 63702

Client Sample ID: MW-7-4-042712-1415
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Acetic acid	ND		25.0	23.80		mg/L		95	80 - 120	2	20
Formic-acid	ND		25.0	24.30		mg/L		97	80 - 120	3	20
Lactic acid	ND		25.0	21.90		mg/L		88	80 - 120	3	20
n-Butyric Acid	ND		25.0	22.00		mg/L		88	80 - 120	4	20
Propionic acid	ND		25.0	20.10		mg/L		80	80 - 120	14	20

Method: VFA-IC - Volatile Fatty Acids, Ion Chromatography (Continued)

Lab Sample ID: 480-19297-3 MSD
Matrix: Water
Analysis Batch: 63702

Client Sample ID: MW-7-4-042712-1415
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Pyruvic Acid	ND		25.0	30.80	F	mg/L		123	80 - 120	10	20

Lab Sample ID: MB 480-64493/4
Matrix: Water
Analysis Batch: 64493

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acetic acid	ND		1.0	0.15	mg/L			05/15/12 18:18	1
Formic-acid	ND		1.0	0.11	mg/L			05/15/12 18:18	1
Lactic acid	ND		1.0	0.14	mg/L			05/15/12 18:18	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/15/12 18:18	1
Propionic acid	ND		1.0	0.17	mg/L			05/15/12 18:18	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/15/12 18:18	1

Lab Sample ID: LCS 480-64493/3
Matrix: Water
Analysis Batch: 64493

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	10.0	10.20		mg/L		102	80 - 120
Formic-acid	10.0	9.78		mg/L		98	80 - 120
Lactic acid	10.0	9.81		mg/L		98	80 - 120
n-Butyric Acid	10.0	10.00		mg/L		100	80 - 120
Propionic acid	10.0	10.40		mg/L		104	80 - 120
Pyruvic Acid	10.0	10.50		mg/L		105	80 - 120

Lab Sample ID: 480-19365-4 MS
Matrix: Water
Analysis Batch: 64493

Client Sample ID: MW-7-5-043012-1130
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	ND		10.0	9.02		mg/L		90	80 - 120
Formic-acid	ND		10.0	10.30		mg/L		103	80 - 120
Lactic acid	ND		10.0	10.30		mg/L		103	80 - 120
n-Butyric Acid	ND		10.0	9.62		mg/L		96	80 - 120
Propionic acid	ND		10.0	ND	F	mg/L		0	80 - 120
Pyruvic Acid	ND		10.0	ND	F	mg/L		0	80 - 120

Lab Sample ID: 480-19365-4 MSD
Matrix: Water
Analysis Batch: 64493

Client Sample ID: MW-7-5-043012-1130
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Acetic acid	ND		10.0	10.80		mg/L		108	80 - 120	18	20
Formic-acid	ND		10.0	10.50		mg/L		105	80 - 120	2	20
Lactic acid	ND		10.0	9.50		mg/L		95	80 - 120	8	20
n-Butyric Acid	ND		10.0	7.54	F	mg/L		75	80 - 120	24	20
Propionic acid	ND		10.0	ND	F	mg/L		0	80 - 120	NC	20
Pyruvic Acid	ND		10.0	ND	F	mg/L		0	80 - 120	NC	20

Method: VFA-IC - Volatile Fatty Acids, Ion Chromatography (Continued)

Lab Sample ID: 480-19497-5 MS
Matrix: Water
Analysis Batch: 64493

Client Sample ID: MW-7-8-050212-0730
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	ND		10.0	9.52		mg/L		95	80 - 120
Formic-acid	ND		10.0	7.99		mg/L		80	80 - 120
Lactic acid	ND		10.0	6.91	F	mg/L		69	80 - 120
n-Butyric Acid	ND		10.0	9.80		mg/L		98	80 - 120
Propionic acid	ND		10.0	6.90	F	mg/L		69	80 - 120
Pyruvic Acid	ND		10.0	ND	F	mg/L		0	80 - 120

Lab Sample ID: MB 480-64494/28
Matrix: Water
Analysis Batch: 64494

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acetic acid	ND		1.0	0.15	mg/L			05/16/12 05:58	1
Formic-acid	ND		1.0	0.11	mg/L			05/16/12 05:58	1
Lactic acid	ND		1.0	0.14	mg/L			05/16/12 05:58	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/16/12 05:58	1
Propionic acid	ND		1.0	0.17	mg/L			05/16/12 05:58	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/16/12 05:58	1

Lab Sample ID: LCS 480-64494/27
Matrix: Water
Analysis Batch: 64494

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	10.0	10.20		mg/L		102	80 - 120
Formic-acid	10.0	9.90		mg/L		99	80 - 120
Lactic acid	10.0	9.72		mg/L		97	80 - 120
n-Butyric Acid	10.0	9.60		mg/L		96	80 - 120
Propionic acid	10.0	10.20		mg/L		102	80 - 120
Pyruvic Acid	10.0	10.20		mg/L		102	80 - 120

GC/MS VOA

Analysis Batch: 63255

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	8260B	
LCS 480-63255/28	Lab Control Sample	Total/NA	Water	8260B	
MB 480-63255/7	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 63414

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	8260B	
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	8260B	
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	8260B	
480-19297-4	TRIP BLANK	Total/NA	Water	8260B	
LCS 480-63414/31	Lab Control Sample	Total/NA	Water	8260B	
MB 480-63414/30	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 63474

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	8260B	
480-19365-5	TRIP BLANK	Total/NA	Water	8260B	
LCS 480-63474/4	Lab Control Sample	Total/NA	Water	8260B	
MB 480-63474/5	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 63572

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	8260B	
480-19365-3 MS	MW-7-6-043012-0900	Total/NA	Water	8260B	
480-19365-3 MSD	MW-7-6-043012-0900	Total/NA	Water	8260B	
LCS 480-63572/4	Lab Control Sample	Total/NA	Water	8260B	
MB 480-63572/5	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 63640

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	8260B	
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	8260B	
480-19420-2 MS	MW-7-7-050112-1330	Total/NA	Water	8260B	
480-19420-2 MSD	MW-7-7-050112-1330	Total/NA	Water	8260B	
480-19420-4	TRIP BLANK	Total/NA	Water	8260B	
LCS 480-63640/3	Lab Control Sample	Total/NA	Water	8260B	
MB 480-63640/4	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 63732

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-2 - DL	MW-7-7-050112-1330	Total/NA	Water	8260B	
LCS 480-63732/3	Lab Control Sample	Total/NA	Water	8260B	
MB 480-63732/4	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 63819

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	8260B	
LCS 480-63819/4	Lab Control Sample	Total/NA	Water	8260B	
MB 480-63819/5	Method Blank	Total/NA	Water	8260B	

GC/MS VOA (Continued)

Analysis Batch: 64020

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	8260B	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	8260B	
LCS 480-64020/4	Lab Control Sample	Total/NA	Water	8260B	
MB 480-64020/5	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 64247

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-2 - DL	MW-7-C-2-050312-1015	Total/NA	Water	8260B	
LCS 480-64247/5	Lab Control Sample	Total/NA	Water	8260B	
MB 480-64247/6	Method Blank	Total/NA	Water	8260B	

GC VOA

Analysis Batch: 38245

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	RSK-175	
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	RSK-175	
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	RSK-175	
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	RSK-175	
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	RSK-175	
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	RSK-175	
LCS 200-38245/2	Lab Control Sample	Total/NA	Water	RSK-175	
MB 200-38245/3	Method Blank	Total/NA	Water	RSK-175	

Analysis Batch: 38628

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	RSK-175	
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	RSK-175	
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	RSK-175	
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	RSK-175	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	RSK-175	
LCS 200-38628/3	Lab Control Sample	Total/NA	Water	RSK-175	
MB 200-38628/4	Method Blank	Total/NA	Water	RSK-175	

Analysis Batch: 62347

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	RSK-175	
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	RSK-175	
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	RSK-175	
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	RSK-175	
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	RSK-175	
LCS 480-62347/3	Lab Control Sample	Total/NA	Water	RSK-175	
LCSD 480-62347/4	Lab Control Sample Dup	Total/NA	Water	RSK-175	
MB 480-62347/2	Method Blank	Total/NA	Water	RSK-175	

Analysis Batch: 62604

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	RSK-175	
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	RSK-175	
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	RSK-175	
LCS 480-62604/4	Lab Control Sample	Total/NA	Water	RSK-175	
LCSD 480-62604/5	Lab Control Sample Dup	Total/NA	Water	RSK-175	

GC VOA (Continued)

Analysis Batch: 62604 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 480-62604/3	Method Blank	Total/NA	Water	RSK-175	

Analysis Batch: 62926

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	RSK-175	
480-19420-1 - DL	MW-7-A-6-050112-0900	Total/NA	Water	RSK-175	
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	RSK-175	
LCS 480-62926/2	Lab Control Sample	Total/NA	Water	RSK-175	
LCSD 480-62926/4	Lab Control Sample Dup	Total/NA	Water	RSK-175	
MB 480-62926/3	Method Blank	Total/NA	Water	RSK-175	

Analysis Batch: 63265

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	RSK-175	
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	RSK-175	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	RSK-175	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	RSK-175	
LCS 480-63265/3	Lab Control Sample	Total/NA	Water	RSK-175	
LCSD 480-63265/4	Lab Control Sample Dup	Total/NA	Water	RSK-175	
MB 480-63265/2	Method Blank	Total/NA	Water	RSK-175	

Metals

Prep Batch: 61766

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	3005A	
LCS 480-61766/2-A	Lab Control Sample	Total/NA	Water	3005A	
MB 480-61766/1-A	Method Blank	Total/NA	Water	3005A	

Prep Batch: 62005

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	3005A	
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	3005A	
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	3005A	
LCS 480-62005/2-A	Lab Control Sample	Total/NA	Water	3005A	
MB 480-62005/1-A	Method Blank	Total/NA	Water	3005A	

Analysis Batch: 62075

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	6010B	61766
LCS 480-61766/2-A	Lab Control Sample	Total/NA	Water	6010B	61766
MB 480-61766/1-A	Method Blank	Total/NA	Water	6010B	61766

Analysis Batch: 62217

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	6010B	62005
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	6010B	62005
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	6010B	62005
LCS 480-62005/2-A	Lab Control Sample	Total/NA	Water	6010B	62005
MB 480-62005/1-A	Method Blank	Total/NA	Water	6010B	62005

Metals (Continued)

Prep Batch: 62531

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	3005A	
480-19365-3 MS	MW-7-6-043012-0900	Total/NA	Water	3005A	
480-19365-3 MSD	MW-7-6-043012-0900	Total/NA	Water	3005A	
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	3005A	
LCS 480-62531/2-A	Lab Control Sample	Total/NA	Water	3005A	
MB 480-62531/1-A	Method Blank	Total/NA	Water	3005A	

Prep Batch: 62755

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	3005A	
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	3005A	
LCS 480-62755/2-A	Lab Control Sample	Total/NA	Water	3005A	
MB 480-62755/1-A	Method Blank	Total/NA	Water	3005A	

Analysis Batch: 62800

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	6010B	62531
480-19365-3 MS	MW-7-6-043012-0900	Total/NA	Water	6010B	62531
480-19365-3 MSD	MW-7-6-043012-0900	Total/NA	Water	6010B	62531
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	6010B	62531
LCS 480-62531/2-A	Lab Control Sample	Total/NA	Water	6010B	62531
MB 480-62531/1-A	Method Blank	Total/NA	Water	6010B	62531

Prep Batch: 62828

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	3005A	
LCS 480-62828/2-A	Lab Control Sample	Total/NA	Water	3005A	
MB 480-62828/1-A	Method Blank	Total/NA	Water	3005A	

Analysis Batch: 63017

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	6010B	62755
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	6010B	62755
LCS 480-62755/2-A	Lab Control Sample	Total/NA	Water	6010B	62755
MB 480-62755/1-A	Method Blank	Total/NA	Water	6010B	62755

Analysis Batch: 63029

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	6010B	62828
LCS 480-62828/2-A	Lab Control Sample	Total/NA	Water	6010B	62828
MB 480-62828/1-A	Method Blank	Total/NA	Water	6010B	62828

Prep Batch: 63214

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	3005A	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	3005A	
LCS 480-63214/2-A	Lab Control Sample	Total/NA	Water	3005A	
MB 480-63214/1-A	Method Blank	Total/NA	Water	3005A	

Analysis Batch: 63452

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	6010B	63214

Metals (Continued)

Analysis Batch: 63452 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	6010B	63214
LCS 480-63214/2-A	Lab Control Sample	Total/NA	Water	6010B	63214
MB 480-63214/1-A	Method Blank	Total/NA	Water	6010B	63214

Analysis Batch: 63610

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	6010B	63214

General Chemistry

Analysis Batch: 61785

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	353.2	

Analysis Batch: 61789

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	353.2	
LCS 480-61789/28	Lab Control Sample	Total/NA	Water	353.2	
LCS 480-61789/52	Lab Control Sample	Total/NA	Water	353.2	
MB 480-61789/27	Method Blank	Total/NA	Water	353.2	
MB 480-61789/51	Method Blank	Total/NA	Water	353.2	

Analysis Batch: 61976

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	VFA-IC	
LCS 480-61976/27	Lab Control Sample	Total/NA	Water	VFA-IC	
MB 480-61976/28	Method Blank	Total/NA	Water	VFA-IC	

Analysis Batch: 62012

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	353.2	
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	353.2	
LCS 480-62012/4	Lab Control Sample	Total/NA	Water	353.2	
MB 480-62012/3	Method Blank	Total/NA	Water	353.2	

Analysis Batch: 62020

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	353.2	
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	353.2	
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	353.2	

Analysis Batch: 62022

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	353.2	

Analysis Batch: 62155

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	350.1	
LCS 480-62155/148	Lab Control Sample	Total/NA	Water	350.1	
MB 480-62155/147	Method Blank	Total/NA	Water	350.1	

General Chemistry (Continued)

Analysis Batch: 62436

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	SM 4500 S2 D	
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	SM 4500 S2 D	
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	SM 4500 S2 D	
480-19297-2 DU	MW-7-3-042712-1330	Total/NA	Water	SM 4500 S2 D	
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	SM 4500 S2 D	
480-19297-3 MS	MW-7-4-042712-1415	Total/NA	Water	SM 4500 S2 D	
LCS 480-62436/4	Lab Control Sample	Total/NA	Water	SM 4500 S2 D	
MB 480-62436/3	Method Blank	Total/NA	Water	SM 4500 S2 D	

Analysis Batch: 62524

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	350.1	
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	350.1	
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	350.1	
LCS 480-62524/148	Lab Control Sample	Total/NA	Water	350.1	
LCS 480-62524/76	Lab Control Sample	Total/NA	Water	350.1	
MB 480-62524/147	Method Blank	Total/NA	Water	350.1	
MB 480-62524/75	Method Blank	Total/NA	Water	350.1	

Analysis Batch: 62526

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	SM 2320B	
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	SM 2320B	
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	SM 2320B	
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	SM 2320B	
LCS 480-62526/4	Lab Control Sample	Total/NA	Water	SM 2320B	
MB 480-62526/3	Method Blank	Total/NA	Water	SM 2320B	

Analysis Batch: 62595

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	353.2	
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	353.2	
LCS 480-62595/4	Lab Control Sample	Total/NA	Water	353.2	
MB 480-62595/3	Method Blank	Total/NA	Water	353.2	

Analysis Batch: 62596

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	353.2	
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	353.2	

Analysis Batch: 62648

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	9060	
480-19202-1 DU	MW-7-2-042612-1415	Total/NA	Water	9060	
LCS 480-62648/28	Lab Control Sample	Total/NA	Water	9060	
MB 480-62648/27	Method Blank	Total/NA	Water	9060	

Analysis Batch: 62649

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	9060	
480-19297-1 DU	MW-7-1-042712-1000	Total/NA	Water	9060	
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	9060	

General Chemistry (Continued)

Analysis Batch: 62649 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	9060	
LCS 480-62649/4	Lab Control Sample	Total/NA	Water	9060	
MB 480-62649/3	Method Blank	Total/NA	Water	9060	

Analysis Batch: 62682

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	350.1	
480-19365-3 DU	MW-7-6-043012-0900	Total/NA	Water	350.1	
480-19365-3 MS	MW-7-6-043012-0900	Total/NA	Water	350.1	
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	350.1	
LCS 480-62682/4	Lab Control Sample	Total/NA	Water	350.1	
MB 480-62682/3	Method Blank	Total/NA	Water	350.1	

Analysis Batch: 62729

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	SM 2320B	
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	SM 2320B	
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	SM 2320B	
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	SM 2320B	
LCS 480-62729/4	Lab Control Sample	Total/NA	Water	SM 2320B	
MB 480-62729/3	Method Blank	Total/NA	Water	SM 2320B	

Analysis Batch: 62778

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	353.2	
LCS 480-62778/4	Lab Control Sample	Total/NA	Water	353.2	
MB 480-62778/3	Method Blank	Total/NA	Water	353.2	

Analysis Batch: 62782

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	353.2	
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	353.2	
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	353.2	

Analysis Batch: 62783

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	353.2	
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	353.2	

Analysis Batch: 62905

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	350.1	
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	350.1	
LCS 480-62905/4	Lab Control Sample	Total/NA	Water	350.1	
MB 480-62905/3	Method Blank	Total/NA	Water	350.1	

Analysis Batch: 62917

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	SM 4500 S2 D	
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	SM 4500 S2 D	
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	SM 4500 S2 D	
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	SM 4500 S2 D	

General Chemistry (Continued)

Analysis Batch: 62917 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	SM 4500 S2 D	
480-19497-5 DU	MW-7-8-050212-0730	Total/NA	Water	SM 4500 S2 D	
480-19497-5 MS	MW-7-8-050212-0730	Total/NA	Water	SM 4500 S2 D	
LCS 480-62917/4	Lab Control Sample	Total/NA	Water	SM 4500 S2 D	
MB 480-62917/3	Method Blank	Total/NA	Water	SM 4500 S2 D	

Analysis Batch: 63103

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	9038	
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	9038	
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	9038	
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	9038	
LCS 480-63103/137	Lab Control Sample	Total/NA	Water	9038	
LCS 480-63103/149	Lab Control Sample	Total/NA	Water	9038	
MB 480-63103/138	Method Blank	Total/NA	Water	9038	
MB 480-63103/150	Method Blank	Total/NA	Water	9038	

Analysis Batch: 63105

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19202-1	MW-7-2-042612-1415	Total/NA	Water	SM 4500 Cl- E	
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	SM 4500 Cl- E	
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	SM 4500 Cl- E	
LCS 480-63105/129	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
LCS 480-63105/99	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
MB 480-63105/100	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-63105/130	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-63105/74	Method Blank	Total/NA	Water	SM 4500 Cl- E	

Analysis Batch: 63137

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	350.1	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	350.1	
LCS 480-63137/148	Lab Control Sample	Total/NA	Water	350.1	
MB 480-63137/147	Method Blank	Total/NA	Water	350.1	

Analysis Batch: 63184

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	353.2	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	353.2	

Analysis Batch: 63185

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	353.2	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	353.2	

Analysis Batch: 63238

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	9060	
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	9060	
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	9060	
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	9060	
LCS 480-63238/4	Lab Control Sample	Total/NA	Water	9060	

General Chemistry (Continued)

Analysis Batch: 63238 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 480-63238/3	Method Blank	Total/NA	Water	9060	

Analysis Batch: 63278

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	9060	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	9060	
480-19600-3 DU	MW-7-D-1-050312-1530	Total/NA	Water	9060	
LCS 480-63278/4	Lab Control Sample	Total/NA	Water	9060	
MB 480-63278/3	Method Blank	Total/NA	Water	9060	

Analysis Batch: 63387

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	350.1	
LCS 480-63387/4	Lab Control Sample	Total/NA	Water	350.1	
MB 480-63387/3	Method Blank	Total/NA	Water	350.1	

Analysis Batch: 63392

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	SM 2320B	
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	SM 2320B	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	SM 2320B	
LCS 480-63392/4	Lab Control Sample	Total/NA	Water	SM 2320B	
MB 480-63392/3	Method Blank	Total/NA	Water	SM 2320B	

Analysis Batch: 63515

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	SM 4500 S2 D	
480-19600-2 MS	MW-7-C-2-050312-1015	Total/NA	Water	SM 4500 S2 D	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	SM 4500 S2 D	
LCS 480-63515/4	Lab Control Sample	Total/NA	Water	SM 4500 S2 D	
MB 480-63515/3	Method Blank	Total/NA	Water	SM 4500 S2 D	

Analysis Batch: 63638

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	9060	
LCS 480-63638/4	Lab Control Sample	Total/NA	Water	9060	
MB 480-63638/3	Method Blank	Total/NA	Water	9060	

Analysis Batch: 63648

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	SM 4500 Cl- E	
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	SM 4500 Cl- E	
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	SM 4500 Cl- E	
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	SM 4500 Cl- E	
LCS 480-63648/72	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
MB 480-63648/50	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-63648/73	Method Blank	Total/NA	Water	SM 4500 Cl- E	

Analysis Batch: 63649

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	9038	
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	9038	

General Chemistry (Continued)

Analysis Batch: 63649 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
LCS 480-63649/24	Lab Control Sample	Total/NA	Water	9038	
LCS 480-63649/43	Lab Control Sample	Total/NA	Water	9038	
MB 480-63649/25	Method Blank	Total/NA	Water	9038	
MB 480-63649/44	Method Blank	Total/NA	Water	9038	

Analysis Batch: 63702

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19297-1	MW-7-1-042712-1000	Total/NA	Water	VFA-IC	
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	VFA-IC	
480-19297-3	MW-7-4-042712-1415	Total/NA	Water	VFA-IC	
480-19297-3 MS	MW-7-4-042712-1415	Total/NA	Water	VFA-IC	
480-19297-3 MSD	MW-7-4-042712-1415	Total/NA	Water	VFA-IC	
LCS 480-63702/3	Lab Control Sample	Total/NA	Water	VFA-IC	
MB 480-63702/4	Method Blank	Total/NA	Water	VFA-IC	

Analysis Batch: 63758

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19297-2	MW-7-3-042712-1330	Total/NA	Water	SM 4500 Cl- E	
LCS 480-63758/6	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
MB 480-63758/7	Method Blank	Total/NA	Water	SM 4500 Cl- E	

Analysis Batch: 64026

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	9038	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	9038	
LCS 480-64026/35	Lab Control Sample	Total/NA	Water	9038	
LCS 480-64026/6	Lab Control Sample	Total/NA	Water	9038	
MB 480-64026/28	Method Blank	Total/NA	Water	9038	
MB 480-64026/36	Method Blank	Total/NA	Water	9038	
MB 480-64026/7	Method Blank	Total/NA	Water	9038	

Analysis Batch: 64027

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	SM 4500 Cl- E	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	SM 4500 Cl- E	
LCS 480-64027/140	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
LCS 480-64027/54	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
LCS 480-64027/82	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/135	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/141	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/30	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/55	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/83	Method Blank	Total/NA	Water	SM 4500 Cl- E	

Analysis Batch: 64319

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	SM 4500 Cl- E	
LCS 480-64319/12	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
MB 480-64319/13	Method Blank	Total/NA	Water	SM 4500 Cl- E	

General Chemistry (Continued)

Analysis Batch: 64493

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-3	MW-7-6-043012-0900	Total/NA	Water	VFA-IC	
480-19365-4	MW-7-5-043012-1130	Total/NA	Water	VFA-IC	
480-19365-4 MS	MW-7-5-043012-1130	Total/NA	Water	VFA-IC	
480-19365-4 MSD	MW-7-5-043012-1130	Total/NA	Water	VFA-IC	
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	VFA-IC	
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	VFA-IC	
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	VFA-IC	
480-19497-5 MS	MW-7-8-050212-0730	Total/NA	Water	VFA-IC	
LCS 480-64493/3	Lab Control Sample	Total/NA	Water	VFA-IC	
MB 480-64493/4	Method Blank	Total/NA	Water	VFA-IC	

Analysis Batch: 64494

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-2	MW-7-C-2-050312-1015	Total/NA	Water	VFA-IC	
480-19600-3	MW-7-D-1-050312-1530	Total/NA	Water	VFA-IC	
LCS 480-64494/27	Lab Control Sample	Total/NA	Water	VFA-IC	
MB 480-64494/28	Method Blank	Total/NA	Water	VFA-IC	

Analysis Batch: 64501

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-1	MW-7-A-6-050112-0900	Total/NA	Water	9038	
480-19420-2	MW-7-7-050112-1330	Total/NA	Water	9038	
480-19497-5	MW-7-8-050212-0730	Total/NA	Water	9038	
LCS 480-64501/59	Lab Control Sample	Total/NA	Water	9038	
LCS 480-64501/81	Lab Control Sample	Total/NA	Water	9038	
MB 480-64501/60	Method Blank	Total/NA	Water	9038	
MB 480-64501/82	Method Blank	Total/NA	Water	9038	

Client Sample ID: MW-7-2-042612-1415

Lab Sample ID: 480-19202-1

Date Collected: 04/26/12 14:15

Matrix: Water

Date Received: 04/26/12 17:50

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	63255	05/06/12 15:37	JMB	TAL BUF
Total/NA	Analysis	RSK-175		1	38245	05/04/12 10:00	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	62347	04/30/12 18:17	JM	TAL BUF
Total/NA	Prep	3005A			61766	04/27/12 08:40	SS	TAL BUF
Total/NA	Analysis	6010B		1	62075	04/27/12 18:05	LH	TAL BUF
Total/NA	Analysis	353.2		1	61785	04/27/12 01:06	KS	TAL BUF
Total/NA	Analysis	353.2		1	61789	04/27/12 01:06	KS	TAL BUF
Total/NA	Analysis	VFA-IC		1	61976	04/30/12 04:52	KAC	TAL BUF
Total/NA	Analysis	350.1		1	62155	04/28/12 13:40	KS	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62436	05/01/12 07:30	EGN	TAL BUF
Total/NA	Analysis	SM 2320B		1	62526	04/30/12 13:10	LYW	TAL BUF
Total/NA	Analysis	9060		1	62648	05/01/12 10:41	KAC	TAL BUF
Total/NA	Analysis	9038		5	63103	05/03/12 22:02	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		5	63105	05/03/12 22:07	PJQ	TAL BUF

Client Sample ID: MW-7-1-042712-1000

Lab Sample ID: 480-19297-1

Date Collected: 04/27/12 10:00

Matrix: Water

Date Received: 04/27/12 17:20

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	63414	05/08/12 01:03	JMB	TAL BUF
Total/NA	Analysis	RSK-175		1	38245	05/04/12 09:09	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	62347	04/30/12 18:34	JM	TAL BUF
Total/NA	Prep	3005A			62005	04/28/12 08:45	SS	TAL BUF
Total/NA	Analysis	6010B		1	62217	04/28/12 16:41	LH	TAL BUF
Total/NA	Analysis	353.2		1	62020	04/27/12 21:28	KS	TAL BUF
Total/NA	Analysis	353.2		1	62022	04/27/12 21:28	KS	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62436	05/01/12 07:30	EGN	TAL BUF
Total/NA	Analysis	350.1		1	62524	05/01/12 13:06	KS	TAL BUF
Total/NA	Analysis	SM 2320B		1	62526	04/30/12 13:10	LYW	TAL BUF
Total/NA	Analysis	9060		1	62649	04/30/12 21:00	KAC	TAL BUF
Total/NA	Analysis	9038		20	63103	05/03/12 22:32	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		30	63105	05/03/12 22:37	PJQ	TAL BUF
Total/NA	Analysis	VFA-IC		1	63702	05/10/12 02:27	KAC	TAL BUF

Client Sample ID: MW-7-3-042712-1330

Lab Sample ID: 480-19297-2

Date Collected: 04/27/12 13:30

Matrix: Water

Date Received: 04/27/12 17:20

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	63414	05/08/12 01:28	JMB	TAL BUF
Total/NA	Analysis	RSK-175		2	38245	05/04/12 09:49	MRV	TAL BUR

Lab Chronicle

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19202-1

Client Sample ID: MW-7-3-042712-1330

Lab Sample ID: 480-19297-2

Date Collected: 04/27/12 13:30
Matrix: Water
Date Received: 04/27/12 17:20

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	RSK-175		1	62347	04/30/12 18:51	JM	TAL BUF
Total/NA	Analysis	RSK-175		100	62347	04/30/12 19:40	JM	TAL BUF
Total/NA	Prep	3005A			62005	04/28/12 08:45	SS	TAL BUF
Total/NA	Analysis	6010B		1	62217	04/28/12 16:44	LH	TAL BUF
Total/NA	Analysis	353.2		1	62012	04/27/12 22:29	KS	TAL BUF
Total/NA	Analysis	353.2		1	62020	04/27/12 22:29	KS	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62436	05/01/12 07:30	EGN	TAL BUF
Total/NA	Analysis	350.1		2	62524	05/01/12 14:21	KS	TAL BUF
Total/NA	Analysis	SM 2320B		1	62526	04/30/12 13:10	LYW	TAL BUF
Total/NA	Analysis	9060		1	62649	04/30/12 22:01	KAC	TAL BUF
Total/NA	Analysis	9038		50	63103	05/03/12 22:31	PJQ	TAL BUF
Total/NA	Analysis	VFA-IC		1	63702	05/10/12 02:56	KAC	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		500	63758	05/09/12 17:54	PJQ	TAL BUF

Client Sample ID: MW-7-4-042712-1415

Lab Sample ID: 480-19297-3

Date Collected: 04/27/12 14:15
Matrix: Water
Date Received: 04/27/12 17:20

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	63414	05/08/12 01:53	JMB	TAL BUF
Total/NA	Analysis	RSK-175		1	38245	05/04/12 09:38	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	62347	04/30/12 19:08	JM	TAL BUF
Total/NA	Prep	3005A			62005	04/28/12 08:45	SS	TAL BUF
Total/NA	Analysis	6010B		1	62217	04/28/12 16:50	LH	TAL BUF
Total/NA	Analysis	353.2		1	62012	04/27/12 22:30	KS	TAL BUF
Total/NA	Analysis	353.2		1	62020	04/27/12 22:30	KS	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62436	05/01/12 07:30	EGN	TAL BUF
Total/NA	Analysis	350.1		1	62524	05/01/12 13:08	KS	TAL BUF
Total/NA	Analysis	SM 2320B		1	62526	04/30/12 13:10	LYW	TAL BUF
Total/NA	Analysis	9060		1	62649	05/01/12 00:00	KAC	TAL BUF
Total/NA	Analysis	9038		5	63103	05/03/12 22:11	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		15	63105	05/03/12 22:39	PJQ	TAL BUF
Total/NA	Analysis	VFA-IC		1	63702	05/10/12 03:25	KAC	TAL BUF

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19297-4

Date Collected: 04/27/12 00:00
Matrix: Water
Date Received: 04/27/12 17:20

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	63414	05/08/12 02:17	JMB	TAL BUF

Client Sample ID: MW-7-6-043012-0900

Lab Sample ID: 480-19365-3

Date Collected: 04/30/12 09:00

Matrix: Water

Date Received: 04/30/12 19:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		10	63572	05/09/12 00:47	LH	TAL BUF
Total/NA	Analysis	RSK-175		1	38245	05/04/12 10:12	MRV	TAL BUR
Total/NA	Analysis	RSK-175		100	62604	05/02/12 15:02	MN	TAL BUF
Total/NA	Analysis	RSK-175		1	62604	05/02/12 16:39	MN	TAL BUF
Total/NA	Prep	3005A			62531	05/02/12 08:00	JM	TAL BUF
Total/NA	Analysis	6010B		1	62800	05/02/12 19:56	AH	TAL BUF
Total/NA	Analysis	353.2		1	62595	05/01/12 23:06	KS	TAL BUF
Total/NA	Analysis	353.2		1	62596	05/01/12 23:06	KS	TAL BUF
Total/NA	Analysis	350.1		1	62682	05/02/12 11:15	KS	TAL BUF
Total/NA	Analysis	SM 2320B		1	62729	05/02/12 13:44	LYW	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62917	05/03/12 12:10	EGN	TAL BUF
Total/NA	Analysis	9060		1	63238	05/05/12 07:37	KAC	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		121	63648	05/08/12 17:46	JR	TAL BUF
Total/NA	Analysis	9038		30	63649	05/08/12 18:06	JR	TAL BUF
Total/NA	Analysis	VFA-IC		1	64493	05/16/12 02:34	KAC	TAL BUF

Client Sample ID: MW-7-5-043012-1130

Lab Sample ID: 480-19365-4

Date Collected: 04/30/12 11:30

Matrix: Water

Date Received: 04/30/12 19:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		200	63474	05/08/12 16:09	RL	TAL BUF
Total/NA	Analysis	RSK-175		2	38245	05/04/12 10:28	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	62604	05/02/12 16:56	MN	TAL BUF
Total/NA	Prep	3005A			62531	05/02/12 08:00	JM	TAL BUF
Total/NA	Analysis	6010B		1	62800	05/02/12 20:09	AH	TAL BUF
Total/NA	Analysis	353.2		1	62595	05/01/12 23:07	KS	TAL BUF
Total/NA	Analysis	353.2		1	62596	05/01/12 23:07	KS	TAL BUF
Total/NA	Analysis	350.1		1	62682	05/02/12 11:20	KS	TAL BUF
Total/NA	Analysis	SM 2320B		1	62729	05/02/12 13:47	LYW	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62917	05/03/12 12:10	EGN	TAL BUF
Total/NA	Analysis	9060		1	63238	05/05/12 08:07	KAC	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		121	63648	05/08/12 17:46	JR	TAL BUF
Total/NA	Analysis	9038		15	63649	05/08/12 17:05	JR	TAL BUF
Total/NA	Analysis	VFA-IC		1	64493	05/16/12 03:03	KAC	TAL BUF

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19365-5

Date Collected: 04/30/12 00:00

Matrix: Water

Date Received: 04/30/12 19:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	63474	05/08/12 16:32	RL	TAL BUF

Lab Chronicle

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19202-1

Client Sample ID: MW-7-A-6-050112-0900

Lab Sample ID: 480-19420-1

Date Collected: 05/01/12 09:00
Matrix: Water
Date Received: 05/01/12 17:17

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		2000	63640	05/09/12 18:52	CDC	TAL BUF
Total/NA	Analysis	RSK-175		2	38628	05/14/12 13:30	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	62926	05/03/12 16:36	JM	TAL BUF
Total/NA	Analysis	RSK-175	DL	50	62926	05/03/12 17:55	JM	TAL BUF
Total/NA	Prep	3005A			62755	05/03/12 08:15	SS	TAL BUF
Total/NA	Analysis	6010B		1	63017	05/03/12 17:45	LH	TAL BUF
Total/NA	Analysis	SM 2320B		1	62729	05/02/12 14:03	LYW	TAL BUF
Total/NA	Analysis	353.2		1	62782	05/02/12 19:59	KS	TAL BUF
Total/NA	Analysis	353.2		1	62783	05/02/12 19:59	KS	TAL BUF
Total/NA	Analysis	350.1		1	62905	05/03/12 12:24	KS	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62917	05/03/12 12:10	EGN	TAL BUF
Total/NA	Analysis	9060		1	63238	05/05/12 08:37	KAC	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		30	63648	05/08/12 17:40	JR	TAL BUF
Total/NA	Analysis	VFA-IC		1	64493	05/15/12 18:47	KAC	TAL BUF
Total/NA	Analysis	9038		5	64501	05/14/12 14:51	JR	TAL BUF

Client Sample ID: MW-7-7-050112-1330

Lab Sample ID: 480-19420-2

Date Collected: 05/01/12 13:30
Matrix: Water
Date Received: 05/01/12 17:17

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		400	63640	05/09/12 19:20	CDC	TAL BUF
Total/NA	Analysis	8260B	DL	2000	63732	05/10/12 00:07	TRB	TAL BUF
Total/NA	Analysis	RSK-175		1	38628	05/14/12 12:45	MRV	TAL BUR
Total/NA	Analysis	RSK-175		50	62926	05/03/12 16:53	JM	TAL BUF
Total/NA	Prep	3005A			62755	05/03/12 08:15	SS	TAL BUF
Total/NA	Analysis	6010B		1	63017	05/03/12 17:48	LH	TAL BUF
Total/NA	Analysis	SM 2320B		1	62729	05/02/12 14:07	LYW	TAL BUF
Total/NA	Analysis	353.2		1	62778	05/02/12 22:14	KS	TAL BUF
Total/NA	Analysis	353.2		1	62782	05/02/12 22:14	KS	TAL BUF
Total/NA	Analysis	350.1		1	62905	05/03/12 12:25	KS	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		2	62917	05/03/12 12:10	EGN	TAL BUF
Total/NA	Analysis	9060		1	63238	05/05/12 09:08	KAC	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		30	63648	05/08/12 17:40	JR	TAL BUF
Total/NA	Analysis	VFA-IC		1	64493	05/15/12 19:17	KAC	TAL BUF
Total/NA	Analysis	9038		30	64501	05/14/12 16:41	JR	TAL BUF

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19420-4

Date Collected: 05/01/12 00:00

Matrix: Water

Date Received: 05/01/12 17:17

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	63640	05/09/12 20:16	CDC	TAL BUF

Client Sample ID: MW-7-8-050212-0730

Lab Sample ID: 480-19497-5

Date Collected: 05/02/12 07:30

Matrix: Water

Date Received: 05/02/12 18:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		4	63819	05/10/12 16:18	DC	TAL BUF
Total/NA	Analysis	RSK-175		1	38628	05/14/12 14:40	MRV	TAL BUR
Total/NA	Analysis	RSK-175		10	63265	05/07/12 11:29	MN	TAL BUF
Total/NA	Prep	3005A			62828	05/03/12 10:15	SS	TAL BUF
Total/NA	Analysis	6010B		1	63029	05/03/12 20:48	AH	TAL BUF
Total/NA	Analysis	353.2		1	62782	05/02/12 20:50	KS	TAL BUF
Total/NA	Analysis	353.2		1	62783	05/02/12 20:50	KS	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62917	05/03/12 12:10	EGN	TAL BUF
Total/NA	Analysis	350.1		1	63387	05/07/12 14:15	KS	TAL BUF
Total/NA	Analysis	SM 2320B		1	63392	05/07/12 14:40	LYW	TAL BUF
Total/NA	Analysis	9060		1	63638	05/07/12 21:41	KAC	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		50	64319	05/11/12 18:48	JR	TAL BUF
Total/NA	Analysis	VFA-IC		1	64493	05/15/12 21:42	KAC	TAL BUF
Total/NA	Analysis	9038		5	64501	05/14/12 14:51	JR	TAL BUF

Client Sample ID: MW-7-C-2-050312-1015

Lab Sample ID: 480-19600-2

Date Collected: 05/03/12 10:15

Matrix: Water

Date Received: 05/03/12 19:45

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	64020	05/11/12 13:01	DC	TAL BUF
Total/NA	Analysis	8260B	DL	5	64247	05/13/12 11:16	JMB	TAL BUF
Total/NA	Analysis	RSK-175		1	38628	05/14/12 12:58	MRV	TAL BUR
Total/NA	Analysis	RSK-175		10	63265	05/07/12 13:51	MN	TAL BUF
Total/NA	Prep	3005A			63214	05/07/12 07:20	SS	TAL BUF
Total/NA	Analysis	6010B		1	63452	05/07/12 17:57	MM	TAL BUF
Total/NA	Analysis	350.1		1	63137	05/04/12 13:52	KS	TAL BUF
Total/NA	Analysis	353.2		1	63184	05/04/12 20:21	KS	TAL BUF
Total/NA	Analysis	353.2		1	63185	05/04/12 20:21	KS	TAL BUF
Total/NA	Analysis	9060		1	63278	05/06/12 13:01	KAC	TAL BUF
Total/NA	Analysis	SM 2320B		1	63392	05/07/12 14:40	LYW	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	63515	05/08/12 08:45	EGN	TAL BUF
Total/NA	Analysis	9038		20	64026	05/10/12 16:33	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		10	64027	05/10/12 16:23	PJQ	TAL BUF
Total/NA	Analysis	VFA-IC		1	64494	05/16/12 11:47	KAC	TAL BUF

Lab Chronicle

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19202-1

Client Sample ID: MW-7-D-1-050312-1530
Date Collected: 05/03/12 15:30
Date Received: 05/03/12 19:45

Lab Sample ID: 480-19600-3
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		4	64020	05/11/12 13:24	DC	TAL BUF
Total/NA	Analysis	RSK-175		5	38628	05/14/12 13:35	MRV	TAL BUR
Total/NA	Analysis	RSK-175		10	63265	05/07/12 14:08	MN	TAL BUF
Total/NA	Analysis	RSK-175		100	63265	05/07/12 15:23	MN	TAL BUF
Total/NA	Prep	3005A			63214	05/07/12 07:20	SS	TAL BUF
Total/NA	Analysis	6010B		1	63452	05/07/12 17:59	MM	TAL BUF
Total/NA	Analysis	6010B		1	63610	05/08/12 14:45	LH	TAL BUF
Total/NA	Analysis	350.1		100	63137	05/04/12 14:24	KS	TAL BUF
Total/NA	Analysis	353.2		1	63184	05/04/12 20:22	KS	TAL BUF
Total/NA	Analysis	353.2		1	63185	05/04/12 20:22	KS	TAL BUF
Total/NA	Analysis	9060		1	63278	05/06/12 13:32	KAC	TAL BUF
Total/NA	Analysis	SM 2320B		1	63392	05/07/12 14:40	LYW	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	63515	05/08/12 08:45	EGN	TAL BUF
Total/NA	Analysis	9038		5	64026	05/10/12 16:33	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		121	64027	05/10/12 17:01	PJQ	TAL BUF
Total/NA	Analysis	VFA-IC		1	64494	05/16/12 12:16	KAC	TAL BUF

Laboratory References:

TAL BUF = TestAmerica Buffalo, 10 Hazelwood Drive, Amherst, NY 14228-2298, TEL (716)691-2600

TAL BUR = TestAmerica Burlington, 30 Community Drive, Suite 11, South Burlington, VT 05403, TEL (802)660-1990

Certification Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19202-1

Laboratory	Authority	Program	EPA Region	Certification ID
TestAmerica Buffalo	Arkansas DEQ	State Program	6	88-0686
TestAmerica Buffalo	California	NELAC	9	1169CA
TestAmerica Buffalo	Connecticut	State Program	1	PH-0568
TestAmerica Buffalo	Florida	NELAC	4	E87672
TestAmerica Buffalo	Georgia	State Program	4	956
TestAmerica Buffalo	Georgia	State Program	4	N/A
TestAmerica Buffalo	Illinois	NELAC	5	100325 / 200003
TestAmerica Buffalo	Iowa	State Program	7	374
TestAmerica Buffalo	Kansas	NELAC	7	E-10187
TestAmerica Buffalo	Kentucky	State Program	4	90029
TestAmerica Buffalo	Kentucky (UST)	State Program	4	30
TestAmerica Buffalo	Louisiana	NELAC	6	02031
TestAmerica Buffalo	Maine	State Program	1	NY0044
TestAmerica Buffalo	Maryland	State Program	3	294
TestAmerica Buffalo	Massachusetts	State Program	1	M-NY044
TestAmerica Buffalo	Michigan	State Program	5	9937
TestAmerica Buffalo	Minnesota	NELAC	5	036-999-337
TestAmerica Buffalo	New Hampshire	NELAC	1	2337
TestAmerica Buffalo	New Hampshire	NELAC	1	68-00281
TestAmerica Buffalo	New Jersey	NELAC	2	NY455
TestAmerica Buffalo	New York	NELAC	2	10026
TestAmerica Buffalo	North Dakota	State Program	8	R-176
TestAmerica Buffalo	Oklahoma	State Program	6	9421
TestAmerica Buffalo	Oregon	NELAC	10	NY200003
TestAmerica Buffalo	Pennsylvania	NELAC	3	68-00281
TestAmerica Buffalo	Tennessee	State Program	4	TN02970
TestAmerica Buffalo	Texas	NELAC	6	T104704412-08-TX
TestAmerica Buffalo	USDA	Federal		P330-08-00242
TestAmerica Buffalo	Virginia	NELAC	3	460185
TestAmerica Buffalo	Virginia	State Program	3	278
TestAmerica Buffalo	Washington	State Program	10	C1677
TestAmerica Buffalo	West Virginia DEP	State Program	3	252
TestAmerica Buffalo	Wisconsin	State Program	5	998310390
TestAmerica Burlington	ACLASS	DoD ELAP		ADE-1492
TestAmerica Burlington	Connecticut	State Program	1	PH-0751
TestAmerica Burlington	DE Haz. Subst. Cleanup Act (HSCA)	State Program	3	NA
TestAmerica Burlington	Florida	NELAC	4	E87467
TestAmerica Burlington	Louisiana	NELAC	6	176292
TestAmerica Burlington	Maine	State Program	1	VT00008
TestAmerica Burlington	Minnesota	NELAC	5	050-999-436
TestAmerica Burlington	New Hampshire	NELAC	1	200610
TestAmerica Burlington	New Jersey	NELAC	2	VT972
TestAmerica Burlington	New York	NELAC	2	10391
TestAmerica Burlington	Pennsylvania	NELAC	3	68-00489
TestAmerica Burlington	Rhode Island	State Program	1	LAO00298
TestAmerica Burlington	USDA	Federal		P330-11-00093
TestAmerica Burlington	Vermont	State Program	1	VT-4000
TestAmerica Burlington	Virginia	NELAC	3	460209

Accreditation may not be offered or required for all methods and analytes reported in this package. Please contact your project manager for the laboratory's current list of certified methods and analytes.

Method Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19202-1

Method	Method Description	Protocol	Laboratory
8260B	Volatile Organic Compounds (GC/MS)	SW846	TAL BUF
RSK-175	Dissolved Gases (GC)	RSK	TAL BUR
RSK-175	Dissolved Gases (GC)	RSK	TAL BUF
6010B	Metals (ICP)	SW846	TAL BUF
350.1	Nitrogen, Ammonia	MCAWW	TAL BUF
353.2	Nitrate	EPA	TAL BUF
353.2	Nitrogen, Nitrite	MCAWW	TAL BUF
9038	Sulfate, Turbidimetric	SW846	TAL BUF
9060	Organic Carbon, Total (TOC)	SW846	TAL BUF
SM 2320B	Alkalinity	SM	TAL BUF
SM 4500 Cl- E	Chloride, Total	SM	TAL BUF
SM 4500 S2 D	Sulfide, Total	SM	TAL BUF
VFA-IC	Volatile Fatty Acids, Ion Chromatography	TestAmerica SOP	TAL BUF

Protocol References:

EPA = US Environmental Protection Agency

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions.

RSK = Sample Prep And Calculations For Dissolved Gas Analysis In Water Samples Using A GC Headspace Equilibration Technique, RSKSOP-175, Rev. 0, 8/11/94, USEPA Research Lab

SM = "Standard Methods For The Examination Of Water And Wastewater",

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

TestAmerica SOP = TestAmerica, Inc., Standard Operating Procedure

Laboratory References:

TAL BUF = TestAmerica Buffalo, 10 Hazelwood Drive, Amherst, NY 14228-2298, TEL (716)691-2600

TAL BUR = TestAmerica Burlington, 30 Community Drive, Suite 11, South Burlington, VT 05403, TEL (802)660-1990

Sample Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19202-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
480-19202-1	MW-7-2-042612-1415	Water	04/26/12 14:15	04/26/12 17:50
480-19297-1	MW-7-1-042712-1000	Water	04/27/12 10:00	04/27/12 17:20
480-19297-2	MW-7-3-042712-1330	Water	04/27/12 13:30	04/27/12 17:20
480-19297-3	MW-7-4-042712-1415	Water	04/27/12 14:15	04/27/12 17:20
480-19297-4	TRIP BLANK	Water	04/27/12 00:00	04/27/12 17:20
480-19365-3	MW-7-6-043012-0900	Water	04/30/12 09:00	04/30/12 19:30
480-19365-4	MW-7-5-043012-1130	Water	04/30/12 11:30	04/30/12 19:30
480-19365-5	TRIP BLANK	Water	04/30/12 00:00	04/30/12 19:30
480-19420-1	MW-7-A-6-050112-0900	Water	05/01/12 09:00	05/01/12 17:17
480-19420-2	MW-7-7-050112-1330	Water	05/01/12 13:30	05/01/12 17:17
480-19420-4	TRIP BLANK	Water	05/01/12 00:00	05/01/12 17:17
480-19497-5	MW-7-8-050212-0730	Water	05/02/12 07:30	05/02/12 18:00
480-19600-2	MW-7-C-2-050312-1015	Water	05/03/12 10:15	05/03/12 19:45
480-19600-3	MW-7-D-1-050312-1530	Water	05/03/12 15:30	05/03/12 19:45

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

5/22/2012

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.2
Client Contact: Mr. Christopher Boron	Phone: 716 655-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page ~~2 of 4~~
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 7 BCP site 9-32-138	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N						
MW-7-2-042612-1415	4/26/12	1415	G	Water			X	X	X	X	X	X	X	X	X	X						
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

	Date/Time	Company		Date/Time	Company
Relinquished by: Thomas Bohlen	4/26/12 1750	GZA	Received by:	4/26/12 1750	TA BUFF
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

estAmerica Buffalo
) Hazelwood Drive
nherst, NY 14228-2298
none (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

5/22/2012

lient Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.3
ent Contact: r. Christopher Boron	Phone: 716 655-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 3 of 4
mpany: ZA GeoEnvironmental, Inc.				Job #:
ldress: 35 Washington Street 11th Floor	Due Date Requested:			
ty: uffalo	TAT Requested (days):			
ate, Zip: Y, 14203				
none:	PO #: 4047065			
mail: hristopher.boron@gza.com	WO #: 58507			
oject Name: 58507, GM-Lockport Groundwater Sampling	Project #: 48004014			
te: Bldg 7 BCP Site 9-32-138	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

ample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity					Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N						
MW-7-1-042712-1000	4/27/12	1000	G	Water			X	X	X	X	X	X	X	X	X	X						
MW-7-3-042712-1330	↓	1330	↓	Water			↓	↓	↓	↓	↓	↓	↓	↓	↓	↓						
MW-7-4-042712-1415	↓	1415	↓	Water			↓	↓	↓	↓	↓	↓	↓	↓	↓	↓						
				Water																		
Trip Blank				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		
				Water																		

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

elinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Thomas Bohlen	4/27/12 / 1720	GZA		4/27/12 1720	TA Buffalo
elinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
elinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.: | Cooler Temperature(s) °C and Other Remarks:

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

5/22/2012

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 4 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:

Address: 535 Washington Street 11th Floor	Due Date Requested:
City: Buffalo	TAT Requested (days):
State, Zip: NY, 14203	
Phone:	PO #: 4047065
Email: christopher.boron@gza.com	WO #: 58507
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014
Site: Bldg. 7 BCP Site 9-32-138	SSOW#:

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N						
MW-7-6-043012-0900 MS/MSD	4/30/12	900	G	Water			X	X	X	X	X	X	X	X	X	X						Only run VOCs 8260B for MS/MSD + #10LB
MW-7-5-043012-1130	4/30/12	1130	G	↓			X	X	X	X	X	X	X	X	X	X						all other SOW
Trip Blank																						

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Thomas Bohlen	4/30/12 / 7:30				
Relinquished by: Joseph Mahon	Date/Time: 4/30/12 / 19:30	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

5/22/2012

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: ~~Page 4 of~~ 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 7 BCP Site 9-32-1.38	SSOW#:			

Analysis Requested

Sample Identification	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity					Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N						
MW-7-A-6-050112-0900	05/1/12	900	G	Water			X	X	X	X	X	X	X	X	X	X					10	
MW-7-7-050112-1330	"	1330	G	↓			X	X	X	X	X	X	X	X	X	X					1	
Trip Blank																						

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
1	Thomas Bohlen	5/1/12 17:17			5-1-12 18:17	GZA
2	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
3	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.: | Cooler Temperature(s) °C and Other Remarks: 4.2 °C

10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTIN

5/22/2012

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 4 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 7 BCP Site 9-32-138	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2SO3, S - H2SO4, T - TSP Dodecahydrat, U - Acetone, V - MCAA, W - ph 4-5, Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N					
MW-7-8-050212-0730	5/2/12	730	G	Water			X	X	X	X	X	X	X	X	X	X				20	
Trip Blank																					

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Thomas Bohlen	5/2/12 / 1800	GZA	Zachary J Rideim	5/2/12 1800	BUF
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716-685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 4 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 7 BCP Site 9-32-138	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2SO3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - ph 4-5, Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity	Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N		
MW-7-C-2-050312-1015	5/3/12	1015	G	Water			X	X	X	X	X	X	X	X	X	X	20	
MW-7-P-1-050312-1530	↓	1530	↓				X	X	X	X	X	X	X	X	X	Y	↓	
Trip Blank																		

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Thomas Bohlen	5/3/12 /				
Relinquished by: Jason Tuttle	Date/Time: 5/3/12 19:46	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

5/22/2012

Login Sample Receipt Checklist

Client: Conestoga-Rovers & Associates, Inc.

Job Number: 480-19202-1

Login Number: 19202

List Number: 1

Creator: Kinecki, Kenneth

List Source: TestAmerica Buffalo

Question	Answer	Comment
Radioactivity either was not measured or, if measured, is at or below background		
The cooler's custody seal, if present, is intact.		
The cooler or samples do not appear to have been compromised or tampered with.		
Samples were received on ice.		
Cooler Temperature is acceptable.		
Cooler Temperature is recorded.		
COC is present.		
COC is filled out in ink and legible.		
COC is filled out with all pertinent information.		
Is the Field Sampler's name present on COC?		
There are no discrepancies between the sample IDs on the containers and the COC.		
Samples are received within Holding Time.		
Sample containers have legible labels.		
Containers are not broken or leaking.		
Sample collection date/times are provided.		
Appropriate sample containers are used.		
Sample bottles are completely filled.		
Sample Preservation Verified		
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs		
VOA sample vials do not have headspace or bubble is <6mm (1/4") in diameter.		
If necessary, staff have been informed of any short hold time or quick TAT needs		
Multiphasic samples are not present.		
Samples do not require splitting or compositing.		
Sampling Company provided.		
Samples received within 48 hours of sampling.		
Samples requiring field filtration have been filtered in the field.		
Chlorine Residual checked.		

Login Sample Receipt Checklist

Client: Conestoga-Rovers & Associates, Inc.

Job Number: 480-19202-1

Login Number: 19202
List Number: 1
Creator: Marion, Greg T

List Source: TestAmerica Burlington
List Creation: 04/28/12 04:36 PM

Question	Answer	Comment
Radioactivity either was not measured or, if measured, is at or below background	N/A	Lab does not accept radioactive samples.
The cooler's custody seal, if present, is intact.	True	487001
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	4.0ºC IR GUN ID 154/CF=-0.2
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	N/A	Received project as a subcontract.
There are no discrepancies between the sample IDs on the containers and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
VOA sample vials do not have headspace or bubble is <6mm (1/4") in diameter.	True	
Multiphasic samples are not present.	N/A	
Samples do not require splitting or compositing.	N/A	
Residual Chlorine Checked.	N/A	

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

ANALYTICAL REPORT

TestAmerica Laboratories, Inc.
TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Tel: (716)691-2600

TestAmerica Job ID: 480-19123-1

Client Project/Site: 058507, GM-Lockport Groundwater Sampling

For:

Conestoga-Rovers & Associates, Inc.
2055 Niagara Falls Blvd., Suite 3
Niagara Falls, New York 14304

Attn: Kathleen Willy

Melissa Deyo

Authorized for release by:
5/22/2012 9:50:31 AM

Melissa Deyo
Project Manager I
melissa.deyo@testamericainc.com

Links

Review your project results through TotalAccess

Have a Question? Ask The Expert

Visit us at: www.testamericainc.com

The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

Table of Contents

Cover Page 1
Table of Contents 2
Definitions/Glossary 3
Case Narrative 4
Detection Summary 7
Client Sample Results 11
Surrogate Summary 21
QC Sample Results 22
QC Association Summary 44
Lab Chronicle 53
Certification Summary 58
Method Summary 59
Sample Summary 60
Chain of Custody 61
Receipt Checklists 65

Qualifiers

GC/MS VOA

Qualifier	Qualifier Description
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

GC VOA

Qualifier	Qualifier Description
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
*	LCS or LCSD exceeds the control limits
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.

General Chemistry

Qualifier	Qualifier Description
B	Compound was found in the blank and sample.
F	MS or MSD exceeds the control limits
^	ICV,CCV,ICB,CCB, ISA, ISB, CRI, CRA, DLCK or MRL standard: Instrument related QC exceeds the control limits.
4	MS, MSD: The analyte present in the original sample is 4 times greater than the matrix spike concentration; therefore, control limits are not applicable.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.
4	MS, MSD: The analyte present in the original sample is 4 times greater than the matrix spike concentration; therefore, control limits are not applicable.
F	MS or MSD exceeds the control limits
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
☼	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CNF	Contains no Free Liquid
DL, RA, RE, IN	Indicates a Dilution, Reanalysis, Re-extraction, or additional Initial metals/anion analysis of the sample
EDL	Estimated Detection Limit
EPA	United States Environmental Protection Agency
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RL	Reporting Limit
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

Job ID: 480-19123-1

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative
480-19123-1

Receipt
The samples were received on 4/25/2012 7:10 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 3.0º C.

GC/MS VOA
No analytical or quality issues were noted.

IC
Method VFA-IC: The method blank for batch 61975 contained Pyruvic acid above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-analysis of samples was not performed.

Method VFA-IC: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for batch 61975 were outside control limits. The associated laboratory control sample (LCS) recovery met acceptance criteria.

No other analytical or quality issues were noted.

GC VOA
Method RSK-175: The method blank for batch 61731 contained Ethane, Ethene and Methane above the method detection limit. These target analyte concentrations were less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Metals
Method 6010B: The following sample was diluted due to the abundance of the target analyte Magnesium: MW-8-4-042512-1800 (480-19123-3). Elevated reporting limits (RLs) are provided.

No other analytical or quality issues were noted.

General Chemistry
Method 9038: The method blank for batch 61992 contained Sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-analysis of samples was not performed.

Method 9038: The matrix spike (MS) recovery for batch 61992 was outside control limits. The associated laboratory control sample (LCS) recovery met acceptance criteria.

Method 9038: The method blanks for batch 63103 contained Sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

Method SM 4500 CL- E: The method blanks for batch 61993 contained Chloride above the reporting limit. The associated samples contained detection that were greater than 10 times the result of the method blank; therefore, no corrective action was required.

Method SM 4500 CL- E: The matrix spike (MS) recovery for batch 61993 was outside control limits. The associated laboratory control sample (LCS) recovery met acceptance criteria.

Method SM 4500 S2 D: The matrix spike (MS) recovery for batch 61729 was outside control limits. The associated laboratory control sample (LCS) recovery met acceptance criteria.

No other analytical or quality issues were noted.

Job ID: 480-19365-1

Job ID: 480-19365-1 (Continued)

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative
480-19365-1

Receipt
The samples were received on 4/30/2012 7:30 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperatures of the 2 coolers at receipt time were 2.4º C and 2.9º C.

GC/MS VOA
Method 8260B: The following samples were diluted due to the abundance of target analytes: MW-8-003-B-043012-1400 (480-19365-1) and MW-8-003-B-043012-1400 (480-19365-1DL). Elevated reporting limits (RLs) are provided.

No other analytical or quality issues were noted.

IC
No analytical or quality issues were noted.

GC VOA
Method RSK-175: The method blank for batch 62604 contained Methane above the method detection limit. These target analyte concentrations were less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Metals
No analytical or quality issues were noted.

General Chemistry
Method 9038: The method blanks for batch 63649 contained Sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Job ID: 480-19420-2

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative
480-19420-2

Receipt
The samples were received on 5/1/2012 5:17 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 4.2º C.

GC/MS VOA
No analytical or quality issues were noted.

IC
No analytical or quality issues were noted.

GC VOA
Method RSK-175: The laboratory control sample duplicate (LSCD) for batch 62926 had recoveries outside on control limits. The associated laboratory control sample (LCS) recovery met acceptance criteria.

No other analytical or quality issues were noted.

Job ID: 480-19420-2 (Continued)

Laboratory: TestAmerica Buffalo (Continued)

Metals
No analytical or quality issues were noted.

General Chemistry
Method 9038: The method blank for batch 63815 contained Sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Job ID: 480-19600-3

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative
480-19600-3

Receipt
The samples were received on 5/3/2012 7:45 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 3.8º C.

GC/MS VOA
Method 8260B: The following sample was diluted due to the abundance of target analytes: MW-8-S-1-050312-1830 (480-19600-4 DL). Elevated reporting limits (RLs) are provided.

No other analytical or quality issues were noted.

IC
Method VFA-IC: The matrix spike / matrix spike duplicate (MS/MSD) recoveries associated with batch 64494 were outside control limits. Matrix interference was suspected.

No other analytical or quality issues were noted.

GC VOA
Method RSK-175: The following sample was diluted due to the abundance of target analytes: MW-8-S-1-050312-1830 (480-19600-4). Elevated reporting limits (RLs) are provided.

Method RSK-175: The method blank for batch 63265 contained Methane above the method detection limit. These target analyte concentrations were less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Metals
No analytical or quality issues were noted.

General Chemistry
Method 9038: The method blank for batch 64026 contained Sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-analysis of samples was not performed.

Method SM4500 Cl-E: The method blank for batch 64027 contained sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Detection Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19123-1

Client Sample ID: MW-6-1-042512-0915 — Lab Sample ID: 480-19123-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Methane	17	B	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	16.5		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	67.7		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	2.6		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	2.4		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	459		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	0.45		0.020	0.0090	mg/L	1		350.1	Total/NA
Sulfate	104	B	25.0	7.5	mg/L	5		9038	Total/NA
Total Organic Carbon	3.8		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	392		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	1130		50.0	23.0	mg/L	50		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	13000		2000	2000	ug/L	2		RSK-175	Total/NA

Client Sample ID: MW-6-2-042512-1130 — Lab Sample ID: 480-19123-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Ethane	0.79	J B	1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	0.63	J B	1.5	0.52	ug/L	1		RSK-175	Total/NA
Methane	0.39	J B	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	0.15		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	89.0		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.79		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	3.8		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	1700		1.0	0.32	mg/L	1		6010B	Total/NA
Nitrate	0.13		0.050	0.011	mg/L	1		353.2	Total/NA
Sulfate	185	B	25.0	7.5	mg/L	5		9038	Total/NA
Total Organic Carbon	2.3		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	388		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	3800		121	55.7	mg/L	121		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	7200		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: MW-8-4-042512-1800 — Lab Sample ID: 480-19123-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	55		1.0	0.81	ug/L	1		8260B	Total/NA
Trichloroethene	15		1.0	0.46	ug/L	1		8260B	Total/NA
Vinyl chloride	18		1.0	0.90	ug/L	1		8260B	Total/NA
Ethane	1.0	J B	1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	0.88	J B	1.5	0.52	ug/L	1		RSK-175	Total/NA
Methane	75	B	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	1.0		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	272		1.0	0.22	mg/L	5		6010B	Total/NA
Manganese	1.9		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	8.5		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	1760		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	0.12		0.020	0.0090	mg/L	1		350.1	Total/NA
Sulfate	259	B	50.0	15.0	mg/L	10		9038	Total/NA
Total Organic Carbon	1.6		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	300		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	3820	B	100	46.0	mg/L	100		SM 4500 Cl- E	Total/NA

Client Sample ID: MW-8-4-042512-1800 (Continued)

Lab Sample ID: 480-19123-3

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	5700		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: MW-6-F-8-042512-1730

Lab Sample ID: 480-19123-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Ethane	0.84	J B	1.5	0.49	ug/L	1		RSK-175	Total/NA
Methane	32	B	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	0.11		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	175		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	1.2		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	4.9		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	2160		1.0	0.32	mg/L	1		6010B	Total/NA
Sulfate	208	B	50.0	15.0	mg/L	10		9038	Total/NA
Total Organic Carbon	1.9		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	368		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	3730	B	100	46.0	mg/L	100		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	9000		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: DUP

Lab Sample ID: 480-19123-5

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Ethane	0.79	J B	1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	0.69	J B	1.5	0.52	ug/L	1		RSK-175	Total/NA
Methane	0.46	J B	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	0.14		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	87.4		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.77		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	4.0		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	1690		1.0	0.32	mg/L	1		6010B	Total/NA
Nitrate	0.12		0.050	0.011	mg/L	1		353.2	Total/NA
Sulfate	150	B	100	30.0	mg/L	20		9038	Total/NA
Total Organic Carbon	2.3		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	360		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	3340	B	100	46.0	mg/L	100		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	8700		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19123-6

No Detections

Client Sample ID: MW-8-003-B-043012-1400

Lab Sample ID: 480-19365-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Trichloroethene	440		5.0	2.3	ug/L	5		8260B	Total/NA
Vinyl chloride	73		5.0	4.5	ug/L	5		8260B	Total/NA
cis-1,2-Dichloroethene - DL	830		25	20	ug/L	25		8260B	Total/NA
Tetrachloroethene - DL	1600		25	9.0	ug/L	25		8260B	Total/NA
Ethane	1.3	J	1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	6.4		1.5	0.52	ug/L	1		RSK-175	Total/NA
Methane	46	B	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	0.14		0.050	0.019	mg/L	1		6010B	Total/NA

Client Sample ID: MW-8-003-B-043012-1400 (Continued)

Lab Sample ID: 480-19365-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Magnesium	41.2		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.38		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	9.8		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	3060		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	0.16		0.020	0.0090	mg/L	1		350.1	Total/NA
Nitrate	0.50		0.050	0.011	mg/L	1		353.2	Total/NA
Sulfate	154	B	75.0	22.5	mg/L	15		9038	Total/NA
Total Organic Carbon	1.3		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	160		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	4640		121	55.7	mg/L	121		SM 4500 Cl- E	Total/NA

Client Sample ID: MW-8-1-043012-1700

Lab Sample ID: 480-19365-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	0.85	J	1.0	0.81	ug/L	1		8260B	Total/NA
Ethane	9.2		1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	3.5		1.5	0.52	ug/L	1		RSK-175	Total/NA
Methane	86	B	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	0.19		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	122		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.16		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	19.4		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	838		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	1.2		0.020	0.0090	mg/L	1		350.1	Total/NA
Sulfate	613	B	150	45.0	mg/L	30		9038	Total/NA
Total Organic Carbon	0.60	J	1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	304		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	475		20.0	9.2	mg/L	20		SM 4500 Cl- E	Total/NA
Sulfide	2.1		0.50	0.26	mg/L	5		SM 4500 S2 D	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	8000		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: MW-8-3-050112-1540

Lab Sample ID: 480-19420-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	5.3		1.0	0.81	ug/L	1		8260B	Total/NA
Tetrachloroethene	0.84	J	1.0	0.36	ug/L	1		8260B	Total/NA
Trichloroethene	5.9		1.0	0.46	ug/L	1		8260B	Total/NA
Ethane	1.4	J *	1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	2.4	*	1.5	0.52	ug/L	1		RSK-175	Total/NA
Methane	1.6	*	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	0.11		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	42.6		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	4.1		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	519		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	386		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	1.5		0.020	0.0090	mg/L	1		350.1	Total/NA
Sulfate	105	B	25.0	7.5	mg/L	5		9038	Total/NA
Total Organic Carbon	6.4		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	360		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	1580		100	46.0	mg/L	100		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	6300		1000	1000	ug/L	1		RSK-175	Total/NA

Detection Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19123-1

Client Sample ID: MW-8-S-2-050312-1830 — Lab Sample ID: 480-19600-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
trans-1,2-Dichloroethene	34		1.0	0.90	ug/L	1		8260B	Total/NA
cis-1,2-Dichloroethene - DL	10000		130	100	ug/L	125		8260B	Total/NA
Trichloroethene - DL	190		130	58	ug/L	125		8260B	Total/NA
Vinyl chloride - DL	380		130	110	ug/L	125		8260B	Total/NA
Ethane	11	J	15	4.9	ug/L	10		RSK-175	Total/NA
Ethene	9.7	J	15	5.2	ug/L	10		RSK-175	Total/NA
Methane	260	B	10	2.2	ug/L	10		RSK-175	Total/NA
Iron	0.20		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	47.3		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.021		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	17.1		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	286		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	1.2		0.020	0.0090	mg/L	1		350.1	Total/NA
Sulfate	243	B	100	30.0	mg/L	20		9038	Total/NA
Total Organic Carbon	1.5		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	372		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	338		10.0	4.6	mg/L	10		SM 4500 Cl- E	Total/NA
Sulfide	0.60		0.10	0.052	mg/L	1		SM 4500 S2 D	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	6800		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: TRIP BLANK — Lab Sample ID: 480-19600-5

No Detections

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19123-1

Client Sample ID: MW-6-1-042512-0915

Lab Sample ID: 480-19123-1

Date Collected: 04/25/12 09:15

Matrix: Water

Date Received: 04/25/12 19:10

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/01/12 23:49	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/01/12 23:49	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/01/12 23:49	1
Trichloroethene	ND		1.0	0.46	ug/L			05/01/12 23:49	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/01/12 23:49	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*99*		*66 - 137*		*05/01/12 23:49*	*1*
4-Bromofluorobenzene (Surr)	*104*		*73 - 120*		*05/01/12 23:49*	*1*
Toluene-d8 (Surr)	*101*		*71 - 126*		*05/01/12 23:49*	*1*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	ND		1.5	0.49	ug/L			04/26/12 20:01	1
Ethene	ND		1.5	0.52	ug/L			04/26/12 20:01	1
Methane	**17**	**B**	1.0	0.22	ug/L			04/26/12 20:01	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**13000**		2000	2000	ug/L			05/04/12 09:44	2

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**16.5**		0.050	0.019	mg/L		04/27/12 08:40	04/27/12 21:41	1
Magnesium	**67.7**		0.20	0.043	mg/L		04/27/12 08:40	04/27/12 21:41	1
Manganese	**2.6**		0.0030	0.00040	mg/L		04/27/12 08:40	04/27/12 21:41	1
Potassium	**2.4**		0.50	0.10	mg/L		04/27/12 08:40	04/27/12 21:41	1
Sodium	**459**		1.0	0.32	mg/L		04/27/12 08:40	04/27/12 21:41	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	**0.45**		0.020	0.0090	mg/L			04/28/12 11:57	1
Nitrate	ND		0.050	0.011	mg/L			04/26/12 22:01	1
Nitrite	ND		0.050	0.020	mg/L			04/26/12 22:01	1
Sulfate	**104**	**B**	25.0	7.5	mg/L			05/03/12 21:08	5
Total Organic Carbon	**3.8**		1.0	0.43	mg/L			04/30/12 22:47	1
Total Alkalinity	**392**		5.0	0.79	mg/L			04/27/12 13:50	1
Chloride	**1130**		50.0	23.0	mg/L			04/27/12 15:09	50
Sulfide	ND		0.10	0.052	mg/L			04/26/12 15:15	1
Acetic acid	ND		1.0	0.15	mg/L			04/29/12 18:40	1
Formic-acid	ND		1.0	0.11	mg/L			04/29/12 18:40	1
Lactic acid	ND		1.0	0.14	mg/L			04/29/12 18:40	1
n-Butyric Acid	ND		1.0	0.16	mg/L			04/29/12 18:40	1
Propionic acid	ND		1.0	0.17	mg/L			04/29/12 18:40	1
Pyruvic Acid	ND		1.0	0.080	mg/L			04/29/12 18:40	1

Client Sample ID: MW-6-2-042512-1130

Lab Sample ID: 480-19123-2

Date Collected: 04/25/12 11:30

Matrix: Water

Date Received: 04/25/12 19:10

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/02/12 00:12	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/02/12 00:12	1

Client Sample ID: MW-6-2-042512-1130

Lab Sample ID: 480-19123-2

Date Collected: 04/25/12 11:30

Matrix: Water

Date Received: 04/25/12 19:10

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/02/12 00:12	1
Trichloroethene	ND		1.0	0.46	ug/L			05/02/12 00:12	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/02/12 00:12	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*96*		*66 - 137*		*05/02/12 00:12*	*1*
4-Bromofluorobenzene (Surr)	*103*		*73 - 120*		*05/02/12 00:12*	*1*
Toluene-d8 (Surr)	*101*		*71 - 126*		*05/02/12 00:12*	*1*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**0.79**	**J B**	1.5	0.49	ug/L			04/26/12 20:18	1
Ethene	**0.63**	**J B**	1.5	0.52	ug/L			04/26/12 20:18	1
Methane	**0.39**	**J B**	1.0	0.22	ug/L			04/26/12 20:18	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**7200**		1000	1000	ug/L			05/04/12 08:46	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.15**		0.050	0.019	mg/L		04/27/12 08:40	04/27/12 21:44	1
Magnesium	**89.0**		0.20	0.043	mg/L		04/27/12 08:40	04/27/12 21:44	1
Manganese	**0.79**		0.0030	0.00040	mg/L		04/27/12 08:40	04/27/12 21:44	1
Potassium	**3.8**		0.50	0.10	mg/L		04/27/12 08:40	04/27/12 21:44	1
Sodium	**1700**		1.0	0.32	mg/L		04/27/12 08:40	04/27/12 21:44	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			04/28/12 11:58	1
Nitrate	**0.13**		0.050	0.011	mg/L			04/27/12 00:25	1
Nitrite	ND		0.050	0.020	mg/L			04/27/12 00:25	1
Sulfate	**185**	**B**	25.0	7.5	mg/L			05/03/12 21:08	5
Total Organic Carbon	**2.3**		1.0	0.43	mg/L			04/30/12 23:48	1
Total Alkalinity	**388**		5.0	0.79	mg/L			04/27/12 13:50	1
Chloride	**3800**		121	55.7	mg/L			04/27/12 15:09	121
Sulfide	ND		0.10	0.052	mg/L			04/26/12 15:15	1
Acetic acid	ND		1.0	0.15	mg/L			04/29/12 19:09	1
Formic-acid	ND		1.0	0.11	mg/L			04/29/12 19:09	1
Lactic acid	ND		1.0	0.14	mg/L			04/29/12 19:09	1
n-Butyric Acid	ND		1.0	0.16	mg/L			04/29/12 19:09	1
Propionic acid	ND		1.0	0.17	mg/L			04/29/12 19:09	1
Pyruvic Acid	ND		1.0	0.080	mg/L			04/29/12 19:09	1

Client Sample ID: MW-8-4-042512-1800

Lab Sample ID: 480-19123-3

Date Collected: 04/25/12 18:00

Matrix: Water

Date Received: 04/25/12 19:10

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	**55**		1.0	0.81	ug/L			05/02/12 00:36	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/02/12 00:36	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/02/12 00:36	1
Trichloroethene	**15**		1.0	0.46	ug/L			05/02/12 00:36	1

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19123-1

Client Sample ID: MW-8-4-042512-1800

Lab Sample ID: 480-19123-3

Date Collected: 04/25/12 18:00

Matrix: Water

Date Received: 04/25/12 19:10

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Vinyl chloride	18		1.0	0.90	ug/L			05/02/12 00:36	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*101*		*66 - 137*		*05/02/12 00:36*	*1*
4-Bromofluorobenzene (Surr)	*107*		*73 - 120*		*05/02/12 00:36*	*1*
Toluene-d8 (Surr)	*104*		*71 - 126*		*05/02/12 00:36*	*1*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	1.0	J B	1.5	0.49	ug/L			04/26/12 20:35	1
Ethene	0.88	J B	1.5	0.52	ug/L			04/26/12 20:35	1
Methane	75	B	1.0	0.22	ug/L			04/26/12 20:35	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	5700		1000	1000	ug/L			05/04/12 08:51	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	1.0		0.050	0.019	mg/L		04/27/12 08:40	04/27/12 21:47	1
Magnesium	272		1.0	0.22	mg/L		04/27/12 08:40	04/30/12 21:15	5
Manganese	1.9		0.0030	0.00040	mg/L		04/27/12 08:40	04/27/12 21:47	1
Potassium	8.5		0.50	0.10	mg/L		04/27/12 08:40	04/27/12 21:47	1
Sodium	1760		1.0	0.32	mg/L		04/27/12 08:40	04/27/12 21:47	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	0.12		0.020	0.0090	mg/L			04/28/12 11:59	1
Nitrate	ND		0.050	0.011	mg/L			04/26/12 22:03	1
Nitrite	ND		0.050	0.020	mg/L			04/26/12 22:03	1
Sulfate	259	B	50.0	15.0	mg/L			04/27/12 15:35	10
Total Organic Carbon	1.6		1.0	0.43	mg/L			05/01/12 02:51	1
Total Alkalinity	300		5.0	0.79	mg/L			04/27/12 13:50	1
Chloride	3820	B	100	46.0	mg/L			04/27/12 16:34	100
Sulfide	ND		0.10	0.052	mg/L			04/26/12 15:15	1
Acetic acid	ND		1.0	0.15	mg/L			04/29/12 19:39	1
Formic-acid	ND		1.0	0.11	mg/L			04/29/12 19:39	1
Lactic acid	ND		1.0	0.14	mg/L			04/29/12 19:39	1
n-Butyric Acid	ND		1.0	0.16	mg/L			04/29/12 19:39	1
Propionic acid	ND		1.0	0.17	mg/L			04/29/12 19:39	1
Pyruvic Acid	ND		1.0	0.080	mg/L			04/29/12 19:39	1

Client Sample ID: MW-6-F-8-042512-1730

Lab Sample ID: 480-19123-4

Date Collected: 04/25/12 17:30

Matrix: Water

Date Received: 04/25/12 19:10

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/02/12 01:00	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/02/12 01:00	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/02/12 01:00	1
Trichloroethene	ND		1.0	0.46	ug/L			05/02/12 01:00	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/02/12 01:00	1

Client Sample ID: MW-6-F-8-042512-1730 — Lab Sample ID: 480-19123-4

Date Collected: 04/25/12 17:30 — **Matrix: Water**
Date Received: 04/25/12 19:10

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*96*		*66 - 137*		*05/02/12 01:00*	*1*
4-Bromofluorobenzene (Surr)	*103*		*73 - 120*		*05/02/12 01:00*	*1*
Toluene-d8 (Surr)	*100*		*71 - 126*		*05/02/12 01:00*	*1*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**0.84**	**J B**	1.5	0.49	ug/L			04/26/12 20:52	1
Ethene	ND		1.5	0.52	ug/L			04/26/12 20:52	1
Methane	**32**	**B**	1.0	0.22	ug/L			04/26/12 20:52	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**9000**		1000	1000	ug/L			05/04/12 08:55	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.11**		0.050	0.019	mg/L		04/27/12 08:40	04/27/12 21:50	1
Magnesium	**175**		0.20	0.043	mg/L		04/27/12 08:40	04/27/12 21:50	1
Manganese	**1.2**		0.0030	0.00040	mg/L		04/27/12 08:40	04/27/12 21:50	1
Potassium	**4.9**		0.50	0.10	mg/L		04/27/12 08:40	04/27/12 21:50	1
Sodium	**2160**		1.0	0.32	mg/L		04/27/12 08:40	04/27/12 21:50	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			04/28/12 11:59	1
Nitrate	ND		0.050	0.011	mg/L			04/26/12 22:04	1
Nitrite	ND		0.050	0.020	mg/L			04/26/12 22:04	1
Sulfate	**208**	**B**	50.0	15.0	mg/L			04/27/12 15:36	10
Total Organic Carbon	**1.9**		1.0	0.43	mg/L			05/01/12 03:22	1
Total Alkalinity	**368**		5.0	0.79	mg/L			04/27/12 13:50	1
Chloride	**3730**	**B**	100	46.0	mg/L			04/27/12 16:34	100
Sulfide	ND		0.10	0.052	mg/L			04/26/12 15:15	1
Acetic acid	ND		1.0	0.15	mg/L			04/29/12 20:08	1
Formic-acid	ND		1.0	0.11	mg/L			04/29/12 20:08	1
Lactic acid	ND		1.0	0.14	mg/L			04/29/12 20:08	1
n-Butyric Acid	ND		1.0	0.16	mg/L			04/29/12 20:08	1
Propionic acid	ND		1.0	0.17	mg/L			04/29/12 20:08	1
Pyruvic Acid	ND		1.0	0.080	mg/L			04/29/12 20:08	1

Client Sample ID: DUP — Lab Sample ID: 480-19123-5

Date Collected: 04/25/12 00:00 — **Matrix: Water**
Date Received: 04/25/12 19:10

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/02/12 01:24	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/02/12 01:24	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/02/12 01:24	1
Trichloroethene	ND		1.0	0.46	ug/L			05/02/12 01:24	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/02/12 01:24	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*99*		*66 - 137*		*05/02/12 01:24*	*1*
4-Bromofluorobenzene (Surr)	*107*		*73 - 120*		*05/02/12 01:24*	*1*

Client Sample ID: DUP — Lab Sample ID: 480-19123-5

Date Collected: 04/25/12 00:00 — **Matrix: Water**
Date Received: 04/25/12 19:10

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Toluene-d8 (Surr)	*104*		*71 - 126*		*05/02/12 01:24*	*1*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**0.79**	**J B**	1.5	0.49	ug/L			04/26/12 21:09	1
Ethene	**0.69**	**J B**	1.5	0.52	ug/L			04/26/12 21:09	1
Methane	**0.46**	**J B**	1.0	0.22	ug/L			04/26/12 21:09	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**8700**		1000	1000	ug/L			05/04/12 09:04	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.14**		0.050	0.019	mg/L		04/27/12 08:40	04/27/12 21:52	1
Magnesium	**87.4**		0.20	0.043	mg/L		04/27/12 08:40	04/27/12 21:52	1
Manganese	**0.77**		0.0030	0.00040	mg/L		04/27/12 08:40	04/27/12 21:52	1
Potassium	**4.0**		0.50	0.10	mg/L		04/27/12 08:40	04/27/12 21:52	1
Sodium	**1690**		1.0	0.32	mg/L		04/27/12 08:40	04/27/12 21:52	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			04/28/12 12:04	1
Nitrate	**0.12**		0.050	0.011	mg/L			04/27/12 00:26	1
Nitrite	ND		0.050	0.020	mg/L			04/27/12 00:26	1
Sulfate	**150**	**B**	100	30.0	mg/L			04/27/12 15:30	20
Total Organic Carbon	**2.3**		1.0	0.43	mg/L			05/01/12 03:52	1
Total Alkalinity	**360**		5.0	0.79	mg/L			04/27/12 13:50	1
Chloride	**3340**	**B**	100	46.0	mg/L			04/27/12 15:24	100
Sulfide	ND		0.10	0.052	mg/L			04/26/12 15:15	1
Acetic acid	ND		1.0	0.15	mg/L			04/29/12 23:32	1
Formic-acid	ND		1.0	0.11	mg/L			04/29/12 23:32	1
Lactic acid	ND		1.0	0.14	mg/L			04/29/12 23:32	1
n-Butyric Acid	ND		1.0	0.16	mg/L			04/29/12 23:32	1
Propionic acid	ND	^	1.0	0.17	mg/L			04/29/12 23:32	1
Pyruvic Acid	ND		1.0	0.080	mg/L			04/29/12 23:32	1

Client Sample ID: TRIP BLANK — Lab Sample ID: 480-19123-6

Date Collected: 04/25/12 00:00 — **Matrix: Water**
Date Received: 04/25/12 19:10

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/02/12 01:48	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/02/12 01:48	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/02/12 01:48	1
Trichloroethene	ND		1.0	0.46	ug/L			05/02/12 01:48	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/02/12 01:48	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*98*		*66 - 137*		*05/02/12 01:48*	*1*
4-Bromofluorobenzene (Surr)	*105*		*73 - 120*		*05/02/12 01:48*	*1*
Toluene-d8 (Surr)	*102*		*71 - 126*		*05/02/12 01:48*	*1*

Client Sample ID: MW-8-003-B-043012-1400

Date Collected: 04/30/12 14:00
Date Received: 04/30/12 19:30

Lab Sample ID: 480-19365-1

Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
trans-1,2-Dichloroethene	ND		5.0	4.5	ug/L			05/08/12 14:10	5
Trichloroethene	**440**		5.0	2.3	ug/L			05/08/12 14:10	5
Vinyl chloride	**73**		5.0	4.5	ug/L			05/08/12 14:10	5

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*90*		*66 - 137*		*05/08/12 14:10*	*5*
4-Bromofluorobenzene (Surr)	*108*		*73 - 120*		*05/08/12 14:10*	*5*
Toluene-d8 (Surr)	*104*		*71 - 126*		*05/08/12 14:10*	*5*

Method: 8260B - Volatile Organic Compounds (GC/MS) - DL

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	**830**		25	20	ug/L			05/09/12 00:24	25
Tetrachloroethene	**1600**		25	9.0	ug/L			05/09/12 00:24	25

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*93*		*66 - 137*		*05/09/12 00:24*	*25*
4-Bromofluorobenzene (Surr)	*108*		*73 - 120*		*05/09/12 00:24*	*25*
Toluene-d8 (Surr)	*106*		*71 - 126*		*05/09/12 00:24*	*25*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**1.3**	**J**	1.5	0.49	ug/L			05/02/12 16:05	1
Ethene	**6.4**		1.5	0.52	ug/L			05/02/12 16:05	1
Methane	**46**	**B**	1.0	0.22	ug/L			05/02/12 16:05	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	ND		1000	1000	ug/L			05/04/12 10:04	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.14**		0.050	0.019	mg/L		05/02/12 08:00	05/02/12 19:45	1
Magnesium	**41.2**		0.20	0.043	mg/L		05/02/12 08:00	05/02/12 19:45	1
Manganese	**0.38**		0.0030	0.00040	mg/L		05/02/12 08:00	05/02/12 19:45	1
Potassium	**9.8**		0.50	0.10	mg/L		05/02/12 08:00	05/02/12 19:45	1
Sodium	**3060**		1.0	0.32	mg/L		05/02/12 08:00	05/02/12 19:45	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	**0.16**		0.020	0.0090	mg/L			05/02/12 11:13	1
Nitrate	**0.50**		0.050	0.011	mg/L			05/01/12 23:05	1
Nitrite	ND		0.050	0.020	mg/L			05/01/12 23:05	1
Sulfate	**154**	**B**	75.0	22.5	mg/L			05/08/12 17:05	15
Total Organic Carbon	**1.3**		1.0	0.43	mg/L			05/05/12 05:38	1
Total Alkalinity	**160**		5.0	0.79	mg/L			05/02/12 13:34	1
Chloride	**4640**		121	55.7	mg/L			05/08/12 17:51	121
Sulfide	ND		0.10	0.052	mg/L			05/03/12 12:10	1
Acetic acid	ND		1.0	0.15	mg/L			05/16/12 01:35	1
Formic-acid	ND		1.0	0.11	mg/L			05/16/12 01:35	1
Lactic acid	ND		1.0	0.14	mg/L			05/16/12 01:35	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/16/12 01:35	1
Propionic acid	ND		1.0	0.17	mg/L			05/16/12 01:35	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/16/12 01:35	1

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19123-1

Client Sample ID: MW-8-1-043012-1700

Lab Sample ID: 480-19365-2

Date Collected: 04/30/12 17:00

Matrix: Water

Date Received: 04/30/12 19:30

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	0.85	J	1.0	0.81	ug/L			05/08/12 14:34	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/08/12 14:34	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/08/12 14:34	1
Trichloroethene	ND		1.0	0.46	ug/L			05/08/12 14:34	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/08/12 14:34	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*91*		*66 - 137*		*05/08/12 14:34*	*1*
4-Bromofluorobenzene (Surr)	*110*		*73 - 120*		*05/08/12 14:34*	*1*
Toluene-d8 (Surr)	*107*		*71 - 126*		*05/08/12 14:34*	*1*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	9.2		1.5	0.49	ug/L			05/02/12 16:22	1
Ethene	3.5		1.5	0.52	ug/L			05/02/12 16:22	1
Methane	86	B	1.0	0.22	ug/L			05/02/12 16:22	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	8000		1000	1000	ug/L			05/04/12 10:08	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	0.19		0.050	0.019	mg/L		05/02/12 08:00	05/02/12 19:54	1
Magnesium	122		0.20	0.043	mg/L		05/02/12 08:00	05/02/12 19:54	1
Manganese	0.16		0.0030	0.00040	mg/L		05/02/12 08:00	05/02/12 19:54	1
Potassium	19.4		0.50	0.10	mg/L		05/02/12 08:00	05/02/12 19:54	1
Sodium	838		1.0	0.32	mg/L		05/02/12 08:00	05/02/12 19:54	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	1.2		0.020	0.0090	mg/L			05/02/12 11:14	1
Nitrate	ND		0.050	0.011	mg/L			05/01/12 21:35	1
Nitrite	ND		0.050	0.020	mg/L			05/01/12 21:35	1
Sulfate	613	B	150	45.0	mg/L			05/08/12 17:05	30
Total Organic Carbon	0.60	J	1.0	0.43	mg/L			05/05/12 07:08	1
Total Alkalinity	304		5.0	0.79	mg/L			05/02/12 13:41	1
Chloride	475		20.0	9.2	mg/L			05/08/12 17:08	20
Sulfide	2.1		0.50	0.26	mg/L			05/03/12 12:10	5
Acetic acid	ND		1.0	0.15	mg/L			05/16/12 02:05	1
Formic-acid	ND		1.0	0.11	mg/L			05/16/12 02:05	1
Lactic acid	ND		1.0	0.14	mg/L			05/16/12 02:05	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/16/12 02:05	1
Propionic acid	ND		1.0	0.17	mg/L			05/16/12 02:05	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/16/12 02:05	1

Client Sample ID: MW-8-3-050112-1540

Lab Sample ID: 480-19420-3

Date Collected: 05/01/12 15:40

Matrix: Water

Date Received: 05/01/12 17:17

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	5.3		1.0	0.81	ug/L			05/10/12 00:35	1
Tetrachloroethene	0.84	J	1.0	0.36	ug/L			05/10/12 00:35	1

Client Sample ID: MW-8-3-050112-1540

Lab Sample ID: 480-19420-3

Date Collected: 05/01/12 15:40

Matrix: Water

Date Received: 05/01/12 17:17

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/10/12 00:35	1
Trichloroethene	**5.9**		1.0	0.46	ug/L			05/10/12 00:35	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/10/12 00:35	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*110*		*66 - 137*		*05/10/12 00:35*	*1*
4-Bromofluorobenzene (Surr)	*89*		*73 - 120*		*05/10/12 00:35*	*1*
Toluene-d8 (Surr)	*106*		*71 - 126*		*05/10/12 00:35*	*1*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**1.4**	**J ***	1.5	0.49	ug/L			05/03/12 17:38	1
Ethene	**2.4**	**	1.5	0.52	ug/L			05/03/12 17:38	1
Methane	**1.6**	**	1.0	0.22	ug/L			05/03/12 17:38	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**6300**		1000	1000	ug/L			05/14/12 12:50	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.11**		0.050	0.019	mg/L		05/03/12 08:15	05/03/12 17:50	1
Magnesium	**42.6**		0.20	0.043	mg/L		05/03/12 08:15	05/03/12 17:50	1
Manganese	**4.1**		0.0030	0.00040	mg/L		05/03/12 08:15	05/03/12 17:50	1
Potassium	**519**		0.50	0.10	mg/L		05/03/12 08:15	05/03/12 17:50	1
Sodium	**386**		1.0	0.32	mg/L		05/03/12 08:15	05/03/12 17:50	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	**1.5**		0.020	0.0090	mg/L			05/03/12 12:26	1
Nitrate	ND		0.050	0.011	mg/L			05/02/12 20:01	1
Nitrite	ND		0.050	0.020	mg/L			05/02/12 20:01	1
Sulfate	**105**	**B**	25.0	7.5	mg/L			05/09/12 19:23	5
Total Organic Carbon	**6.4**		1.0	0.43	mg/L			05/05/12 09:38	1
Total Alkalinity	**360**		5.0	0.79	mg/L			05/02/12 14:10	1
Chloride	**1580**		100	46.0	mg/L			05/09/12 20:24	100
Sulfide	ND		0.10	0.052	mg/L			05/03/12 12:10	1
Acetic acid	ND		1.0	0.15	mg/L			05/15/12 19:46	1
Formic-acid	ND		1.0	0.11	mg/L			05/15/12 19:46	1
Lactic acid	ND		1.0	0.14	mg/L			05/15/12 19:46	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/15/12 19:46	1
Propionic acid	ND		1.0	0.17	mg/L			05/15/12 19:46	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/15/12 19:46	1

Client Sample ID: MW-8-S-2-050312-1830

Lab Sample ID: 480-19600-4

Date Collected: 05/03/12 18:30

Matrix: Water

Date Received: 05/03/12 19:45

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Tetrachloroethene	ND		1.0	0.36	ug/L			05/11/12 13:48	1
trans-1,2-Dichloroethene	**34**		1.0	0.90	ug/L			05/11/12 13:48	1

Client Sample ID: MW-8-S-2-050312-1830

Lab Sample ID: 480-19600-4

Date Collected: 05/03/12 18:30

Matrix: Water

Date Received: 05/03/12 19:45

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	121		66 - 137		05/11/12 13:48	1
4-Bromofluorobenzene (Surr)	111		73 - 120		05/11/12 13:48	1
Toluene-d8 (Surr)	114		71 - 126		05/11/12 13:48	1

Method: 8260B - Volatile Organic Compounds (GC/MS) - DL

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	10000		130	100	ug/L			05/14/12 11:20	125
Trichloroethene	190		130	58	ug/L			05/14/12 11:20	125
Vinyl chloride	380		130	110	ug/L			05/14/12 11:20	125

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	107		66 - 137		05/14/12 11:20	125
4-Bromofluorobenzene (Surr)	98		73 - 120		05/14/12 11:20	125
Toluene-d8 (Surr)	99		71 - 126		05/14/12 11:20	125

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	11	J	15	4.9	ug/L			05/07/12 14:25	10
Ethene	9.7	J	15	5.2	ug/L			05/07/12 14:25	10
Methane	260	B	10	2.2	ug/L			05/07/12 14:25	10

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	6800		1000	1000	ug/L			05/14/12 13:06	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	0.20		0.050	0.019	mg/L		05/07/12 07:20	05/07/12 18:02	1
Magnesium	47.3		0.20	0.043	mg/L		05/07/12 07:20	05/07/12 18:02	1
Manganese	0.021		0.0030	0.00040	mg/L		05/07/12 07:20	05/07/12 18:02	1
Potassium	17.1		0.50	0.10	mg/L		05/07/12 07:20	05/07/12 18:02	1
Sodium	286		1.0	0.32	mg/L		05/07/12 07:20	05/07/12 18:02	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	1.2		0.020	0.0090	mg/L			05/04/12 13:54	1
Nitrate	ND		0.050	0.011	mg/L			05/04/12 20:23	1
Nitrite	ND		0.050	0.020	mg/L			05/04/12 20:23	1
Sulfate	243	B	100	30.0	mg/L			05/10/12 16:33	20
Total Organic Carbon	1.5		1.0	0.43	mg/L			05/06/12 14:31	1
Total Alkalinity	372		5.0	0.79	mg/L			05/07/12 14:40	1
Chloride	338		10.0	4.6	mg/L			05/10/12 16:39	10
Sulfide	0.60		0.10	0.052	mg/L			05/08/12 08:45	1
Acetic acid	ND		1.0	0.15	mg/L			05/16/12 12:45	1
Formic-acid	ND		1.0	0.11	mg/L			05/16/12 12:45	1
Lactic acid	ND		1.0	0.14	mg/L			05/16/12 12:45	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/16/12 12:45	1
Propionic acid	ND		1.0	0.17	mg/L			05/16/12 12:45	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/16/12 12:45	1

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19123-1

Client Sample ID: TRIP BLANK
Date Collected: 05/03/12 00:00
Date Received: 05/03/12 19:45

Lab Sample ID: 480-19600-5
Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/13/12 12:06	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/13/12 12:06	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/13/12 12:06	1
Trichloroethene	ND		1.0	0.46	ug/L			05/13/12 12:06	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/13/12 12:06	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*111*		*66 - 137*		*05/13/12 12:06*	*1*
4-Bromofluorobenzene (Surr)	*98*		*73 - 120*		*05/13/12 12:06*	*1*
Toluene-d8 (Surr)	*100*		*71 - 126*		*05/13/12 12:06*	*1*

Surrogate Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19123-1

Method: 8260B - Volatile Organic Compounds (GC/MS)

Matrix: Water

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)		
		12DCE	BFB	TOL
Lab Sample ID	Client Sample ID	(66-137)	(73-120)	(71-126)
480-19123-1	MW-6-1-042512-0915	99	104	101
480-19123-2	MW-6-2-042512-1130	96	103	101
480-19123-3	MW-8-4-042512-1800	101	107	104
480-19123-4	MW-6-F-8-042512-1730	96	103	100
480-19123-5	DUP	99	107	104
480-19123-6	TRIP BLANK	98	105	102
480-19365-1	MW-8-003-B-043012-1400	90	108	104
480-19365-1 - DL	MW-8-003-B-043012-1400	93	108	106
480-19365-2	MW-8-1-043012-1700	91	110	107
480-19420-3	MW-8-3-050112-1540	110	89	106
480-19600-4	MW-8-S-2-050312-1830	121	111	114
480-19600-4 - DL	MW-8-S-2-050312-1830	107	98	99
480-19600-5	TRIP BLANK	111	98	100
LCS 480-62559/4	Lab Control Sample	92	99	99
LCS 480-63474/4	Lab Control Sample	90	106	106
LCS 480-63572/4	Lab Control Sample	92	106	103
LCS 480-63732/3	Lab Control Sample	104	99	107
LCS 480-64020/4	Lab Control Sample	110	115	116
LCS 480-64247/5	Lab Control Sample	105	101	99
LCS 480-64274/5	Lab Control Sample	105	100	97
MB 480-62559/5	Method Blank	99	108	106
MB 480-63474/5	Method Blank	92	110	107
MB 480-63572/5	Method Blank	93	107	104
MB 480-63732/4	Method Blank	111	90	104
MB 480-64020/5	Method Blank	112	111	113
MB 480-64247/6	Method Blank	106	97	98
MB 480-64274/6	Method Blank	107	98	99

Surrogate Legend

12DCE = 1,2-Dichloroethane-d4 (Surr)

BFB = 4-Bromofluorobenzene (Surr)

TOL = Toluene-d8 (Surr)

Method: 8260B - Volatile Organic Compounds (GC/MS)

Lab Sample ID: MB 480-62559/5
Matrix: Water
Analysis Batch: 62559

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/01/12 22:52	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/01/12 22:52	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/01/12 22:52	1
Trichloroethene	ND		1.0	0.46	ug/L			05/01/12 22:52	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/01/12 22:52	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*99*		*66 - 137*		*05/01/12 22:52*	*1*
4-Bromofluorobenzene (Surr)	*108*		*73 - 120*		*05/01/12 22:52*	*1*
Toluene-d8 (Surr)	*106*		*71 - 126*		*05/01/12 22:52*	*1*

Lab Sample ID: LCS 480-62559/4
Matrix: Water
Analysis Batch: 62559

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	22.6		ug/L		90	74 - 124
Tetrachloroethene	25.0	23.4		ug/L		94	74 - 122
trans-1,2-Dichloroethene	25.0	21.8		ug/L		87	73 - 127
Trichloroethene	25.0	22.0		ug/L		88	74 - 123

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*92*		*66 - 137*
4-Bromofluorobenzene (Surr)	*99*		*73 - 120*
Toluene-d8 (Surr)	*99*		*71 - 126*

Lab Sample ID: MB 480-63474/5
Matrix: Water
Analysis Batch: 63474

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/08/12 12:03	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/08/12 12:03	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/08/12 12:03	1
Trichloroethene	ND		1.0	0.46	ug/L			05/08/12 12:03	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/08/12 12:03	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*92*		*66 - 137*		*05/08/12 12:03*	*1*
4-Bromofluorobenzene (Surr)	*110*		*73 - 120*		*05/08/12 12:03*	*1*
Toluene-d8 (Surr)	*107*		*71 - 126*		*05/08/12 12:03*	*1*

Lab Sample ID: LCS 480-63474/4
Matrix: Water
Analysis Batch: 63474

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	25.9		ug/L		104	74 - 124
Tetrachloroethene	25.0	28.9		ug/L		116	74 - 122

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 480-63474/4
Matrix: Water
Analysis Batch: 63474

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
trans-1,2-Dichloroethene			25.0	27.3		ug/L		109	73 - 127		
Trichloroethene			25.0	24.8		ug/L		99	74 - 123		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*90*		*66 - 137*
4-Bromofluorobenzene (Surr)	*106*		*73 - 120*
Toluene-d8 (Surr)	*106*		*71 - 126*

Lab Sample ID: MB 480-63572/5
Matrix: Water
Analysis Batch: 63572

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/08/12 23:15	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/08/12 23:15	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/08/12 23:15	1
Trichloroethene	ND		1.0	0.46	ug/L			05/08/12 23:15	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/08/12 23:15	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*93*		*66 - 137*		*05/08/12 23:15*	*1*
4-Bromofluorobenzene (Surr)	*107*		*73 - 120*		*05/08/12 23:15*	*1*
Toluene-d8 (Surr)	*104*		*71 - 126*		*05/08/12 23:15*	*1*

Lab Sample ID: LCS 480-63572/4
Matrix: Water
Analysis Batch: 63572

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
cis-1,2-Dichloroethene			25.0	25.1		ug/L		100	74 - 124		
Tetrachloroethene			25.0	27.2		ug/L		109	74 - 122		
trans-1,2-Dichloroethene			25.0	25.5		ug/L		102	73 - 127		
Trichloroethene			25.0	23.9		ug/L		96	74 - 123		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*92*		*66 - 137*
4-Bromofluorobenzene (Surr)	*106*		*73 - 120*
Toluene-d8 (Surr)	*103*		*71 - 126*

Lab Sample ID: MB 480-63732/4
Matrix: Water
Analysis Batch: 63732

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/09/12 23:04	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/09/12 23:04	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/09/12 23:04	1
Trichloroethene	ND		1.0	0.46	ug/L			05/09/12 23:04	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/09/12 23:04	1

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 480-63732/4
Matrix: Water
Analysis Batch: 63732

Client Sample ID: Method Blank
Prep Type: Total/NA

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	111		66 - 137		05/09/12 23:04	1
4-Bromofluorobenzene (Surr)	90		73 - 120		05/09/12 23:04	1
Toluene-d8 (Surr)	104		71 - 126		05/09/12 23:04	1

Lab Sample ID: LCS 480-63732/3
Matrix: Water
Analysis Batch: 63732

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	27.9		ug/L		112	74 - 124
Tetrachloroethene	25.0	26.9		ug/L		108	74 - 122
trans-1,2-Dichloroethene	25.0	29.0		ug/L		116	73 - 127
Trichloroethene	25.0	28.0		ug/L		112	74 - 123

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	104		66 - 137
4-Bromofluorobenzene (Surr)	99		73 - 120
Toluene-d8 (Surr)	107		71 - 126

Lab Sample ID: MB 480-64020/5
Matrix: Water
Analysis Batch: 64020

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/11/12 11:17	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/11/12 11:17	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/11/12 11:17	1
Trichloroethene	ND		1.0	0.46	ug/L			05/11/12 11:17	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/11/12 11:17	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	112		66 - 137		05/11/12 11:17	1
4-Bromofluorobenzene (Surr)	111		73 - 120		05/11/12 11:17	1
Toluene-d8 (Surr)	113		71 - 126		05/11/12 11:17	1

Lab Sample ID: LCS 480-64020/4
Matrix: Water
Analysis Batch: 64020

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	26.8		ug/L		107	74 - 124
Tetrachloroethene	25.0	27.3		ug/L		109	74 - 122
trans-1,2-Dichloroethene	25.0	26.2		ug/L		105	73 - 127
Trichloroethene	25.0	26.6		ug/L		106	74 - 123

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	110		66 - 137
4-Bromofluorobenzene (Surr)	115		73 - 120

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 480-64020/4
Matrix: Water
Analysis Batch: 64020

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Surrogate	LCS %Recovery	LCS Qualifier	Limits
Toluene-d8 (Surr)	*116*		*71 - 126*

Lab Sample ID: MB 480-64247/6
Matrix: Water
Analysis Batch: 64247

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/13/12 10:35	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/13/12 10:35	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/13/12 10:35	1
Trichloroethene	ND		1.0	0.46	ug/L			05/13/12 10:35	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/13/12 10:35	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	*106*		*66 - 137*		*05/13/12 10:35*	*1*
4-Bromofluorobenzene (Surr)	*97*		*73 - 120*		*05/13/12 10:35*	*1*
Toluene-d8 (Surr)	*98*		*71 - 126*		*05/13/12 10:35*	*1*

Lab Sample ID: LCS 480-64247/5
Matrix: Water
Analysis Batch: 64247

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	29.9		ug/L		120	74 - 124
Tetrachloroethene	25.0	27.4		ug/L		110	74 - 122
trans-1,2-Dichloroethene	25.0	31.1		ug/L		124	73 - 127
Trichloroethene	25.0	29.2		ug/L		117	74 - 123

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	*105*		*66 - 137*
4-Bromofluorobenzene (Surr)	*101*		*73 - 120*
Toluene-d8 (Surr)	*99*		*71 - 126*

Lab Sample ID: MB 480-64274/6
Matrix: Water
Analysis Batch: 64274

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/14/12 10:42	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/14/12 10:42	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/14/12 10:42	1
Trichloroethene	ND		1.0	0.46	ug/L			05/14/12 10:42	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/14/12 10:42	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	*107*		*66 - 137*		*05/14/12 10:42*	*1*
4-Bromofluorobenzene (Surr)	*98*		*73 - 120*		*05/14/12 10:42*	*1*
Toluene-d8 (Surr)	*99*		*71 - 126*		*05/14/12 10:42*	*1*

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 480-64274/5
Matrix: Water
Analysis Batch: 64274

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	29.4		ug/L		118	74 - 124
Tetrachloroethene	25.0	27.4		ug/L		110	74 - 122
trans-1,2-Dichloroethene	25.0	31.2		ug/L		125	73 - 127
Trichloroethene	25.0	29.0		ug/L		116	74 - 123

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*105*		*66 - 137*
4-Bromofluorobenzene (Surr)	*100*		*73 - 120*
Toluene-d8 (Surr)	*97*		*71 - 126*

Method: RSK-175 - Dissolved Gases (GC)

Lab Sample ID: MB 200-38245/3
Matrix: Water
Analysis Batch: 38245

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	ND		1000	1000	ug/L			05/04/12 08:23	1

Lab Sample ID: LCS 200-38245/2
Matrix: Water
Analysis Batch: 38245

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Carbon dioxide	5010	5150		ug/L		103	70 - 130

Lab Sample ID: MB 200-38628/4
Matrix: Water
Analysis Batch: 38628

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	ND		1000	1000	ug/L			05/14/12 11:34	1

Lab Sample ID: LCS 200-38628/3
Matrix: Water
Analysis Batch: 38628

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Carbon dioxide	5010	5330		ug/L		106	70 - 130

Lab Sample ID: MB 480-61731/3
Matrix: Water
Analysis Batch: 61731

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	0.810	J	1.5	0.49	ug/L			04/26/12 16:52	1
Ethene	0.647	J	1.5	0.52	ug/L			04/26/12 16:52	1
Methane	0.589	J	1.0	0.22	ug/L			04/26/12 16:52	1

Method: RSK-175 - Dissolved Gases (GC) (Continued)

Lab Sample ID: LCS 480-61731/4
Matrix: Water
Analysis Batch: 61731

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethane	14.4	14.1		ug/L		98	71 - 147
Ethene	13.5	13.1		ug/L		97	71 - 147
Methane	7.76	7.73		ug/L		100	48 - 174

Lab Sample ID: LCSD 480-61731/5
Matrix: Water
Analysis Batch: 61731

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ethane	14.4	14.6		ug/L		102	71 - 147	3	50
Ethene	13.5	13.6		ug/L		101	71 - 147	4	50
Methane	7.76	7.81		ug/L		101	48 - 174	1	50

Lab Sample ID: MB 480-62604/3
Matrix: Water
Analysis Batch: 62604

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	ND		1.5	0.49	ug/L			05/02/12 08:32	1
Ethene	ND		1.5	0.52	ug/L			05/02/12 08:32	1
Methane	0.522	J	1.0	0.22	ug/L			05/02/12 08:32	1

Lab Sample ID: LCS 480-62604/4
Matrix: Water
Analysis Batch: 62604

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethane	7.19	8.33		ug/L		116	71 - 147
Ethene	6.73	7.84		ug/L		116	71 - 147
Methane	3.88	4.65		ug/L		120	48 - 174

Lab Sample ID: LCSD 480-62604/5
Matrix: Water
Analysis Batch: 62604

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ethane	7.19	8.43		ug/L		117	71 - 147	1	50
Ethene	6.73	7.90		ug/L		117	71 - 147	1	50
Methane	3.88	4.60		ug/L		119	48 - 174	1	50

Lab Sample ID: MB 480-62926/3
Matrix: Water
Analysis Batch: 62926

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	ND		1.5	0.49	ug/L			05/03/12 15:53	1
Ethene	ND		1.5	0.52	ug/L			05/03/12 15:53	1
Methane	ND		1.0	0.22	ug/L			05/03/12 15:53	1

Method: RSK-175 - Dissolved Gases (GC) (Continued)

Lab Sample ID: LCS 480-62926/2
Matrix: Water
Analysis Batch: 62926

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethane	14.4	16.0		ug/L		111	71 - 147
Ethene	13.5	15.2		ug/L		113	71 - 147
Methane	7.76	8.49		ug/L		109	48 - 174

Lab Sample ID: LCSD 480-62926/4
Matrix: Water
Analysis Batch: 62926

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ethane	7.19	14.1	*	ug/L		196	71 - 147	13	50
Ethene	6.73	13.2	*	ug/L		196	71 - 147	14	50
Methane	3.88	7.92	*	ug/L		204	48 - 174	7	50

Lab Sample ID: MB 480-63265/2
Matrix: Water
Analysis Batch: 63265

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	ND		1.5	0.49	ug/L			05/07/12 07:56	1
Ethene	ND		1.5	0.52	ug/L			05/07/12 07:56	1
Methane	0.523	J	1.0	0.22	ug/L			05/07/12 07:56	1

Lab Sample ID: LCS 480-63265/3
Matrix: Water
Analysis Batch: 63265

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethane	7.19	8.44		ug/L		117	71 - 147
Ethene	6.73	7.81		ug/L		116	71 - 147
Methane	3.88	4.65		ug/L		120	48 - 174

Lab Sample ID: LCSD 480-63265/4
Matrix: Water
Analysis Batch: 63265

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ethane	7.19	8.44		ug/L		117	71 - 147	0	50
Ethene	6.73	7.76		ug/L		115	71 - 147	1	50
Methane	3.88	4.73		ug/L		122	48 - 174	2	50

Method: 6010B - Metals (ICP)

Lab Sample ID: MB 480-61646/1-A
Matrix: Water
Analysis Batch: 62078

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 61646

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		04/27/12 08:40	04/27/12 20:53	1
Magnesium	ND		0.20	0.043	mg/L		04/27/12 08:40	04/27/12 20:53	1
Manganese	ND		0.0030	0.00040	mg/L		04/27/12 08:40	04/27/12 20:53	1

Method: 6010B - Metals (ICP) (Continued)

Lab Sample ID: MB 480-61646/1-A
Matrix: Water
Analysis Batch: 62078

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 61646

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Potassium	ND		0.50	0.10	mg/L		04/27/12 08:40	04/27/12 20:53	1
Sodium	ND		1.0	0.32	mg/L		04/27/12 08:40	04/27/12 20:53	1

Lab Sample ID: LCS 480-61646/2-A
Matrix: Water
Analysis Batch: 62078

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 61646

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	10.0	9.22		mg/L		92	80 - 120
Magnesium	10.0	9.67		mg/L		97	80 - 120
Manganese	0.200	0.200		mg/L		100	80 - 120
Potassium	10.0	9.64		mg/L		96	80 - 120
Sodium	10.0	9.60		mg/L		96	80 - 120

Lab Sample ID: MB 480-62531/1-A
Matrix: Water
Analysis Batch: 62800

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 62531

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		05/02/12 08:00	05/02/12 19:40	1
Magnesium	ND		0.20	0.043	mg/L		05/02/12 08:00	05/02/12 19:40	1
Manganese	ND		0.0030	0.00040	mg/L		05/02/12 08:00	05/02/12 19:40	1
Potassium	ND		0.50	0.10	mg/L		05/02/12 08:00	05/02/12 19:40	1
Sodium	ND		1.0	0.32	mg/L		05/02/12 08:00	05/02/12 19:40	1

Lab Sample ID: LCS 480-62531/2-A
Matrix: Water
Analysis Batch: 62800

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 62531

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	10.0	9.58		mg/L		96	80 - 120
Magnesium	10.0	9.24		mg/L		92	80 - 120
Manganese	0.200	0.196		mg/L		98	80 - 120
Potassium	10.0	9.43		mg/L		94	80 - 120
Sodium	10.0	9.34		mg/L		93	80 - 120

Lab Sample ID: MB 480-62755/1-A
Matrix: Water
Analysis Batch: 63017

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 62755

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		05/03/12 08:15	05/03/12 17:12	1
Magnesium	ND		0.20	0.043	mg/L		05/03/12 08:15	05/03/12 17:12	1
Manganese	ND		0.0030	0.00040	mg/L		05/03/12 08:15	05/03/12 17:12	1
Potassium	ND		0.50	0.10	mg/L		05/03/12 08:15	05/03/12 17:12	1
Sodium	ND		1.0	0.32	mg/L		05/03/12 08:15	05/03/12 17:12	1

Method: 6010B - Metals (ICP) (Continued)

Lab Sample ID: LCS 480-62755/2-A
Matrix: Water
Analysis Batch: 63017

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 62755

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	10.0	10.33		mg/L		103	80 - 120
Magnesium	10.0	10.09		mg/L		101	80 - 120
Manganese	0.200	0.204		mg/L		102	80 - 120
Potassium	10.0	10.25		mg/L		102	80 - 120
Sodium	10.0	10.22		mg/L		102	80 - 120

Lab Sample ID: MB 480-63214/1-A
Matrix: Water
Analysis Batch: 63452

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 63214

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		05/07/12 07:20	05/07/12 16:59	1
Magnesium	ND		0.20	0.043	mg/L		05/07/12 07:20	05/07/12 16:59	1
Manganese	ND		0.0030	0.00040	mg/L		05/07/12 07:20	05/07/12 16:59	1
Potassium	ND		0.50	0.10	mg/L		05/07/12 07:20	05/07/12 16:59	1
Sodium	ND		1.0	0.32	mg/L		05/07/12 07:20	05/07/12 16:59	1

Lab Sample ID: LCS 480-63214/2-A
Matrix: Water
Analysis Batch: 63452

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 63214

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	10.0	10.10		mg/L		101	80 - 120
Magnesium	10.0	10.01		mg/L		100	80 - 120
Manganese	0.200	0.205		mg/L		103	80 - 120
Potassium	10.0	9.77		mg/L		98	80 - 120
Sodium	10.0	9.72		mg/L		97	80 - 120

Method: 350.1 - Nitrogen, Ammonia

Lab Sample ID: MB 480-62155/27
Matrix: Water
Analysis Batch: 62155

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			04/28/12 11:39	1

Lab Sample ID: MB 480-62155/51
Matrix: Water
Analysis Batch: 62155

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			04/28/12 12:02	1

Lab Sample ID: LCS 480-62155/28
Matrix: Water
Analysis Batch: 62155

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	0.967		mg/L		97	90 - 110

Method: 350.1 - Nitrogen, Ammonia (Continued)

Lab Sample ID: LCS 480-62155/52
Matrix: Water
Analysis Batch: 62155

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	0.970		mg/L		97	90 - 110

Lab Sample ID: MB 480-62682/3
Matrix: Water
Analysis Batch: 62682

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/02/12 11:08	1

Lab Sample ID: LCS 480-62682/4
Matrix: Water
Analysis Batch: 62682

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	0.961		mg/L		96	90 - 110

Lab Sample ID: MB 480-62905/3
Matrix: Water
Analysis Batch: 62905

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/03/12 12:21	1

Lab Sample ID: LCS 480-62905/4
Matrix: Water
Analysis Batch: 62905

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	0.988		mg/L		99	90 - 110

Lab Sample ID: MB 480-63137/123
Matrix: Water
Analysis Batch: 63137

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/04/12 13:49	1

Lab Sample ID: LCS 480-63137/124
Matrix: Water
Analysis Batch: 63137

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	1.00		mg/L		100	90 - 110

Lab Sample ID: 480-19600-4 MS
Matrix: Water
Analysis Batch: 63137

Client Sample ID: MW-8-S-2-050312-1830
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.2		0.200	1.34	4	mg/L		91	54 - 150

Method: 350.1 - Nitrogen, Ammonia (Continued)

Lab Sample ID: 480-19600-4 DU
Matrix: Water
Analysis Batch: 63137

Client Sample ID: MW-8-S-2-050312-1830
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Ammonia	1.2		1.15		mg/L		1	20

Method: 353.2 - Nitrogen, Nitrite

Lab Sample ID: MB 480-61789/3
Matrix: Water
Analysis Batch: 61789

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrite	ND		0.050	0.020	mg/L			04/27/12 00:10	1

Lab Sample ID: LCS 480-61789/4
Matrix: Water
Analysis Batch: 61789

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrite	1.50	1.50		mg/L		100	90 - 110

Lab Sample ID: MB 480-62595/3
Matrix: Water
Analysis Batch: 62595

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrite	ND		0.050	0.020	mg/L			05/01/12 23:00	1

Lab Sample ID: LCS 480-62595/4
Matrix: Water
Analysis Batch: 62595

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrite	1.50	1.54		mg/L		103	90 - 110

Method: 9038 - Sulfate, Turbidimetric

Lab Sample ID: MB 480-61992/7
Matrix: Water
Analysis Batch: 61992

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	2.97	J	5.0	1.5	mg/L			04/27/12 15:09	1

Lab Sample ID: LCS 480-61992/6
Matrix: Water
Analysis Batch: 61992

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	28.19		mg/L		94	90 - 110

Method: 9038 - Sulfate, Turbidimetric (Continued)

Lab Sample ID: 480-19123-5 MS
Matrix: Water
Analysis Batch: 61992

Client Sample ID: DUP
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	150	B	20.0	195.6	4	mg/L		227	60 - 128

Lab Sample ID: 480-19123-5 DU
Matrix: Water
Analysis Batch: 61992

Client Sample ID: DUP
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Sulfate	150	B	142.3		mg/L		5	20

Lab Sample ID: MB 480-63103/126
Matrix: Water
Analysis Batch: 63103

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.79	J	5.0	1.5	mg/L			05/03/12 21:08	1

Lab Sample ID: MB 480-63103/53
Matrix: Water
Analysis Batch: 63103

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	3.18	J	5.0	1.5	mg/L			05/03/12 15:13	1

Lab Sample ID: LCS 480-63103/125
Matrix: Water
Analysis Batch: 63103

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	30.88		mg/L		103	90 - 110

Lab Sample ID: LCS 480-63103/52
Matrix: Water
Analysis Batch: 63103

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	29.15		mg/L		97	90 - 110

Lab Sample ID: MB 480-63649/25
Matrix: Water
Analysis Batch: 63649

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.69	J	5.0	1.5	mg/L			05/08/12 16:58	1

Lab Sample ID: MB 480-63649/44
Matrix: Water
Analysis Batch: 63649

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.84	J	5.0	1.5	mg/L			05/08/12 18:06	1

Method: 9038 - Sulfate, Turbidimetric (Continued)

Lab Sample ID: LCS 480-63649/24
Matrix: Water
Analysis Batch: 63649

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	29.50		mg/L		98	90 - 110

Lab Sample ID: LCS 480-63649/43
Matrix: Water
Analysis Batch: 63649

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	30.28		mg/L		101	90 - 110

Lab Sample ID: MB 480-63815/7
Matrix: Water
Analysis Batch: 63815

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.59	J	5.0	1.5	mg/L			05/09/12 18:55	1

Lab Sample ID: LCS 480-63815/6
Matrix: Water
Analysis Batch: 63815

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	32.63		mg/L		109	90 - 110

Lab Sample ID: MB 480-64026/36
Matrix: Water
Analysis Batch: 64026

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.83	J	5.0	1.5	mg/L			05/10/12 14:26	1

Lab Sample ID: MB 480-64026/54
Matrix: Water
Analysis Batch: 64026

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.96	J	5.0	1.5	mg/L			05/10/12 15:33	1

Lab Sample ID: MB 480-64026/7
Matrix: Water
Analysis Batch: 64026

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	ND		5.0	1.5	mg/L			05/10/12 11:47	1

Lab Sample ID: LCS 480-64026/53
Matrix: Water
Analysis Batch: 64026

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	32.09		mg/L		107	90 - 110

Method: 9038 - Sulfate, Turbidimetric (Continued)

Lab Sample ID: LCS 480-64026/6
Matrix: Water
Analysis Batch: 64026

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	31.50		mg/L		105	90 - 110

Method: 9060 - Organic Carbon, Total (TOC)

Lab Sample ID: MB 480-62648/27
Matrix: Water
Analysis Batch: 62648

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Organic Carbon	ND		1.0	0.43	mg/L			05/01/12 01:50	1

Lab Sample ID: MB 480-62648/3
Matrix: Water
Analysis Batch: 62648

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Organic Carbon	ND		1.0	0.43	mg/L			04/30/12 13:36	1

Lab Sample ID: LCS 480-62648/28
Matrix: Water
Analysis Batch: 62648

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	60.0	54.44		mg/L		91	90 - 110

Lab Sample ID: LCS 480-62648/4
Matrix: Water
Analysis Batch: 62648

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	60.0	55.22		mg/L		92	90 - 110

Lab Sample ID: 480-19123-1 DU
Matrix: Water
Analysis Batch: 62648

Client Sample ID: MW-6-1-042512-0915
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Total Organic Carbon	3.8		3.94		mg/L		4	20

Lab Sample ID: MB 480-63238/3
Matrix: Water
Analysis Batch: 63238

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Organic Carbon	ND		1.0	0.43	mg/L			05/05/12 02:13	1

Method: 9060 - Organic Carbon, Total (TOC) (Continued)

Lab Sample ID: LCS 480-63238/4
Matrix: Water
Analysis Batch: 63238

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	60.0	57.93		mg/L		97	90 - 110

Lab Sample ID: MB 480-63278/3
Matrix: Water
Analysis Batch: 63278

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Organic Carbon	ND		1.0	0.43	mg/L			05/06/12 06:12	1

Lab Sample ID: LCS 480-63278/4
Matrix: Water
Analysis Batch: 63278

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	60.0	59.91		mg/L		100	90 - 110

Lab Sample ID: 480-19600-4 MS
Matrix: Water
Analysis Batch: 63278

Client Sample ID: MW-8-S-2-050312-1830
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	1.5		20.0	18.97		mg/L		88	54 - 131

Method: SM 2320B - Alkalinity

Lab Sample ID: MB 480-61950/3
Matrix: Water
Analysis Batch: 61950

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Alkalinity	ND		5.0	0.79	mg/L			04/27/12 13:50	1

Lab Sample ID: LCS 480-61950/4
Matrix: Water
Analysis Batch: 61950

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Alkalinity	1000	928.0		mg/L		93	90 - 110

Lab Sample ID: 480-19123-3 MS
Matrix: Water
Analysis Batch: 61950

Client Sample ID: MW-8-4-042512-1800
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Alkalinity	300		200	552.0		mg/L		126	22 - 128

Method: SM 2320B - Alkalinity (Continued)

Lab Sample ID: 480-19123-1 DU
Matrix: Water
Analysis Batch: 61950

Client Sample ID: MW-6-1-042512-0915
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Total Alkalinity	392		392.0		mg/L		0	20

Lab Sample ID: MB 480-62729/3
Matrix: Water
Analysis Batch: 62729

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Alkalinity	ND		5.0	0.79	mg/L			05/02/12 13:21	1

Lab Sample ID: LCS 480-62729/4
Matrix: Water
Analysis Batch: 62729

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Alkalinity	1000	956.0		mg/L		96	90 - 110

Lab Sample ID: 480-19365-1 MS
Matrix: Water
Analysis Batch: 62729

Client Sample ID: MW-8-003-B-043012-1400
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Alkalinity	160		200	368.0		mg/L		104	22 - 128

Lab Sample ID: MB 480-63392/3
Matrix: Water
Analysis Batch: 63392

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Alkalinity	ND		5.0	0.79	mg/L			05/07/12 14:40	1

Lab Sample ID: LCS 480-63392/4
Matrix: Water
Analysis Batch: 63392

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Alkalinity	1000	952.0		mg/L		95	90 - 110

Method: SM 4500 Cl- E - Chloride, Total

Lab Sample ID: MB 480-61931/91
Matrix: Water
Analysis Batch: 61931

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			04/27/12 15:09	1

Method: SM 4500 Cl- E - Chloride, Total (Continued)

Lab Sample ID: LCS 480-61931/90
Matrix: Water
Analysis Batch: 61931

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	24.88		mg/L		100	90 - 110

Lab Sample ID: MB 480-61993/7
Matrix: Water
Analysis Batch: 61993

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	1.03		1.0	0.46	mg/L			04/27/12 15:14	1

Lab Sample ID: LCS 480-61993/6
Matrix: Water
Analysis Batch: 61993

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	27.07		mg/L		108	90 - 110

Lab Sample ID: 480-19123-5 MS
Matrix: Water
Analysis Batch: 61993

Client Sample ID: DUP
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	3340	B	20.0	3338	4	mg/L		-20	74 - 131

Lab Sample ID: 480-19123-5 DU
Matrix: Water
Analysis Batch: 61993

Client Sample ID: DUP
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Chloride	3340	B	3370		mg/L		0.8	20

Lab Sample ID: MB 480-63648/50
Matrix: Water
Analysis Batch: 63648

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/08/12 17:00	1

Lab Sample ID: LCS 480-63648/49
Matrix: Water
Analysis Batch: 63648

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	25.64		mg/L		103	90 - 110

Lab Sample ID: MB 480-63813/32
Matrix: Water
Analysis Batch: 63813

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/09/12 20:21	1

Method: SM 4500 Cl- E - Chloride, Total (Continued)

Lab Sample ID: LCS 480-63813/31
Matrix: Water
Analysis Batch: 63813

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	25.76		mg/L		103	90 - 110

Lab Sample ID: MB 480-64027/135
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/10/12 19:30	1

Lab Sample ID: MB 480-64027/141
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/10/12 20:00	1

Lab Sample ID: MB 480-64027/30
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	0.722	J	1.0	0.46	mg/L			05/10/12 14:29	1

Lab Sample ID: MB 480-64027/55
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/10/12 15:55	1

Lab Sample ID: LCS 480-64027/140
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	26.47		mg/L		106	90 - 110

Lab Sample ID: LCS 480-64027/54
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	26.16		mg/L		105	90 - 110

Method: SM 4500 S2 D - Sulfide, Total

Lab Sample ID: MB 480-61729/3
Matrix: Water
Analysis Batch: 61729

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfide	ND		0.10	0.052	mg/L			04/26/12 15:15	1

Lab Sample ID: LCS 480-61729/4
Matrix: Water
Analysis Batch: 61729

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfide	0.750	0.816		mg/L		109	90 - 110

Lab Sample ID: 480-19123-4 MS
Matrix: Water
Analysis Batch: 61729

Client Sample ID: MW-6-F-8-042512-1730
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfide	ND		0.500	0.396	F	mg/L		79	90 - 110

Lab Sample ID: 480-19123-5 DU
Matrix: Water
Analysis Batch: 61729

Client Sample ID: DUP
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Sulfide	ND		ND		mg/L		NC	20

Lab Sample ID: MB 480-62917/3
Matrix: Water
Analysis Batch: 62917

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfide	ND		0.10	0.052	mg/L			05/03/12 12:10	1

Lab Sample ID: LCS 480-62917/4
Matrix: Water
Analysis Batch: 62917

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfide	0.750	0.703		mg/L		94	90 - 110

Lab Sample ID: MB 480-63515/3
Matrix: Water
Analysis Batch: 63515

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfide	ND		0.10	0.052	mg/L			05/08/12 08:45	1

Lab Sample ID: LCS 480-63515/4
Matrix: Water
Analysis Batch: 63515

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfide	0.750	0.726		mg/L		97	90 - 110

Method: SM 4500 S2 D - Sulfide, Total (Continued)

Lab Sample ID: 480-19600-4 DU
Matrix: Water
Analysis Batch: 63515

Client Sample ID: MW-8-S-2-050312-1830
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Sulfide	0.60		0.622		mg/L		3	20

Method: VFA-IC - Volatile Fatty Acids, Ion Chromatography

Lab Sample ID: MB 480-61975/4
Matrix: Water
Analysis Batch: 61975

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acetic acid	ND		1.0	0.15	mg/L			04/29/12 11:23	1
Formic-acid	ND		1.0	0.11	mg/L			04/29/12 11:23	1
Lactic acid	ND		1.0	0.14	mg/L			04/29/12 11:23	1
n-Butyric Acid	ND		1.0	0.16	mg/L			04/29/12 11:23	1
Propionic acid	ND		1.0	0.17	mg/L			04/29/12 11:23	1
Pyruvic Acid	0.121	J	1.0	0.080	mg/L			04/29/12 11:23	1

Lab Sample ID: LCS 480-61975/3
Matrix: Water
Analysis Batch: 61975

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	10.0	9.43		mg/L		94	80 - 120
Formic-acid	10.0	9.47		mg/L		95	80 - 120
Lactic acid	10.0	9.69		mg/L		97	80 - 120
n-Butyric Acid	10.0	9.70		mg/L		97	80 - 120
Propionic acid	10.0	9.67		mg/L		97	80 - 120
Pyruvic Acid	10.0	10.10		mg/L		101	80 - 120

Lab Sample ID: 480-19123-4 MS
Matrix: Water
Analysis Batch: 61975

Client Sample ID: MW-6-F-8-042512-1730
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	ND		10.0	9.18		mg/L		92	80 - 120
Formic-acid	ND		10.0	9.12		mg/L		91	80 - 120
Lactic acid	ND		10.0	8.86		mg/L		89	80 - 120
n-Butyric Acid	ND		10.0	8.68		mg/L		87	80 - 120
Propionic acid	ND		10.0	6.85	F	mg/L		69	80 - 120
Pyruvic Acid	ND		10.0	4.99	F	mg/L		50	80 - 120

Lab Sample ID: 480-19123-4 MSD
Matrix: Water
Analysis Batch: 61975

Client Sample ID: MW-6-F-8-042512-1730
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Acetic acid	ND		10.0	9.92		mg/L		99	80 - 120	8	20
Formic-acid	ND		10.0	9.29		mg/L		93	80 - 120	2	20
Lactic acid	ND		10.0	9.17		mg/L		92	80 - 120	3	20
n-Butyric Acid	ND		10.0	8.58		mg/L		86	80 - 120	1	20
Propionic acid	ND		10.0	7.37	F	mg/L		74	80 - 120	7	20

Method: VFA-IC - Volatile Fatty Acids, Ion Chromatography (Continued)

Lab Sample ID: 480-19123-4 MSD
Matrix: Water
Analysis Batch: 61975

Client Sample ID: MW-6-F-8-042512-1730
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Pyruvic Acid	ND		10.0	4.62	F	mg/L		46	80 - 120	8	20

Lab Sample ID: MB 480-61976/28
Matrix: Water
Analysis Batch: 61976

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acetic acid	ND		1.0	0.15	mg/L			04/29/12 23:03	1
Formic-acid	ND		1.0	0.11	mg/L			04/29/12 23:03	1
Lactic acid	ND		1.0	0.14	mg/L			04/29/12 23:03	1
n-Butyric Acid	ND		1.0	0.16	mg/L			04/29/12 23:03	1
Propionic acid	ND	^	1.0	0.17	mg/L			04/29/12 23:03	1
Pyruvic Acid	ND		1.0	0.080	mg/L			04/29/12 23:03	1

Lab Sample ID: LCS 480-61976/27
Matrix: Water
Analysis Batch: 61976

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	10.0	9.51		mg/L		95	80 - 120
Formic-acid	10.0	9.40		mg/L		94	80 - 120
Lactic acid	10.0	9.73		mg/L		97	80 - 120
n-Butyric Acid	10.0	9.57		mg/L		96	80 - 120
Propionic acid	10.0	9.76	^	mg/L		98	80 - 120
Pyruvic Acid	10.0	10.20		mg/L		102	80 - 120

Lab Sample ID: MB 480-64493/4
Matrix: Water
Analysis Batch: 64493

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acetic acid	ND		1.0	0.15	mg/L			05/15/12 18:18	1
Formic-acid	ND		1.0	0.11	mg/L			05/15/12 18:18	1
Lactic acid	ND		1.0	0.14	mg/L			05/15/12 18:18	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/15/12 18:18	1
Propionic acid	ND		1.0	0.17	mg/L			05/15/12 18:18	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/15/12 18:18	1

Lab Sample ID: LCS 480-64493/3
Matrix: Water
Analysis Batch: 64493

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	10.0	10.20		mg/L		102	80 - 120
Formic-acid	10.0	9.78		mg/L		98	80 - 120
Lactic acid	10.0	9.81		mg/L		98	80 - 120
n-Butyric Acid	10.0	10.00		mg/L		100	80 - 120
Propionic acid	10.0	10.40		mg/L		104	80 - 120
Pyruvic Acid	10.0	10.50		mg/L		105	80 - 120

Method: VFA-IC - Volatile Fatty Acids, Ion Chromatography (Continued)

Lab Sample ID: MB 480-64494/28
Matrix: Water
Analysis Batch: 64494

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acetic acid	ND		1.0	0.15	mg/L			05/16/12 05:58	1
Formic-acid	ND		1.0	0.11	mg/L			05/16/12 05:58	1
Lactic acid	ND		1.0	0.14	mg/L			05/16/12 05:58	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/16/12 05:58	1
Propionic acid	ND		1.0	0.17	mg/L			05/16/12 05:58	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/16/12 05:58	1

Lab Sample ID: LCS 480-64494/27
Matrix: Water
Analysis Batch: 64494

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	10.0	10.20		mg/L		102	80 - 120
Formic-acid	10.0	9.90		mg/L		99	80 - 120
Lactic acid	10.0	9.72		mg/L		97	80 - 120
n-Butyric Acid	10.0	9.60		mg/L		96	80 - 120
Propionic acid	10.0	10.20		mg/L		102	80 - 120
Pyruvic Acid	10.0	10.20		mg/L		102	80 - 120

Lab Sample ID: 480-19600-4 MS
Matrix: Water
Analysis Batch: 64494

Client Sample ID: MW-8-S-2-050312-1830
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	ND		10.0	9.58		mg/L		96	80 - 120
Formic-acid	ND		10.0	10.90		mg/L		109	80 - 120
Lactic acid	ND		10.0	10.10		mg/L		101	80 - 120
n-Butyric Acid	ND		10.0	9.38		mg/L		94	80 - 120
Propionic acid	ND		10.0	ND	F	mg/L		0	80 - 120
Pyruvic Acid	ND		10.0	ND	F	mg/L		0	80 - 120

Lab Sample ID: 480-19600-4 MSD
Matrix: Water
Analysis Batch: 64494

Client Sample ID: MW-8-S-2-050312-1830
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Acetic acid	ND		10.0	9.33		mg/L		93	80 - 120	3	20
Formic-acid	ND		10.0	10.80		mg/L		108	80 - 120	1	20
Lactic acid	ND		10.0	10.00		mg/L		100	80 - 120	1	20
n-Butyric Acid	ND		10.0	9.33		mg/L		93	80 - 120	1	20
Propionic acid	ND		10.0	ND	F	mg/L		0	80 - 120	NC	20
Pyruvic Acid	ND		10.0	ND	F	mg/L		0	80 - 120	NC	20

GC/MS VOA

Analysis Batch: 62559

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	8260B	
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	8260B	
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	8260B	
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	8260B	
480-19123-5	DUP	Total/NA	Water	8260B	
480-19123-6	TRIP BLANK	Total/NA	Water	8260B	
LCS 480-62559/4	Lab Control Sample	Total/NA	Water	8260B	
MB 480-62559/5	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 63474

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	8260B	
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	8260B	
LCS 480-63474/4	Lab Control Sample	Total/NA	Water	8260B	
MB 480-63474/5	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 63572

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1 - DL	MW-8-003-B-043012-1400	Total/NA	Water	8260B	
LCS 480-63572/4	Lab Control Sample	Total/NA	Water	8260B	
MB 480-63572/5	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 63732

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	8260B	
LCS 480-63732/3	Lab Control Sample	Total/NA	Water	8260B	
MB 480-63732/4	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 64020

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	8260B	
LCS 480-64020/4	Lab Control Sample	Total/NA	Water	8260B	
MB 480-64020/5	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 64247

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-5	TRIP BLANK	Total/NA	Water	8260B	
LCS 480-64247/5	Lab Control Sample	Total/NA	Water	8260B	
MB 480-64247/6	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 64274

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4 - DL	MW-8-S-2-050312-1830	Total/NA	Water	8260B	
LCS 480-64274/5	Lab Control Sample	Total/NA	Water	8260B	
MB 480-64274/6	Method Blank	Total/NA	Water	8260B	

GC VOA

Analysis Batch: 38245

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	RSK-175	
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	RSK-175	

GC VOA (Continued)

Analysis Batch: 38245 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	RSK-175	
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	RSK-175	
480-19123-5	DUP	Total/NA	Water	RSK-175	
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	RSK-175	
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	RSK-175	
LCS 200-38245/2	Lab Control Sample	Total/NA	Water	RSK-175	
MB 200-38245/3	Method Blank	Total/NA	Water	RSK-175	

Analysis Batch: 38628

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	RSK-175	
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	RSK-175	
LCS 200-38628/3	Lab Control Sample	Total/NA	Water	RSK-175	
MB 200-38628/4	Method Blank	Total/NA	Water	RSK-175	

Analysis Batch: 61731

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	RSK-175	
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	RSK-175	
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	RSK-175	
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	RSK-175	
480-19123-5	DUP	Total/NA	Water	RSK-175	
LCS 480-61731/4	Lab Control Sample	Total/NA	Water	RSK-175	
LCSD 480-61731/5	Lab Control Sample Dup	Total/NA	Water	RSK-175	
MB 480-61731/3	Method Blank	Total/NA	Water	RSK-175	

Analysis Batch: 62604

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	RSK-175	
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	RSK-175	
LCS 480-62604/4	Lab Control Sample	Total/NA	Water	RSK-175	
LCSD 480-62604/5	Lab Control Sample Dup	Total/NA	Water	RSK-175	
MB 480-62604/3	Method Blank	Total/NA	Water	RSK-175	

Analysis Batch: 62926

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	RSK-175	
LCS 480-62926/2	Lab Control Sample	Total/NA	Water	RSK-175	
LCSD 480-62926/4	Lab Control Sample Dup	Total/NA	Water	RSK-175	
MB 480-62926/3	Method Blank	Total/NA	Water	RSK-175	

Analysis Batch: 63265

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	RSK-175	
LCS 480-63265/3	Lab Control Sample	Total/NA	Water	RSK-175	
LCSD 480-63265/4	Lab Control Sample Dup	Total/NA	Water	RSK-175	
MB 480-63265/2	Method Blank	Total/NA	Water	RSK-175	

Metals

Prep Batch: 61646

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	3005A	
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	3005A	
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	3005A	
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	3005A	
480-19123-5	DUP	Total/NA	Water	3005A	
LCS 480-61646/2-A	Lab Control Sample	Total/NA	Water	3005A	
MB 480-61646/1-A	Method Blank	Total/NA	Water	3005A	

Analysis Batch: 62078

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	6010B	61646
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	6010B	61646
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	6010B	61646
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	6010B	61646
480-19123-5	DUP	Total/NA	Water	6010B	61646
LCS 480-61646/2-A	Lab Control Sample	Total/NA	Water	6010B	61646
MB 480-61646/1-A	Method Blank	Total/NA	Water	6010B	61646

Analysis Batch: 62423

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	6010B	61646

Prep Batch: 62531

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	3005A	
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	3005A	
LCS 480-62531/2-A	Lab Control Sample	Total/NA	Water	3005A	
MB 480-62531/1-A	Method Blank	Total/NA	Water	3005A	

Prep Batch: 62755

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	3005A	
LCS 480-62755/2-A	Lab Control Sample	Total/NA	Water	3005A	
MB 480-62755/1-A	Method Blank	Total/NA	Water	3005A	

Analysis Batch: 62800

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	6010B	62531
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	6010B	62531
LCS 480-62531/2-A	Lab Control Sample	Total/NA	Water	6010B	62531
MB 480-62531/1-A	Method Blank	Total/NA	Water	6010B	62531

Analysis Batch: 63017

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	6010B	62755
LCS 480-62755/2-A	Lab Control Sample	Total/NA	Water	6010B	62755
MB 480-62755/1-A	Method Blank	Total/NA	Water	6010B	62755

Prep Batch: 63214

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	3005A	
LCS 480-63214/2-A	Lab Control Sample	Total/NA	Water	3005A	

Metals (Continued)

Prep Batch: 63214 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 480-63214/1-A	Method Blank	Total/NA	Water	3005A	

Analysis Batch: 63452

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	6010B	63214
LCS 480-63214/2-A	Lab Control Sample	Total/NA	Water	6010B	63214
MB 480-63214/1-A	Method Blank	Total/NA	Water	6010B	63214

General Chemistry

Analysis Batch: 61729

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	SM 4500 S2 D	
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	SM 4500 S2 D	
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	SM 4500 S2 D	
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	SM 4500 S2 D	
480-19123-4 MS	MW-6-F-8-042512-1730	Total/NA	Water	SM 4500 S2 D	
480-19123-5	DUP	Total/NA	Water	SM 4500 S2 D	
480-19123-5 DU	DUP	Total/NA	Water	SM 4500 S2 D	
LCS 480-61729/4	Lab Control Sample	Total/NA	Water	SM 4500 S2 D	
MB 480-61729/3	Method Blank	Total/NA	Water	SM 4500 S2 D	

Analysis Batch: 61785

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	353.2	
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	353.2	
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	353.2	
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	353.2	
480-19123-5	DUP	Total/NA	Water	353.2	

Analysis Batch: 61789

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	353.2	
480-19123-5	DUP	Total/NA	Water	353.2	
LCS 480-61789/4	Lab Control Sample	Total/NA	Water	353.2	
MB 480-61789/3	Method Blank	Total/NA	Water	353.2	

Analysis Batch: 61790

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	353.2	
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	353.2	
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	353.2	

Analysis Batch: 61931

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	SM 4500 Cl- E	
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	SM 4500 Cl- E	
LCS 480-61931/90	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
MB 480-61931/91	Method Blank	Total/NA	Water	SM 4500 Cl- E	

General Chemistry (Continued)

Analysis Batch: 61950

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	SM 2320B	
480-19123-1 DU	MW-6-1-042512-0915	Total/NA	Water	SM 2320B	
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	SM 2320B	
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	SM 2320B	
480-19123-3 MS	MW-8-4-042512-1800	Total/NA	Water	SM 2320B	
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	SM 2320B	
480-19123-5	DUP	Total/NA	Water	SM 2320B	
LCS 480-61950/4	Lab Control Sample	Total/NA	Water	SM 2320B	
MB 480-61950/3	Method Blank	Total/NA	Water	SM 2320B	

Analysis Batch: 61975

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	VFA-IC	
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	VFA-IC	
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	VFA-IC	
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	VFA-IC	
480-19123-4 MS	MW-6-F-8-042512-1730	Total/NA	Water	VFA-IC	
480-19123-4 MSD	MW-6-F-8-042512-1730	Total/NA	Water	VFA-IC	
LCS 480-61975/3	Lab Control Sample	Total/NA	Water	VFA-IC	
MB 480-61975/4	Method Blank	Total/NA	Water	VFA-IC	

Analysis Batch: 61976

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-5	DUP	Total/NA	Water	VFA-IC	
LCS 480-61976/27	Lab Control Sample	Total/NA	Water	VFA-IC	
MB 480-61976/28	Method Blank	Total/NA	Water	VFA-IC	

Analysis Batch: 61992

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	9038	
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	9038	
480-19123-5	DUP	Total/NA	Water	9038	
480-19123-5 DU	DUP	Total/NA	Water	9038	
480-19123-5 MS	DUP	Total/NA	Water	9038	
LCS 480-61992/6	Lab Control Sample	Total/NA	Water	9038	
MB 480-61992/7	Method Blank	Total/NA	Water	9038	

Analysis Batch: 61993

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	SM 4500 Cl- E	
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	SM 4500 Cl- E	
480-19123-5	DUP	Total/NA	Water	SM 4500 Cl- E	
480-19123-5 DU	DUP	Total/NA	Water	SM 4500 Cl- E	
480-19123-5 MS	DUP	Total/NA	Water	SM 4500 Cl- E	
LCS 480-61993/6	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
MB 480-61993/7	Method Blank	Total/NA	Water	SM 4500 Cl- E	

Analysis Batch: 62155

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	350.1	
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	350.1	
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	350.1	

General Chemistry (Continued)

Analysis Batch: 62155 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	350.1	
480-19123-5	DUP	Total/NA	Water	350.1	
LCS 480-62155/28	Lab Control Sample	Total/NA	Water	350.1	
LCS 480-62155/52	Lab Control Sample	Total/NA	Water	350.1	
MB 480-62155/27	Method Blank	Total/NA	Water	350.1	
MB 480-62155/51	Method Blank	Total/NA	Water	350.1	

Analysis Batch: 62595

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	353.2	
LCS 480-62595/4	Lab Control Sample	Total/NA	Water	353.2	
MB 480-62595/3	Method Blank	Total/NA	Water	353.2	

Analysis Batch: 62596

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	353.2	
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	353.2	

Analysis Batch: 62597

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	353.2	

Analysis Batch: 62648

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	9060	
480-19123-1 DU	MW-6-1-042512-0915	Total/NA	Water	9060	
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	9060	
480-19123-3	MW-8-4-042512-1800	Total/NA	Water	9060	
480-19123-4	MW-6-F-8-042512-1730	Total/NA	Water	9060	
480-19123-5	DUP	Total/NA	Water	9060	
LCS 480-62648/28	Lab Control Sample	Total/NA	Water	9060	
LCS 480-62648/4	Lab Control Sample	Total/NA	Water	9060	
MB 480-62648/27	Method Blank	Total/NA	Water	9060	
MB 480-62648/3	Method Blank	Total/NA	Water	9060	

Analysis Batch: 62682

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	350.1	
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	350.1	
LCS 480-62682/4	Lab Control Sample	Total/NA	Water	350.1	
MB 480-62682/3	Method Blank	Total/NA	Water	350.1	

Analysis Batch: 62729

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	SM 2320B	
480-19365-1 MS	MW-8-003-B-043012-1400	Total/NA	Water	SM 2320B	
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	SM 2320B	
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	SM 2320B	
LCS 480-62729/4	Lab Control Sample	Total/NA	Water	SM 2320B	
MB 480-62729/3	Method Blank	Total/NA	Water	SM 2320B	

General Chemistry (Continued)

Analysis Batch: 62782

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	353.2	

Analysis Batch: 62783

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	353.2	

Analysis Batch: 62905

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	350.1	
LCS 480-62905/4	Lab Control Sample	Total/NA	Water	350.1	
MB 480-62905/3	Method Blank	Total/NA	Water	350.1	

Analysis Batch: 62917

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	SM 4500 S2 D	
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	SM 4500 S2 D	
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	SM 4500 S2 D	
LCS 480-62917/4	Lab Control Sample	Total/NA	Water	SM 4500 S2 D	
MB 480-62917/3	Method Blank	Total/NA	Water	SM 4500 S2 D	

Analysis Batch: 63103

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19123-1	MW-6-1-042512-0915	Total/NA	Water	9038	
480-19123-2	MW-6-2-042512-1130	Total/NA	Water	9038	
LCS 480-63103/125	Lab Control Sample	Total/NA	Water	9038	
LCS 480-63103/52	Lab Control Sample	Total/NA	Water	9038	
MB 480-63103/126	Method Blank	Total/NA	Water	9038	
MB 480-63103/53	Method Blank	Total/NA	Water	9038	

Analysis Batch: 63137

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	350.1	
480-19600-4 DU	MW-8-S-2-050312-1830	Total/NA	Water	350.1	
480-19600-4 MS	MW-8-S-2-050312-1830	Total/NA	Water	350.1	
LCS 480-63137/124	Lab Control Sample	Total/NA	Water	350.1	
MB 480-63137/123	Method Blank	Total/NA	Water	350.1	

Analysis Batch: 63184

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	353.2	

Analysis Batch: 63185

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	353.2	

Analysis Batch: 63238

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	9060	
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	9060	
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	9060	
LCS 480-63238/4	Lab Control Sample	Total/NA	Water	9060	
MB 480-63238/3	Method Blank	Total/NA	Water	9060	

General Chemistry (Continued)

Analysis Batch: 63278

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	9060	
480-19600-4 MS	MW-8-S-2-050312-1830	Total/NA	Water	9060	
LCS 480-63278/4	Lab Control Sample	Total/NA	Water	9060	
MB 480-63278/3	Method Blank	Total/NA	Water	9060	

Analysis Batch: 63392

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	SM 2320B	
LCS 480-63392/4	Lab Control Sample	Total/NA	Water	SM 2320B	
MB 480-63392/3	Method Blank	Total/NA	Water	SM 2320B	

Analysis Batch: 63515

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	SM 4500 S2 D	
480-19600-4 DU	MW-8-S-2-050312-1830	Total/NA	Water	SM 4500 S2 D	
LCS 480-63515/4	Lab Control Sample	Total/NA	Water	SM 4500 S2 D	
MB 480-63515/3	Method Blank	Total/NA	Water	SM 4500 S2 D	

Analysis Batch: 63648

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	SM 4500 Cl- E	
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	SM 4500 Cl- E	
LCS 480-63648/49	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
MB 480-63648/50	Method Blank	Total/NA	Water	SM 4500 Cl- E	

Analysis Batch: 63649

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	9038	
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	9038	
LCS 480-63649/24	Lab Control Sample	Total/NA	Water	9038	
LCS 480-63649/43	Lab Control Sample	Total/NA	Water	9038	
MB 480-63649/25	Method Blank	Total/NA	Water	9038	
MB 480-63649/44	Method Blank	Total/NA	Water	9038	

Analysis Batch: 63813

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	SM 4500 Cl- E	
LCS 480-63813/31	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
MB 480-63813/32	Method Blank	Total/NA	Water	SM 4500 Cl- E	

Analysis Batch: 63815

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	9038	
LCS 480-63815/6	Lab Control Sample	Total/NA	Water	9038	
MB 480-63815/7	Method Blank	Total/NA	Water	9038	

Analysis Batch: 64026

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	9038	
LCS 480-64026/53	Lab Control Sample	Total/NA	Water	9038	
LCS 480-64026/6	Lab Control Sample	Total/NA	Water	9038	
MB 480-64026/36	Method Blank	Total/NA	Water	9038	

General Chemistry (Continued)

Analysis Batch: 64026 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 480-64026/54	Method Blank	Total/NA	Water	9038	
MB 480-64026/7	Method Blank	Total/NA	Water	9038	

Analysis Batch: 64027

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	SM 4500 Cl- E	
LCS 480-64027/140	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
LCS 480-64027/54	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/135	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/141	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/30	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/55	Method Blank	Total/NA	Water	SM 4500 Cl- E	

Analysis Batch: 64493

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19365-1	MW-8-003-B-043012-1400	Total/NA	Water	VFA-IC	
480-19365-2	MW-8-1-043012-1700	Total/NA	Water	VFA-IC	
480-19420-3	MW-8-3-050112-1540	Total/NA	Water	VFA-IC	
LCS 480-64493/3	Lab Control Sample	Total/NA	Water	VFA-IC	
MB 480-64493/4	Method Blank	Total/NA	Water	VFA-IC	

Analysis Batch: 64494

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-4	MW-8-S-2-050312-1830	Total/NA	Water	VFA-IC	
480-19600-4 MS	MW-8-S-2-050312-1830	Total/NA	Water	VFA-IC	
480-19600-4 MSD	MW-8-S-2-050312-1830	Total/NA	Water	VFA-IC	
LCS 480-64494/27	Lab Control Sample	Total/NA	Water	VFA-IC	
MB 480-64494/28	Method Blank	Total/NA	Water	VFA-IC	

Client Sample ID: MW-6-1-042512-0915

Lab Sample ID: 480-19123-1

Date Collected: 04/25/12 09:15

Matrix: Water

Date Received: 04/25/12 19:10

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	62559	05/01/12 23:49	DC	TAL BUF
Total/NA	Analysis	RSK-175		2	38245	05/04/12 09:44	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	61731	04/26/12 20:01	JM	TAL BUF
Total/NA	Prep	3005A			61646	04/27/12 08:40	SS	TAL BUF
Total/NA	Analysis	6010B		1	62078	04/27/12 21:41	MM	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	61729	04/26/12 15:15	EGN	TAL BUF
Total/NA	Analysis	353.2		1	61785	04/26/12 22:01	KS	TAL BUF
Total/NA	Analysis	353.2		1	61790	04/26/12 22:01	KS	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		50	61931	04/27/12 15:09	PJQ	TAL BUF
Total/NA	Analysis	SM 2320B		1	61950	04/27/12 13:50	LYW	TAL BUF
Total/NA	Analysis	VFA-IC		1	61975	04/29/12 18:40	RMM	TAL BUF
Total/NA	Analysis	350.1		1	62155	04/28/12 11:57	KS	TAL BUF
Total/NA	Analysis	9060		1	62648	04/30/12 22:47	KAC	TAL BUF
Total/NA	Analysis	9038		5	63103	05/03/12 21:08	PJQ	TAL BUF

Client Sample ID: MW-6-2-042512-1130

Lab Sample ID: 480-19123-2

Date Collected: 04/25/12 11:30

Matrix: Water

Date Received: 04/25/12 19:10

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	62559	05/02/12 00:12	DC	TAL BUF
Total/NA	Analysis	RSK-175		1	38245	05/04/12 08:46	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	61731	04/26/12 20:18	JM	TAL BUF
Total/NA	Prep	3005A			61646	04/27/12 08:40	SS	TAL BUF
Total/NA	Analysis	6010B		1	62078	04/27/12 21:44	MM	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	61729	04/26/12 15:15	EGN	TAL BUF
Total/NA	Analysis	353.2		1	61785	04/27/12 00:25	KS	TAL BUF
Total/NA	Analysis	353.2		1	61789	04/27/12 00:25	KS	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		121	61931	04/27/12 15:09	PJQ	TAL BUF
Total/NA	Analysis	SM 2320B		1	61950	04/27/12 13:50	LYW	TAL BUF
Total/NA	Analysis	VFA-IC		1	61975	04/29/12 19:09	RMM	TAL BUF
Total/NA	Analysis	350.1		1	62155	04/28/12 11:58	KS	TAL BUF
Total/NA	Analysis	9060		1	62648	04/30/12 23:48	KAC	TAL BUF
Total/NA	Analysis	9038		5	63103	05/03/12 21:08	PJQ	TAL BUF

Client Sample ID: MW-8-4-042512-1800

Lab Sample ID: 480-19123-3

Date Collected: 04/25/12 18:00

Matrix: Water

Date Received: 04/25/12 19:10

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	62559	05/02/12 00:36	DC	TAL BUF
Total/NA	Analysis	RSK-175		1	38245	05/04/12 08:51	MRV	TAL BUR

Client Sample ID: MW-8-4-042512-1800

Lab Sample ID: 480-19123-3

Date Collected: 04/25/12 18:00

Matrix: Water

Date Received: 04/25/12 19:10

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	RSK-175		1	61731	04/26/12 20:35	JM	TAL BUF
Total/NA	Prep	3005A			61646	04/27/12 08:40	SS	TAL BUF
Total/NA	Analysis	6010B		1	62078	04/27/12 21:47	MM	TAL BUF
Total/NA	Analysis	6010B		5	62423	04/30/12 21:15	MM	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	61729	04/26/12 15:15	EGN	TAL BUF
Total/NA	Analysis	353.2		1	61785	04/26/12 22:03	KS	TAL BUF
Total/NA	Analysis	353.2		1	61790	04/26/12 22:03	KS	TAL BUF
Total/NA	Analysis	SM 2320B		1	61950	04/27/12 13:50	LYW	TAL BUF
Total/NA	Analysis	VFA-IC		1	61975	04/29/12 19:39	RMM	TAL BUF
Total/NA	Analysis	9038		10	61992	04/27/12 15:35	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		100	61993	04/27/12 16:34	PJQ	TAL BUF
Total/NA	Analysis	350.1		1	62155	04/28/12 11:59	KS	TAL BUF
Total/NA	Analysis	9060		1	62648	05/01/12 02:51	KAC	TAL BUF

Client Sample ID: MW-6-F-8-042512-1730

Lab Sample ID: 480-19123-4

Date Collected: 04/25/12 17:30

Matrix: Water

Date Received: 04/25/12 19:10

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	62559	05/02/12 01:00	DC	TAL BUF
Total/NA	Analysis	RSK-175		1	38245	05/04/12 08:55	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	61731	04/26/12 20:52	JM	TAL BUF
Total/NA	Prep	3005A			61646	04/27/12 08:40	SS	TAL BUF
Total/NA	Analysis	6010B		1	62078	04/27/12 21:50	MM	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	61729	04/26/12 15:15	EGN	TAL BUF
Total/NA	Analysis	353.2		1	61785	04/26/12 22:04	KS	TAL BUF
Total/NA	Analysis	353.2		1	61790	04/26/12 22:04	KS	TAL BUF
Total/NA	Analysis	SM 2320B		1	61950	04/27/12 13:50	LYW	TAL BUF
Total/NA	Analysis	VFA-IC		1	61975	04/29/12 20:08	RMM	TAL BUF
Total/NA	Analysis	9038		10	61992	04/27/12 15:36	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		100	61993	04/27/12 16:34	PJQ	TAL BUF
Total/NA	Analysis	350.1		1	62155	04/28/12 11:59	KS	TAL BUF
Total/NA	Analysis	9060		1	62648	05/01/12 03:22	KAC	TAL BUF

Client Sample ID: DUP

Lab Sample ID: 480-19123-5

Date Collected: 04/25/12 00:00

Matrix: Water

Date Received: 04/25/12 19:10

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	62559	05/02/12 01:24	DC	TAL BUF
Total/NA	Analysis	RSK-175		1	38245	05/04/12 09:04	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	61731	04/26/12 21:09	JM	TAL BUF

Client Sample ID: DUP

Lab Sample ID: 480-19123-5

Date Collected: 04/25/12 00:00

Matrix: Water

Date Received: 04/25/12 19:10

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3005A			61646	04/27/12 08:40	SS	TAL BUF
Total/NA	Analysis	6010B		1	62078	04/27/12 21:52	MM	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	61729	04/26/12 15:15	EGN	TAL BUF
Total/NA	Analysis	353.2		1	61785	04/27/12 00:26	KS	TAL BUF
Total/NA	Analysis	353.2		1	61789	04/27/12 00:26	KS	TAL BUF
Total/NA	Analysis	SM 2320B		1	61950	04/27/12 13:50	LYW	TAL BUF
Total/NA	Analysis	VFA-IC		1	61976	04/29/12 23:32	KAC	TAL BUF
Total/NA	Analysis	9038		20	61992	04/27/12 15:30	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		100	61993	04/27/12 15:24	PJQ	TAL BUF
Total/NA	Analysis	350.1		1	62155	04/28/12 12:04	KS	TAL BUF
Total/NA	Analysis	9060		1	62648	05/01/12 03:52	KAC	TAL BUF

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19123-6

Date Collected: 04/25/12 00:00

Matrix: Water

Date Received: 04/25/12 19:10

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	62559	05/02/12 01:48	DC	TAL BUF

Client Sample ID: MW-8-003-B-043012-1400

Lab Sample ID: 480-19365-1

Date Collected: 04/30/12 14:00

Matrix: Water

Date Received: 04/30/12 19:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		5	63474	05/08/12 14:10	RL	TAL BUF
Total/NA	Analysis	8260B	DL	25	63572	05/09/12 00:24	LH	TAL BUF
Total/NA	Analysis	RSK-175		1	38245	05/04/12 10:04	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	62604	05/02/12 16:05	MN	TAL BUF
Total/NA	Prep	3005A			62531	05/02/12 08:00	JM	TAL BUF
Total/NA	Analysis	6010B		1	62800	05/02/12 19:45	AH	TAL BUF
Total/NA	Analysis	353.2		1	62595	05/01/12 23:05	KS	TAL BUF
Total/NA	Analysis	353.2		1	62596	05/01/12 23:05	KS	TAL BUF
Total/NA	Analysis	350.1		1	62682	05/02/12 11:13	KS	TAL BUF
Total/NA	Analysis	SM 2320B		1	62729	05/02/12 13:34	LYW	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62917	05/03/12 12:10	EGN	TAL BUF
Total/NA	Analysis	9060		1	63238	05/05/12 05:38	KAC	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		121	63648	05/08/12 17:51	JR	TAL BUF
Total/NA	Analysis	9038		15	63649	05/08/12 17:05	JR	TAL BUF
Total/NA	Analysis	VFA-IC		1	64493	05/16/12 01:35	KAC	TAL BUF

Client Sample ID: MW-8-1-043012-1700

Lab Sample ID: 480-19365-2

Date Collected: 04/30/12 17:00

Matrix: Water

Date Received: 04/30/12 19:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	63474	05/08/12 14:34	RL	TAL BUF
Total/NA	Analysis	RSK-175		1	38245	05/04/12 10:08	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	62604	05/02/12 16:22	MN	TAL BUF
Total/NA	Prep	3005A			62531	05/02/12 08:00	JM	TAL BUF
Total/NA	Analysis	6010B		1	62800	05/02/12 19:54	AH	TAL BUF
Total/NA	Analysis	353.2		1	62596	05/01/12 21:35	KS	TAL BUF
Total/NA	Analysis	353.2		1	62597	05/01/12 21:35	KS	TAL BUF
Total/NA	Analysis	350.1		1	62682	05/02/12 11:14	KS	TAL BUF
Total/NA	Analysis	SM 2320B		1	62729	05/02/12 13:41	LYW	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		5	62917	05/03/12 12:10	EGN	TAL BUF
Total/NA	Analysis	9060		1	63238	05/05/12 07:08	KAC	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		20	63648	05/08/12 17:08	JR	TAL BUF
Total/NA	Analysis	9038		30	63649	05/08/12 17:05	JR	TAL BUF
Total/NA	Analysis	VFA-IC		1	64493	05/16/12 02:05	KAC	TAL BUF

Client Sample ID: MW-8-3-050112-1540

Lab Sample ID: 480-19420-3

Date Collected: 05/01/12 15:40

Matrix: Water

Date Received: 05/01/12 17:17

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	63732	05/10/12 00:35	TRB	TAL BUF
Total/NA	Analysis	RSK-175		1	38628	05/14/12 12:50	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	62926	05/03/12 17:38	JM	TAL BUF
Total/NA	Prep	3005A			62755	05/03/12 08:15	SS	TAL BUF
Total/NA	Analysis	6010B		1	63017	05/03/12 17:50	LH	TAL BUF
Total/NA	Analysis	SM 2320B		1	62729	05/02/12 14:10	LYW	TAL BUF
Total/NA	Analysis	353.2		1	62782	05/02/12 20:01	KS	TAL BUF
Total/NA	Analysis	353.2		1	62783	05/02/12 20:01	KS	TAL BUF
Total/NA	Analysis	350.1		1	62905	05/03/12 12:26	KS	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62917	05/03/12 12:10	EGN	TAL BUF
Total/NA	Analysis	9060		1	63238	05/05/12 09:38	KAC	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		100	63813	05/09/12 20:24	PJQ	TAL BUF
Total/NA	Analysis	9038		5	63815	05/09/12 19:23	PJQ	TAL BUF
Total/NA	Analysis	VFA-IC		1	64493	05/15/12 19:46	KAC	TAL BUF

Client Sample ID: MW-8-S-2-050312-1830

Lab Sample ID: 480-19600-4

Date Collected: 05/03/12 18:30

Matrix: Water

Date Received: 05/03/12 19:45

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	64020	05/11/12 13:48	DC	TAL BUF
Total/NA	Analysis	8260B	DL	125	64274	05/14/12 11:20	CDC	TAL BUF

Lab Chronicle

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19123-1

Client Sample ID: MW-8-S-2-050312-1830

Lab Sample ID: 480-19600-4

Date Collected: 05/03/12 18:30
Matrix: Water
Date Received: 05/03/12 19:45

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	RSK-175		1	38628	05/14/12 13:06	MRV	TAL BUR
Total/NA	Analysis	RSK-175		10	63265	05/07/12 14:25	MN	TAL BUF
Total/NA	Prep	3005A			63214	05/07/12 07:20	SS	TAL BUF
Total/NA	Analysis	6010B		1	63452	05/07/12 18:02	MM	TAL BUF
Total/NA	Analysis	350.1		1	63137	05/04/12 13:54	KS	TAL BUF
Total/NA	Analysis	353.2		1	63184	05/04/12 20:23	KS	TAL BUF
Total/NA	Analysis	353.2		1	63185	05/04/12 20:23	KS	TAL BUF
Total/NA	Analysis	9060		1	63278	05/06/12 14:31	KAC	TAL BUF
Total/NA	Analysis	SM 2320B		1	63392	05/07/12 14:40	LYW	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	63515	05/08/12 08:45	EGN	TAL BUF
Total/NA	Analysis	9038		20	64026	05/10/12 16:33	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		10	64027	05/10/12 16:39	PJQ	TAL BUF
Total/NA	Analysis	VFA-IC		1	64494	05/16/12 12:45	KAC	TAL BUF

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19600-5

Date Collected: 05/03/12 00:00
Matrix: Water
Date Received: 05/03/12 19:45

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	64247	05/13/12 12:06	JMB	TAL BUF

Laboratory References:

TAL BUF = TestAmerica Buffalo, 10 Hazelwood Drive, Amherst, NY 14228-2298, TEL (716)691-2600

TAL BUR = TestAmerica Burlington, 30 Community Drive, Suite 11, South Burlington, VT 05403, TEL (802)660-1990

Certification Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19123-1

Laboratory	Authority	Program	EPA Region	Certification ID
TestAmerica Buffalo	Arkansas DEQ	State Program	6	88-0686
TestAmerica Buffalo	California	NELAC	9	1169CA
TestAmerica Buffalo	Connecticut	State Program	1	PH-0568
TestAmerica Buffalo	Florida	NELAC	4	E87672
TestAmerica Buffalo	Georgia	State Program	4	956
TestAmerica Buffalo	Georgia	State Program	4	N/A
TestAmerica Buffalo	Illinois	NELAC	5	100325 / 200003
TestAmerica Buffalo	Iowa	State Program	7	374
TestAmerica Buffalo	Kansas	NELAC	7	E-10187
TestAmerica Buffalo	Kentucky	State Program	4	90029
TestAmerica Buffalo	Kentucky (UST)	State Program	4	30
TestAmerica Buffalo	Louisiana	NELAC	6	02031
TestAmerica Buffalo	Maine	State Program	1	NY0044
TestAmerica Buffalo	Maryland	State Program	3	294
TestAmerica Buffalo	Massachusetts	State Program	1	M-NY044
TestAmerica Buffalo	Michigan	State Program	5	9937
TestAmerica Buffalo	Minnesota	NELAC	5	036-999-337
TestAmerica Buffalo	New Hampshire	NELAC	1	2337
TestAmerica Buffalo	New Hampshire	NELAC	1	68-00281
TestAmerica Buffalo	New Jersey	NELAC	2	NY455
TestAmerica Buffalo	New York	NELAC	2	10026
TestAmerica Buffalo	North Dakota	State Program	8	R-176
TestAmerica Buffalo	Oklahoma	State Program	6	9421
TestAmerica Buffalo	Oregon	NELAC	10	NY200003
TestAmerica Buffalo	Pennsylvania	NELAC	3	68-00281
TestAmerica Buffalo	Tennessee	State Program	4	TN02970
TestAmerica Buffalo	Texas	NELAC	6	T104704412-08-TX
TestAmerica Buffalo	USDA	Federal		P330-08-00242
TestAmerica Buffalo	Virginia	NELAC	3	460185
TestAmerica Buffalo	Virginia	State Program	3	278
TestAmerica Buffalo	Washington	State Program	10	C1677
TestAmerica Buffalo	West Virginia DEP	State Program	3	252
TestAmerica Buffalo	Wisconsin	State Program	5	998310390
TestAmerica Burlington	ACLASS	DoD ELAP		ADE-1492
TestAmerica Burlington	Connecticut	State Program	1	PH-0751
TestAmerica Burlington	DE Haz. Subst. Cleanup Act (HSCA)	State Program	3	NA
TestAmerica Burlington	Florida	NELAC	4	E87467
TestAmerica Burlington	Louisiana	NELAC	6	176292
TestAmerica Burlington	Maine	State Program	1	VT00008
TestAmerica Burlington	Minnesota	NELAC	5	050-999-436
TestAmerica Burlington	New Hampshire	NELAC	1	200610
TestAmerica Burlington	New Jersey	NELAC	2	VT972
TestAmerica Burlington	New York	NELAC	2	10391
TestAmerica Burlington	Pennsylvania	NELAC	3	68-00489
TestAmerica Burlington	Rhode Island	State Program	1	LAO00298
TestAmerica Burlington	USDA	Federal		P330-11-00093
TestAmerica Burlington	Vermont	State Program	1	VT-4000
TestAmerica Burlington	Virginia	NELAC	3	460209

Accreditation may not be offered or required for all methods and analytes reported in this package. Please contact your project manager for the laboratory's current list of certified methods and analytes.

Method Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19123-1

Method	Method Description	Protocol	Laboratory
8260B	Volatile Organic Compounds (GC/MS)	SW846	TAL BUF
RSK-175	Dissolved Gases (GC)	RSK	TAL BUR
RSK-175	Dissolved Gases (GC)	RSK	TAL BUF
6010B	Metals (ICP)	SW846	TAL BUF
350.1	Nitrogen, Ammonia	MCAWW	TAL BUF
353.2	Nitrate	EPA	TAL BUF
353.2	Nitrogen, Nitrite	MCAWW	TAL BUF
9038	Sulfate, Turbidimetric	SW846	TAL BUF
9060	Organic Carbon, Total (TOC)	SW846	TAL BUF
SM 2320B	Alkalinity	SM	TAL BUF
SM 4500 Cl- E	Chloride, Total	SM	TAL BUF
SM 4500 S2 D	Sulfide, Total	SM	TAL BUF
VFA-IC	Volatile Fatty Acids, Ion Chromatography	TestAmerica SOP	TAL BUF

Protocol References:

EPA = US Environmental Protection Agency

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions.

RSK = Sample Prep And Calculations For Dissolved Gas Analysis In Water Samples Using A GC Headspace Equilibration Technique, RSKSOP-175, Rev. 0, 8/11/94, USEPA Research Lab

SM = "Standard Methods For The Examination Of Water And Wastewater",

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

TestAmerica SOP = TestAmerica, Inc., Standard Operating Procedure

Laboratory References:

TAL BUF = TestAmerica Buffalo, 10 Hazelwood Drive, Amherst, NY 14228-2298, TEL (716)691-2600

TAL BUR = TestAmerica Burlington, 30 Community Drive, Suite 11, South Burlington, VT 05403, TEL (802)660-1990

Sample Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19123-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
480-19123-1	MW-6-1-042512-0915	Water	04/25/12 09:15	04/25/12 19:10
480-19123-2	MW-6-2-042512-1130	Water	04/25/12 11:30	04/25/12 19:10
480-19123-3	MW-8-4-042512-1800	Water	04/25/12 18:00	04/25/12 19:10
480-19123-4	MW-6-F-8-042512-1730	Water	04/25/12 17:30	04/25/12 19:10
480-19123-5	DUP	Water	04/25/12 00:00	04/25/12 19:10
480-19123-6	TRIP BLANK	Water	04/25/12 00:00	04/25/12 19:10
480-19365-1	MW-8-003-B-043012-1400	Water	04/30/12 14:00	04/30/12 19:30
480-19365-2	MW-8-1-043012-1700	Water	04/30/12 17:00	04/30/12 19:30
480-19420-3	MW-8-3-050112-1540	Water	05/01/12 15:40	05/01/12 17:17
480-19600-4	MW-8-S-2-050312-1830	Water	05/03/12 18:30	05/03/12 19:45
480-19600-5	TRIP BLANK	Water	05/03/12 00:00	05/03/12 19:45

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: Thomas Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.1
Client Contact: Mr. Christopher Boron	Phone: 716 844-7046	E-Mail: melissa.deyo@testamericainc.com		Page: Page 1 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 8 BCP Site 9-32-139	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity	Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N		
MW-6-1-042512-0915	4/25/12	915	G	Water			X	X	X	X	X	X	X	X	X	X		
MW-6-2-042512-1130		1130	G	Water														
MW-8-4-042512-1800		1800	G	Water														
MW-6-F-8-042512-1730		1730	G	Water														
DUP			G	Water														
				Water														
Trip Blank				Water														
				Water														
				Water														
				Water														
				Water														

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
1	Thomas Bohlen	4/25/12 / 1910	GZA		04/25/12 1910	TAB BUFFALO
2	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
3	Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.:

Cooler Temperature(s) °C and Other Remarks:

Page 61 of 66

5/22/2012

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page ~~1 of 4~~
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 8 BCP Site 9-32-139	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N						
MW-8-003-B-043012-1400	4/30/12	1400	G	Water			X	X	X	X	X	X	X	X	X	X						
MW-8-1-043012-1700	↓	1700	G	↓			X	X	X	X	X	X	X	X	X	X						
Trip Blank																						

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:			
Relinquished by: Thomas Bohlen	Date/Time: 4/30/12 / 7:30	Company GZA	Received by:	Date/Time:	Company
Relinquished by: Jason Midura	Date/Time: 4/30/12 / 19:30	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Page 62 of 66

5/22/2012

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 4 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:

Address: 535 Washington Street 11th Floor	Due Date Requested:	Analysis Requested	Preservation Codes:
City: Buffalo	TAT Requested (days):		A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2SO3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - ph 4-5, Z - other (specify)
State, Zip: NY, 14203			
Phone:	PO #: 4047065		Other:
Email: christopher.boron@gza.com	WO #: 58507		
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014		
Site: Bldg 8 BCP Site 9-32-139	SSOW#:		

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2; 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N					
MW-8-3-050112-1540	5/1/12	1540	G	Water			X	X	X	X	X	X	X	X	X	X					20	
Trip Blank																						

Possible Hazard Identification	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological	☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months
Deliverable Requested: I, II, III, IV, Other (specify)	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Thomas Bohlen	5/1/12 / 17:17			5-1-12 17:17	TAL
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks: 4.2 #

5/22/2012

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 4 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 8 BCP Site 9-32-139	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity	Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N		
MW-8-2-050312 ~~1530~~ 1830	050312	1830	G	Water			X	X	X	X	X	X	X		X	X		12	
Trip Blank																		

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by: Thomas Bohlen	Date/Time: 5/3/12	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time: 5/3/12 19:45	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.: | Cooler Temperature(s) °C and Other Remarks:

Page 64 of 66

5/22/2012

Login Sample Receipt Checklist

Client: Conestoga-Rovers & Associates, Inc.

Job Number: 480-19123-1

Login Number: 19123

List Source: TestAmerica Buffalo

List Number: 1

Creator: Janish, Carl

Question	Answer	Comment
Radioactivity either was not measured or, if measured, is at or below background	True	
The cooler's custody seal, if present, is intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the sample IDs on the containers and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
VOA sample vials do not have headspace or bubble is <6mm (1/4") in diameter.	True	
If necessary, staff have been informed of any short hold time or quick TAT needs	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Sampling Company provided.	True	GZA
Samples received within 48 hours of sampling.	True	
Samples requiring field filtration have been filtered in the field.	True	
Chlorine Residual checked.	N/A	

Login Sample Receipt Checklist

Client: Conestoga-Rovers & Associates, Inc.

Job Number: 480-19123-1

Login Number: 19123
List Number: 1
Creator: Kirchner, Benjamin

List Source: TestAmerica Burlington
List Creation: 04/27/12 03:27 PM

Question	Answer	Comment
Radioactivity either was not measured or, if measured, is at or below background	N/A	Lab does not accept radioactive samples.
The cooler's custody seal, if present, is intact.	True	792260
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	4.6ºC, IR GUN ID 154, CF -0.2
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	N/A	Received project as a subcontract.
There are no discrepancies between the sample IDs on the containers and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
VOA sample vials do not have headspace or bubble is <6mm (1/4") in diameter.	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	Check done at department level as required.

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

ANALYTICAL REPORT

TestAmerica Laboratories, Inc.
TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Tel: (716)691-2600

TestAmerica Job ID: 480-19497-1

Client Project/Site: 058507, GM-Lockport Groundwater Sampling

For:

Conestoga-Rovers & Associates, Inc.
2055 Niagara Falls Blvd., Suite 3
Niagara Falls, New York 14304

Attn: Kathleen Willy

Melissa Deyo

Authorized for release by:
5/22/2012 10:23:02 AM

Melissa Deyo
Project Manager I
melissa.deyo@testamericainc.com

LINKS

Review your project results through TotalAccess

Have a Question? Ask The Expert

Visit us at: www.testamericainc.com

The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

Table of Contents

Cover Page 1
Table of Contents 2
Definitions/Glossary 3
Case Narrative 4
Detection Summary 6
Client Sample Results 8
Surrogate Summary 13
QC Sample Results 14
QC Association Summary 25
Lab Chronicle 29
Certification Summary 32
Method Summary 33
Sample Summary 34
Chain of Custody 35
Receipt Checklists 37

Qualifiers

GC VOA

Qualifier	Qualifier Description
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

Metals

Qualifier	Qualifier Description
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
4	MS, MSD: The analyte present in the original sample is 4 times greater than the matrix spike concentration; therefore, control limits are not applicable.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

General Chemistry

Qualifier	Qualifier Description
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
☼	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CNF	Contains no Free Liquid
DL, RA, RE, IN	Indicates a Dilution, Reanalysis, Re-extraction, or additional Initial metals/anion analysis of the sample
EDL	Estimated Detection Limit
EPA	United States Environmental Protection Agency
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RL	Reporting Limit
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

Job ID: 480-19497-1

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative
480-19497-1

Receipt
The samples were received on 5/2/2012 6:00 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 6.9º C.

GC/MS VOA
Method 8260B: The following samples were diluted due to the abundance of target analytes: MW-10-2-050212-1200 (480-19497-1), MW-10-2-050212-1200 (480-19497-1 DL), (480-19497-1 MS), (480-19497-1 MSD) and BLDG-10-MW-1-050212-1620 (480-19497-3). Elevated reporting limits (RLs) are provided.

No other analytical or quality issues were noted.

IC
No analytical or quality issues were noted.

GC VOA
Method RSK-175: The following samples were diluted due to the abundance of target analytes: MW-10-2-050212-1200 (480-19497-1). Elevated reporting limits (RLs) are provided.

Method RSK-175: The method blank for batch 63265 contained Methane above the method detection limit. These target analyte concentrations were less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Metals
No analytical or quality issues were noted.

General Chemistry
Method 9038: The method blank for batch 63757 contained Sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

Method SM 4500 Cl- E: The method blank for batch 63758 contained Chloride above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Job ID: 480-19600-1

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative
480-19600-1

Receipt
The samples were received on 5/3/2012 7:45 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 3.8º C.

GC/MS VOA
Method 8260B: The following volatiles sample was diluted due to foaming at the time of purging during the original sample analysis: MW-9-101-A-050312-1215 (480-19600-1). Elevated reporting limits (RLs) are provided.

No other analytical or quality issues were noted.

Job ID: 480-19600-1 (Continued)

Laboratory: TestAmerica Buffalo (Continued)

IC
No analytical or quality issues were noted.

GC VOA
Method RSK-175: The method blank for batch 63265 contained Methane above the method detection limit. These target analyte concentrations were less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Metals
No analytical or quality issues were noted.

General Chemistry
Method 9038: The method blank for batch 64026 contained sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-analysis of samples was not performed.

Method SM4500 Cl-E: The method blank for batch 64027 contained sulfate above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-analysis of samples was not performed.

No other analytical or quality issues were noted.

Detection Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19497-1

Client Sample ID: MW-10-2-050212-1200 — Lab Sample ID: 480-19497-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
trans-1,2-Dichloroethene	26		2.0	1.8	ug/L	2		8260B	Total/NA
Vinyl chloride	60		2.0	1.8	ug/L	2		8260B	Total/NA
cis-1,2-Dichloroethene - DL	2100		40	32	ug/L	40		8260B	Total/NA
Tetrachloroethene - DL	330		40	14	ug/L	40		8260B	Total/NA
Trichloroethene - DL	810		40	18	ug/L	40		8260B	Total/NA
Ethane	10	J	15	4.9	ug/L	10		RSK-175	Total/NA
Ethene	8.4	J	15	5.2	ug/L	10		RSK-175	Total/NA
Methane	130	B	10	2.2	ug/L	10		RSK-175	Total/NA
Iron	0.15		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	92.7		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.27		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	10.8		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	1610		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	0.52		0.020	0.0090	mg/L	1		350.1	Total/NA
Sulfate	147	B	50.0	15.0	mg/L	10		9038	Total/NA
Total Organic Carbon	1.2		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	240		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	1110	B	50.0	23.0	mg/L	50		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	4100		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: MW-10-3-050212-1400 — Lab Sample ID: 480-19497-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	14		1.0	0.81	ug/L	1		8260B	Total/NA
Tetrachloroethene	14		1.0	0.36	ug/L	1		8260B	Total/NA
Trichloroethene	7.0		1.0	0.46	ug/L	1		8260B	Total/NA
Methane	0.47	J B	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	0.075		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	17.5		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.00094	J	0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	2.4		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	44.7		1.0	0.32	mg/L	1		6010B	Total/NA
Nitrate	1.5		0.050	0.011	mg/L	1		353.2	Total/NA
Sulfate	74.0	B	25.0	7.5	mg/L	5		9038	Total/NA
Total Organic Carbon	0.52	J	1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	128		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	91.0	B	4.0	1.8	mg/L	4		SM 4500 Cl- E	Total/NA

Client Sample ID: BLDG-10-MW-1-050212-1620 — Lab Sample ID: 480-19497-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Tetrachloroethene	150000		2000	720	ug/L	2000		8260B	Total/NA
Trichloroethene	2500		2000	920	ug/L	2000		8260B	Total/NA
Ethane	2.6		1.5	0.49	ug/L	1		RSK-175	Total/NA
Ethene	7.7		1.5	0.52	ug/L	1		RSK-175	Total/NA
Methane	12	B	1.0	0.22	ug/L	1		RSK-175	Total/NA
Iron	1.2		0.050	0.019	mg/L	1		6010B	Total/NA
Magnesium	80.8		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.32		0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	4.7		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	76.8		1.0	0.32	mg/L	1		6010B	Total/NA
Ammonia	0.18		0.020	0.0090	mg/L	1		350.1	Total/NA

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19497-1

Client Sample ID: BLDG-10-MW-1-050212-1620 (Continued)

Lab Sample ID: 480-19497-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Sulfate	195	B	50.0	15.0	mg/L	10		9038	Total/NA
Total Organic Carbon	4.4		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	320		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	115	B	5.0	2.3	mg/L	5		SM 4500 Cl- E	Total/NA
Acetic acid	0.67	J	1.0	0.15	mg/L	1		VFA-IC	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	7900		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19497-4

No Detections

Client Sample ID: MW-9-101-A-050312-1215

Lab Sample ID: 480-19600-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Methane	0.52	J B	1.0	0.22	ug/L	1		RSK-175	Total/NA
Magnesium	137		0.20	0.043	mg/L	1		6010B	Total/NA
Manganese	0.0023	J	0.0030	0.00040	mg/L	1		6010B	Total/NA
Potassium	21.5		0.50	0.10	mg/L	1		6010B	Total/NA
Sodium	748		1.0	0.32	mg/L	1		6010B	Total/NA
Nitrate	6.3		0.050	0.011	mg/L	1		353.2	Total/NA
Sulfate	1170	B	250	75.0	mg/L	50		9038	Total/NA
Total Organic Carbon	3.0		1.0	0.43	mg/L	1		9060	Total/NA
Total Alkalinity	200		5.0	0.79	mg/L	1		SM 2320B	Total/NA
Chloride	1440		30.0	13.8	mg/L	30		SM 4500 Cl- E	Total/NA

Analyte	Result	Qualifier	RL	RL	Unit	Dil Fac	D	Method	Prep Type
Carbon dioxide	4200		1000	1000	ug/L	1		RSK-175	Total/NA

Client Sample ID: MW-10-2-050212-1200

Date Collected: 05/02/12 12:00
Date Received: 05/02/12 18:00

Lab Sample ID: 480-19497-1

Matrix: Water

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
trans-1,2-Dichloroethene	26		2.0	1.8	ug/L			05/10/12 14:46	2
Vinyl chloride	60		2.0	1.8	ug/L			05/10/12 14:46	2

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*112*		*66 - 137*		*05/10/12 14:46*	*2*
4-Bromofluorobenzene (Surr)	*98*		*73 - 120*		*05/10/12 14:46*	*2*
Toluene-d8 (Surr)	*118*		*71 - 126*		*05/10/12 14:46*	*2*

Method: 8260B - Volatile Organic Compounds (GC/MS) - DL

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	2100		40	32	ug/L			05/11/12 11:34	40
Tetrachloroethene	330		40	14	ug/L			05/11/12 11:34	40
Trichloroethene	810		40	18	ug/L			05/11/12 11:34	40

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*111*		*66 - 137*		*05/11/12 11:34*	*40*
4-Bromofluorobenzene (Surr)	*101*		*73 - 120*		*05/11/12 11:34*	*40*
Toluene-d8 (Surr)	*120*		*71 - 126*		*05/11/12 11:34*	*40*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	10	J	15	4.9	ug/L			05/07/12 10:28	10
Ethene	8.4	J	15	5.2	ug/L			05/07/12 10:28	10
Methane	130	B	10	2.2	ug/L			05/07/12 10:28	10

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	4100		1000	1000	ug/L			05/14/12 14:04	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	0.15		0.050	0.019	mg/L		05/03/12 10:15	05/03/12 20:15	1
Magnesium	92.7		0.20	0.043	mg/L		05/03/12 10:15	05/03/12 20:15	1
Manganese	0.27		0.0030	0.00040	mg/L		05/03/12 10:15	05/03/12 20:15	1
Potassium	10.8		0.50	0.10	mg/L		05/03/12 10:15	05/03/12 20:15	1
Sodium	1610		1.0	0.32	mg/L		05/03/12 10:15	05/03/12 20:15	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	0.52		0.020	0.0090	mg/L			05/03/12 13:26	1
Nitrate	ND		0.050	0.011	mg/L			05/02/12 20:42	1
Nitrite	ND		0.050	0.020	mg/L			05/02/12 20:42	1
Sulfate	147	B	50.0	15.0	mg/L			05/09/12 18:26	10
Total Organic Carbon	1.2		1.0	0.43	mg/L			05/06/12 21:02	1
Total Alkalinity	240		5.0	0.79	mg/L			05/07/12 14:40	1
Chloride	1110	B	50.0	23.0	mg/L			05/09/12 19:49	50
Sulfide	ND		0.10	0.052	mg/L			05/03/12 12:10	1
Acetic acid	ND		1.0	0.15	mg/L			05/15/12 20:15	1
Formic-acid	ND		1.0	0.11	mg/L			05/15/12 20:15	1
Lactic acid	ND		1.0	0.14	mg/L			05/15/12 20:15	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/15/12 20:15	1
Propionic acid	ND		1.0	0.17	mg/L			05/15/12 20:15	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/15/12 20:15	1

Client Sample ID: MW-10-3-050212-1400

Lab Sample ID: 480-19497-2

Date Collected: 05/02/12 14:00

Matrix: Water

Date Received: 05/02/12 18:00

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	**14**		1.0	0.81	ug/L			05/11/12 11:57	1
Tetrachloroethene	**14**		1.0	0.36	ug/L			05/11/12 11:57	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/11/12 11:57	1
Trichloroethene	**7.0**		1.0	0.46	ug/L			05/11/12 11:57	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/11/12 11:57	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*113*		*66 - 137*		*05/11/12 11:57*	*1*
4-Bromofluorobenzene (Surr)	*101*		*73 - 120*		*05/11/12 11:57*	*1*
Toluene-d8 (Surr)	*120*		*71 - 126*		*05/11/12 11:57*	*1*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	ND		1.5	0.49	ug/L			05/07/12 11:59	1
Ethene	ND		1.5	0.52	ug/L			05/07/12 11:59	1
Methane	**0.47**	**J B**	1.0	0.22	ug/L			05/07/12 11:59	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	ND		1000	1000	ug/L			05/14/12 14:15	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**0.075**		0.050	0.019	mg/L		05/03/12 10:15	05/03/12 20:18	1
Magnesium	**17.5**		0.20	0.043	mg/L		05/03/12 10:15	05/03/12 20:18	1
Manganese	**0.00094**	**J**	0.0030	0.00040	mg/L		05/03/12 10:15	05/03/12 20:18	1
Potassium	**2.4**		0.50	0.10	mg/L		05/03/12 10:15	05/03/12 20:18	1
Sodium	**44.7**		1.0	0.32	mg/L		05/03/12 10:15	05/03/12 20:18	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/03/12 13:27	1
Nitrate	**1.5**		0.050	0.011	mg/L			05/02/12 22:31	1
Nitrite	ND		0.050	0.020	mg/L			05/02/12 22:31	1
Sulfate	**74.0**	**B**	25.0	7.5	mg/L			05/09/12 19:37	5
Total Organic Carbon	**0.52**	**J**	1.0	0.43	mg/L			05/07/12 20:43	1
Total Alkalinity	**128**		5.0	0.79	mg/L			05/07/12 14:40	1
Chloride	**91.0**	**B**	4.0	1.8	mg/L			05/09/12 19:38	4
Sulfide	ND		0.10	0.052	mg/L			05/03/12 12:10	1
Acetic acid	ND		1.0	0.15	mg/L			05/15/12 20:44	1
Formic-acid	ND		1.0	0.11	mg/L			05/15/12 20:44	1
Lactic acid	ND		1.0	0.14	mg/L			05/15/12 20:44	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/15/12 20:44	1
Propionic acid	ND		1.0	0.17	mg/L			05/15/12 20:44	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/15/12 20:44	1

Client Sample ID: BLDG-10-MW-1-050212-1620

Lab Sample ID: 480-19497-3

Date Collected: 05/02/12 16:20

Matrix: Water

Date Received: 05/02/12 18:00

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		2000	1600	ug/L			05/10/12 15:32	2000
Tetrachloroethene	**150000**		2000	720	ug/L			05/10/12 15:32	2000

Client Sample ID: BLDG-10-MW-1-050212-1620

Lab Sample ID: 480-19497-3

Date Collected: 05/02/12 16:20
Matrix: Water
Date Received: 05/02/12 18:00

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
trans-1,2-Dichloroethene	ND		2000	1800	ug/L			05/10/12 15:32	2000
Trichloroethene	**2500**		2000	920	ug/L			05/10/12 15:32	2000
Vinyl chloride	ND		2000	1800	ug/L			05/10/12 15:32	2000

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*108*		*66 - 137*		*05/10/12 15:32*	*2000*
4-Bromofluorobenzene (Surr)	*94*		*73 - 120*		*05/10/12 15:32*	*2000*
Toluene-d8 (Surr)	*114*		*71 - 126*		*05/10/12 15:32*	*2000*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	**2.6**		1.5	0.49	ug/L			05/07/12 12:16	1
Ethene	**7.7**		1.5	0.52	ug/L			05/07/12 12:16	1
Methane	**12**	**B**	1.0	0.22	ug/L			05/07/12 12:16	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**7900**		1000	1000	ug/L			05/14/12 14:33	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**1.2**		0.050	0.019	mg/L		05/03/12 10:15	05/03/12 20:20	1
Magnesium	**80.8**		0.20	0.043	mg/L		05/03/12 10:15	05/03/12 20:20	1
Manganese	**0.32**		0.0030	0.00040	mg/L		05/03/12 10:15	05/03/12 20:20	1
Potassium	**4.7**		0.50	0.10	mg/L		05/03/12 10:15	05/03/12 20:20	1
Sodium	**76.8**		1.0	0.32	mg/L		05/03/12 10:15	05/03/12 20:20	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	**0.18**		0.020	0.0090	mg/L			05/03/12 13:28	1
Nitrate	ND		0.050	0.011	mg/L			05/02/12 20:44	1
Nitrite	ND		0.050	0.020	mg/L			05/02/12 20:44	1
Sulfate	**195**	**B**	50.0	15.0	mg/L			05/09/12 19:37	10
Total Organic Carbon	**4.4**		1.0	0.43	mg/L			05/07/12 21:13	1
Total Alkalinity	**320**		5.0	0.79	mg/L			05/07/12 14:40	1
Chloride	**115**	**B**	5.0	2.3	mg/L			05/09/12 18:15	5
Sulfide	ND		0.10	0.052	mg/L			05/03/12 12:10	1
Acetic acid	**0.67**	**J**	1.0	0.15	mg/L			05/15/12 21:13	1
Formic-acid	ND		1.0	0.11	mg/L			05/15/12 21:13	1
Lactic acid	ND		1.0	0.14	mg/L			05/15/12 21:13	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/15/12 21:13	1
Propionic acid	ND		1.0	0.17	mg/L			05/15/12 21:13	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/15/12 21:13	1

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19497-4

Date Collected: 05/02/12 00:00
Matrix: Water
Date Received: 05/02/12 18:00

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/10/12 15:55	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/10/12 15:55	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/10/12 15:55	1
Trichloroethene	ND		1.0	0.46	ug/L			05/10/12 15:55	1

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19497-1

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19497-4
Date Collected: 05/02/12 00:00
Matrix: Water
Date Received: 05/02/12 18:00

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Vinyl chloride	ND		1.0	0.90	ug/L			05/10/12 15:55	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*108*		*66 - 137*		*05/10/12 15:55*	*1*
4-Bromofluorobenzene (Surr)	*94*		*73 - 120*		*05/10/12 15:55*	*1*
Toluene-d8 (Surr)	*113*		*71 - 126*		*05/10/12 15:55*	*1*

Client Sample ID: MW-9-101-A-050312-1215

Lab Sample ID: 480-19600-1
Date Collected: 05/03/12 12:15
Matrix: Water
Date Received: 05/03/12 19:45

Method: 8260B - Volatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		4.0	3.2	ug/L			05/11/12 12:37	4
Tetrachloroethene	ND		4.0	1.4	ug/L			05/11/12 12:37	4
trans-1,2-Dichloroethene	ND		4.0	3.6	ug/L			05/11/12 12:37	4
Trichloroethene	ND		4.0	1.8	ug/L			05/11/12 12:37	4
Vinyl chloride	ND		4.0	3.6	ug/L			05/11/12 12:37	4

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*112*		*66 - 137*		*05/11/12 12:37*	*4*
4-Bromofluorobenzene (Surr)	*112*		*73 - 120*		*05/11/12 12:37*	*4*
Toluene-d8 (Surr)	*111*		*71 - 126*		*05/11/12 12:37*	*4*

Method: RSK-175 - Dissolved Gases (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	ND		1.5	0.49	ug/L			05/07/12 15:06	1
Ethene	ND		1.5	0.52	ug/L			05/07/12 15:06	1
Methane	**0.52**	**J B**	1.0	0.22	ug/L			05/07/12 15:06	1

Analyte	Result	Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	**4200**		1000	1000	ug/L			05/14/12 12:54	1

Method: 6010B - Metals (ICP)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		05/07/12 07:20	05/07/12 17:54	1
Magnesium	**137**		0.20	0.043	mg/L		05/07/12 07:20	05/07/12 17:54	1
Manganese	**0.0023**	**J**	0.0030	0.00040	mg/L		05/07/12 07:20	05/07/12 17:54	1
Potassium	**21.5**		0.50	0.10	mg/L		05/07/12 07:20	05/07/12 17:54	1
Sodium	**748**		1.0	0.32	mg/L		05/07/12 07:20	05/07/12 17:54	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/04/12 13:51	1
Nitrate	**6.3**		0.050	0.011	mg/L			05/04/12 21:14	1
Nitrite	ND		0.050	0.020	mg/L			05/04/12 21:14	1
Sulfate	**1170**	**B**	250	75.0	mg/L			05/10/12 16:43	50
Total Organic Carbon	**3.0**		1.0	0.43	mg/L			05/06/12 12:32	1
Total Alkalinity	**200**		5.0	0.79	mg/L			05/07/12 14:40	1
Chloride	**1440**		30.0	13.8	mg/L			05/10/12 16:23	30
Sulfide	ND		0.10	0.052	mg/L			05/08/12 08:45	1
Acetic acid	ND		1.0	0.15	mg/L			05/16/12 11:18	1
Formic-acid	ND		1.0	0.11	mg/L			05/16/12 11:18	1

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19497-1

Client Sample ID: MW-9-101-A-050312-1215
Date Collected: 05/03/12 12:15
Date Received: 05/03/12 19:45

Lab Sample ID: 480-19600-1
Matrix: Water

General Chemistry (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Lactic acid	ND		1.0	0.14	mg/L			05/16/12 11:18	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/16/12 11:18	1
Propionic acid	ND		1.0	0.17	mg/L			05/16/12 11:18	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/16/12 11:18	1

Surrogate Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19497-1

Method: 8260B - Volatile Organic Compounds (GC/MS)

Matrix: Water

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)		
		12DCE	BFB	TOL
Lab Sample ID	Client Sample ID	(66-137)	(73-120)	(71-126)
480-19497-1	MW-10-2-050212-1200	112	98	118
480-19497-1 - DL	MW-10-2-050212-1200	111	101	120
480-19497-1 MS	MW-10-2-050212-1200	104	95	112
480-19497-1 MSD	MW-10-2-050212-1200	108	101	117
480-19497-2	MW-10-3-050212-1400	113	101	120
480-19497-3	BLDG-10-MW-1-050212-1620	108	94	114
480-19497-4	TRIP BLANK	108	94	113
480-19600-1	MW-9-101-A-050312-1215	112	112	111
LCS 480-63819/4	Lab Control Sample	109	97	118
LCS 480-64011/4	Lab Control Sample	104	95	114
LCS 480-64020/4	Lab Control Sample	110	115	116
MB 480-63819/5	Method Blank	115	99	121
MB 480-64011/5	Method Blank	106	96	115
MB 480-64020/5	Method Blank	112	111	113

Surrogate Legend

12DCE = 1,2-Dichloroethane-d4 (Surr)

BFB = 4-Bromofluorobenzene (Surr)

TOL = Toluene-d8 (Surr)

Method: 8260B - Volatile Organic Compounds (GC/MS)

Lab Sample ID: MB 480-63819/5
Matrix: Water
Analysis Batch: 63819

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/10/12 11:24	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/10/12 11:24	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/10/12 11:24	1
Trichloroethene	ND		1.0	0.46	ug/L			05/10/12 11:24	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/10/12 11:24	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*115*		*66 - 137*		*05/10/12 11:24*	*1*
4-Bromofluorobenzene (Surr)	*99*		*73 - 120*		*05/10/12 11:24*	*1*
Toluene-d8 (Surr)	*121*		*71 - 126*		*05/10/12 11:24*	*1*

Lab Sample ID: LCS 480-63819/4
Matrix: Water
Analysis Batch: 63819

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	25.3		ug/L		101	74 - 124
Tetrachloroethene	25.0	27.2		ug/L		109	74 - 122
trans-1,2-Dichloroethene	25.0	26.7		ug/L		107	73 - 127
Trichloroethene	25.0	25.4		ug/L		102	74 - 123

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*109*		*66 - 137*
4-Bromofluorobenzene (Surr)	*97*		*73 - 120*
Toluene-d8 (Surr)	*118*		*71 - 126*

Lab Sample ID: MB 480-64011/5
Matrix: Water
Analysis Batch: 64011

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/11/12 10:36	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/11/12 10:36	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/11/12 10:36	1
Trichloroethene	ND		1.0	0.46	ug/L			05/11/12 10:36	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/11/12 10:36	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*106*		*66 - 137*		*05/11/12 10:36*	*1*
4-Bromofluorobenzene (Surr)	*96*		*73 - 120*		*05/11/12 10:36*	*1*
Toluene-d8 (Surr)	*115*		*71 - 126*		*05/11/12 10:36*	*1*

Lab Sample ID: LCS 480-64011/4
Matrix: Water
Analysis Batch: 64011

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	25.0		ug/L		100	74 - 124
Tetrachloroethene	25.0	27.1		ug/L		108	74 - 122

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 480-64011/4
Matrix: Water
Analysis Batch: 64011

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
trans-1,2-Dichloroethene			25.0	26.1		ug/L		104	73 - 127		
Trichloroethene			25.0	24.7		ug/L		99	74 - 123		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*104*		*66 - 137*
4-Bromofluorobenzene (Surr)	*95*		*73 - 120*
Toluene-d8 (Surr)	*114*		*71 - 126*

Lab Sample ID: 480-19497-1 MS
Matrix: Water
Analysis Batch: 64011

Client Sample ID: MW-10-2-050212-1200
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
cis-1,2-Dichloroethene	2100		1000	2940		ug/L		87	74 - 124		
Tetrachloroethene	330		1000	1340		ug/L		102	74 - 122		
trans-1,2-Dichloroethene	ND		1000	1080		ug/L		108	73 - 127		
Trichloroethene	810		1000	1700		ug/L		90	74 - 123		

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*104*		*66 - 137*
4-Bromofluorobenzene (Surr)	*95*		*73 - 120*
Toluene-d8 (Surr)	*112*		*71 - 126*

Lab Sample ID: 480-19497-1 MSD
Matrix: Water
Analysis Batch: 64011

Client Sample ID: MW-10-2-050212-1200
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
cis-1,2-Dichloroethene	2100		1000	2840		ug/L		76	74 - 124	4	15
Tetrachloroethene	330		1000	1310		ug/L		98	74 - 122	3	20
trans-1,2-Dichloroethene	ND		1000	1030		ug/L		103	73 - 127	5	20
Trichloroethene	810		1000	1630		ug/L		82	74 - 123	4	16

Surrogate	*MSD %Recovery*	*MSD Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*108*		*66 - 137*
4-Bromofluorobenzene (Surr)	*101*		*73 - 120*
Toluene-d8 (Surr)	*117*		*71 - 126*

Lab Sample ID: MB 480-64020/5
Matrix: Water
Analysis Batch: 64020

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
cis-1,2-Dichloroethene	ND		1.0	0.81	ug/L			05/11/12 11:17	1
Tetrachloroethene	ND		1.0	0.36	ug/L			05/11/12 11:17	1
trans-1,2-Dichloroethene	ND		1.0	0.90	ug/L			05/11/12 11:17	1
Trichloroethene	ND		1.0	0.46	ug/L			05/11/12 11:17	1
Vinyl chloride	ND		1.0	0.90	ug/L			05/11/12 11:17	1

Method: 8260B - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 480-64020/5
Matrix: Water
Analysis Batch: 64020

Client Sample ID: Method Blank
Prep Type: Total/NA

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	112		66 - 137		05/11/12 11:17	1
4-Bromofluorobenzene (Surr)	111		73 - 120		05/11/12 11:17	1
Toluene-d8 (Surr)	113		71 - 126		05/11/12 11:17	1

Lab Sample ID: LCS 480-64020/4
Matrix: Water
Analysis Batch: 64020

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
cis-1,2-Dichloroethene	25.0	26.8		ug/L		107	74 - 124
Tetrachloroethene	25.0	27.3		ug/L		109	74 - 122
trans-1,2-Dichloroethene	25.0	26.2		ug/L		105	73 - 127
Trichloroethene	25.0	26.6		ug/L		106	74 - 123

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	110		66 - 137
4-Bromofluorobenzene (Surr)	115		73 - 120
Toluene-d8 (Surr)	116		71 - 126

Method: RSK-175 - Dissolved Gases (GC)

Lab Sample ID: MB 200-38628/4
Matrix: Water
Analysis Batch: 38628

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon dioxide	ND		1000	1000	ug/L			05/14/12 11:34	1

Lab Sample ID: LCS 200-38628/3
Matrix: Water
Analysis Batch: 38628

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Carbon dioxide	5010	5330		ug/L		106	70 - 130

Lab Sample ID: MB 480-63265/2
Matrix: Water
Analysis Batch: 63265

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethane	ND		1.5	0.49	ug/L			05/07/12 07:56	1
Ethene	ND		1.5	0.52	ug/L			05/07/12 07:56	1
Methane	0.523	J	1.0	0.22	ug/L			05/07/12 07:56	1

Lab Sample ID: LCS 480-63265/3
Matrix: Water
Analysis Batch: 63265

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethane	7.19	8.44		ug/L		117	71 - 147

Method: RSK-175 - Dissolved Gases (GC) (Continued)

Lab Sample ID: LCS 480-63265/3
Matrix: Water
Analysis Batch: 63265

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethene	6.73	7.81		ug/L		116	71 - 147
Methane	3.88	4.65		ug/L		120	48 - 174

Lab Sample ID: LCSD 480-63265/4
Matrix: Water
Analysis Batch: 63265

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ethane	7.19	8.44		ug/L		117	71 - 147	0	50
Ethene	6.73	7.76		ug/L		115	71 - 147	1	50
Methane	3.88	4.73		ug/L		122	48 - 174	2	50

Method: 6010B - Metals (ICP)

Lab Sample ID: MB 480-62828/1-A
Matrix: Water
Analysis Batch: 63029

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 62828

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		05/03/12 10:15	05/03/12 19:39	1
Magnesium	ND		0.20	0.043	mg/L		05/03/12 10:15	05/03/12 19:39	1
Manganese	ND		0.0030	0.00040	mg/L		05/03/12 10:15	05/03/12 19:39	1
Potassium	ND		0.50	0.10	mg/L		05/03/12 10:15	05/03/12 19:39	1
Sodium	ND		1.0	0.32	mg/L		05/03/12 10:15	05/03/12 19:39	1

Lab Sample ID: LCS 480-62828/2-A
Matrix: Water
Analysis Batch: 63029

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 62828

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	10.0	9.75		mg/L		98	80 - 120
Magnesium	10.0	9.54		mg/L		95	80 - 120
Manganese	0.200	0.205		mg/L		103	80 - 120
Potassium	10.0	9.33		mg/L		93	80 - 120
Sodium	10.0	9.43		mg/L		94	80 - 120

Lab Sample ID: 480-19497-3 MS
Matrix: Water
Analysis Batch: 63029

Client Sample ID: BLDG-10-MW-1-050212-1620
Prep Type: Total/NA
Prep Batch: 62828

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	1.2		10.0	10.22		mg/L		91	75 - 125
Magnesium	80.8		10.0	88.75	4	mg/L		79	75 - 125
Manganese	0.32		0.200	0.504		mg/L		92	75 - 125
Potassium	4.7		10.0	14.06		mg/L		93	75 - 125
Sodium	76.8		10.0	85.49	4	mg/L		87	75 - 125

Method: 6010B - Metals (ICP) (Continued)

Lab Sample ID: 480-19497-3 MSD
Matrix: Water
Analysis Batch: 63029

Client Sample ID: BLDG-10-MW-1-050212-1620
Prep Type: Total/NA
Prep Batch: 62828

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Iron	1.2		10.0	10.24		mg/L		91	75 - 125	0	20
Magnesium	80.8		10.0	88.84	4	mg/L		80	75 - 125	0	20
Manganese	0.32		0.200	0.506		mg/L		92	75 - 125	0	20
Potassium	4.7		10.0	14.06		mg/L		93	75 - 125	0	20
Sodium	76.8		10.0	85.85	4	mg/L		90	75 - 125	0	20

Lab Sample ID: MB 480-63214/1-A
Matrix: Water
Analysis Batch: 63452

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 63214

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	ND		0.050	0.019	mg/L		05/07/12 07:20	05/07/12 16:59	1
Magnesium	ND		0.20	0.043	mg/L		05/07/12 07:20	05/07/12 16:59	1
Manganese	ND		0.0030	0.00040	mg/L		05/07/12 07:20	05/07/12 16:59	1
Potassium	ND		0.50	0.10	mg/L		05/07/12 07:20	05/07/12 16:59	1
Sodium	ND		1.0	0.32	mg/L		05/07/12 07:20	05/07/12 16:59	1

Lab Sample ID: LCS 480-63214/2-A
Matrix: Water
Analysis Batch: 63452

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 63214

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Iron	10.0	10.10		mg/L		101	80 - 120
Magnesium	10.0	10.01		mg/L		100	80 - 120
Manganese	0.200	0.205		mg/L		103	80 - 120
Potassium	10.0	9.77		mg/L		98	80 - 120
Sodium	10.0	9.72		mg/L		97	80 - 120

Method: 350.1 - Nitrogen, Ammonia

Lab Sample ID: MB 480-62905/51
Matrix: Water
Analysis Batch: 62905

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/03/12 13:08	1

Lab Sample ID: LCS 480-62905/52
Matrix: Water
Analysis Batch: 62905

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	1.00		mg/L		100	90 - 110

Lab Sample ID: MB 480-63137/123
Matrix: Water
Analysis Batch: 63137

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	ND		0.020	0.0090	mg/L			05/04/12 13:49	1

Method: 350.1 - Nitrogen, Ammonia (Continued)

Lab Sample ID: LCS 480-63137/124
Matrix: Water
Analysis Batch: 63137

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia	1.00	1.00		mg/L		100	90 - 110

Method: 353.2 - Nitrogen, Nitrite

Lab Sample ID: MB 480-62778/3
Matrix: Water
Analysis Batch: 62778

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrite	ND		0.050	0.020	mg/L			05/02/12 22:12	1

Lab Sample ID: LCS 480-62778/4
Matrix: Water
Analysis Batch: 62778

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrite	1.50	1.42		mg/L		95	90 - 110

Lab Sample ID: MB 480-63180/3
Matrix: Water
Analysis Batch: 63180

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrite	ND		0.050	0.020	mg/L			05/04/12 21:07	1

Lab Sample ID: LCS 480-63180/4
Matrix: Water
Analysis Batch: 63180

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Nitrite	1.50	1.56		mg/L		104	90 - 110

Method: 9038 - Sulfate, Turbidimetric

Lab Sample ID: MB 480-63757/7
Matrix: Water
Analysis Batch: 63757

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.54	J	5.0	1.5	mg/L			05/09/12 17:58	1

Lab Sample ID: LCS 480-63757/6
Matrix: Water
Analysis Batch: 63757

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	30.62		mg/L		102	90 - 110

Method: 9038 - Sulfate, Turbidimetric (Continued)

Lab Sample ID: MB 480-64026/54
Matrix: Water
Analysis Batch: 64026

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	1.96	J	5.0	1.5	mg/L			05/10/12 15:33	1

Lab Sample ID: LCS 480-64026/53
Matrix: Water
Analysis Batch: 64026

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfate	30.0	32.09		mg/L		107	90 - 110

Method: 9060 - Organic Carbon, Total (TOC)

Lab Sample ID: MB 480-63278/19
Matrix: Water
Analysis Batch: 63278

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Organic Carbon	ND		1.0	0.43	mg/L			05/06/12 16:33	1

Lab Sample ID: MB 480-63278/3
Matrix: Water
Analysis Batch: 63278

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Organic Carbon	ND		1.0	0.43	mg/L			05/06/12 06:12	1

Lab Sample ID: LCS 480-63278/20
Matrix: Water
Analysis Batch: 63278

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	60.0	59.60		mg/L		99	90 - 110

Lab Sample ID: LCS 480-63278/4
Matrix: Water
Analysis Batch: 63278

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	60.0	59.91		mg/L		100	90 - 110

Lab Sample ID: MB 480-63638/3
Matrix: Water
Analysis Batch: 63638

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Organic Carbon	ND		1.0	0.43	mg/L			05/07/12 19:14	1

Method: 9060 - Organic Carbon, Total (TOC) (Continued)

Lab Sample ID: LCS 480-63638/4
Matrix: Water
Analysis Batch: 63638

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Organic Carbon	60.0	57.35		mg/L		96	90 - 110

Method: SM 2320B - Alkalinity

Lab Sample ID: MB 480-63392/3
Matrix: Water
Analysis Batch: 63392

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Alkalinity	ND		5.0	0.79	mg/L			05/07/12 14:40	1

Lab Sample ID: LCS 480-63392/4
Matrix: Water
Analysis Batch: 63392

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Alkalinity	1000	952.0		mg/L		95	90 - 110

Method: SM 4500 Cl- E - Chloride, Total

Lab Sample ID: MB 480-63758/7
Matrix: Water
Analysis Batch: 63758

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	0.504	J	1.0	0.46	mg/L			05/09/12 17:52	1

Lab Sample ID: LCS 480-63758/6
Matrix: Water
Analysis Batch: 63758

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	26.88		mg/L		108	90 - 110

Lab Sample ID: MB 480-64027/135
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/10/12 19:30	1

Lab Sample ID: MB 480-64027/141
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/10/12 20:00	1

Method: SM 4500 Cl- E - Chloride, Total (Continued)

Lab Sample ID: MB 480-64027/30
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	0.722	J	1.0	0.46	mg/L			05/10/12 14:29	1

Lab Sample ID: MB 480-64027/55
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	ND		1.0	0.46	mg/L			05/10/12 15:55	1

Lab Sample ID: LCS 480-64027/140
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	26.47		mg/L		106	90 - 110

Lab Sample ID: LCS 480-64027/54
Matrix: Water
Analysis Batch: 64027

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	25.0	26.16		mg/L		105	90 - 110

Method: SM 4500 S2 D - Sulfide, Total

Lab Sample ID: MB 480-62917/3
Matrix: Water
Analysis Batch: 62917

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfide	ND		0.10	0.052	mg/L			05/03/12 12:10	1

Lab Sample ID: LCS 480-62917/4
Matrix: Water
Analysis Batch: 62917

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfide	0.750	0.703		mg/L		94	90 - 110

Lab Sample ID: MB 480-63515/3
Matrix: Water
Analysis Batch: 63515

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfide	ND		0.10	0.052	mg/L			05/08/12 08:45	1

Method: SM 4500 S2 D - Sulfide, Total (Continued)

Lab Sample ID: LCS 480-63515/4
Matrix: Water
Analysis Batch: 63515

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Sulfide	0.750	0.726		mg/L		97	90 - 110

Method: VFA-IC - Volatile Fatty Acids, Ion Chromatography

Lab Sample ID: MB 480-64493/4
Matrix: Water
Analysis Batch: 64493

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acetic acid	ND		1.0	0.15	mg/L			05/15/12 18:18	1
Formic-acid	ND		1.0	0.11	mg/L			05/15/12 18:18	1
Lactic acid	ND		1.0	0.14	mg/L			05/15/12 18:18	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/15/12 18:18	1
Propionic acid	ND		1.0	0.17	mg/L			05/15/12 18:18	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/15/12 18:18	1

Lab Sample ID: LCS 480-64493/3
Matrix: Water
Analysis Batch: 64493

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	10.0	10.20		mg/L		102	80 - 120
Formic-acid	10.0	9.78		mg/L		98	80 - 120
Lactic acid	10.0	9.81		mg/L		98	80 - 120
n-Butyric Acid	10.0	10.00		mg/L		100	80 - 120
Propionic acid	10.0	10.40		mg/L		104	80 - 120
Pyruvic Acid	10.0	10.50		mg/L		105	80 - 120

Lab Sample ID: MB 480-64494/28
Matrix: Water
Analysis Batch: 64494

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Acetic acid	ND		1.0	0.15	mg/L			05/16/12 05:58	1
Formic-acid	ND		1.0	0.11	mg/L			05/16/12 05:58	1
Lactic acid	ND		1.0	0.14	mg/L			05/16/12 05:58	1
n-Butyric Acid	ND		1.0	0.16	mg/L			05/16/12 05:58	1
Propionic acid	ND		1.0	0.17	mg/L			05/16/12 05:58	1
Pyruvic Acid	ND		1.0	0.080	mg/L			05/16/12 05:58	1

Lab Sample ID: LCS 480-64494/27
Matrix: Water
Analysis Batch: 64494

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acetic acid	10.0	10.20		mg/L		102	80 - 120
Formic-acid	10.0	9.90		mg/L		99	80 - 120
Lactic acid	10.0	9.72		mg/L		97	80 - 120
n-Butyric Acid	10.0	9.60		mg/L		96	80 - 120
Propionic acid	10.0	10.20		mg/L		102	80 - 120

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19497-1

Method: VFA-IC - Volatile Fatty Acids, Ion Chromatography (Continued)

Lab Sample ID: LCS 480-64494/27
Matrix: Water
Analysis Batch: 64494

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Pyruvic Acid	10.0	10.20		mg/L		102	80 - 120

GC/MS VOA

Analysis Batch: 63819

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	8260B	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	8260B	
480-19497-4	TRIP BLANK	Total/NA	Water	8260B	
LCS 480-63819/4	Lab Control Sample	Total/NA	Water	8260B	
MB 480-63819/5	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 64011

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1 - DL	MW-10-2-050212-1200	Total/NA	Water	8260B	
480-19497-1 MS	MW-10-2-050212-1200	Total/NA	Water	8260B	
480-19497-1 MSD	MW-10-2-050212-1200	Total/NA	Water	8260B	
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	8260B	
LCS 480-64011/4	Lab Control Sample	Total/NA	Water	8260B	
MB 480-64011/5	Method Blank	Total/NA	Water	8260B	

Analysis Batch: 64020

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	8260B	
LCS 480-64020/4	Lab Control Sample	Total/NA	Water	8260B	
MB 480-64020/5	Method Blank	Total/NA	Water	8260B	

GC VOA

Analysis Batch: 38628

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	RSK-175	
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	RSK-175	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	RSK-175	
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	RSK-175	
LCS 200-38628/3	Lab Control Sample	Total/NA	Water	RSK-175	
MB 200-38628/4	Method Blank	Total/NA	Water	RSK-175	

Analysis Batch: 63265

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	RSK-175	
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	RSK-175	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	RSK-175	
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	RSK-175	
LCS 480-63265/3	Lab Control Sample	Total/NA	Water	RSK-175	
LCSD 480-63265/4	Lab Control Sample Dup	Total/NA	Water	RSK-175	
MB 480-63265/2	Method Blank	Total/NA	Water	RSK-175	

Metals

Prep Batch: 62828

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	3005A	
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	3005A	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	3005A	
480-19497-3 MS	BLDG-10-MW-1-050212-1620	Total/NA	Water	3005A	
480-19497-3 MSD	BLDG-10-MW-1-050212-1620	Total/NA	Water	3005A	
LCS 480-62828/2-A	Lab Control Sample	Total/NA	Water	3005A	

Metals (Continued)

Prep Batch: 62828 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 480-62828/1-A	Method Blank	Total/NA	Water	3005A	

Analysis Batch: 63029

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	6010B	62828
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	6010B	62828
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	6010B	62828
480-19497-3 MS	BLDG-10-MW-1-050212-1620	Total/NA	Water	6010B	62828
480-19497-3 MSD	BLDG-10-MW-1-050212-1620	Total/NA	Water	6010B	62828
LCS 480-62828/2-A	Lab Control Sample	Total/NA	Water	6010B	62828
MB 480-62828/1-A	Method Blank	Total/NA	Water	6010B	62828

Prep Batch: 63214

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	3005A	
LCS 480-63214/2-A	Lab Control Sample	Total/NA	Water	3005A	
MB 480-63214/1-A	Method Blank	Total/NA	Water	3005A	

Analysis Batch: 63452

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	6010B	63214
LCS 480-63214/2-A	Lab Control Sample	Total/NA	Water	6010B	63214
MB 480-63214/1-A	Method Blank	Total/NA	Water	6010B	63214

General Chemistry

Analysis Batch: 62778

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	353.2	
LCS 480-62778/4	Lab Control Sample	Total/NA	Water	353.2	
MB 480-62778/3	Method Blank	Total/NA	Water	353.2	

Analysis Batch: 62782

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	353.2	
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	353.2	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	353.2	

Analysis Batch: 62783

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	353.2	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	353.2	

Analysis Batch: 62905

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	350.1	
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	350.1	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	350.1	
LCS 480-62905/52	Lab Control Sample	Total/NA	Water	350.1	
MB 480-62905/51	Method Blank	Total/NA	Water	350.1	

General Chemistry (Continued)

Analysis Batch: 62917

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	SM 4500 S2 D	
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	SM 4500 S2 D	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	SM 4500 S2 D	
LCS 480-62917/4	Lab Control Sample	Total/NA	Water	SM 4500 S2 D	
MB 480-62917/3	Method Blank	Total/NA	Water	SM 4500 S2 D	

Analysis Batch: 63137

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	350.1	
LCS 480-63137/124	Lab Control Sample	Total/NA	Water	350.1	
MB 480-63137/123	Method Blank	Total/NA	Water	350.1	

Analysis Batch: 63180

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	353.2	
LCS 480-63180/4	Lab Control Sample	Total/NA	Water	353.2	
MB 480-63180/3	Method Blank	Total/NA	Water	353.2	

Analysis Batch: 63184

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	353.2	

Analysis Batch: 63278

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	9060	
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	9060	
LCS 480-63278/20	Lab Control Sample	Total/NA	Water	9060	
LCS 480-63278/4	Lab Control Sample	Total/NA	Water	9060	
MB 480-63278/19	Method Blank	Total/NA	Water	9060	
MB 480-63278/3	Method Blank	Total/NA	Water	9060	

Analysis Batch: 63392

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	SM 2320B	
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	SM 2320B	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	SM 2320B	
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	SM 2320B	
LCS 480-63392/4	Lab Control Sample	Total/NA	Water	SM 2320B	
MB 480-63392/3	Method Blank	Total/NA	Water	SM 2320B	

Analysis Batch: 63515

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	SM 4500 S2 D	
LCS 480-63515/4	Lab Control Sample	Total/NA	Water	SM 4500 S2 D	
MB 480-63515/3	Method Blank	Total/NA	Water	SM 4500 S2 D	

Analysis Batch: 63638

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	9060	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	9060	
LCS 480-63638/4	Lab Control Sample	Total/NA	Water	9060	
MB 480-63638/3	Method Blank	Total/NA	Water	9060	

General Chemistry (Continued)

Analysis Batch: 63757

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	9038	
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	9038	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	9038	
LCS 480-63757/6	Lab Control Sample	Total/NA	Water	9038	
MB 480-63757/7	Method Blank	Total/NA	Water	9038	

Analysis Batch: 63758

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	SM 4500 Cl- E	
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	SM 4500 Cl- E	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	SM 4500 Cl- E	
LCS 480-63758/6	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
MB 480-63758/7	Method Blank	Total/NA	Water	SM 4500 Cl- E	

Analysis Batch: 64026

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	9038	
LCS 480-64026/53	Lab Control Sample	Total/NA	Water	9038	
MB 480-64026/54	Method Blank	Total/NA	Water	9038	

Analysis Batch: 64027

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	SM 4500 Cl- E	
LCS 480-64027/140	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
LCS 480-64027/54	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/135	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/141	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/30	Method Blank	Total/NA	Water	SM 4500 Cl- E	
MB 480-64027/55	Method Blank	Total/NA	Water	SM 4500 Cl- E	

Analysis Batch: 64493

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19497-1	MW-10-2-050212-1200	Total/NA	Water	VFA-IC	
480-19497-2	MW-10-3-050212-1400	Total/NA	Water	VFA-IC	
480-19497-3	BLDG-10-MW-1-050212-1620	Total/NA	Water	VFA-IC	
LCS 480-64493/3	Lab Control Sample	Total/NA	Water	VFA-IC	
MB 480-64493/4	Method Blank	Total/NA	Water	VFA-IC	

Analysis Batch: 64494

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-19600-1	MW-9-101-A-050312-1215	Total/NA	Water	VFA-IC	
LCS 480-64494/27	Lab Control Sample	Total/NA	Water	VFA-IC	
MB 480-64494/28	Method Blank	Total/NA	Water	VFA-IC	

Lab Chronicle

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19497-1

Client Sample ID: MW-10-2-050212-1200

Lab Sample ID: 480-19497-1

Date Collected: 05/02/12 12:00

Matrix: Water

Date Received: 05/02/12 18:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		2	63819	05/10/12 14:46	DC	TAL BUF
Total/NA	Analysis	8260B	DL	40	64011	05/11/12 11:34	DC	TAL BUF
Total/NA	Analysis	RSK-175		1	38628	05/14/12 14:04	MRV	TAL BUR
Total/NA	Analysis	RSK-175		10	63265	05/07/12 10:28	MN	TAL BUF
Total/NA	Prep	3005A			62828	05/03/12 10:15	SS	TAL BUF
Total/NA	Analysis	6010B		1	63029	05/03/12 20:15	AH	TAL BUF
Total/NA	Analysis	353.2		1	62782	05/02/12 20:42	KS	TAL BUF
Total/NA	Analysis	353.2		1	62783	05/02/12 20:42	KS	TAL BUF
Total/NA	Analysis	350.1		1	62905	05/03/12 13:26	KS	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62917	05/03/12 12:10	EGN	TAL BUF
Total/NA	Analysis	9060		1	63278	05/06/12 21:02	KAC	TAL BUF
Total/NA	Analysis	SM 2320B		1	63392	05/07/12 14:40	LYW	TAL BUF
Total/NA	Analysis	9038		10	63757	05/09/12 18:26	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		50	63758	05/09/12 19:49	PJQ	TAL BUF
Total/NA	Analysis	VFA-IC		1	64493	05/15/12 20:15	KAC	TAL BUF

Client Sample ID: MW-10-3-050212-1400

Lab Sample ID: 480-19497-2

Date Collected: 05/02/12 14:00

Matrix: Water

Date Received: 05/02/12 18:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	64011	05/11/12 11:57	DC	TAL BUF
Total/NA	Analysis	RSK-175		1	38628	05/14/12 14:15	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	63265	05/07/12 11:59	MN	TAL BUF
Total/NA	Prep	3005A			62828	05/03/12 10:15	SS	TAL BUF
Total/NA	Analysis	6010B		1	63029	05/03/12 20:18	AH	TAL BUF
Total/NA	Analysis	353.2		1	62778	05/02/12 22:31	KS	TAL BUF
Total/NA	Analysis	353.2		1	62782	05/02/12 22:31	KS	TAL BUF
Total/NA	Analysis	350.1		1	62905	05/03/12 13:27	KS	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62917	05/03/12 12:10	EGN	TAL BUF
Total/NA	Analysis	SM 2320B		1	63392	05/07/12 14:40	LYW	TAL BUF
Total/NA	Analysis	9060		1	63638	05/07/12 20:43	KAC	TAL BUF
Total/NA	Analysis	9038		5	63757	05/09/12 19:37	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		4	63758	05/09/12 19:38	PJQ	TAL BUF
Total/NA	Analysis	VFA-IC		1	64493	05/15/12 20:44	KAC	TAL BUF

Client Sample ID: BLDG-10-MW-1-050212-1620

Lab Sample ID: 480-19497-3

Date Collected: 05/02/12 16:20

Matrix: Water

Date Received: 05/02/12 18:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		2000	63819	05/10/12 15:32	DC	TAL BUF

Lab Chronicle

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19497-1

Client Sample ID: BLDG-10-MW-1-050212-1620

Lab Sample ID: 480-19497-3

Date Collected: 05/02/12 16:20
Matrix: Water
Date Received: 05/02/12 18:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	RSK-175		1	38628	05/14/12 14:33	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	63265	05/07/12 12:16	MN	TAL BUF
Total/NA	Prep	3005A			62828	05/03/12 10:15	SS	TAL BUF
Total/NA	Analysis	6010B		1	63029	05/03/12 20:20	AH	TAL BUF
Total/NA	Analysis	353.2		1	62782	05/02/12 20:44	KS	TAL BUF
Total/NA	Analysis	353.2		1	62783	05/02/12 20:44	KS	TAL BUF
Total/NA	Analysis	350.1		1	62905	05/03/12 13:28	KS	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	62917	05/03/12 12:10	EGN	TAL BUF
Total/NA	Analysis	SM 2320B		1	63392	05/07/12 14:40	LYW	TAL BUF
Total/NA	Analysis	9060		1	63638	05/07/12 21:13	KAC	TAL BUF
Total/NA	Analysis	9038		10	63757	05/09/12 19:37	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		5	63758	05/09/12 18:15	PJQ	TAL BUF
Total/NA	Analysis	VFA-IC		1	64493	05/15/12 21:13	KAC	TAL BUF

Client Sample ID: TRIP BLANK

Lab Sample ID: 480-19497-4

Date Collected: 05/02/12 00:00
Matrix: Water
Date Received: 05/02/12 18:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		1	63819	05/10/12 15:55	DC	TAL BUF

Client Sample ID: MW-9-101-A-050312-1215

Lab Sample ID: 480-19600-1

Date Collected: 05/03/12 12:15
Matrix: Water
Date Received: 05/03/12 19:45

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260B		4	64020	05/11/12 12:37	DC	TAL BUF
Total/NA	Analysis	RSK-175		1	38628	05/14/12 12:54	MRV	TAL BUR
Total/NA	Analysis	RSK-175		1	63265	05/07/12 15:06	MN	TAL BUF
Total/NA	Prep	3005A			63214	05/07/12 07:20	SS	TAL BUF
Total/NA	Analysis	6010B		1	63452	05/07/12 17:54	MM	TAL BUF
Total/NA	Analysis	350.1		1	63137	05/04/12 13:51	KS	TAL BUF
Total/NA	Analysis	353.2		1	63180	05/04/12 21:14	KS	TAL BUF
Total/NA	Analysis	353.2		1	63184	05/04/12 21:14	KS	TAL BUF
Total/NA	Analysis	9060		1	63278	05/06/12 12:32	KAC	TAL BUF
Total/NA	Analysis	SM 2320B		1	63392	05/07/12 14:40	LYW	TAL BUF
Total/NA	Analysis	SM 4500 S2 D		1	63515	05/08/12 08:45	EGN	TAL BUF
Total/NA	Analysis	9038		50	64026	05/10/12 16:43	PJQ	TAL BUF
Total/NA	Analysis	SM 4500 Cl- E		30	64027	05/10/12 16:23	PJQ	TAL BUF
Total/NA	Analysis	VFA-IC		1	64494	05/16/12 11:18	KAC	TAL BUF

Lab Chronicle

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19497-1

Laboratory References:

TAL BUF = TestAmerica Buffalo, 10 Hazelwood Drive, Amherst, NY 14228-2298, TEL (716)691-2600

TAL BUR = TestAmerica Burlington, 30 Community Drive, Suite 11, South Burlington, VT 05403, TEL (802)660-1990

Certification Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19497-1

Laboratory	Authority	Program	EPA Region	Certification ID
TestAmerica Buffalo	Arkansas DEQ	State Program	6	88-0686
TestAmerica Buffalo	California	NELAC	9	1169CA
TestAmerica Buffalo	Connecticut	State Program	1	PH-0568
TestAmerica Buffalo	Florida	NELAC	4	E87672
TestAmerica Buffalo	Georgia	State Program	4	956
TestAmerica Buffalo	Georgia	State Program	4	N/A
TestAmerica Buffalo	Illinois	NELAC	5	100325 / 200003
TestAmerica Buffalo	Iowa	State Program	7	374
TestAmerica Buffalo	Kansas	NELAC	7	E-10187
TestAmerica Buffalo	Kentucky	State Program	4	90029
TestAmerica Buffalo	Kentucky (UST)	State Program	4	30
TestAmerica Buffalo	Louisiana	NELAC	6	02031
TestAmerica Buffalo	Maine	State Program	1	NY0044
TestAmerica Buffalo	Maryland	State Program	3	294
TestAmerica Buffalo	Massachusetts	State Program	1	M-NY044
TestAmerica Buffalo	Michigan	State Program	5	9937
TestAmerica Buffalo	Minnesota	NELAC	5	036-999-337
TestAmerica Buffalo	New Hampshire	NELAC	1	2337
TestAmerica Buffalo	New Hampshire	NELAC	1	68-00281
TestAmerica Buffalo	New Jersey	NELAC	2	NY455
TestAmerica Buffalo	New York	NELAC	2	10026
TestAmerica Buffalo	North Dakota	State Program	8	R-176
TestAmerica Buffalo	Oklahoma	State Program	6	9421
TestAmerica Buffalo	Oregon	NELAC	10	NY200003
TestAmerica Buffalo	Pennsylvania	NELAC	3	68-00281
TestAmerica Buffalo	Tennessee	State Program	4	TN02970
TestAmerica Buffalo	Texas	NELAC	6	T104704412-08-TX
TestAmerica Buffalo	USDA	Federal		P330-08-00242
TestAmerica Buffalo	Virginia	NELAC	3	460185
TestAmerica Buffalo	Virginia	State Program	3	278
TestAmerica Buffalo	Washington	State Program	10	C1677
TestAmerica Buffalo	West Virginia DEP	State Program	3	252
TestAmerica Buffalo	Wisconsin	State Program	5	998310390
TestAmerica Burlington	ACLASS	DoD ELAP		ADE-1492
TestAmerica Burlington	Connecticut	State Program	1	PH-0751
TestAmerica Burlington	DE Haz. Subst. Cleanup Act (HSCA)	State Program	3	NA
TestAmerica Burlington	Florida	NELAC	4	E87467
TestAmerica Burlington	Louisiana	NELAC	6	176292
TestAmerica Burlington	Maine	State Program	1	VT00008
TestAmerica Burlington	Minnesota	NELAC	5	050-999-436
TestAmerica Burlington	New Hampshire	NELAC	1	200610
TestAmerica Burlington	New Jersey	NELAC	2	VT972
TestAmerica Burlington	New York	NELAC	2	10391
TestAmerica Burlington	Pennsylvania	NELAC	3	68-00489
TestAmerica Burlington	Rhode Island	State Program	1	LAO00298
TestAmerica Burlington	USDA	Federal		P330-11-00093
TestAmerica Burlington	Vermont	State Program	1	VT-4000
TestAmerica Burlington	Virginia	NELAC	3	460209

Accreditation may not be offered or required for all methods and analytes reported in this package. Please contact your project manager for the laboratory's current list of certified methods and analytes.

Method Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19497-1

Method	Method Description	Protocol	Laboratory
8260B	Volatile Organic Compounds (GC/MS)	SW846	TAL BUF
RSK-175	Dissolved Gases (GC)	RSK	TAL BUR
RSK-175	Dissolved Gases (GC)	RSK	TAL BUF
6010B	Metals (ICP)	SW846	TAL BUF
350.1	Nitrogen, Ammonia	MCAWW	TAL BUF
353.2	Nitrate	EPA	TAL BUF
353.2	Nitrogen, Nitrite	MCAWW	TAL BUF
9038	Sulfate, Turbidimetric	SW846	TAL BUF
9060	Organic Carbon, Total (TOC)	SW846	TAL BUF
SM 2320B	Alkalinity	SM	TAL BUF
SM 4500 Cl- E	Chloride, Total	SM	TAL BUF
SM 4500 S2 D	Sulfide, Total	SM	TAL BUF
VFA-IC	Volatile Fatty Acids, Ion Chromatography	TestAmerica SOP	TAL BUF

Protocol References:

EPA = US Environmental Protection Agency

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions.

RSK = Sample Prep And Calculations For Dissolved Gas Analysis In Water Samples Using A GC Headspace Equilibration Technique, RSKSOP-175, Rev. 0, 8/11/94, USEPA Research Lab

SM = "Standard Methods For The Examination Of Water And Wastewater",

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

TestAmerica SOP = TestAmerica, Inc., Standard Operating Procedure

Laboratory References:

TAL BUF = TestAmerica Buffalo, 10 Hazelwood Drive, Amherst, NY 14228-2298, TEL (716)691-2600

TAL BUR = TestAmerica Burlington, 30 Community Drive, Suite 11, South Burlington, VT 05403, TEL (802)660-1990

Sample Summary

Client: Conestoga-Rovers & Associates, Inc.
Project/Site: 058507, GM-Lockport Groundwater Sampling

TestAmerica Job ID: 480-19497-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
480-19497-1	MW-10-2-050212-1200	Water	05/02/12 12:00	05/02/12 18:00
480-19497-2	MW-10-3-050212-1400	Water	05/02/12 14:00	05/02/12 18:00
480-19497-3	BLDG-10-MW-1-050212-1620	Water	05/02/12 16:20	05/02/12 18:00
480-19497-4	TRIP BLANK	Water	05/02/12 00:00	05/02/12 18:00
480-19600-1	MW-9-101-A-050312-1215	Water	05/03/12 12:15	05/03/12 19:45

10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

5/22/2012

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716 685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 4 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 10 BCP Site 9-32-140	SSOW#:			

Analysis Requested

Preservation Codes:

A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2SO3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - ph 4-5, Z - other (specify)

Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N						
MW-10-2-050212-1200	5/2/12	1200	G	Water			X	X	X	X	X	X	X	X	X	X					20	
MW-10-3-050212-1400	↓	1400	↓	↓			↓	↓	↓	↓	↓	↓	↓	↓	↓	↓					↓	
BLDG-10-MW-1-050212-1620	↓	1620	↓	↓			↓	↓	↓	↓	↓	↓	↓	↓	↓	↓					↓	
Trip Blank																						

Possible Hazard Identification

☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)

☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Thomas Bohlen	5/2/12 / 1800	GZA	Zachary J Robison	5/2/12 1800	BUF
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No | Custody Seal No.: | Cooler Temperature(s) °C and Other Remarks:

TestAmerica Buffalo
10 Hazelwood Drive
Amherst, NY 14228-2298
Phone (716) 691-2600 Fax (716) 691-7991

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Information	Sampler: T. Bohlen	Lab PM: Deyo, Melissa L	Carrier Tracking No(s):	COC No: 480-23685-5992.4
Client Contact: Mr. Christopher Boron	Phone: 716-685-2300	E-Mail: melissa.deyo@testamericainc.com		Page: Page 4 of 4
Company: GZA GeoEnvironmental, Inc.				Job #:
Address: 535 Washington Street 11th Floor	Due Date Requested:			
City: Buffalo	TAT Requested (days):			
State, Zip: NY, 14203				
Phone:	PO #: 4047065			
Email: christopher.boron@gza.com	WO #: 58507			
Project Name: 058507, GM-Lockport Groundwater Sampling	Project #: 48004014			
Site: Bldg 10 BCP Site 9-32-140	SSOW#:			

Analysis Requested

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	RSK_175_CO2 - Carbon dioxide	VFA_IC - Standard VFA Compounds	350.1 - Ammonia	6010B - (MOD) TAL Metals ICP	8260B - (MOD) TCL list OLM04.2	9060 - Total Organic Carbon	RSK_175 - (MOD) Local Method	SM4500_S2_D - Sulfide	353.2, 353.2_Nitrite, 9038, Nitrate_Calc, SM4500_Cl_E	2320B - Total Alkalinity				Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	N	S	D	A	A	A	CB	N	N						
MW-9-101-A-050312-1215	5/3/12	1215	G	Water			Y	X	X	X	X	X	X	X	X	X					20	
Trip Blank																						

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Thomas Bohlen	5/3/12 /				
Relinquished by: Jeeen Nelson	Date/Time: 5/3/12 19:45	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks:

Preservation Codes:

A - HCL	M - Hexane
B - NaOH	N - None
C - Zn Acetate	O - AsNaO2
D - Nitric Acid	P - Na2O4S
E - NaHSO4	Q - Na2SO3
F - MeOH	R - Na2S2SO3
G - Amchlor	S - H2SO4
H - Ascorbic Acid	T - TSP Dodecahydrate
I - Ice	U - Acetone
J - DI Water	V - MCAA
K - EDTA	W - ph 4-5
L - EDA	Z - other (specify)

Other:

5/22/2012

Login Sample Receipt Checklist

Client: Conestoga-Rovers & Associates, Inc.

Job Number: 480-19497-1

Login Number: 19497
List Number: 1
Creator: Janish, Carl

List Source: TestAmerica Buffalo

Question	Answer	Comment
Radioactivity either was not measured or, if measured, is at or below background	True	
The cooler's custody seal, if present, is intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the sample IDs on the containers and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
VOA sample vials do not have headspace or bubble is <6mm (1/4") in diameter.	True	
If necessary, staff have been informed of any short hold time or quick TAT needs	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Sampling Company provided.	True	GZA
Samples received within 48 hours of sampling.	True	
Samples requiring field filtration have been filtered in the field.	True	
Chlorine Residual checked.	N/A	

Login Sample Receipt Checklist

Client: Conestoga-Rovers & Associates, Inc.

Job Number: 480-19497-1

Login Number: 19497
List Number: 1
Creator: Marion, Greg T

List Source: TestAmerica Burlington
List Creation: 05/04/12 03:30 PM

Question	Answer	Comment
Radioactivity either was not measured or, if measured, is at or below background	N/A	Lab does not accept radioactive samples.
The cooler's custody seal, if present, is intact.	True	487024,025
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	1.0ºC IR GUN ID 154/CF=-0.2
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	N/A	Received project as a subcontract.
There are no discrepancies between the sample IDs on the containers and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
VOA sample vials do not have headspace or bubble is <6mm (1/4") in diameter.	True	
Multiphasic samples are not present.	N/A	
Samples do not require splitting or compositing.	N/A	
Residual Chlorine Checked.	N/A	

APPENDIX D

DATA QUALITY ASSESSMENT & VERIFICATION REPORT

CONESTOGA-ROVERS & ASSOCIATES

9033 Meridian Way, West Chester, Ohio 45069
Telephone: (513) 942-4750 Fax: (513) 942-8585
www.CRAworld.com

MEMORANDUM

TO: Denis Conley

FROM: Kathleen Willy/amm/51

REF. NO.: 58507-256011

DATE: July 16, 2012

Revised: July 17, 2012

CC: Claire Mondello, Chris Boron

E-Mail and Hard Copy If Requested

RE: Data Quality Assessment and Verification
Groundwater Monitoring
GM Components Holdings (GMCH) Facility
Lockport, New York
April-May 2012

The following details a quality assessment and validation of the analytical data resulting from the April-May 2012 collection of 81 groundwater samples including two (2) field duplicates and six (6) trip blanks from the GMCH Site in Lockport, New York. The sample summary detailing sample identification, sample location, quality control samples, and analytical parameters is presented in Table 1. Sample analysis was completed at TestAmerica Laboratories, Inc. (TestAmerica) in Amherst, New York in accordance with the methodologies presented in Table 2. Table 3 presents the validated analytical data.

The quality control criteria used to assess the data were established by the methods. Application of quality assurance criteria was consistent with following guidance documents:

i) "USEPA Contract Laboratory Program National Functional Guidelines for Organic Data Review", EPA-540/R-99/008, October 1999.

ii) "USEPA Contract Laboratory Program National Functional Guidelines for Inorganic Data Review", USEPA 540/R-094-013, February 1994.

These guidelines are collectively referred to as "NFGs" in this Memorandum.

SAMPLE QUANTITATION

The laboratory reported detected concentrations of volatile organic compounds (VOC) below the laboratory's practical quantitation limit (PQL) but above the laboratory's method detection limit (MDL). The laboratory flagged these sample concentrations with a "J". These concentrations should be considered as estimated (J) values unless qualified otherwise in this memorandum

EQUAL EMPLOYMENT OPPORTUNITY EMPLOYER

REGISTERED COMPANY
ISO 9001
ENGINEERING DESIGN

SAMPLE PRESERVATION AND HOLDING TIMES

Sample holding time periods and preservation requirements are summarized in the analytical methods. All sample extractions and/or analyses were performed within the specified holding times.

All samples were properly received and stored after collection.

METHOD BLANK SAMPLES

Method blank samples are prepared from a purified sample matrix and are processed concurrently with investigative samples to assess the presence and the magnitude of sample contamination introduced during sample analysis. Method blank samples are analyzed at a minimum frequency of one per analytical batch and target analytes should be non-detect.

The method blank samples were reported to be free from detectable levels of target analytes with the exception of low levels of methane, ethane, and ethene. Associated sample results with concentrations similar to that found in the method blank were qualified as non-detect (see Table 4). Sample results that were either non-detect or significantly greater than the concentration found in the method blank were not impacted, and no qualification of the data was necessary.

SURROGATE COMPOUNDS – ORGANIC ANALYSES

Individual sample performance for organic analyses was monitored by assessing the results of surrogate compound percent recoveries. Surrogate percent recoveries are reviewed against the laboratory developed control limits provided in the analytical report.

The surrogate recovery acceptance criteria were met for all samples indicating acceptable laboratory performance.

MATRIX SPIKE/MATRIX SPIKE DUPLICATE ANALYSES – ORGANIC ANALYSES

To assess the long term accuracy and precision of the analytical methods on various matrices, matrix spike/matrix spike duplicate (MS/MSD) percent recoveries and the relative percent difference (RPD) of the concentrations were determined. The organic MS/MSD percent recovery and RPD control limits are established by the laboratory.

Site specific MS/MSD analyses were performed as specified in Table 1 and all recoveries were within laboratory specified control limits with the exception of propionic acid and pyruvic acid. A summary of qualified results can be found in Table 5.

MATRIX SPIKE/MATRIX DUPLICATE ANALYSES – GENERAL CHEMISTRY

To evaluate the effects of sample matrices on the measurement procedures and accuracy of a particular analysis, samples are spiked with a known concentration of the analyte of concern and analyzed as MS samples. The established control limits for inorganic matrix spike recoveries are 75 to 125 percent. Spike recoveries are not assessed for samples having original concentrations significantly greater than the spike concentration (>four times).

Analytical precision is evaluated based on the analysis of duplicate samples. Laboratory duplicate results are assessed against a maximum RPD of 20 percent.

MS and duplicate analyses were performed at the required frequency for all general chemistry parameters. The results showed acceptable accuracy and precision on this sample matrix with the exception of sulfide and sulfate. A summary of qualified results can be found in Table 6.

LABORATORY CONTROL SAMPLE/LABORATORY CONTROL DUPLICATE ANALYSIS

The laboratory control sample and laboratory control duplicate (LCS/LCD) analyses serve as a monitor of the overall performance in all steps of the sample analysis and are analyzed with each sample batch. The LCS/LCD percent recoveries were evaluated against method and laboratory established control limits. Laboratory precision was verified by the relative percent difference (RPD) of the LCS/LCD when a matrix spike/matrix spike duplicate was not analyzed.

The LCS/LCD percent recoveries were within the laboratory control limits.

FIELD QUALITY ASSURANCE/QUALITY CONTROL

The field quality assurance/quality control consisted of two (2) field duplicate samples and six (6) trip blank samples.

Field Duplicate

Samples were collected in duplicate as summarized in Table 1 and submitted blind to the laboratory for analysis. All sample results outside estimated ranges of detection showed acceptable sampling and analytical precision.

Trip Blanks

To monitor potential cross-contamination of VOC during aqueous sample transportation and storage, a trip blank was submitted to the laboratory for VOC analysis with each shipping cooler containing multiple samples.

The trip blank samples were reported to be free from detectable levels of target analytes indicating contamination during transport and analysis was not a problem.

OVERALL ASSESSMENT

The data were found to exhibit acceptable levels of accuracy and precision based on the provided information and may be used with the qualifications noted.

TABLE 1

SAMPLE COLLECTION AND ANALYSIS SUMMARY
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

				Analysis/Parameters												
Sample ID	*Location ID*	*Collection Date (mm/dd/yy)*	*Collection Time (hr:min)*	*TCL VOCs*	*TOC*	*Sulfate*	*Sulfide*	*Nitrite*	*Ammonia*	*Chloride*	*Volatile Fatty Acids*	*Alkalinity*	*Metals*	*Hydrogen*	*Dissolved Gases*	*Comments*
MW-15-041812-0900	MW-15	04/18/12	9:00:00 AM	X	X	X	X	X	X	X	X	X	X	X	X	
MW-11-041812-1245	MW-11	04/18/12	12:45:00 PM	X	X	X	X	X	X	X	X	X	X	X	X	
MW-12-041812-1530	MW-12	04/18/12	3:30:00 PM	X	X	X	X	X	X	X	X	X	X	X	X	
MW-13-041912-0845	MW-13	04/19/12	8:45:00 AM	X	X	X	X	X	X	X	X	X	X	X	X	
MW-14-041912-1315	MW-14	04/19/12	1:15:00 PM	X	X	X	X	X	X	X	X	X	X	X	X	
MW-10-041912-1520	MW-10	04/19/12	3:20:00 PM	X	X	X	X	X	X	X	X	X	X	X	X	
DUP-041912-0001	MW-13	04/19/12	4/19/2012	X	X	X	X	X	X	X	X	X	X	X	X	Field duplicate of sample MW-13-041912-0845
MW-4-042012-1300	MW-4	04/20/12	1:00:00 PM	X	X	X	X	X	X	X	X	X	X	X	X	
MW-7-042012-1630	MW-7	04/20/12	4:30:00 PM	X	X	X	X	X	X	X	X	X	X		X	
MW-6-1-042512-0915	MW-6-1	04/25/12	9:15:00 AM	X	X	X	X	X	X	X	X	X	X		X	
MW-6-2-042512-1130	MW-6-2	04/25/12	11:30:00 AM	X	X	X	X	X	X	X	X	X	X		X	
MW-8-4-042512-1800	MW-8-4	04/25/12	6:00:00 PM	X	X	X	X	X	X	X	X	X	X		X	
MW-6-F-8-042512-1730	MW-6-F-8	04/25/12	5:30:00 PM	X	X	X	X	X	X	X	X	X	X		X	
DUP	MW-6-2	04/25/12	4/25/2012	X	X	X	X	X	X	X	X	X	X		X	Field duplicate of sample MW-6-2-042512-1130
TRIP BLANK	-	04/25/12	4/25/2012	X												Trip blank
MW-7-2-042612-1415	MW-7-2	04/26/12	2:15:00 PM	X	X	X	X	X	X	X	X	X	X		X	
MW-7-1-042712-1000	MW-7-1	04/27/12	10:00:00 AM	X	X	X	X	X	X	X	X	X	X		X	
MW-7-3-042712-1330	MW-7-3	04/27/12	1:30:00 PM	X	X	X	X	X	X	X	X	X	X		X	
MW-7-4-042712-1415	MW-7-4	04/27/12	2:15:00 PM	X	X	X	X	X	X	X	X	X	X		X	
TRIP BLANK	-	04/27/12	4/27/2012	X												Trip blank
MW-8-003-B-043012-1400	MW-8-003-B	04/30/12	2:00:00 PM	X	X	X	X	X	X	X	X	X	X		X	
MW-8-1-043012-1700	MW-8-1	04/30/12	5:00:00 PM	X	X	X	X	X	X	X	X	X	X		X	
MW-7-6-043012-0900	MW-7-6	04/30/12	9:00:00 AM	X	X	X	X	X	X	X	X	X	X		X	MS/MSD VOCs only
MW-7-5-043012-1130	MW-7-5	04/30/12	11:30:00 AM	X	X	X	X	X	X	X	X	X	X		X	
TRIP BLANK	-	04/27/12	4/27/2012	X												Trip blank
MW-7-A-6-050112-0900	MW-7-A-6	05/01/12	9:00:00 AM	X	X	X	X	X	X	X	X	X	X		X	
MW-7-7-050112-1330	MW-7-7	05/01/12	1:30:00 PM	X	X	X	X	X	X	X	X	X	X		X	
MW-8-3-050112-1540	MW-8-3	05/01/12	3:40:00 PM	X	X	X	X	X	X	X	X	X	X		X	
TRIP BLANK	-	04/27/12	4/27/2012	X												Trip blank

TABLE 1

SAMPLE COLLECTION AND ANALYSIS SUMMARY
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

				Analysis/Parameters												
Sample ID	***Location ID***	***Collection Date (mm/dd/yy)***	***Collection Time (hr:min)***	*TCL VOCs*	*TOC*	*Sulfate*	*Sulfide*	*Nitrite*	*Ammonia*	*Chloride*	*Volatile Fatty Acids*	*Alkalinity*	*Metals*	*Hydrogen*	*Dissolved Gases*	***Comments***
MW-10-2-050212-1200	MW-10-2	05/02/12	12:00:00 PM	X	X	X	X	X	X	X	X	X	X		X	
MW-10-3-050212-1400	MW-10-3	05/02/12	2:00:00 PM	X	X	X	X	X	X	X	X	X	X		X	
BLDG-10-MW-1-050212-1620	MW-10-1	05/02/12	4:20:00 PM	X	X	X	X	X	X	X	X	X	X		X	
TRIP BLANK	-	05/02/12	5/2/2012	X												Trip blank
MW-7-8-050212-0730	MW-7-8	05/02/12	7:30:00 AM	X	X	X	X	X	X	X	X	X	X		X	
MW-9-101-A-050312-1215	MW-9-101-A	05/03/12	12:15:00 PM	X	X	X	X	X	X	X	X	X	X		X	
MW-7-C-2-050312-1015	MW-7-C-2	05/03/12	10:15:00 AM	X	X	X	X	X	X	X	X	X	X		X	
MW-7-P-1-050312-1530	MW-7-P-1	05/03/12	3:30:00 PM	X	X	X	X	X	X	X	X	X	X		X	
MW-8-2-050312-1830	MW-8-2	05/03/12	6:30:00 PM	X	X	X	X	X	X	X	X	X	X		X	
TRIP BLANK	-	04/25/12	4/25/2012	X												Trip blank

Notes:

-	Not applicable.
MS/MSD	Matrix spike/matrix spike duplicate
TCL	Target Compound List
TOC	Total Organic Carbon
VOCs	Volatile Organic Compounds

TABLE 2

ANALYTICAL METHODS SUMMARY
GROUNDWATER SAMPLING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Parameter	*Analytical Method*
VOCs	SW 846 8260[1]
TOC	SW 846 9060[1]
Sulfide	EPA 376.1[2]
Total Nitrogen (as ammonia)	EPA 350.1[2]
Chloride, Sulfate	EPA 300[2]
Nitrite, Nitrate	EPA 353.2[2]
Alkalinity	SM 2320[3]
Methane, Ethane, Ethene, Carbon dioxide	RSK 175[4]
Hydrogen	AM20GAX[5]
Metals	SW 846 6010[1]

Notes:

1	Referenced from "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods", SW-846, Third Edition, 1986, with subsequent revisions.
2	Methods referenced from "Methods for Chemical Analysis of Water and Wastes", EPA-600/4-79-020, March 1983, with all subsequent revisions.
3	Referenced from "Standard Methods for the Examination of Water and Wastewater," 18th Edition, 1992, with all subsequent revisions.
4	EPA RSK175 - EPA Internal Standard Operating Procedure, Bryan Newell, R.S. Kerr Laboratory, Oklahoma, August 1994.
5	Microseeps Standard Operating Procedure (SOP).
VOCs	Volatile Organic Compounds.
TOC	Total organic carbon

TABLE 3

ANALYTICAL RESULTS SUMMARY
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Sample Location:		*MW-4*	*MW-6-1*	*MW-6-2*	*MW-6-2*	*MW-6-F-8*	*MW-7*	*MW-7-1*	*MW-7-2*
Sample ID:		*MW-4-042012-1300*	*MW-6-1-042512-0915*	*DUP*	*MW-6-2-042512-1130*	*MW-6-F-8-042512-1730*	*MW-7-042012-1630*	*MW-7-1-042712-1000*	*MW-7-2-042612-1415*
Sample Date:		*4/20/2012*	*4/25/2012*	*4/25/2012 (Duplicate)*	*4/25/2012*	*4/25/2012*	*4/20/2012*	*4/27/2012*	*4/26/2012*
Parameters:	***Units***								
Volatile Organic Compounds									
cis-1,2-Dichloroethene	µg/L	42000	1.0 U	1.0 U	1.0 U	1.0 U	43000	1.0 U	1.0 U
Tetrachloroethene	µg/L	1.4	1.0 U	1.0 U	1.0 U	1.0 U	10000 U	1.0 U	1.0 U
trans-1,2-Dichloroethene	µg/L	160	1.0 U	1.0 U	1.0 U	1.0 U	10000 U	1.0 U	1.0 U
Trichloroethene	µg/L	18000	1.0 U	1.0 U	1.0 U	1.0 U	730000	1.0 U	4.0
Vinyl chloride	µg/L	9100	1.0 U	1.0 U	1.0 U	1.0 U	10000 U	1.0 U	1.0 U
Metals									
Iron	mg/L	2.7	16.5	0.14	0.15	0.11	0.061	0.28	0.076
Magnesium	mg/L	138	67.7	87.4	89.0	175	67.1	111	40.0
Manganese	mg/L	1.5	2.6	0.77	0.79	1.2	0.024	0.42	0.041
Potassium	mg/L	15.6	2.4	4.0	3.8	4.9	13.2	4.3	1.6
Sodium	mg/L	1400	459	1690	1700	2160	193	563	109
Gas									
Carbon dioxide	µg/L	9500	13000	8700	7200	9000	1600	6800	3700
Ethane	µg/L	650 J	1.5 U	1.5 U	1.5 U	1.5 U	17	1.5 U	1.5 U
Ethene	µg/L	2300	1.5 U	1.5 U	1.5 U	1.5 U	98	1.5 U	1.5 U
Hydrogen	nM	28	-	-	-	-	-	-	-
Methane	µg/L	3800	17	1.0 U	1.0 U	32	46	9.4	1.0 U
General Chemistry									
Acetic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	4.2	1.0 U	1.0 U
Alkalinity, total (as CaCO3)	mg/L	320	392	360	388	368	240	288	324
Ammonia	mg/L	2.6	0.45	0.020 U	0.020 U	0.020 U	0.77	0.0092 J	0.020 U
Butanoic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	0.62 J	1.0 U	1.0 U
Chloride	mg/L	3580	1130	3340	3800	3730	416	1450	212

TABLE 3

ANALYTICAL RESULTS SUMMARY
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Sample Location:		*MW-4*	*MW-6-1*	*MW-6-2*	*MW-6-2*	*MW-6-F-8*	*MW-7*	*MW-7-1*	*MW-7-2*
Sample ID:		*MW-4-042012-1300*	*MW-6-1-042512-0915*	*DUP*	*MW-6-2-042512-1130*	*MW-6-F-8-042512-1730*	*MW-7-042012-1630*	*MW-7-1-042712-1000*	*MW-7-2-042612-1415*
Sample Date:		*4/20/2012*	*4/25/2012*	*4/25/2012* *(Duplicate)*	*4/25/2012*	*4/25/2012*	*4/20/2012*	*4/27/2012*	*4/26/2012*
Parameters:	***Units***								
General Chemistry (Cont'd)									
Formic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Lactic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Nitrate (as N)	mg/L	0.050 U	0.050 U	0.12	0.13	0.050 U	0.050 U	0.050 U	0.059
Nitrite (as N)	mg/L	0.050 U	0.050 U	0.050 U	0.050 U	0.050 U	0.050 U	0.050 U	0.050 U
Propionic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 UJ	1.0 U	1.0 U	1.0 U
Pyruvic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 UJ	1.0 U	1.0 U	1.0 U
Sulfate	mg/L	282 J	104	150	185	208	332 J	131	66.6
Sulfide	mg/L	0.10 U	0.10 UJ	0.10 UJ	0.10 UJ	0.10 UJ	0.10 U	0.10 U	0.10 U
Total organic carbon (TOC)	mg/L	3.1	3.8	2.3	2.3	1.9	8.7	0.97 J	1.6

TABLE 3

ANALYTICAL RESULTS SUMMARY
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Sample Location:		*MW-7-3*	*MW-7-4*	*MW-7-5*	*MW-7-6*	*MW-7-7*	*MW-7-8*	*MW-7-A-6*
Sample ID:		*MW-7-3-042712-1330*	*MW-7-4-042712-1415*	*MW-7-5-043012-1130*	*MW-7-6-043012-0900*	*MW-7-7-050112-1330*	*MW-7-8-050212-0730*	*MW-7-A-6-050112-0900*
Sample Date:		*4/27/2012*	*4/27/2012*	*4/30/2012*	*4/30/2012*	*5/1/2012*	*5/2/2012*	*5/1/2012*
Parameters:	***Units***							
Volatile Organic Compounds								
cis-1,2-Dichloroethene	µg/L	8.6	1.0 U	640	480	6000	67	22000
Tetrachloroethene	µg/L	1.0 U	1.0 U	8700	710	120000	220	140000
trans-1,2-Dichloroethene	µg/L	1.0 U	1.0 U	200 U	10 U	400 U	4.0 U	2000 U
Trichloroethene	µg/L	1.0 U	3.6	760	290	2600	130	26000
Vinyl chloride	µg/L	43	1.0 U	200 U	55	960	4.0 U	1800 J
Metals								
Iron	mg/L	2.5	0.27	0.12	0.16	0.080	4.0	0.49
Magnesium	mg/L	248	34.3	124	106	151	170	95.4
Manganese	mg/L	0.35	0.017	1.1	0.18	0.0089	0.15	0.92
Potassium	mg/L	50.2	2.1	8.0	10.9	40.5	38.2	2.7
Sodium	mg/L	4340	226	2530	2450	1030	896	226
Gas								
Carbon dioxide	µg/L	9100	3900	11000	8200	1000 U	1000 U	19000
Ethane	µg/L	6.0	1.5 U	1.0 J	6.3	68 J	21	14
Ethene	µg/L	10	1.5 U	1.3 J	1.7	130	7.8 J	160
Hydrogen	nM	-	-	-	-	-	-	-
Methane	µg/L	220	1.0 U	25	420	530	67	1100
General Chemistry								
Acetic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	6.1	1.0 U	1.0 U
Alkalinity, total (as CaCO3)	mg/L	280	320	320	288	42.0	60.0	472
Ammonia	mg/L	2.6	0.020 U	0.043	0.051	1.8	0.25	0.022
Butanoic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Chloride	mg/L	6890	351	4600	4230	687	2330	695

TABLE 3

ANALYTICAL RESULTS SUMMARY
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Sample Location:		*MW-7-3*	*MW-7-4*	*MW-7-5*	*MW-7-6*	*MW-7-7*	*MW-7-8*	*MW-7-A-6*
Sample ID:		*MW-7-3-042712-1330*	*MW-7-4-042712-1415*	*MW-7-5-043012-1130*	*MW-7-6-043012-0900*	*MW-7-7-050112-1330*	*MW-7-8-050212-0730*	*MW-7-A-6-050112-0900*
Sample Date:		*4/27/2012*	*4/27/2012*	*4/30/2012*	*4/30/2012*	*5/1/2012*	*5/2/2012*	*5/1/2012*
Parameters:	***Units***							
General Chemistry (Cont'd)								
Formic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Lactic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Nitrate (as N)	mg/L	0.38	0.11	0.89	0.057	0.088	0.050 U	0.050 U
Nitrite (as N)	mg/L	0.050 U	0.050 U	0.039 J	0.050 U	0.022 J	0.050 U	0.050 U
Propionic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.5	1.0 U	1.0 U
Pyruvic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Sulfate	mg/L	727	72.2	218	264	451	145	111
Sulfide	mg/L	0.055 J	0.10 U	0.10 U	0.10 U	1.7	0.10 U	0.10 U
Total organic carbon (TOC)	mg/L	1.3	0.68 J	1.8	1.3	14.1	0.73 J	10.5

TABLE 3

ANALYTICAL RESULTS SUMMARY
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Sample Location:		*MW-7-C-2*	*MW-7-P-1*	*MW-8-1*	*MW-8-2*	*MW-8-3*	*MW-8-003-B*	*MW-8-4*
Sample ID:		*MW-7-C-2-050312-1015*	*MW-7-P-1-050312-1530*	*MW-8-1-043012-1700*	*MW-8-2-050312-1830*	*MW-8-3-050112-1540*	*MW-8-003-B-043012-1400*	*MW-8-4-042512-1800*
Sample Date:		*5/3/2012*	*5/3/2012*	*4/30/2012*	*5/3/2012*	*5/1/2012*	*4/30/2012*	*4/25/2012*
Parameters:	***Units***							
Volatile Organic Compounds								
cis-1,2-Dichloroethene	µg/L	370	4.0 U	0.85 J	10000	5.3	830	55
Tetrachloroethene	µg/L	1.0 U	4.0 U	1.0 U	1.0 U	0.84 J	1600	1.0 U
trans-1,2-Dichloroethene	µg/L	1.2	4.0 U	1.0 U	34	1.0 U	5.0 U	1.0 U
Trichloroethene	µg/L	1.0 U	4.0 U	1.0 U	190	5.9	440	15
Vinyl chloride	µg/L	21	19	1.0 U	380	1.0 U	73	18
Metals								
Iron	mg/L	0.93	61.2	0.19	0.20	0.11	0.14	1.0
Magnesium	mg/L	83.8	388	122	47.3	42.6	41.2	272
Manganese	mg/L	0.084	10.1	0.16	0.021	4.1	0.38	1.9
Potassium	mg/L	7.5	31.4	19.4	17.1	519	9.8	8.5
Sodium	mg/L	126	358	838	286	386	3060	1760
Gas								
Carbon dioxide	µg/L	4800	25000	8000	6800	6300	1000 U	5700
Ethane	µg/L	9.6 J	52	9.2	11 J	1.4 J	1.3 J	1.5 U
Ethene	µg/L	8.0 J	14 J	3.5	9.7 J	2.4	6.4	1.5 U
Hydrogen	nM	-	-	-	-	-	-	-
Methane	µg/L	82	2800	86	260	1.6	46	75
General Chemistry								
Acetic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Alkalinity, total (as CaCO3)	mg/L	260	244	304	372	360	160	300
Ammonia	mg/L	0.39	170	1.2	1.2	1.5	0.16	0.12
Butanoic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Chloride	mg/L	181	5890	475	338	1580	4640	3820

TABLE 3

ANALYTICAL RESULTS SUMMARY
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Sample Location:		*MW-7-C-2*	*MW-7-P-1*	*MW-8-1*	*MW-8-2*	*MW-8-3*	*MW-8-003-B*	*MW-8-4*
Sample ID:		*MW-7-C-2-050312-1015*	*MW-7-P-1-050312-1530*	*MW-8-1-043012-1700*	*MW-8-2-050312-1830*	*MW-8-3-050112-1540*	*MW-8-003-B-043012-1400*	*MW-8-4-042512-1800*
Sample Date:		*5/3/2012*	*5/3/2012*	*4/30/2012*	*5/3/2012*	*5/1/2012*	*4/30/2012*	*4/25/2012*
Parameters:	***Units***							
General Chemistry (Cont'd)								
Formic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Lactic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Nitrate (as N)	mg/L	0.050 U	0.050 U	0.050 U	0.050 U	0.050 U	0.50	0.050 U
Nitrite (as N)	mg/L	0.050 U	0.050 U	0.050 U	0.050 U	0.050 U	0.050 U	0.050 U
Propionic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Pyruvic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Sulfate	mg/L	525	71.0	613	243	105	154	259
Sulfide	mg/L	0.10 U	0.10 U	2.1	0.60	0.10 U	0.10 U	0.10 UJ
Total organic carbon (TOC)	mg/L	0.67 J	2.3	0.60 J	1.5	6.4	1.3	1.6

TABLE 3

ANALYTICAL RESULTS SUMMARY
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Sample Location:	*MW-9-101-A*	*MW-10*	*MW-10-1*	*MW-10-2*	*MW-10-3*	*MW-11*	*MW-12*
Sample ID:	*MW-9-101-A-050312-1215*	*MW-10-041912-1520*	*BLDG-10-MW-1-050212-1620*	*MW-10-2-050212-1200*	*MW-10-3-050212-1400*	*MW-11-041812-1245*	*MW-12-041812-1530*
Sample Date:	*5/3/2012*	*4/19/2012*	*5/2/2012*	*5/2/2012*	*5/2/2012*	*4/18/2012*	*4/18/2012*
Parameters:	***Units***						
Volatile Organic Compounds							
cis-1,2-Dichloroethene	µg/L	4.0 U	300	2000 U	2100	14	1.4	150
Tetrachloroethene	µg/L	4.0 U	77	150000	330	14	1.0 U	1.0 U
trans-1,2-Dichloroethene	µg/L	4.0 U	4.0 U	2000 U	26	1.0 U	1.0 U	1.0 U
Trichloroethene	µg/L	4.0 U	150	2500	810	7.0	1.0 U	0.83 J
Vinyl chloride	µg/L	4.0 U	35	2000 U	60	1.0 U	2.6	120
Metals							
Iron	mg/L	0.050 U	0.32	1.2	0.15	0.075	0.20	12.7
Magnesium	mg/L	137	95.5	80.8	92.7	17.5	48.5	84.3
Manganese	mg/L	0.0023 J	2.4	0.32	0.27	0.00094 J	0.14	9.1
Potassium	mg/L	21.5	7.0	4.7	10.8	2.4	8.3	3.7
Sodium	mg/L	748	2110	76.8	1610	44.7	143	1250
Gas							
Carbon dioxide	µg/L	4200	5600	7900	4100	1000 U	2100	15000
Ethane	µg/L	1.5 U	9.1 J	2.6	10 J	1.5 U	1.5 U	11 J
Ethene	µg/L	1.5 U	9.2 J	7.7	8.4 J	1.5 U	1.5 U	11 J
Hydrogen	nM	-	1.0	-	-	-	12	0.76
Methane	µg/L	1.0 U	170	12	130	1.0 U	14	300
General Chemistry							
Acetic acid	mg/L	1.0 U	1.0 U	0.67 J	1.0 U	1.0 U	1.0 U	1.0 U
Alkalinity, total (as CaCO3)	mg/L	200	280	320	240	128	248	280
Ammonia	mg/L	0.020 U	0.11	0.18	0.52	0.020 U	0.27	1.8
Butanoic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Chloride	mg/L	1440	3790	115	1110	91.0	360	2900

TABLE 3

ANALYTICAL RESULTS SUMMARY
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Sample Location:		*MW-9-101-A*	*MW-10*	*MW-10-1*	*MW-10-2*	*MW-10-3*	*MW-11*	*MW-12*
Sample ID:		*MW-9-101-A-050312-1215*	*MW-10-041912-1520*	*BLDG-10-MW-1-050212-1620*	*MW-10-2-050212-1200*	*MW-10-3-050212-1400*	*MW-11-041812-1245*	*MW-12-041812-1530*
Sample Date:		*5/3/2012*	*4/19/2012*	*5/2/2012*	*5/2/2012*	*5/2/2012*	*4/18/2012*	*4/18/2012*
Parameters:	***Units***							
General Chemistry (Cont'd)								
Formic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Lactic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Nitrate (as N)	mg/L	6.3	0.050 U	0.050 U	0.050 U	1.5	0.095	0.050 U
Nitrite (as N)	mg/L	0.050 U	0.050 U	0.050 U	0.050 U	0.050 U	0.050 U	0.050 U
Propionic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Pyruvic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U	1.0 U
Sulfate	mg/L	1170	210	195	147	74.0	98.9	133
Sulfide	mg/L	0.10 U	0.10 U	0.10 U	0.10 U	0.10 U	0.053 J	0.10 UJ
Total organic carbon (TOC)	mg/L	3.0	2.3	4.4	1.2	0.52 J	1.3	3.7

TABLE 3

ANALYTICAL RESULTS SUMMARY
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Sample Location:		*MW-13*	*MW-13*	*MW-14*	*MW-15*
Sample ID:		*DUP-041912-0001*	*MW-13-041912-0845*	*MW-14-041912-1315*	*MW-15-041812-0900*
Sample Date:		*4/19/2012 (Duplicate)*	*4/19/2012*	*4/19/2012*	*4/18/2012*
Parameters:	***Units***				
Volatile Organic Compounds					
cis-1,2-Dichloroethene	µg/L	4.0 U	1.0 U	1.2	1.0 U
Tetrachloroethene	µg/L	4.0 U	1.0 U	1.0 U	8.1
trans-1,2-Dichloroethene	µg/L	4.0 U	1.0 U	1.0 U	1.0 U
Trichloroethene	µg/L	4.0 U	1.0 U	1.0 U	0.65 J
Vinyl chloride	µg/L	4.0 U	1.0 U	1.1	1.0 U
Metals					
Iron	mg/L	5.7	5.8	0.14	0.050 U
Magnesium	mg/L	36.3	38.5	86.7	54.4
Manganese	mg/L	4.1	4.4	0.29	0.24
Potassium	mg/L	5.4	5.3	6.2	3.3
Sodium	mg/L	925	940	916	424
Gas					
Carbon dioxide	µg/L	4500	3700	2900	11000
Ethane	µg/L	8.6 J	8.2 J	8.6 J	1.5 U
Ethene	µg/L	8.0 J	15 U	8.3 J	1.5 U
Hydrogen	nM	0.79	0.50 J	6.7	0.82
Methane	µg/L	89	93	71	1.0 U
General Chemistry					
Acetic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U
Alkalinity, total (as CaCO3)	mg/L	352	360	328	384
Ammonia	mg/L	0.90	0.96	0.25	0.020 U
Butanoic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U
Chloride	mg/L	1490	1490	1720	962

TABLE 3

ANALYTICAL RESULTS SUMMARY
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Sample Location:		*MW-13*	*MW-13*	*MW-14*	*MW-15*
Sample ID:		*DUP-041912-0001*	*MW-13-041912-0845*	*MW-14-041912-1315*	*MW-15-041812-0900*
Sample Date:		*4/19/2012*	*4/19/2012*	*4/19/2012*	*4/18/2012*
		(Duplicate)			
Parameters:	***Units***				
General Chemistry (Cont'd)					
Formic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U
Lactic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U
Nitrate (as N)	mg/L	0.068	0.081	0.050 U	0.73
Nitrite (as N)	mg/L	0.050 U	0.050 U	0.050 U	0.050 U
Propionic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U
Pyruvic acid	mg/L	1.0 U	1.0 U	1.0 U	1.0 U
Sulfate	mg/L	66.3	71.3	88.2	111
Sulfide	mg/L	0.10 U	0.10 U	0.10 U	0.10 UJ
Total organic carbon (TOC)	mg/L	4.0	4.0	1.5	2.0

Notes:
- - Not analyzed.
J - Estimated.
U - Not detected.
UJ - Not detected, estimated reporting limit

TABLE 4

QUALIFIED SAMPLE RESULTS DUE TO ANALYTE CONCENTRATIONS IN THE METHOD BLANKS
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Parameter	*Analysis Date*	*Analyte*	*Blank Result*	*Sample ID*	*Qualified Sample Result*	*Units*
Dissolved Gases	4/22/2012	Ethane	0.792 J	MW-11-041812-1245	1.5 U	µg/L
				MW-15-041812-0900	1.5 U	µg/L
Dissolved Gases	4/22/2012	Ethene	0.799 J	MW-11-041812-1245	1.5 U	µg/L
				MW-13-041912-0845	15 U	µg/L
				MW-15-041812-0900	1.5 U	µg/L
Dissolved Gases	4/22/2012	Methane	0.317 J	MW-15-041812-0900	1.0 U	µg/L
Dissolved Gases	4/26/2012	Ethane	0.810 J	DUP	1.5 U	µg/L
				MW-6-2-042512-1130	1.5 U	µg/L
				MW-6-F-8-042512-1730	1.5 U	µg/L
				MW-8-4-042512-1800	1.5 U	µg/L
Dissolved Gases	4/26/2012	Ethene	0.647 J	DUP	1.5 U	µg/L
				MW-6-2-042512-1130	1.5 U	µg/L
				MW-8-4-042512-1800	1.5 U	µg/L
Dissolved Gases	4/26/2012	Methane	0.589 J	DUP	1.0 U	µg/L
				MW-6-2-042512-1130	1.0 U	µg/L
Dissolved Gases	4/30/2012	Ethane	0.845 J	MW-7-1-042712-1000	1.5 U	µg/L
				MW-7-4-042712-1415	1.5 U	µg/L
Dissolved Gases	4/30/2012	Ethene	0.670 J	MW-7-1-042712-1000	1.5 U	µg/L
				MW-7-4-042712-1415	1.5 U	µg/L
Dissolved Gases	4/30/2012	Methane	0.511 J	MW-7-2-042612-1415	1.0 U	µg/L
Dissolved Gases	5/7/2012	Methane	0.523 J	MW-10-3-050212-1400	1.0 U	µg/L
				MW-9-101-A-050312-1215	1.0 U	µg/L

Notes:
J Estimated.
U Not detected.

TABLE 5

QUALIFIED SAMPLE RESULTS DUE TO OUTLYING MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERIES
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Parameter	*Associated Sample ID*	*Analyte*	*MS Recovery (percent)*	*MSD Recovery (percent)*	*RPD*	*Control Limits*		*Qualified Sample Result*	*Units*
						Recovery (percent)	*RPD (percent)*		
General Chemistry	MW-6-F-8-042512-1730	Propionic acid	69	74	7	80 - 120	20	1.0 UJ	mg/L
General Chemistry	MW-6-F-8-042512-1730	Pyruvic acid	50	46	8	80 - 120	20	1.0 UJ	mg/L

Notes:
MS Matrix Spike.
MSD Matrix Spike Duplicate.
RPD Relative Percent Difference.
UJ Not detected, estimated reporting limit.

TABLE 6

QUALIFIED SAMPLE RESULTS DUE TO OUTLYING MATRIX SPIKE RECOVERIES
GROUNDWATER MONITORING
GM COMPONENTS HOLDINGS (GMCH) FACILITY
LOCKPORT, NEW YORK
APRIL-MAY 2012

Analyte	*Spike ID*	*MS Recovery (percent)*	*Control Limits (percent)*	*Associated Samples*	*Qualified Sample Results*	*Units*
Sulfide	MW-12-041812-1530	79	90 - 110	MW-11-041812-1245	0.053 J	mg/L
				MW-12-041812-1530	0.10 UJ	mg/L
				MW-15-041812-0900	0.10 UJ	mg/L
Sulfate	MW-4-042012-1300	1	60 -128	MW-4-042012-1300	282 J	mg/L
				MW-7-042012-1630	232 J	mg/L
Sulfide	MW-6-F-8-042512-1730	79	90 - 110	DUP	0.10 UJ	mg/L
				MW-6-1-042512-0915	0.10 UJ	mg/L
				MW-6-2-042512-1130	0.10 UJ	mg/L
				MW-6-F-8-042512-1730	0.10 UJ	mg/L
				MW-8-4-042512-1800	0.10 UJ	mg/L

Notes:
J Estimated.
MS Matrix Spike.
UJ Not detected, estimated reporting limit.

APPENDIX E

ANAEROBIC BIODEGRADATION SCREENING TABLES

ANAEROBIC BIODEGRADATION SCREENING
MW-7-7 MNA Scorecard
Building 7 BCP Site
GM Component Holdings, LLC
Lockport, New York

Analysis	Concentration in Most Contaminated Zone	Value	Laboratory or Field Analysis Value (mg/L)	Score
DO	<0.5 mg/L	3	1.5	
DO	>5 mg/l	-3		
Nitrate	<1 mg/L	2	0.088	2
Iron II	>1 mg/l	2	0.08	
Sulfate	<20 mg/L	2	451	
Sulfide	>1 mg/L	3	1.7	3
Methane	<0.5 mg/L	0		
Methane	>0.5 mg/L	3	0.53	3
ORP	<50 mV	1		
ORP	<-100 mV	2	-189	2
pH	5< pH <9	0		
pH	5> pH >9	-2	9.5	-2
TOC	>20 mg/L	2	14.1	
Temp	> 20^{o}C	1	10.5	
Carbon Dioxide	>2 times background (4.2)	1	ND	
Alkalinity	>2 times background (200)	1	42	
Chloride	>2 times background (1440)	2	687	
Hydrogen	>1 nM	3	NT	
Hydrogen	<1nM	0		
Volatile Fatty Acids	>0.1 mg/L	2	0.0076	
BTEX	>0.1 mg/L	2	ND	
PCE		0	120	
TCE	If Daughter Product	2	2.6	2
DCE	If Daughter Product	2	6	2
VC	If Daughter Product	2	0.96	2
1,1,1-TCA		0	ND	
DCA	If Daughter Product	2	ND	
Carbon Tetrachloride		0	ND	
Chloroethane	If Daughter Product	2	ND	
Ethene/Ethane	>0.01 mg/L or	2		
	>0.1 mg/L	3	0.13	3
Chloroform	If Daughter Product	2	ND	
Dichloromethane	If Daughter Product	2	ND	
			Total Score	17

Scoring Interpretation	
0 to 5	Inadequate evidence for anaerobic biodegradation* of chlorinated organics
6 to 14	Limited evidence for anaerobic biodegradation* of chlorinated organics
15 to 20	Adequate evidence for anaerobic biodegradation* of chlorinated organics
>20	Strong evidence for anaerobic biodegradation* of chlorinated organics
*reductive dechlorination	

Values Taken from EPA Document **EPA/600/R-98/128,** *Technical Protocol for Evaluating Natural Attenuation of Chlorinated Solvents in Ground Water* , 1998, Table 2.3 and Table 2.4

Notes:
1. ND=not detected
2. NT=not tested
3. EM=Equipment malfunction

ANAEROBIC BIODEGRADATION SCREENING
MW-7-A-6 MNA Scorecard
Building 7 BCP Site
GM Component Holdings, LLC
Lockport, New York

Analysis	Concentration in Most Contaminated Zone	Value	Laboratory or Field Analysis Value (mg/L)	Score
DO	<0.5 mg/L	3	0.69	
DO	>5 mg/l	-3		
Nitrate	<1 mg/L	2	ND	
Iron II	>1 mg/l	2	0.49	
Sulfate	<20 mg/L	2	111	
Sulfide	>1 mg/L	3	ND	
Methane	<0.5 mg/L	0		
Methane	>0.5 mg/L	3	1.1	3
ORP	<50 mV	1	29.5	1
ORP	<-100 mV	2		
pH	5< pH <9	0	6.7	0
pH	5> pH >10	-2		
TOC	>20 mg/L	2	10.5	
Temp	> 20°C	1	12.2	
Carbon Dioxide	>2 times background (4.2)	1	19	1
Alkalinity	>2 times background (200)	1	472	1
Chloride	>2 times background (1440)	2	695	
Hydrogen	>1 nM	3	NT	
Hydrogen	<1nM	0		
Volatile Fatty Acids	>0.1 mg/L	2	ND	
BTEX	>0.1 mg/L	2	ND	
PCE		0	140	
TCE	If Daughter Product	2	26	2
DCE	If Daughter Product	2	22	2
VC	If Daughter Product	2	1.8	2
1,1,1-TCA		0	ND	
DCA	If Daughter Product	2	ND	
Carbon Tetrachloride		0	ND	
Chloroethane	If Daughter Product	2	ND	
Ethene/Ethane	>0.01 mg/L or	2		
	>0.1 mg/L	3	0.16	3
Chloroform	If Daughter Product	2	ND	
Dichloromethane	If Daughter Product	2	ND	
			Total Score	15

Scoring Interpretation	
0 to 5	Inadequate evidence for anaerobic biodegradation* of chlorinated organics
6 to 14	Limited evidence for anaerobic biodegradation* of chlorinated organics
15 to 20	Adequate evidence for anaerobic biodegradation* of chlorinated organics
>20	Strong evidence for anaerobic biodegradation* of chlorinated organics
*reductive dechlorination	

Values Taken from EPA Document **EPA/600/R-98/128,** *Technical Protocol for Evaluating Natural Attenuation of Chlorinated Solvents in Ground Water* , 1998, Table 2.3 and Table 2.4

Notes:
1. ND=not detected
2. NT=not tested
3. EM=Equipment malfunction

ANAEROBIC BIODEGRADATION SCREENING
MW-8-2 MNA Scorecard
Building 8 BCP Site
GM Component Holdings, LLC
Lockport, New York

Analysis	Concentration in Most Contaminated Zone	Value	Laboratory or Field Analysis Value (mg/L)	Score
DO	<0.5 mg/L	3	3.5	
DO	>5 mg/l	-3		
Nitrate	<1 mg/L	2	ND	2
Iron II	>1 mg/l	2	0.2	
Sulfate	<20 mg/L	2	243	
Sulfide	>1 mg/L	3	0.6	
Methane	<0.5 mg/L	0	0.26	0
Methane	>0.5 mg/L	3		
ORP	<50 mV	1	-98.5	1
ORP	<-100 mV	2		
pH	5< pH <9	0	6.8	0
pH	5> pH >10	-2		
TOC	>20 mg/L	2	1.5	
Temp	> 20°C	1	20.4	1
Carbon Dioxide	>2 times background (4.2)	1	6.8	
Alkalinity	>2 times background (200)	1	372	
Chloride	>2 times background (1440)	2	338	
Hydrogen	>1 nM	3	NT	
Hydrogen	<1nM	0	NT	
Volatile Fatty Acids	>0.1 mg/L	2	ND	
BTEX	>0.1 mg/L	2	ND	
PCE		0	ND	
TCE	If Daughter Product	2	190	
DCE	If Daughter Product	2	10,034	2
VC	If Daughter Product	2	380.00	2
1,1,1-TCA		0	ND	
DCA	If Daughter Product	2	ND	
Carbon Tetrachloride		0	ND	
Chloroethane	If Daughter Product	2	ND	
Ethene/Ethane	>0.01 mg/L or	2	0.0097	
	>0.1 mg/L	3		
Chloroform	If Daughter Product	2	ND	
Dichloromethane	If Daughter Product	2	ND	
				8

Scoring Interpretation	
0 to 5	Inadequate evidence for anaerobic biodegradation* of chlorinated organics
6 to 14	Limited evidence for anaerobic biodegradation* of chlorinated organics
15 to 20	Adequate evidence for anaerobic biodegradation* of chlorinated organics
>20	Strong evidence for anaerobic biodegradation* of chlorinated organics
*reductive dechlorination	

Values Taken from EPA Document **EPA/600/R-98/128,** *Technical Protocol for Evaluating Natural Attenuation of Chlorinated Solvents in Ground Water* , 1998, Table 2.3 and Table 2.4

Notes:
1. ND=not detected
2. NT=not tested
3. EM=Equipment malfunction

ANAEROBIC BIODEGRADATION SCREENING
BLDG-10-MW-1 MNA Scorecard
Building 10 BCP Site
GM Component Holdings, LLC
Lockport, New York

Analysis	Concentration in Most Contaminated Zone	Value	Laboratory or Field Analysis Value (mg/L)	Score
DO	<0.5 mg/L	3	3.2	
DO	>5 mg/l	-3		
Nitrate	<1 mg/L	2	ND	2
Iron II	>1 mg/l	2	1.2	2
Sulfate	<20 mg/L	2	195	
Sulfide	>1 mg/L	3	ND	
Methane	<0.5 mg/L	0	0.012	0
Methane	>0.5 mg/L	3		
ORP	<50 mV	1	-21.7	1
ORP	<-100 mV	2		
pH	5< pH <9	0	6.6	0
pH	5> pH >9	-2		
TOC	>20 mg/L	2	4.4	
Temp	> 20^{o}C	1	19.7	
Carbon Dioxide	>2 times background (4.2)	1	7.9	
Alkalinity	>2 times background (200)	1	320	
Chloride	>2 times background (1440)	2	115	
Hydrogen	>1 nM	3	NT	
Hydrogen	<1nM	0		
Volatile Fatty Acids	>0.1 mg/L	2	0.67	2
BTEX	>0.1 mg/L	2	ND	
PCE		0	150	
TCE	If Daughter Product	2	2.5	2
DCE	If Daughter Product	2	ND	
VC	If Daughter Product	2	ND	
1,1,1-TCA		0	ND	
DCA	If Daughter Product	2	ND	
Carbon Tetrachloride		0	ND	
Chloroethane	If Daughter Product	2	ND	
Ethene/Ethane	>0.01 mg/L or	2	0.0077	
	>0.1 mg/L	3		
Chloroform	If Daughter Product	2	ND	
Dichloromethane	If Daughter Product	2	ND	
			Total Score	9

Scoring Interpretation	
0 to 5	Inadequate evidence for anaerobic biodegradation* of chlorinated organics
6 to 14	Limited evidence for anaerobic biodegradation* of chlorinated organics
15 to 20	Adequate evidence for anaerobic biodegradation* of chlorinated organics
>20	Strong evidence for anaerobic biodegradation* of chlorinated organics
*reductive dechlorination	

Values Taken from EPA Document **EPA/600/R-98/128,** *Technical Protocol for Evaluating Natural Attenuation of Chlorinated Solvents in Ground Water* , 1998, Table 2.3 and Table 2.4

Notes:
1. ND=not detected
2. NT=not tested
3. EM=Equipment malfunction