

August 13, 2009
File No. 32795.29



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Mr. Gary Jablonski
Rhode Island Department of Environmental Management
Office of Waste Management
235 Promenade Street
Providence, Rhode Island 02908

Re: Sixth Quarterly (April-June of 2009) Interim Compliance Monitoring Report
Charbert, Division of NFA
Richmond, Rhode Island
RIDEM Case # 99-037

Dear Mr. Jablonski:

This letter with attachments serves as the sixth quarterly Interim Compliance Monitoring Report. The work was conducted in compliance with the December 18, 2007 Order of Approval and the October 15, 2007 *Remedial Action Work Plan (RAWP)* that was prepared to address the applicable requirements of Section 9.00 of the RIDEM's Rules and Regulations for the Investigation and Remediation of Hazardous Materials Releases, (DEM-DSR01-93 Remediation Regulations) for the Charbert facility located at 299 Church Street in Richmond (Alton), Rhode Island. It was prepared by GZA GeoEnvironmental, Inc., on behalf of our client Charbert, Division of NFA.

DATA SUMMARY

This report includes the following information and is subject to the Limitations presented in Attachment A:

- The sixth round of groundwater sampling was conducted July 8 and 9, 2009 and consisted of 12 monitoring wells within areas of active treatment and along the downgradient compliance boundaries, see attached Figure 1 for monitoring well locations. Groundwater was analyzed for volatile organic compounds (VOCs) via EPA Method 8260B. The detected analytes have been summarized and compared to RIDEM's Method 1 GA Groundwater Objectives and Groundwater Quality Preventative Action Limits (PALs) in the attached Tables 1 through 13. The laboratory certificates of analysis are provided in Attachment B.
- Groundwater sampling was performed in general accordance with EPA's July 30, 1996 *Low Stress (low flow) Purging and Sampling Procedure* (Low Flow SOP). Low flow sampling equipment (exclusive of tubing which is dedicated) was decontaminated prior to use on-site and between each location following EPA's recommended protocols. Water quality monitoring for stabilization was conducted utilizing a Horiba multimeter in a flow through cell. Field equipment used to perform the testing was calibrated according to the manufacturer's instructions before each sampling day, and confirmatory readings were taken at the end of each sampling day.



- The air sparge and soil vapor extraction monthly monitoring reports and associated data tables for April, May and June of 2009 are included as Attachment C. Soil vapor extraction and sparge wells for the interior and exterior remedial systems are shown on Figures 2 and 3, respectively. The monthly reports include the following information:

Soil Vapor Extraction System

During each visit, the following data was measured and recorded at each of the vent wells:

1. Air flow rates;
2. Vacuum response in inches of water column (IW);
3. TVOC measurements using a PID equipped with a 10.6 eV lamp; and
4. O₂, CO₂ and Lower Explosive Limit (LEL) measurements were collected utilizing a Land-Tech infrared gas meter.

Air Sparge System

During each visit, the following data was measured and recorded at each of the sparge points:

1. Air flow rates; and
2. Air pressures.

- The second quarter (April-June) 2009 underground injection control (UIC) report has been attached for your information. The report contains a summary of industrial wastewater pumping activities and the sampling results of the six UIC monitoring wells. The complete report has been included as Attachment D.
- The sixth round of groundwater sampling from the five upgradient perimeter wells, conducted at the request of RIDEM, was conducted July 8 and 9, 2009. These five wells are generally located between the Charbert facility and nearby private wells. The report contains the results of the monitoring well sampling for this the fifth quarter. The complete report has been included as Attachment E.

EVALUATION

Sixth Quarter ICMP Monitoring Results

The July 8 and July 9, 2009 groundwater results have been compared to the applicable groundwater standards for Rhode Island and there are contaminants that exceed the RIDEM GA Groundwater Objectives or RIDEM Preventative Action Limits (PALs) for VOCs in 10 of the 12 monitoring wells. In certain wells, vinyl chloride, cis-1,2-dichloroethene,



trichloroethene (TCE) and tetrachloroethene (PCE) exceeded the GA Groundwater Objectives established for each contaminant. In other wells, vinyl chloride and PCE exceeded the PALs. Only monitoring well RIZ-5 had no detectable levels of VOCs.

The RIDEM GA Groundwater Objective for vinyl chloride is 2 µg/L. The samples from RIZ-7, GP-28, GP-20, GP-26, GZ-7, and GZ-3 had levels of 130, 440, 71, 81, 2.2 and 19 µg/L, respectively. Vinyl chloride was detected at 1.0 µg/L, the Preventative Action Limit (PAL), at GZ-21. The GA Groundwater Objective for cis-1,2-dichloroethene is 70 µg/L and the samples from RIZ-7, GP-28, GZ-20, GP-26, GZ-7, and GZ-3 had levels of 160, 560, 830, 910, 100, and 180 µg/L, respectively. Trichloroethene has a GA Groundwater Objective of 5 µg/L. The samples from monitoring well locations GZ-23, GZ-28, GZ-20, GP-26, GZ-7, and GZ-3 had TCE levels of 21, 23, 690, 310, 42, and 180 µg/L, respectively. Tetrachloroethene has a GA Groundwater Objective of 5 µg/L. The samples from monitoring well locations GZ-22, GZ-23, GZ-19, GP-28, GZ-20, GP-26, GZ-7 and GZ-3 had PCE levels of 35, 17, 1,300, 15, 1,200, 330, 18, and 560 µg/L, respectively. Tetrachloroethene was detected at 4.1 µg/L, which exceeds the PAL of 2.5 µg/L, in the sample from well GZ-21.

The detected levels of each of these compounds are within historical ranges of analytical data collected from the Site. A comparison of baseline results with the sixth quarter results shows that there have been changes in the distribution of contaminant concentrations within the identified zone of contamination. There are also changes in the ratio of parent to daughter products (i.e., PCE concentrations relative to TCE, 1,2-DCE and VC). The observed changes are not unexpected given the level of disturbance to the aquifer introduced by the sparging system. The decrease in chlorinated daughter products is also consistent with a decrease in the level of reductive dechlorination caused by the oxygen introduced by the sparging system.

A previously non-detected constituent, tetrahydrofuran (THF), was observed in the sample from RIZ-13. RIZ-13, due to its proximity to the exterior air sparge system, operates under pressure. As a result, RIZ-13 has been modified with a locking cap to prevent accidental opening of the well while the air sparge system is in operation. In order to secure the riser, a small quantity of adhesive was used to join the plastic pipe components, above the water table. Many plumbing adhesives contain THF solvents. Thus, we believe that the THF detect may be attributed to the use of the plumbing adhesive.

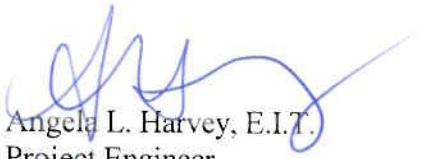
The quarterly monitoring program will be continued for 2 more quarters through December 2009. At that time, an evaluation will be made of the future sampling frequency potentially moving to semi-annual corresponding to periods of seasonal high and low groundwater (e.g., March and September). Seasonal groundwater levels will be evaluated prior to choosing a time (date) in which these samples will be collected.

We trust that this information fulfills your present needs. If you have any questions please call Angela Harvey, Stephen Andrus, or Edward Summerly at (401) 421-4140.



Very truly yours,

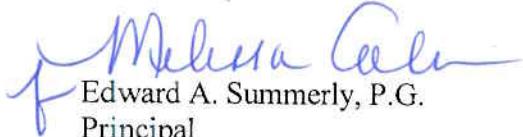
GZA GEOENVIRONMENTAL, INC.



Angela L. Harvey, E.I.T.
Project Engineer



for Albert Flori
Project Reviewer



Edward A. Summerly, P.G.
Principal

ALH/EAS:mac

CC: Tracy Nelson Hay, Richmond Town Clerk
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Attachments: Tables - Tables 1 through 13 - Detected Constituents Summary
Figure 1: Monitoring Well Locations
Figure 2: Interior AS-SVE Monitoring System
Figure 3: Exterior AS-SVE Monitoring System
Appendix A – Limitations
Appendix B – Laboratory Certificates of Analysis
Appendix C – Monthly AS/SVE System Monitoring Data
Appendix D – Second Quarter 2009 UIC Report
Appendix E – Sixth Quarterly Perimeter Well Monitoring Results

TABLES

TABLE 1
GZ-21
DETECTED CONSTITUENTS SUMMARY

*Second Quarter ICMP
 Charbert Facility
 Richmond, Rhode Island*

GZ-21	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALS	Units	Date											
				Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/05/2009		04/01/2009	
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit
Shallow Aquifer Monitoring Well Screen From 10'-20' BGS															
EPA 8260															
VOLATILE ORGANICS															
Vinyl Chloride	2	1	ug/L	<	1.0	8.4	1.0	2.8	1.0	3.4	1.0	2.3	1.0	<	1.0
cis-1,2-Dichloroethene	70	35	ug/L	7.8	1.0	10.0	1.0	7.7	1.0	4.7	1.0	1.7	1.0	<	1.0
Trichloroethene	5	2.5	ug/L	3.5	1.0	1.7	1.0	2.3	1.0	2.7	1.0	1.7	1.0	1.4	1.0
Tetrachloroethene	5	2.5	ug/L	7.2	1.0	2.4	1.0	7.6	1.0	6.1	1.0	6.2	1.0	7.1	1.0
Mod. EPA 8100															
TOTAL PETROLEUM HYDROCARBON															
Hydrocarbon Content	NS	NS	ug/L	<	200	NT		NT		NT		<	200	NT	
FIELD PARAMETERS															
pH	NS	NS	SU	4.0	5.0	5.7	6.2	5.4	6.4						7.0
CONDUCTIVITY	NS	NS	mS/cm	0.337	0.660	0.480	0.378	0.788	0.369						0.406
TURBIDITY	NS	NS	NTU	5	3	80	12	4	4						108
DISSOLVED OXYGEN	NS	NS	mg/L	1.0	0.0	1.4	0.6	0.45	6.51						0.0
TEMPERATURE	NS	NS	°C	16.4	14.4	14.8	17.9	13.2	9.8						13.0
ORP	NS	NS	mV	191	-58	-64	34	67	-64						-33

Notes:

PAL = RIDEMs Preventative Action Limit

RIDEM GA EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED GREEN

PALs EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED BLUE

< = NO DETECTS

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TABLE 2
GZ-22
DETECTED CONSTITUENTS SUMMARY

Quarterly ICMP
Charbert Facility
Richmond, Rhode Island

GZ-22 Deep Aquifer Monitoring Well Screen From 25'-30' BGS	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	Units	Date													
				Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/05/2009		04/01/2009		07/08/2009	
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit
VOLATILE ORGANICS																	
Vinyl Chloride	2	1	ug/L	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0
cis-1,2-Dichloroethene	70	35	ug/L	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0
Trichloroethene	5	2.5	ug/L	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0
Tetrachloroethene	5	2.5	ug/L	14	1.0	12	1.0	86	1.0	<	1.0	28	1.0	17	1.0	35	1.0
FIELD PARAMETERS																	
pH	NS	NS	SU	4.0	5.0	5.1	6.1	6.4	6.3							6.2	
CONDUCTIVITY	NS	NS	mS/cm	0.330	0.218	0.173	0.146	0.128	0.127							0.137	
TURBIDITY	NS	NS	NTU	5	5	25	31	126	141							NT	
DISSOLVED OXYGEN	NS	NS	mg/L	1.0	0.0	1.5	0.5	0.2	0.1							0.0	
TEMPERATURE	NS	NS	°C	15.8	15.1	15.9	16.6	11.7	11.0							14.0	
ORP	NS	NS	mV	198	91	32	154	81	12							76	

Notes:

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TABLE 3
GZ-23
DETECTED CONSTITUENTS SUMMARY

Quarterly ICMP
Charbert Facility
Richmond, Rhode Island

GZ-23	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	Units	Date													
				Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/05/2009		04/01/2009		07/08/2009	
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit
Shallow Aquifer Monitoring Well Screen From 10'-20' BGS																	
EPA 8260																	
VOLATILE ORGANICS																	
Vinyl Chloride	2	1	ug/L	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0
cis-1,2-Dichloroethene	70	35	ug/L	<	1.0	<	1.0	6.5	1.0	<	1.0	<	1.0	3	1.0	3.4	1.0
Trichloroethene	5	2.5	ug/L	<	1.0	1.8	1.0	27	1.0	1.8	1.0	1.4	1.0	14	1.0	21	1.0
Tetrachloroethene	5	2.5	ug/L	<	1.0	2.4	1.0	59	1.0	1.7	1.0	2	1.0	24	1.0	17	1.0
Mod. EPA 8100																	
TOTAL PETROLEUM HYDROCARBON																	
Hydrocarbon Content	NS	NS	ug/L	<	200	NT	NT	NT	NT	<	200	NT	NT	NT	NT	NT	NT
FIELD PARAMETERS																	
pH	NS	NS	SU	4.0	5.0	5.7	6.5	6.5	6.3								6.7
CONDUCTIVITY	NS	NS	mS/cm	0.339	0.428	0.254	0.109	0.129	0.481								0.335
TURBIDITY	NS	NS	NTU	157	0	224	12.2	4	2								59
DISSOLVED OXYGEN	NS	NS	mg/L	0.0	0.0	0.3	0.1	0.1	0.0								0.0
TEMPERATURE	NS	NS	°C	16.6	16.1	15.4	14.6	11.6	11.8								13.7
ORP	NS	NS	mV	-8	-60	-78	-106	25	-77								-39

Notes:

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TABLE 4
GZ-19
DETECTED CONSTITUENTS SUMMARY

Quarterly ICMP
Charbert Facility
Richmond, Rhode Island

GZ-19 Deep Aquifer Monitoring Well Screen From 25'-30' BGS	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	Units	Date														
				Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/05/2009		04/01/2009				
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit			
VOLATILE ORGANICS																		
EPA 8260	cis-1,2-Dichloroethene	70	35	ug/L	4.6	1.0	<	250	4.2	1.0	<	250	<	250	< 3	< 10		
	1,1,1-Trichloroethane	200	100	ug/L	13	1.0	<	250	9.0	1.0	<	250	<	250	< 3	< 10		
	Trichloroethene	5	2.5	ug/L	260	1.0	390	250	200	1.0	<	250	<	250	< 3	< 10		
	Tetrachloroethene	5	2.5	ug/L	16,000	1.0	20,000	250	19,000	1.0	16,000	250	8,400	250	2,900	3	1,300	10
FIELD PARAMETERS																		
	pH	NS	NS	SU	4.0		5.0		5.0		6.1		6.4		6.2			
	CONDUCTIVITY	NS	NS	mS/cm	0.338		0.453		0.106		0.085		0.114		0.211			
	TURBIDITY	NS	NS	NTU	68		1		240		31.7		4		3			
	DISSOLVED OXYGEN	NS	NS	mg/L	0.0		0.0		0.3		0.1		0.2		0.8			
	TEMPERATURE	NS	NS	°C	16.5		15.6		15.6		14		12.4		11.6			
	ORP	NS	NS	mV	24		79		105		113		51		58			

Notes:

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For the July 2008 sampling round GZ-19 and RIZ-7 data were inadvertently switched. The error was corrected and they appear as they should in these tables

TABLE 5
RIZ-7
DETECTED CONSTITUENTS SUMMARY

Quarterly ICMP
Charbert Facility
Richmond, Rhode Island

RIZ-7	RIDEM GA	RIDEM Groundwater	Units	Date												
				Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/05/2009		04/01/2009		
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	
Shallow Aquifer Monitoring Well Screen From 5'-15' BGS	Groundwater Objectives	Quality PALs														
VOLATILE ORGANICS																
EPA 8260	Vinyl Chloride	2	1	ug/L	15	1.0	120	1.0	85	2.5	100	1.0	130	1.0	150	1.0
	trans-1,2-Dichloroethene	100	50	ug/L	<	1.0	2.6	1.0	3.1	2.5	3	1.0	3.6	1.0	5.6	1.0
	cis-1,2-Dichloroethene	70	35	ug/L	2.5	1.0	64	1.0	41	2.5	54	1.0	100	1.0	190	1.0
	Trichloroethene	5	2.5	ug/L	<	1.0	<	1.0	<	2.5	<	1.0	<	1.0	<	0.0
	Tetrachloroethene	5	2.5	ug/L	<	1.0	<	1.0	7	2.5	<	1.0	<	1.0	<	1.0
	Ethylbenzene	700	350	ug/L	<	1.0	2.7	1.0	2.8	2.5	<	1.0	<	1.0	<	1.0
	m&p-Xylene	NS	NS	ug/L	<	2.0	2.9	2.0	<	5.0	<	2.0	<	2.0	<	2.0
	o-Xylene	NS	NS	ug/L	1.7	1.0	2.6	1.0	3.2	2.5	1.6	1.0	1.3	1.0	<	1.0
	Total Xylenes	1000	500	ug/L	1.7	2.0	5.7	2.0	3.2	5.0	1.6	2.0	<	2.0	<	2.0
	2-Chlorotoluene	NS	NS	ug/L	1.0	1.0	1.2	1.0	<	2.5	3.2	1.0	3	1.0	2.8	1.0
	N-Propylbenzene	NS	NS	ug/L	<	1.0	<	1.0	1.0	2.5	<	1.0	<	1.0	<	1.0
	sec-Butylbenzene	NS	NS	ug/L	<	1.0	<	1.0	1.0	2.5	<	1.0	<	1.0	<	1.0
Mod. EPA 8100	TOTAL PETROLEUM HYDROCARBON															
	Hydrocarbon Content	NS	NS	ug/L	300	200	NT		NT		NT		570	200	NT	
	FIELD PARAMETERS															
	pH	NS	NS	SU	4.0	5.0	6.1	6.4	6.7	6.4	7.6					
	CONDUCTIVITY	NS	NS	mS/cm	0.786	0.748	0.357	0.249	0.316	0.090	0.474					
	TURBIDITY	NS	NS	NTU	5	0	153	20	0	3	4					
	DISSOLVED OXYGEN	NS	NS	mg/L	0.0	0.0	0.2	0.0	0.1	0.0	0.0					
	TEMPERATURE	NS	NS	°C	16.5	14.4	15.8	15.8	13.1	10.7	13.6					
	ORP	NS	NS	mV	-23	-53	-112	-117	5	-92	-46					

Notes:

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For the July 2008 sampling round GZ-19 and RIZ-7 data were inadvertently switched. The error was corrected and they appear as they should in these tables.

TABLE 6
GP-28
DETECTED CONSTITUENTS SUMMARY

Quarterly ICMP
Charbert Facility
Richmond, Rhode Island

GP-28 Shallow Aquifer Monitoring Well Screen From 3'-15' BGS		RIDEIM GA Groundwater Objectives	RIDEIM Groundwater Quality PALs	Units	Date													
					Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/05/2009		04/01/2009		07/08/2009	
					Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit
VOLATILE ORGANICS																		
EPA 8260	Vinyl Chloride	2	1	ug/L	1,200	5.0	180	2.5	<	1.0	10	1.0	140	1.0	52	50.0	440	5.0
	cis-1,2-Dichloroethene	70	35	ug/L	1,400	5.0	200	2.5	6.2	1.0	2.9	1.0	940	1.0	2,900	50.0	560	5.0
	Trichloroethene	5	2.5	ug/L	<	5.0	<	2.5	<	1.0	<	1.0	350	1.0	<	50.0	23	5.0
	Tetrachloroethene	5	2.5	ug/L	<	5.0	<	2.5	<	1.0	<	1.0	2,900	1.0	<	50.0	15	5.0
	trans-1,2-Dichloroethene	100	50	ug/L	11	5.0	<	2.5	<	1.0	<	1.0	<	25.0	<	50.0	7	5.0
	Ethylbenzene	700	350	ug/L	<	5.0	<	2.5	1.2	1.0	<	1.0	<	1.0	<	50.0	<	5.0
	o-Xylene	NS	NS	ug/L	<	5.0	<	2.5	1.8	1.0	1.9	1.0	<	1.0	<	50.0	<	5.0
	Total Xylenes	1000	500	ug/L	<	10	<	5.0	1.8	2.0	<	2.0	<	2.0	<	50.0	<	10.0
	2-Chlorotoluene	NS	NS	ug/L	<	5.0	<	2.5	1.3	1.0	1.0	1.0	<	1.0	<	50.0	<	5.0
TOTAL PETROLEUM HYDROCARBON																		
Mod. EPA 8100		Hydrocarbon Content	NS	NS	ug/L	350	200	NT	NT	NT	NT	NT	290	200	NT	NT	NT	
FIELD PARAMETERS																		
		pH	NS	NS	SU	4.0	5.0	5.5	6.5	6.9	6.8	7.2						
		CONDUCTIVITY	NS	NS	mS/cm	0.900	0.492	0.700	0.410	0.135	0.191	0.230						
		TURBIDITY	NS	NS	NTU	5	30	270	116	420	399	11						
		DISSOLVED OXYGEN	NS	NS	mg/L	0.0	0.0	0.6	0.1	0.32	0	0.71						
		TEMPERATURE	NS	NS	°C	12.0	11.1	17.6	16.8	5.9	7.9	19.6						
		ORP	NS	NS	mV	-47	-71	-112	-144	8	-117	-96						

Notes:

PAL = RIDEIMs Preventative Action Limit

RIDEIM GA EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED GREEN

PALs EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED BLUE

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TABLE 7
RIZ-5
DETECTED CONSTITUENTS SUMMARY

Quarterly ICMP
Charbert Facility
Richmond, Rhode Island

RIZ-5 Shallow Aquifer Monitoring Well Screen From 9.5'-19.5' BGS	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	Units	Date												
				Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/05/2009		04/01/2009		
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	
VOLATILE ORGANICS																
EPA 8260	Vinyl Chloride	2	1	ug/L	<	1.0	<	1.0	<	2.5	<	1.0	<	1.0	<	1.0
	cis-1,2-Dichloroethene	70	35	ug/L	2.9	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0
	Trichloroethene	5	2.5	ug/L	2.4	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0
	Tetrachloroethene	5	2.5	ug/L	5.3	1.0	<	1.0	<	1.0	<	1.0	1.9	1.0	<	1.0
Mod. EPA 8100	TOTAL PETROLEUM HYDROCARBON															
	Hydrocarbon Content	NS	NS	ug/L	<	200	NT	NT	NT	NT	<	200	NT	NT	NT	NT
	FIELD PARAMETERS															
	pH	NS	NS	SU	4.0	5.0	5.6	6.0	6.6	7.0	7.0	7.0	7.0	7.0	6.3	6.3
	CONDUCTIVITY	NS	NS	mS/cm	0.465	0.919	0.181	0.226	0.353	0.221	0.221	0.221	0.221	0.221	0.165	0.165
	TURBIDITY	NS	NS	NTU	64	110	713	325	1	5	5	5	5	5	3	3
	DISSOLVED OXYGEN	NS	NS	mg/L	0.0	7.0	7.4	8.59	3.55	12.51	12.51	12.51	12.51	12.51	10.3	10.3
	TEMPERATURE	NS	NS	°C	14.7	13.5	14.2	14.5	11.4	11.5	11.5	11.5	11.5	11.5	12.9	12.9
	ORP	NS	NS	mV	26	135	140	154	143	42	42	42	42	42	119	119

Notes:

PAL = RIDEMs Preventative Action Limit

RIDEM GA EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED GREEN

PALs EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED BLUE

ND = NO DETECTS

NS = NO STANDARD

NT = NOT TESTED

BGS = BELOW GROUND SURFACE

TABLE 8
GZ-20
DETECTED CONSTITUENTS SUMMARY

Quarterly ICMP
Charbert Facility
Richmond, Rhode Island

GZ-20	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	Units	Date															
				Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/05/2009		04/01/2009					
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result			
EPA 8260																			
VOLATILE ORGANICS																			
Vinyl Chloride	2	1	ug/L	1.2	1.0	1.3	1.0	<	5.0	<	5.0	35	5.0	48	10.0	71	10.0		
cis-1,2-Dichloroethene	70	35	ug/L	52	1.0	64	1.0	120	5.0	230	5.0	500	5.0	600	10.0	830	10.0		
Trichloroethene	5	2.5	ug/L	52	1.0	60	1.0	99	5.0	180	5.0	400	5.0	520	10.0	690	10.0		
Tetrachloroethene	5	2.5	ug/L	89	1.0	130	1.0	230	5.0	430	5.0	880	5.0	110	10.0	1200	10.0		
FIELD PARAMETERS																			
pH	NS	NS	SU	4.0		5.0		5.4		6.1		6.4		6.4		6.4			
CONDUCTIVITY	NS	NS	mS/cm	0.346		0.220		0.124		0.139		0.132		0.148		0.163			
TURBIDITY	NS	NS	NTU	280		165		585		118		42		185		52			
DISSOLVED OXYGEN	NS	NS	mg/L	0.0		0.0		0.6		0.1		0.23		1.0		0.0			
TEMPERATURE	NS	NS	°C	15.3		14.6		15.0		14.4		12.0		11.9		14.5			
ORP	NS	NS	mV	8		-38		66		73		86		40		86			

Notes:

PAL = RIDEMs Preventative Action Limit

RIDEM GA EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED GREEN

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TABLE 9
RIZ-1
DETECTED CONSTITUENTS SUMMARY

Quarterly ICMP
Charbert Facility
Richmond, Rhode Island

RIZ-1	RIDEM GA	RIDEM Groundwater	Units	Date											
				Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/06/2009		04/01/2009	
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit
Shallow Aquifer Monitoring Well Screen From 5'-15' BGS	Groundwater Objectives	Quality PALs													
EPA 8260															
VOLATILE ORGANICS															
Vinyl Chloride	2	1	ug/L	<	1.0	NT		<	1.0	NT		<	1.0	<	1.0
cis-1,2-Dichloroethene	70	35	ug/L	<	1.0	NT		<	1.0	NT		<	1.0	<	1.0
Trichloroethene	5	2.5	ug/L	<	1.0	NT		<	1.0	NT		<	1.0	<	1.0
Tetrachloroethene	5	2.5	ug/L	<	1.0	NT		<	1.0	NT		<	1.0	<	1.0
Mod. EPA 8100															
TOTAL PETROLEUM HYDROCARBON															
Hydrocarbon Content	NS	NS	ug/L	<	200	NT		NT		NT		<	200	NT	NT
FIELD PARAMETERS															
pH	NS	NS	SU	4.0		NT		NT		5.42		5.5		5.8	5.3
CONDUCTIVITY	NS	NS	mS/cm	0.912		NT		NT		0.199		0.342		0.79	0.962
TURBIDITY	NS	NS	NTU	5		NT		NT		1		3		5	3.4
DISSOLVED OXYGEN	NS	NS	mg/L	4.0		NT		NT		3		5.6		7.3	7.1
TEMPERATURE	NS	NS	°C	13.5		NT		NT		19.2		11.3		9.2	16.1
ORP	NS	NS	mV	256		NT		NT		248		222		115	222

Notes:

PAL = RIDEMs Preventative Action Limit

RIDEM GA EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED GREEN

PALs EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED BLUE

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TABLE 10
GP-26
DETECTED CONSTITUENTS SUMMARY

Quarterly ICMP
 Charbert Facility
 Richmond, Rhode Island

GP-26	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	Units	Date															
				Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/05/2009		04/01/2009		07/08/2009			
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit
Shallow Aquifer Monitoring Well Screen From 4'-16' BGS																			
EPA 8260	VOLATILE ORGANICS																		
Vinyl Chloride	2	1	ug/L	530	25	100	1.0	100	5.0	16	10	96	10	9	2.5	81	10.0		
1,1-Dichloroethene	7	3.5	ug/L	<	25	1.1	1.0	<	5.0	<	10	<	10	<	2.5	<	10.0		
trans-1,2-Dichloroethene	100	50	ug/L	70	25	20	1.0	<	5.0	19	10	<	10	<	2.5	<	10.0		
cis-1,2-Dichloroethene	70	35	ug/L	6,800	25	2,100	1.0	160	5.0	2,300	100	1,200	100	110	2.5	910	10.0		
Trichloroethene	5	2.5	ug/L	1,200	25	2,500	1.0	82	5.0	2,300	100	1,600	100	120	2.5	310	10.0		
Tetrachloroethene	5	2.5	ug/L	1,800	25	4,100	1.0	330	5.0	2,900	100	2,100	100	210	2.5	330	10.0		
Mod. EPA 8100	TOTAL PETROLEUM HYDROCARBON																		
Hydrocarbon Content	NS	NS	ug/L	800	200	NT		NT		NT		NT		450	200	NT		NT	
FIELD PARAMETERS																			
pH	NS	NS	SU	4.0		6.0		5.3		6.5		6.8		6.6		7.0			
CONDUCTIVITY	NS	NS	mS/cm	3.00		3.49		0.462		0.341		0.490		0.267		0.449			
TURBIDITY	NS	NS	NTU	5		1		51		31		5		35		19			
DISSOLVED OXYGEN	NS	NS	mg/L	0.0		0.0		0.3		0.3		0.3		0		0			
TEMPERATURE	NS	NS	°C	13.9		12.5		14.6		17.7		10.4		10.6		15.4			
ORP	NS	NS	mV	31		61		-40		-8		89		10		-24			

Notes:

PAL = RIDEMs Preventative Action Limit

RIDEM GA EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED GREEN

PALs EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED BLUE

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TABLE 11
GZ-7
DETECTED CONSTITUENTS SUMMARY

Quarterly ICMP
Charbert Facility
Richmond, Rhode Island

GZ-7 Deep Aquifer Monitoring Well Screen From 33'-43' BGS	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	Units	Date											
				Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/05/2009		04/01/2009	
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit
EPA 8260															
Vinyl Chloride	2	1	ug/L	<	1.0	<	1.0	1.3	1.0	<	1.0	<	1.0	<	1.0
cis-1,2-Dichloroethene	70	35	ug/L	<	1.0	13	1.0	140	1.0	33	1.0	4.2	1.0	72	1.0
Trichloroethene	5	2.5	ug/L	<	1.0	74	1.0	140	1.0	37	1.0	<	1.0	97	1.0
Tetrachloroethene	5	2.5	ug/L	<	1.0	26	1.0	15	1.0	7.1	1.0	<	1.0	30	1.0
FIELD PARAMETERS															
pH	NS	NS	SU	4.0	5.0	5.5	6.34	7.2	6.6	7.72					
CONDUCTIVITY	NS	NS	mS/cm	0.223	0.359	0.226	0.106	0.168	0.185	0.175					
TURBIDITY	NS	NS	NTU	5	5	17	0.3	4	1.4	2					
DISSOLVED OXYGEN	NS	NS	mg/L	0.0	0.0	1.0	0.4	0.3	0.0	0.0					
TEMPERATURE	NS	NS	°C	14.5	14.3	13.9	13.9	12.2	12.6	13.5					
ORP	NS	NS	mV	-8	-55	-80	-48	-18	-74	-98					

Notes:

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RIDEM GA EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED GREEN

PALs EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED BLUE

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TABLE 12
GZ-3
DETECTED CONSTITUENTS SUMMARY

Second Quarter ICMP
 Charbert Facility
 Richmond, Rhode Island

GZ-3 Deep Aquifer Monitoring Well Screen From 30'-40' BGS	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	Units	Date													
				Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/06/2009		04/01/2009			
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit		
VOLATILE ORGANICS																	
Vinyl Chloride	2	1	ug/L	<	1.0	<	1.0	3.1	1.0	<	10	8.1	10	16	5	19	5
cis-1,2-Dichloroethene	70	35	ug/L	9.3	1.0	16	1.0	65	1.0	86	10	110	10	180	5	180	5
Trichloroethene	5	2.5	ug/L	10	1.0	17	1.0	91	1.0	93	10	81	10	150	5	180	5
Tetrachloroethene	5	2.5	ug/L	12	1.0	22	1.0	440	1.0	180	10	160	10	450	5	560	5
FIELD PARAMETERS																	
pH	NS	NS	SU	4.0	5.0	5.1	6.5	6.2	6.4	7.4							
CONDUCTIVITY	NS	NS	mS/cm	0.339	0.392	0.206	0.114	0.415	0.419	0.171							
TURBIDITY	NS	NS	NTU	5	5	34	7	5	4	19							
DISSOLVED OXYGEN	NS	NS	mg/L	0.0	0.0	0.7	0.28	0.25	0	0							
TEMPERATURE	NS	NS	°C	15.4	15.4	14.8	14.6	12.4	12.2	13.1							
ORP	NS	NS	mV	-15	8	-22	-41	49	-25	-41							

Notes:

PAL = RIDEMs Preventative Action Limit

RIDEM GA EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED GREEN

PALs EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED BLUE

ND = NO DETECTS

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TABLE 13
RIZ-13
DETECTED CONSTITUENTS SUMMARY

Quarterly ICMP
Charbert Facility
Richmond, Rhode Island

RIZ-13 Shallow Aquifer Monitoring Well Screen From 14'-24' BGS	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	Units	Date														
				Baseline 1/2/2008		04/01/2008		07/07/2008		10/01/2008		01/06/2009		04/01/2009		07/09/2009		
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	
VOLATILE ORGANICS																		
EPA 8260	Vinyl Chloride	2	1	ug/L	4.4	1.0	<	1.0	<	1.0	<	1.0	1.1	1.0	<	1.0	<	1.0
	Tetrahydrofuran	NS	NS	ug/L	<	10.0	<	10.0	<	10.0	<	10.0	<	10.0	<	10.0	17	10.0
	cis-1,2-Dichloroethene	70	35	ug/L	6.6	1.0	<	1.0	<	1.0	<	1.0	3.8	1.0	<	1.0	<	1.0
	Trichloroethene	5	2.5	ug/L	5.6	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0
	Tetrachloroethene	5	2.5	ug/L	6.9	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0	<	1.0
Mod. EPA 8100	TOTAL PETROLEUM HYDROCARBON																	
	Hydrocarbon Content	NS	NS	ug/L	<	200	NT	NT	NT	NT	NT	NT	1,100	200	NT	NT	NT	
	FIELD PARAMETERS																	
	pH	NS	NS	SU	5.0	6.0		4.8	6.83	5.8		5.6		4.5				
	CONDUCTIVITY	NS	NS	mS/cm	0.392	0.900		0.773	0.361	0.875		0.571		0.562				
	TURBIDITY	NS	NS	NTU	3	5		208	54.8	4		88		22.2				
	DISSOLVED OXYGEN	NS	NS	mg/L	1.0	10.0		12.0	7.7	5.7		10.1		8.9				
	TEMPERATURE	NS	NS	°C	14.8	14.8		15.6	16.2	12.4		9.8		13.3				
	ORP	NS	NS	mV	28	56		34	-9	176		109		290				

Notes:

PAL = RIDEMs Preventative Action Limit

RIDEM GA EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED GREEN

PALs EXCEEDANCES ARE IN BOLD AND HIGHLIGHTED BLUE

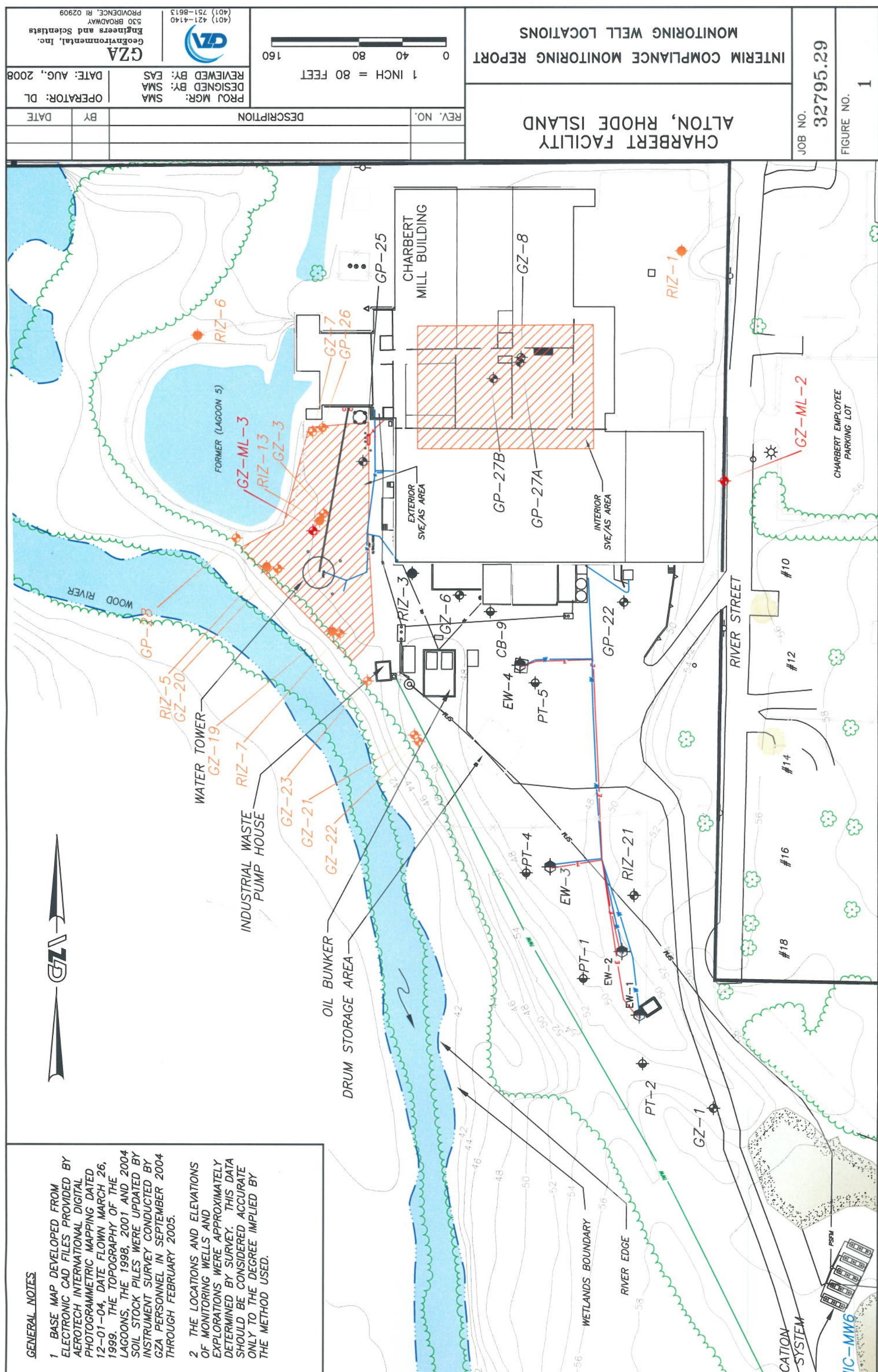
ND = NO DETECTS

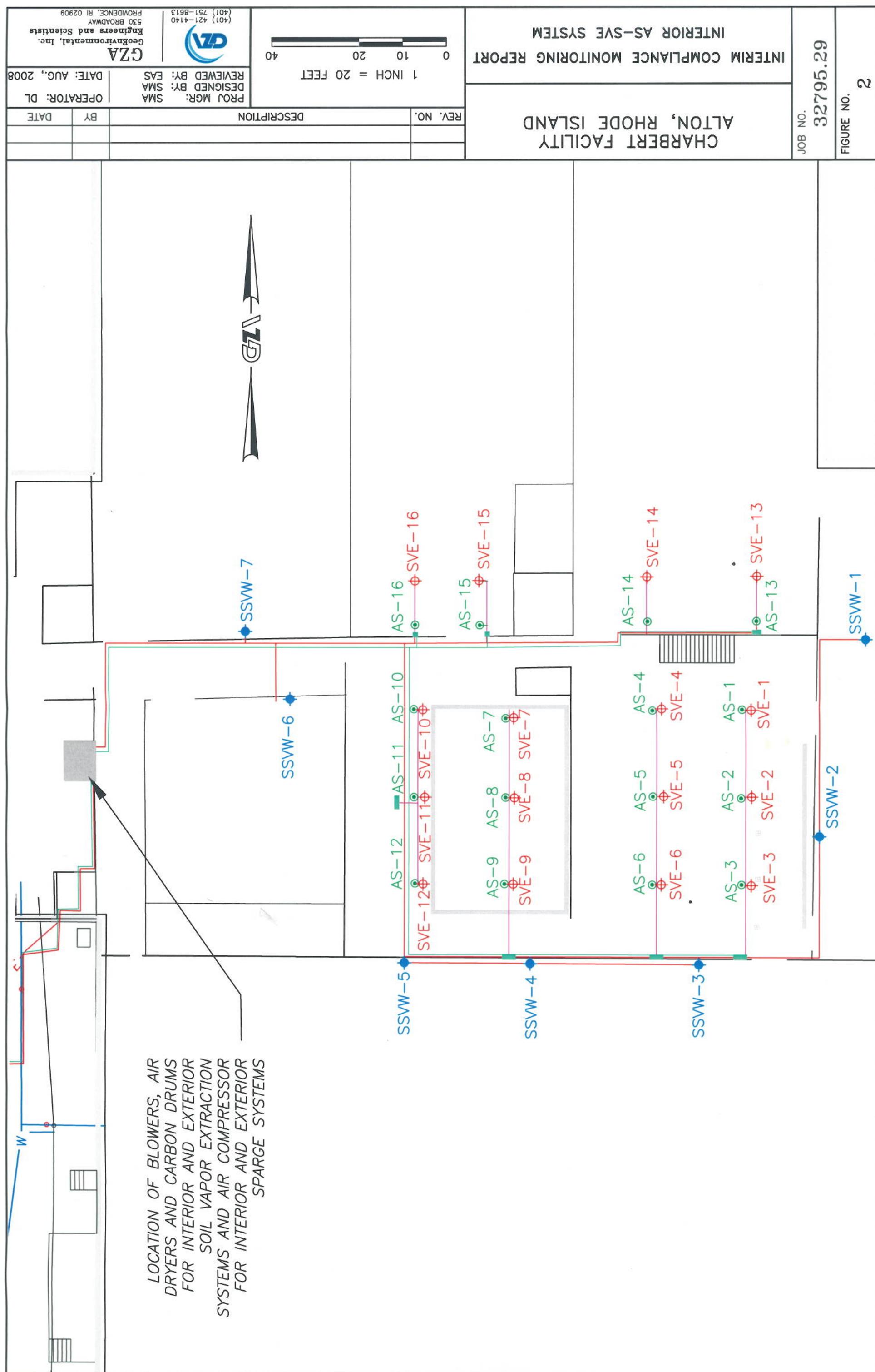
NS = NO STANDARD

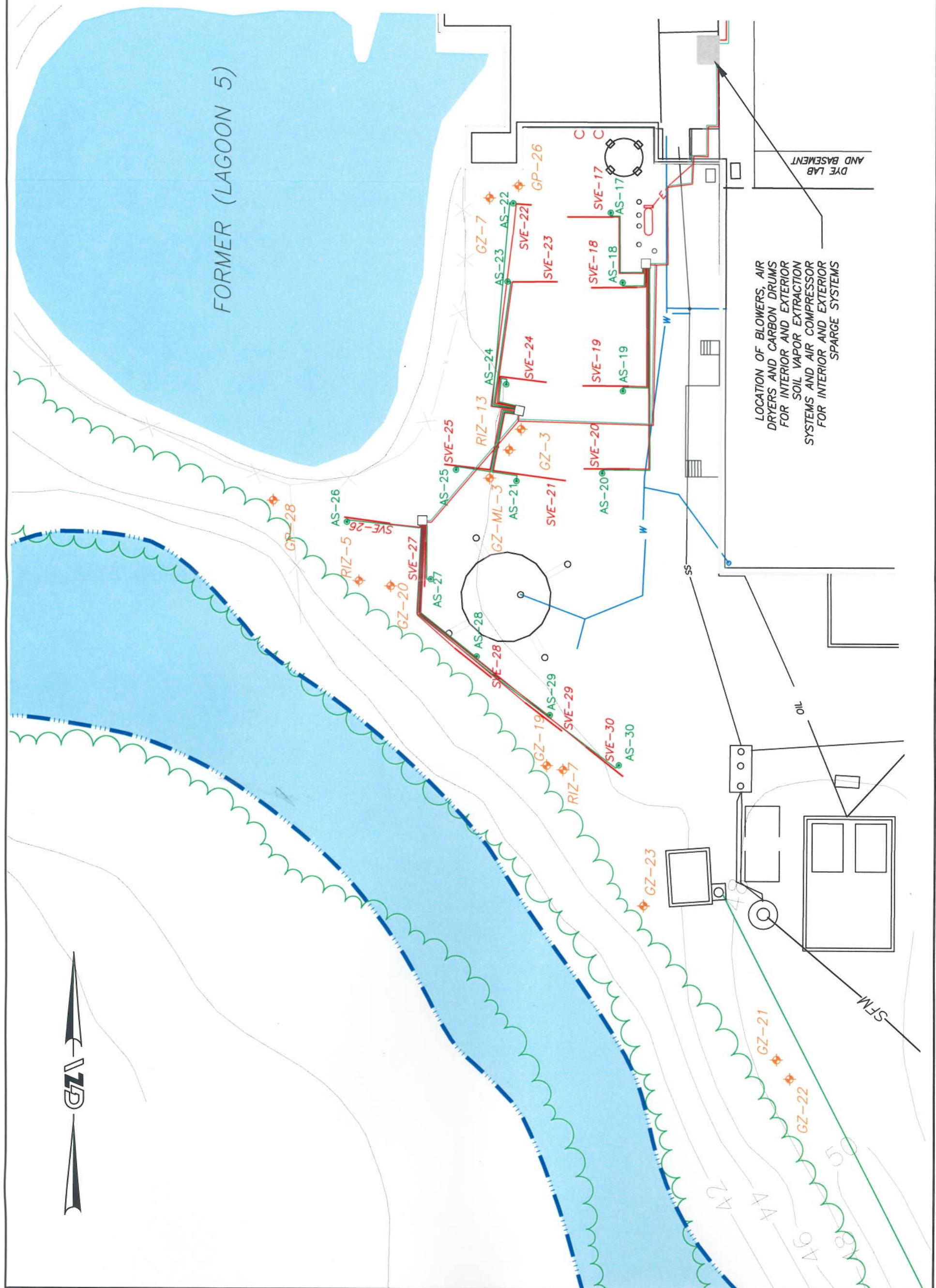
NT = NOT TESTED

BGS = BELOW GROUND SURFACE

FIGURES







APPENDIX A

LIMITATIONS

GEOHYDROLOGICAL LIMITATIONS

1. The conclusions and recommendations submitted in this report are based in part upon the data obtained from a limited number of soil samples from widely spaced subsurface explorations. The nature and extent of variations between these explorations may not become evident until further investigation. If variations or other latent conditions then appear evident, it will be necessary to reevaluate the recommendations of this report.
2. The generalized soil profile described in the text is intended to convey trends in subsurface conditions. The boundaries between strata are approximate and idealized and have been developed by interpretations of widely spaced explorations and samples; actual soil transitions are probably more gradual. For specific information, refer to the boring logs.
3. Water level readings have been made in the test pits, borings and/or observation wells at times and under conditions stated on the exploration logs. These data have been reviewed and interpretations have been made in the text of this report. However, it must be noted that fluctuations in the level of the groundwater may occur due to variations in rainfall and other factors different from those prevailing at the time measurements were made.
4. The conclusions and recommendations contained in this report are based in part upon various types of chemical data and are contingent upon their validity. These data have been reviewed and interpretations made in the report. As indicated within the report, some of these data are preliminary "screening" level data, and should be confirmed with quantitative analyses if more specific information is necessary. Moreover, it should be noted that variations in the types and concentrations of contaminants and variations in their flow paths may occur due to seasonal water table fluctuations, past disposal practices, the passage of time, and other factors. Should additional chemical data become available in the future, these data should be reviewed by GZA, and the conclusions and recommendations presented therein modified accordingly.
5. Chemical analyses have been performed for specific parameters during the course of this study, as detailed in the text. It must be noted that additional constituents not searched for during the current study may be present in soil and groundwater at the site.
6. It is recommended that this firm be retained to provide further engineering services during design, implementation, and/or construction of any remedial measures, if necessary. This is to observe compliance with the concepts and recommendations contained herein and to allow design changes in the event that subsurface conditions differ from those anticipated.

APPENDIX B

LABORATORY CERTIFICATES OF ANALYSIS



GZA GeoEnvironmental, Inc.

106 South Street

Hopkinton, MA 01748

(781) 278-4700

Laboratory Identification Numbers:

MA and ME: **MA092** NH: **2028**

CT: **PH0579** RI: **LA000236**

NELAC - NYS DOH: **11063**

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.

140 Broadway

Providence, RI 02903

Stephen Andrus / Angela Harvey

Project No.: **03.0032795.29**

Work Order No.: **0907-00067**

Date Received: **07/10/2009**

Date Reported: **07/15/2009**

SAMPLE INFORMATION

Date Sampled	Matrix	Laboratory ID	Sample ID
07/08/2009	Aqueous	0907-00067 001	GZ-7
07/08/2009	Aqueous	0907-00067 002	GP-26
07/08/2009	Aqueous	0907-00067 003	GZ-3
07/08/2009	Aqueous	0907-00067 004	GP-28
07/08/2009	Aqueous	0907-00067 005	RIZ-5
07/08/2009	Aqueous	0907-00067 006	GZ-20
07/08/2009	Aqueous	0907-00067 007	GZ-19
07/08/2009	Aqueous	0907-00067 008	GZ-23
07/09/2009	Aqueous	0907-00067 009	GZ-21
07/08/2009	Aqueous	0907-00067 010	GZ-22
07/09/2009	Aqueous	0907-00067 011	RIZ-13
07/08/2009	Aqueous	0907-00067 012	RIZ-7
07/08/2009	Aqueous	0907-00067 013	GZ-100
07/08/2009	Aqueous	0907-00067 014	Trip Blank



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Hopkinton, MA 01748
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Page 2 of 45

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

PROJECT NARRATIVE:

1. Sample Receipt

The samples were received on 07/10/09 via x GZA courier, EC, FEDEX, or hand delivered. The temperature of the temperature blank/x cooler air, was 4.0 degrees C. The temperature requirement for most analyses is above freezing to 6 degrees C. The samples were received intact for all requested analyses.

The chain of custody indicates that the samples, when required, were chemically preserved in accordance with the method they reference.

2. EPA Method 8260 - VOCs

Sample RIZ-7 (0907-67-012) was analyzed at a 1/5 dilution based upon screening information and in order to report all target analytes within the calibration range of the instrument.

Samples GZ-3 (0907-67-003) and GP-28 (0907-67-004) were analyzed at a 1/10 dilution based upon screening information and in order to report all target analytes within the calibration range of the instrument.

Samples GP-26 (0907-67-002), GZ-20 (0907-67-006), GZ-19 (0907-67-007) and GZ-100 (0907-67-013) were analyzed at a 1/25 dilution based upon screening information and in order to report all target analytes within the calibration range of the instrument.

Attach QC 8260 07/14/09 #2 S - Aqueous



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Page 3 of 45

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Data Authorized By:

NELAC certification, as indicated by the NELAC Lab ID Number, is per analyte. For a complete list of NELAC validated analytes, please contact the laboratory.

Abbreviations:

% R = % Recovery
DF = Dilution Factor
DFS = Dilution Factor Solids
CF = Calculation Factor
DO = Diluted Out

Method Key:

Method 8260: The current version of the method is 8260B.
Method 8270: The current version of the method is 8270D.
Method 6010: The current version of the method is 6010B.

Please note that the laboratory signed copy of the chain of custody record is an integral part of the data report.

The laboratory report shall not be reproduced except in full without the written consent of the laboratory.

Soil data is reported on a dry weight basis unless otherwise specified.
Matrix Spike / Matrix Spike Duplicate sets are performed as per method and are reported at the end of the analytical report if assigned on the Chain of Custody.



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Page 4 of 45

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	GZ-7	Sample No.:	001
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	2.2	1.0	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	100	1.0	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	42	1.0	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009



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Page 5 of 45

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	GZ-7	Sample No.:	001
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	18	1.0	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	93.0	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	103	70-130	% R	MQS	07/15/2009



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Page 6 of 45

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-7**
Sample Date: **07/08/2009**

Sample No.: **001**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	102 1.0	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



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106 South Street
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Page 7 of 45

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	GP-26	Sample No.:	002
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	81	10	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Diethyl ether	EPA 8260	<50	50	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<250	250	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<10	10	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<250	250	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	910	10	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<100	100	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	310	10	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<250	250	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<20	20	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<250	250	ug/L	MQS	07/15/2009



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Page 8 of 45

A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	GP-26	Sample No.:	002
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	330	10	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<20	20	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<50	50	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<20	20	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	91.5	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	102	70-130	% R	MQS	07/15/2009



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Page 9 of 45

A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GP-26** Sample No.: **002**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	102 10	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	GZ-3	Sample No.:	003
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	19	5.0	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<25	25	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<130	130	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<130	130	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	180	5.0	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<50	50	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	180	5.0	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<130	130	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<130	130	ug/L	MQS	07/15/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	GZ-3	Sample No.:	003
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	560	5.0	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<25	25	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	92.9	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	102	70-130	% R	MQS	07/15/2009



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Page 12 of 45

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-3**

Sample No.: **003**

Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	100 5.0	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GP-28** Sample No.: **004**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	440	5.0	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<25	25	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<130	130	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	7.0	5.0	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<130	130	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	560	5.0	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<50	50	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	23	5.0	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<130	130	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<130	130	ug/L	MQS	07/15/2009



A N A L Y T I C A L R E P O R T

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Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	GP-28	Sample No.:	004
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	15	5.0	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<25	25	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	92.9	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	101	70-130	% R	MQS	07/15/2009



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Page 15 of 45

A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GP-28** Sample No.: **004**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	98.7 5.0	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **RIZ-5** Sample No.: **005**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009



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Page 17 of 45

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	RIZ-5	Sample No.:	005
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	94.7	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	102	70-130	% R	MQS	07/15/2009



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Page 18 of 45

A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **RIZ-5**

Sample No.: **005**

Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	101 1.0	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	GZ-20	Sample No.:	006
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	71	10	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<50	50	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<250	250	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<10	10	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<250	250	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	830	10	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<100	100	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	690	10	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<250	250	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<20	20	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<250	250	ug/L	MQS	07/15/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-20** Sample No.: **006**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	1200	10	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<20	20	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<50	50	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<20	20	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	97.5	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	102	70-130	% R	MQS	07/15/2009



GZA GeoEnvironmental, Inc.
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Page 21 of 45

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-20**

Sample No.: **006**

Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	104 10	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	GZ-19	Sample No.:	007
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<50	50	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<250	250	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<10	10	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<250	250	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<100	100	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<250	250	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<20	20	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<250	250	ug/L	MQS	07/15/2009



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Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-19** Sample No.: **007**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	1300	10	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<20	20	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<50	50	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<20	20	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	95.2	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	102	70-130	% R	MQS	07/15/2009



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Page 24 of 45

A N A L Y T I C A L R E P O R T

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Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-19**

Sample No.: **007**

Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	102 10	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
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Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-23** Sample No.: **008**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	3.4	1.0	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	21	1.0	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009



A N A L Y T I C A L R E P O R T

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Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-23** Sample No.: **008**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	17	1.0	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	96.3	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	101	70-130	% R	MQS	07/15/2009



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Page 27 of 45

A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-23** Sample No.: **008**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	101 1.0	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-21** Sample No.: **009**
Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	1.0	1.0	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	1.4	1.0	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-21** Sample No.: **009**
Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	4.1	1.0	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	94.4	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	102	70-130	% R	MQS	07/15/2009



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Page 30 of 45

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-21** Sample No.: **009**
Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	104 1.0	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	GZ-22	Sample No.:	010
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009



A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-22** Sample No.: **010**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	35	1.0	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	89.8	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	101	70-130	% R	MQS	07/15/2009



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Page 33 of 45

A N A L Y T I C A L R E P O R T

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140 Broadway
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-22**

Sample No.: **010**

Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	103 1.0	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **RIZ-13** Sample No.: **011**
Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	17	10	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009



A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **RIZ-13** Sample No.: **011**
Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	94.4	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	102	70-130	% R	MQS	07/15/2009



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Page 36 of 45

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **RIZ-13**

Sample No.: **011**

Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	104 1.0	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	RIZ-7	Sample No.:	012
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	130	2.5	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<13	13	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<63	63	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	5.4	2.5	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<63	63	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	160	2.5	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<25	25	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<63	63	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<63	63	ug/L	MQS	07/15/2009



A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	RIZ-7	Sample No.:	012
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	3.6	2.5	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<13	13	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<2.5	2.5	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	98.6	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	104	70-130	% R	MQS	07/15/2009



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Page 39 of 45

A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **RIZ-7**

Sample No.: **012**

Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	104 2.5	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-100** Sample No.: **013**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	74	10	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<50	50	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<250	250	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<10	10	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<250	250	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	860	10	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<100	100	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	740	10	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<250	250	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<20	20	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<250	250	ug/L	MQS	07/15/2009



A N A L Y T I C A L R E P O R T

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Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-100** Sample No.: **013**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	1400	10	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<20	20	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<20	20	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<50	50	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<20	20	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<10	10	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	92.2	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	102	70-130	% R	MQS	07/15/2009



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Page 42 of 45

A N A L Y T I C A L R E P O R T

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Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **GZ-100** Sample No.: **013**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	104 10	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009



A N A L Y T I C A L R E P O R T

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Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	Trip Blank	Sample No.:	014
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/15/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Vinyl Chloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrahydrofuran	EPA 8260	<10	10	ug/L	MQS	07/15/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Trichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/15/2009



A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID:	Trip Blank	Sample No.:	014
Sample Date:	07/08/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Tetrachloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Dibromochloromethane	EPA 8260	1.1	1.0	ug/L	MQS	07/15/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/15/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/15/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/15/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	93.6	70-130	% R	MQS	07/15/2009
***Toluene-D8	EPA 8260	102	70-130	% R	MQS	07/15/2009



GZA GeoEnvironmental, Inc.
106 South Street
Hopkinton, MA 01748
(781) 278-4700

Page 45 of 45

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/15/2009**
Work Order No.: **0907-00067**

Sample ID: **Trip Blank** Sample No.: **014**
Sample Date: **07/08/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	101 1.0	70-130	% R CF	MQS MQS	07/15/2009 07/14/2009

Method Blank

Date Analyzed:	7/14/2009 2		Laboratory Control Sample			Laboratory Control Sample Duplicate			RPD	Limit	Verdict	
	Conc. ug/L	Acceptance Limit	Date Analyzed:	Spike Concentration = 20ug/L	% Recovery	Acceptance Limits	Verdict	% Recovery	Acceptance Limits	Verdict		
Volatile Organics			dichlorodifluoromethane	94.6	70-130	ok	97.1	70-130	ok	2.60	<25	ok
dichloromethane	< 1.0	< 1.0	chloromethane	115	70-130	ok	114	70-130	ok	0.22	<25	ok
vinyl chloride	< 0.5	< 0.5	vinyl chloride	96.5	80-120	ok	98.3	70-130	ok	1.85	<25	ok
bromomethane	< 1.0	< 1.0	bromomethane	92.2	70-130	ok	90.6	70-130	ok	1.74	<25	ok
chloroethane	< 0.5	< 0.5	chloroethane	95.1	70-130	ok	95.1	70-130	ok	0.00	<25	ok
trichlorofluoromethane	< 1.0	< 1.0	trichlorofluoromethane	86.0	70-130	ok	84.7	70-130	ok	1.46	<25	ok
diethyl ether	< 2.5	< 2.5	diethyl ether	91.4	70-130	ok	87.1	70-130	ok	4.88	<25	ok
acetone	< 13	< 13	acetone	103	70-130	ok	97.4	70-130	ok	6.00	<25	ok
1,1-dichloroethene	< 0.5	< 0.5	1,1-dichloroethene	95.7	80-120	ok	95.1	70-130	ok	0.60	<25	ok
FREON-113	< 1.0	< 1.0	FREON-113	86.9	70-130	ok	89.8	70-130	ok	3.34	<25	ok
iodomethane	< 0.5	< 0.5	iodomethane	80.1	70-130	ok	78.5	70-130	ok	2.01	<25	ok
carbon disulfide	< 5.0	< 5.0	carbon disulfide	104	70-130	ok	105	70-130	ok	1.16	<25	ok
dichloromethane	< 1.0	< 1.0	dichloromethane	96.0	70-130	ok	94.2	70-130	ok	1.82	<25	ok
tert-butyl alcohol (TBA)	< 13	< 13	tert-butyl alcohol (TBA)	84.9	70-130	ok	76.7	70-130	ok	10.1	<25	ok
acrylonitrile	< 0.5	< 0.5	acrylonitrile	97.3	70-130	ok	94.2	70-130	ok	3.31	<25	ok
methyl-tert-butyl-ether	< 0.5	< 0.5	methyl-tert-butyl-ether	88.3	70-130	ok	83.4	70-130	ok	5.71	<25	ok
trans-1,2-dichloroethene	< 0.5	< 0.5	trans-1,2-dichloroethene	102	70-130	ok	102	70-130	ok	0.43	<25	ok
1,1-dichloroethane	< 0.5	< 0.5	1,1-dichloroethane	95.7	70-130	ok	95.3	70-130	ok	0.48	<25	ok
di-isopropyl ether (DIPE)	< 1.0	< 1.0	di-isopropyl ether (DIPE)	104	70-130	ok	98.6	70-130	ok	4.88	<25	ok
ethyl tert-butyl ether (EIBE)	< 1.0	< 1.0	ethyl tert-butyl ether (EIBE)	88.4	70-130	ok	83.8	70-130	ok	5.32	<25	ok
vinyl acetate	< 13	< 13	vinyl acetate	87.4	70-130	ok	78.4	70-130	ok	10.8	<25	ok
2-butanone	< 13	< 13	2-butanone	99.3	70-130	ok	90.5	70-130	ok	9.24	<25	ok
2,2-dichloropropane	< 0.5	< 0.5	2,2-dichloropropane	77.4	70-130	ok	78.4	70-130	ok	1.22	<25	ok
cis-1,2-dichloroethene	< 0.5	< 0.5	cis-1,2-dichloroethene	89.9	70-130	ok	88.5	70-130	ok	1.59	<25	ok
chloroform	< 0.5	< 0.5	chloroform	87.9	80-120	ok	85.2	70-130	ok	3.13	<25	ok
bromochloromethane	< 0.5	< 0.5	bromochloromethane	80.4	70-130	ok	75.9	70-130	ok	5.81	<25	ok
tetrahydrofuran	< 5.0	< 5.0	tetrahydrofuran	103	70-130	ok	94.3	70-130	ok	8.49	<25	ok
1,1,1-trichloroethane	< 0.5	< 0.5	1,1,1-trichloroethane	83.3	70-130	ok	83.9	70-130	ok	0.78	<25	ok
1,1-dichloropropene	< 0.5	< 0.5	1,1-dichloropropene	93.5	70-130	ok	94.0	70-130	ok	0.54	<25	ok
carbon tetrachloride	< 0.5	< 0.5	carbon tetrachloride	81.9	70-130	ok	79.9	70-130	ok	2.50	<25	ok
1,2-dichloroethane	< 0.5	< 0.5	1,2-dichloroethane	81.2	70-130	ok	75.7	70-130	ok	7.06	<25	ok
benzene	< 0.5	< 0.5	benzene	102	70-130	ok	102	70-130	ok	0.65	<25	ok
tert-amyl methyl ether (TAME)	< 1.0	< 1.0	tert-amyl methyl ether (TAME)	87.6	70-130	ok	82.0	70-130	ok	6.61	<25	ok
trichloroethene	< 0.5	< 0.5	trichloroethene	84.0	70-130	ok	81.4	70-130	ok	3.17	<25	ok
1,2-dichloropropane	< 0.5	< 0.5	1,2-dichloropropane	102	80-120	ok	97.4	70-130	ok	4.77	<25	ok
bromodichloromethane	< 0.5	< 0.5	bromodichloromethane	85.4	70-130	ok	80.7	70-130	ok	5.62	<25	ok
1,4-Dioxane	< 50	< 50	1,4-Dioxane	99.3	70-130	ok	87.8	70-130	ok	12.3	<25	ok
dibromomethane	< 0.5	< 0.5	dibromomethane	80.7	70-130	ok	78.0	70-130	ok	3.40	<25	ok
4-methyl-2-pentanone	< 13	< 13	4-methyl-2-pentanone	99.7	70-130	ok	90.8	70-130	ok	9.30	<25	ok
cis-1,3-dichloropropene	< 0.5	< 0.5	cis-1,3-dichloropropene	89.2	70-130	ok	85.3	70-130	ok	4.41	<25	ok
toluene	< 0.5	< 0.5	toluene	97.7	80-120	ok	96.0	70-130	ok	1.70	<25	ok
trans-1,3-dichloropropene	< 1.0	< 1.0	trans-1,3-dichloropropene	84.3	70-130	ok	78.8	70-130	ok	6.66	<25	ok
1,1,2-trichloroethane	< 0.5	< 0.5	1,1,2-trichloroethane	86.1	70-130	ok	84.2	70-130	ok	2.24	<25	ok
2-hexanone	< 13	< 13	2-hexanone	96.5	70-130	ok	91.2	70-130	ok	5.65	<25	ok
1,3-dichloropropane	< 0.5	< 0.5	1,3-dichloropropane	92.8	70-130	ok	90.8	70-130	ok	2.22	<25	ok
tetrachloroethene	< 0.5	< 0.5	tetrachloroethene	79.8	70-130	ok	84.0	70-130	ok	5.20	<25	ok
dibromochloromethane	< 0.5	< 0.5	dibromochloromethane	75.3	70-130	ok	73.1	70-130	ok	2.99	<25	ok
1,2-dibromoethane (EDB)	< 1.0	< 1.0	1,2-dibromoethane (EDB)	84.2	70-130	ok	81.3	70-130	ok	3.61	<25	ok
chlorobenzene	< 0.5	< 0.5	chlorobenzene	83.2	70-130	ok	86.1	70-130	ok	3.38	<25	ok
1,1,1,2-tetrachloroethane	< 0.5	< 0.5	1,1,1,2-tetrachloroethane	76.3	70-130	ok	77.8	70-130	ok	1.86	<25	ok
ethylbenzene	< 0.5	< 0.5	ethylbenzene	89.7	80-120	ok	91.8	70-130	ok	2.31	<25	ok
1,1,2,2-tetrachloroethane	< 0.5	< 0.5	1,1,2,2-tetrachloroethane	96.2	70-130	ok	92.0	70-130	ok	4.51	<25	ok
m&p-xylene	< 1.0	< 1.0	m&p-xylene	91.1	70-130	ok	92.4	70-130	ok	1.42	<25	ok
o-xylene	< 0.5	< 0.5	o-xylene	111	70-130	ok	112	70-130	ok	0.65	<25	ok
styrene	< 0.5	< 0.5	styrene	109	70-130	ok	109	70-130	ok	0.44	<25	ok
bromoform	< 1.0	< 1.0	bromoform	95.3	70-130	ok	88.5	70-130	ok	7.37	<25	ok
isopropylbenzene	< 0.5	< 0.5	isopropylbenzene	127	70-130	ok	129	70-130	ok	1.31	<25	ok
1,2,3-trichloropropane	< 0.5	< 0.5	1,2,3-trichloropropane	97.1	70-130	ok	95.9	70-130	ok	1.21	<25	ok
bromobenzene	< 0.5	< 0.5	bromobenzene	96.5	70-130	ok	94.1	70-130	ok	2.55	<25	ok
n-propylbenzene	< 0.5	< 0.5	n-propylbenzene	123	70-130	ok	121	70-130	ok	1.02	<25	ok
2-chlorotoluene	< 0.5	< 0.5	2-chlorotoluene	115	70-130	ok	115	70-130	ok	0.50	<25	ok
1,3,5-trimethylbenzene	< 0.5	< 0.5	1,3,5-trimethylbenzene	111	70-130	ok	110	70-130	ok	0.48	<25	ok
trans-1,4-dichloro-2-butene	< 1.0	< 1.0	trans-1,4-dichloro-2-butene	103	70-130	ok	92.7	70-130	ok	10.9	<25	ok
4-chlorotoluene	< 0.5	< 0.5	4-chlorotoluene	114	70-130	ok	113	70-130	ok	1.62	<25	ok
tert-butyl-benzene	< 0.5	< 0.5	tert-butyl-benzene	96.7	70-130	ok	97.6	70-130	ok	0.85	<25	ok
1,2,4-trimethylbenzene	< 0.5	< 0.5	1,2,4-trimethylbenzene	109	70-130	ok	108	70-130	ok	0.54	<25	ok
sec-butyl-benzene	< 0.5	< 0.5	sec-butyl-benzene	108	70-130	ok	108	70-130	ok	0.11	<25	ok
p-isopropyltoluene	< 0.5	< 0.5	p-isopropyltoluene	101	70-130	ok	102	70-130	ok	1.15	<25	ok
1,3-dichlorobenzene	< 0.5	< 0.5	1,3-dichlorobenzene	98.4	70-130	ok	97.4	70-130	ok	1.02	<25	ok
1,4-dichlorobenzene	< 0.5	< 0.5	1,4-dichlorobenzene	97.9	70-130	ok	95.6	70-130	ok	2.36	<25	ok
n-butylbenzene	< 0.5	< 0.5	n-butylbenzene	115	70-130	ok	116	70-130	ok	1.07	<25	ok
1,2-dichlorobenzene	< 0.5	< 0.5	1,2-dichlorobenzene	95.0	70-130	ok	92.6	70-130	ok	2.57	<25	ok
1,2-dibromo-3-chloropropane	< 2.5	< 2.5	1,2-dibromo-3-chloropropane	86.7	70-130	ok	82.4	70-130	ok	5.07	<25	ok
1,3,5-trichlorobenzene	< 0.5	< 0.5	1,3,5-trichlorobenzene	103	70-130	ok	103	70-130	ok	0.44	<25	ok
1,2,4-trichlorobenzene	< 0.5	< 0.5	1,2,4-trichlorobenzene	106	70-130	ok	104	70-130	ok	2.10	<25	ok
hexachlorobutadiene	< 0.5	< 0.5	hexachlorobutadiene	108	70-130	ok	109	70-130	ok	0.82	<25	ok
naphthalene	< 1.0	< 1.0	naphthalene	87.5	70-130	ok	83.4	70-130	ok	4.79	<25	ok
1,2,3-trichlorobenzene	< 0.5	< 0.5	1,2,3-trichlorobenzene	96.6	70-130	ok	93.8	70-130	ok	2.90	<25	ok

Surrogates:	Recovery (%)	Acceptance Limits	Surrogates:	Recovery (%)	Acceptance Limits	Verdict	Recovery (%)	Acceptance Limits	Verdict	RPD	Limits	Verdict
DIBROMOFLUOROMETHANE	90.9	70-130	DIBROMOFLUOROMETHANE	89.6	70-130	ok	88.2	70-130	ok	1.50	<25	ok
1,2-DICHLOROETHANE-D4	93.7	70-130	1,2-DICHLOROETHANE-D4	91.1	70-130	ok	91.7	70-130	ok	0.67	<25	ok
TOLUENE-D8	101	70-130	TOLUENE-D8	100	70-130</							

CHAIN-OF-CUSTODY RECORD

W.O. # CHP-0067
(for lab use only)

Sample ID.	Date/Time Sampled	Matrix	ANALYSIS REQUIRED					
			Air	Soil	Ground W.	Surface W.	Waste W.	Drinking W.
gP-7	7-8-09 1046	Giu						
gP-24	7-8-09 0950							
gP-23	7-8-09 0940							
gP-28	7-8-09 1120							
gP-5	7-8-09 1144							
gP-20	7-8-09 1333							
gP-19	7-8-09 1325							
gP-23	7-8-09 1245							
gP-21	7-9-09 0754							
gP-22	7-9-09 1555							
R12-13	7-9-09 1447							
R12-7	7-8-09 1457							
REMOVED BY ANALYST								
CONTAINER TYPE (P=Plastic, G=Glass, V=Vial, T=Teflon, O=Other)*								
RELEQUISHEDEX (REGULATION)	DATE/TIME	RECEIVED BY: (AFFILIATION)						
RELEQUISHEDEX (AFFILIATION)	DATE/TIME	RECEIVED BY: (AFFILIATION)						
RELEQUISHEDEX (AFFILIATION)	DATE/TIME	RECEIVED BY: (AFFILIATION)						
RELEQUISHEDEX (AFFILIATION)	DATE/TIME	RECEIVED BY: (AFFILIATION)						
PROJECT MANAGER: <u>Angela Harvey</u> EXT: <u>2739</u>								
NOTES: (Unless otherwise noted, all samples have been refrigerated to 4° C)								
*Specify "Other" preservatives and containers types in this space.								
<i>Please send report to Angela + Steve Andrus</i>								
PROJECT FILE NO.: <u>03-00-32745</u>	LAB USE: <u>Standard</u>	TEMP. OF COOLER: <u>4.0 °C</u>	Temp Blank: <u>0.0</u>	COOLER AIR: <u>0.0</u>	TASK NO.: <u>ICMP</u>	P.O. NO.: <u></u>		
LOCATION: <u>Alton RI</u>								
COLLECTOR(S): <u>Angela Harvey</u> @ <u>gza.com</u>	SHEET: <u>1</u>	OF: <u>2</u>						

CHAIN-OF-CUSTODY RECORD

W.O. # 0907-20067
(for lab use only)

APPENDIX C

MONTHLY AS/SVE SYSTEM MONITORING DATA

Name: Angela Harvey
 Date: 4/24/2009
 Hour meter: 11065.4

TABLE 1
INTERIOR SVE SYSTEM
 Charbert Facility
 Alton, Rhode Island

Location	Order	TVOC (ppm)	O2 (%)	CO2 (%)	CH4 (%)	LEL (%)	Vacuum (in.)	Diff Pressure (in of water)	Flow (ft ³ /min)	Notes:
SVE-1	16	2.7	20.6	0.1	0.0	0	2.1	0.019	7.6	
SVE-2	17	3.4	20.6	0.0	0.0	0	2.7	0.018	7.4	
SVE-3	18	3.0	20.6	0.0	0.0	0	1.8	0.020	7.8	
SVE-4	13	3.9	20.6	0.1	0.0	0	1.2	0.019	7.0	
SVE-5	14	3.1	20.6	0.1	0.0	0	3.0	0.009	5.2	Valve fully open.
SVE-6	15	3	20.6	0.0	0.0	0	2.2	0.020	7.8	
SVE-7	10	2.8	20.7	0.1	0.0	0	3.2	0.019	7.6	
SVE-8	11	2.7	20.6	0.1	0.0	0	3.2	0.019	7.6	
SVE-9	12	3	20.6	0.1	0.0	0	1.4	0.019	7.6	
SVE-10	7	2.5	20.8	0.1	0.0	0	2.2	0.019	7.6	
SVE-11	8	2.7	20.5	0.1	0.0	0	2.5	0.019	7.6	
SVE-12	9	2.8	20.7	0.0	0.0	0	3.8	0.021	7.9	
SVE-13	22	3.6	20.7	0.0	0.0	0	2.0	0.019	7.6	
SVE-14	23	4	20.7	0.0	0.0	0	2.0	0.020	7.8	
SVE-15	4	3.6	20.7	0.1	0.0	0	0.7	0.018	7.4	
SVE-16	3	3	20.8	0.0	0.0	0	2.5	0.019	7.6	
SSVW-1	19	2.7	20.7	0.0	0.0	0	0.8	0.020	7.8	
SSVW-2	20	2.7	20.6	0.0	0.0	0	1.5	0.020	7.8	
SSVW-3	21	2.8	20.6	0.0	0.0	0	1.4	0.019	7.6	
SSVW-4	6	2.1	20.6	0.0	0.0	0	1.0	0.020	7.8	
SSVW-5	5	1.9	20.7	0.1	0.0	0	1.0	0.018	7.4	
SSVW-6	2	1.3	20.7	0.0	0.0	0	0.2	0.020	7.8	
SSVW-7	1	2.9	20.7	0.1	0.0	0	1.5	0.019	7.6	
Combine (BD)		2.7	20.7	0.0	0.0	0	9.1	--	--	
Combine (DH)		--	--	--	--	--	18.0	--	--	
Combine (AD)		--	--	--	--	--	24.1	--	--	
Combine (AB)		--	--	--	--	--	19.2	--	155.0	
Effluent 1st drum		3.7	--	--	--	--	--	--	--	
Effluent 2nd drum		3.3	--	--	--	--	--	--	--	

Combined 155 scfm per 23 wells = 6.8 scfm per well = 0.019 inches DP per well.

Baselines:

Landtec: O2 = 20.6, CO2 = 0.0, CH4 = 0, LEL = 0.0%
 OVM: 98.6 ppmv

Name: Angela Harvey
 Date: 4/24/2009
 Hour meter: 10501.5

TABLE 2
EXTERIOR SVE SYSTEM
 Charbert Facility
 Alton, Rhode Island

Location	Order	TVOC (ppm)	O2 (%)	CO2 (%)	CH4 (%)	LEL (%)	Vacuum (in.)	Diff Pressure (in of water)	Flow (ft ³ /min)	Notes:
SVE-17	1	0.7	20.4	0.1	0.0	0	NM	0.012	6.0	
SVE-18	2	4.5	20.2	0.1	0.0	0	NM	0.004	4.0	Valve fully open.
SVE-19	3	6.8	20.1	0.2	0.0	0	NM	0.000	7.1*	Valve fully open.
SVE-20	4	4.3	20.0	0.1	0.0	0	NM	0.013	6.2	
SVE-21	5	3.6	19.5	0.1	0.0	0	NM	0.000	7.1*	Valve fully open.
SVE-22	6	9.4	19.6	0.1	0.0	0	NM	0.006	4.6	
SVE-23	7	5.7	19.7	0.1	0.0	0	NM	0.010	5.6	Valve fully open.
SVE-24	8	4.5	19.9	0.1	0.0	0	NM	0.014	6.4	
SVE-25	9	2.5	19.9	0.1	0.0	0	NM	0.004	4.0	Valve fully open.
SVE-26	10	2.1	20.0	0.1	0.0	0	NM	0.012	6.0	
SVE-27	11	3.2	20.1	0.1	0.0	0	NM	0.013	6.2	
SVE-28	12	1.9	20.1	0.0	0.0	0	NM	0.010	5.6	Valve fully open.
SVE-29	13	2.1	20.3	0.1	0.0	0	NM	0.004	4.0	Valve fully open.
SVE-30	14	2.4	20.3	0.1	0.0	0	NM	0.000	7.1*	Valve fully open.
Combine (BD)		3.9	20.7	0.1	0.0	0	8.1	--	--	
Combine (DH)	--	--	--	--	--	--	10.0	--	--	
Combine (AD)	--	--	--	--	--	--	17.5	--	--	
Combine (AB)	--	--	--	--	--	--	5.2	--	80	
Effluent 1st drum		5.0	--	--	--	--	--	--	--	
Effluent 2nd drum		1.2	--	--	--	--	--	--	--	

Combined 80 scfm per 14 wells = 5.714 scfm per well = 0.0.012 inches DP per well.

*Estimated flow rate

NM = Not measured due to equipment failure.

Name: Angela Harvey
Date: 4/24/2009

TABLE 3
INTERIOR AS SYSTEM
Charbert Facility
Alton, Rhode Island

Location	Pressure (psi)	Diff Pressure (in of water)	Flow (ft ³ /min)	Notes:
AS-1	15	1.7	2.0	
AS-2		1.6	2.1	
AS-3		1.8	2.1	
AS-4	16	1.5	2.1	
AS-5		1.5	2.1	
AS-6		1.5	2.1	
AS-7	16	1.6	2.2	
AS-8		1.6	2.2	
AS-9		1.6	2.2	
AS-10	15	1.6	2.2	
AS-11		1.6	2.2	
AS-12		1.8	2.3	
AS-13	16	1.7	2.2	
AS-14		1.6	2.2	
AS-15	16	1.6	2.2	
AS-16	16	1.5	2.1	
Combine	19	7.7	32	

Combined 7.7 inches DP @ 19 psi = 32 scfm per 16 wells = 2 scfm per well = 1.6 inches DP per well.

Name: Angela Harvey
Date: 4/24/2009

TABLE 4
EXTERIOR AS SYSTEM
Charbert Facility
Alton, Rhode Island

Location	Pressure (psi)	Diff Pressure (in of water)	Flow (ft ³ /min)	Notes:
AS-17	14	1.9	2.3	
AS-18		2.0	2.3	
AS-19		1.9	2.3	
AS-20		2.1	2.4	
AS-21	12	2.0	2.3	
AS-22		2.0	2.3	
AS-23		2.1	2.3	
AS-24		2.2	2.4	
AS-25		2.1	2.3	
AS-26	13	2.0	2.3	
AS-27		2.1	2.3	
AS-28		1.9	2.2	
AS-29		2.1	2.3	
AS-30		1.9	2.2	
Combine	18	10.6	34	

Combined 10.6 inches DP @ 18 psi = 34 scfm per 14 wells = 2.42 scfm per well = 2.0 inches DP per well.

Name: Angela Harvey
 Date: 5/22/2009
 Hour meter: 11737

TABLE 1
INTERIOR SVE SYSTEM
 Charbert Facility
 Alton, Rhode Island

Location	Order	TVOC (ppm)	O2 (%)	CO2 (%)	CH4 (%)	LEL (%)	Vacuum (in.)	Diff Pressure (in of water)	Flow (ft ³ /min)	Notes:
SVE-1	16	1.5	20.0	0.0	0.0	0	1.8	0.019	7.6	
SVE-2	17	2.0	20.0	0.0	0.0	0	1.0	0.022	7.9	
SVE-3	18	1.9	20.1	0.0	0.0	0	1.8	0.020	7.8	
SVE-4	13	1.6	19.8	0.0	0.0	0	1.2	0.018	7.4	
SVE-5	14	2.1	20.8	0.0	0.0	0	3.5	0.014	6.4	Valve fully open.
SVE-6	15	1.9	19.8	0.0	0.0	0	2.2	0.019	7.6	
SVE-7	10	1.2	19.7	0.0	0.0	0	2.99	0.020	7.8	
SVE-8	11	1.2	19.6	0.0	0.0	0	3.0	0.020	7.8	
SVE-9	12	1.0	19.7	0.0	0.0	0	1.38	0.020	7.8	
SVE-10	7	1.2	20.7	0.0	0.0	0	2.6	0.020	7.8	
SVE-11	8	1.3	19.6	0.1	0.0	0	2.2	0.021	7.9	
SVE-12	9	1.3	19.7	0.0	0.0	0	3.7	0.020	7.8	
SVE-13	22	0.3	19.4	0.0	0.0	0	2.1	0.020	7.8	
SVE-14	23	0.1	19.6	0.1	0.0	0	2.1	0.018	7.4	
SVE-15	4	1.9	19.7	0.0	0.0	0	0.9	0.018	7.4	
SVE-16	3	1.8	20.3	0.0	0.0	0	2.0	0.019	7.6	
SSVW-1	19	0.7	20.3	0.0	0.0	0	0.8	0.020	7.8	
SSVW-2	20	0.3	20.1	0.0	0.0	0	1.8	0.019	7.6	
SSVW-3	21	1.1	20.1	0.0	0.0	0	0.4	0.020	7.8	
SSVW-4	6	0.9	20.2	0.0	0.0	0	1.6	0.020	7.8	
SSVW-5	5	0.5	19.7	0.0	0.0	0	1.1	0.020	7.8	
SSVW-6	2	1.9	19.7	0.0	0.0	0	0.2	0.020	7.8	
SSVW-7	1	0.8	20.2	0.0	0.0	0	0.3	0.020	7.8	
Combine (BD)		1.2	19.5	0.0	0.0	0	20.2	--	--	
Combine (DH)		--	--	--	--	--	20.0	--	--	
Combine (AD)		--	--	--	--	--	45.2	--	--	
Combine (AB)		--	--	--	--	--	1.8	--	155.0	
Effluent 1st drum		1.6	--	--	--	--	--	--	--	
Effluent 2nd drum		6.9	--	--	--	--	--	--	--	

Combined 155 scfm per 23 wells = 6.8 scfm per well = 0.019 inches DP per well.

Baselines:

Landtec: O2 = 20.6, CO2 = 0.0, CH4 = 0, LEL = 0.0%
 OVM: 99.4 ppmv

Name: Angela Harvey
 Date: 5/22/2009
 Hour meter: 11173

TABLE 2
EXTERIOR SVE SYSTEM
 Charbert Facility
 Alton, Rhode Island

Location	Order	TVOC (ppm)	O2 (%)	CO2 (%)	CH4 (%)	LEL (%)	Vacuum (in.)	Diff Pressure (in of water)	Flow (ft ³ /min)	Notes:
SVE-17	1	2.2	20.3	0.2	0.0	0	1.7	0.010	5.6	
SVE-18	2	2.3	19.9	0.2	0.0	0	2.7	0.000	4.6*	Valve fully open.
SVE-19	3	2.3	19.9	0.3	0.0	0	2.6	0.000	4.6*	Valve fully open.
SVE-20	4	2.2	19.8	0.2	0.0	0	2.7	0.010	5.6	
SVE-21	5	1.2	19.6	0.1	0.0	0	2.4	0.000	4.6*	Valve fully open.
SVE-22	6	2.2	19.4	0.2	0.0	0	2.3	0.000	4.6*	Valve fully open.
SVE-23	7	2.8	19.4	0.1	0.0	0	2.2	0.010	5.6	
SVE-24	8	2.2	19.2	0.0	0.0	0	2.2	0.009	5.2	
SVE-25	9	0.1	19.3	0.1	0.0	0	0.9	0.000	4.6*	
SVE-26	10	1.2	19.3	0.2	0.0	0	0.6	0.010	5.6	
SVE-27	11	1.0	19.3	0.1	0.0	0	1.4	0.010	5.6	
SVE-28	12	0.9	19.5	0.1	0.0	0	2.0	0.000	4.6*	Valve fully open.
SVE-29	13	0.8	19.4	0.1	0.0	0	2.0	0.000	4.6*	Valve fully open.
SVE-30	14	0.8	19.5	0.1	0.0	0	2.3	0.000	4.6*	Valve fully open.
Combine (BD)		2.8	19.5	0.1	0.0	0	3.8	--	--	
Combine (DH)	--	--	--	--	--	--	20.0	--	--	
Combine (AD)	--	--	--	--	--	--	13.7	--	--	
Combine (AB)	--	--	--	--	--	--	4.8	--	80	
Effluent 1st drum		2.3	--	--	--	--	--	--	--	
Effluent 2nd drum		5.3	--	--	--	--	--	--	--	

Combined 80 scfm per 16 wells = 5 scfm per well = 0.0009 inches DP per well.

*Estimated flow rate

Name: Angela Harvey
Date: 5/22/09

TABLE 3
INTERIOR AS SYSTEM
Charbert Facility
Alton, Rhode Island

Location	Pressure (psi)	Diff Pressure (in of water)	Flow (ft ³ /min)	Notes:
AS-1	15	NM		
AS-2		NM		
AS-3		NM		
AS-4	16	NM		
AS-5		NM		
AS-6		NM		
AS-7	16	NM		
AS-8		NM		
AS-9		NM		
AS-10	14	NM		
AS-11		NM		
AS-12		NM		
AS-13	14	NM		
AS-14		NM		
AS-15	14	NM		
AS-16	14	NM		
Combine	19	7.6	32	

Combined 7.6 inches DP @ 19 psi = 32 scfm per 16 wells = 2 scfm per well = 1.6 inches DP per well.

NM = Not measured due to equipment malfunction.

Name: Angela Harvey
Date: 5/22/2009

TABLE 4

EXTERIOR AS SYSTEM

Charbert Facility
Alton, Rhode Island

Location	Pressure (psi)	Diff Pressure (in of water)	Flow (ft ³ /min)	Notes:
AS-17	14	2.1	2.4	
AS-18		2.2	2.4	
AS-19		2.0	2.3	
AS-20		1.9	2.3	
AS-21	14	1.9	2.3	
AS-22		2.2	2.4	
AS-23		2.1	2.4	
AS-24		2.0	2.3	
AS-25		2.0	2.3	
AS-26	13	2.1	2.3	
AS-27		2.0	2.3	
AS-28		2.0	2.3	
AS-29		2.1	2.3	
AS-30		2.0	2.3	
Combine	18	10.5	34	

Combined 10.5 inches DP @ 18 psi = 34 scfm per 14 wells = 2.42 scfm per well = 2.0 inches DP per well.

Name: Angela Harvey
 Date: 6/30/2009
 Hour meter: 12673

TABLE 1
INTERIOR SVE SYSTEM
 Charbert Facility
 Alton, Rhode Island

Location	Order	TVOC (ppm)	O2 (%)	CO2 (%)	CH4 (%)	LEL (%)	Vacuum (in.)	Diff Pressure (in of water)	Flow (ft ³ /min)	Notes:
SVE-1	16	NM	20.1	0.0	0.0	0	1.8	0.020	7.8	
SVE-2	17	NM	20.2	0.0	0.0	0	2.6	0.017	7.2	
SVE-3	18	NM	20.1	0.0	0.0	0	2.0	0.021	7.9	
SVE-4	13	NM	20.1	0.1	0.0	0	1.3	0.019	7.6	
SVE-5	14	NM	20.0	0.0	0.0	0	2.9	0.004	3.4	Valve fully open.
SVE-6	15	NM	20.1	0.0	0.0	0	2.4	0.021	7.9	
SVE-7	10	NM	20.3	0.0	0.0	0	3.1	0.017	7.2	
SVE-8	11	NM	20.1	0.0	0.0	0	3.0	0.018	7.4	
SVE-9	12	NM	20.2	0.0	0.0	0	2.48	0.018	7.4	
SVE-10	7	NM	20.3	0.0	0.0	0	1.4	0.017	7.2	
SVE-11	8	NM	20.2	0.1	0.0	0	3.3	0.019	7.6	
SVE-12	9	NM	20.3	0.0	0.0	0	1.9	0.018	7.4	
SVE-13	22	NM	20.0	0.0	0.0	0	1.9	0.018	7.4	
SVE-14	23	NM	20.1	0.0	0.0	0	2.3	0.018	7.4	
SVE-15	4	NM	19.4	0.0	0.0	0	0.9	0.019	7.6	
SVE-16	3	NM	20.0	0.0	0.0	0	1.9	0.017	7.2	
SSVW-1	19	NM	19.9	0.0	0.0	0	1.0	0.019	7.6	
SSVW-2	20	NM	19.9	0.0	0.0	0	2.5	0.019	7.6	
SSVW-3	21	NM	20.1	0.0	0.0	0	1.4	0.020	7.8	
SSVW-4	6	NM	20.1	0.0	0.0	0	1.8	0.020	7.8	
SSVW-5	5	NM	20.0	0.0	0.0	0	0.3	0.018	7.4	
SSVW-6	2	NM	20.4	0.0	0.0	0	1.3	0.017	7.2	
SSVW-7	1	NM	20.4	0.0	0.0	0	0.2	0.017	7.2	
Combine (BD)		NM	20.3	0.0	0.0	0	1.1	--	--	
Combine (DH)	--	--	--	--	--	--	20.0	--	--	
Combine (AD)	--	--	--	--	--	--	25.7	--	--	
Combine (AB)	--	--	--	--	--	--	17.2	--	155.0	
Effluent 1st drum		NM	--	--	--	--	--	--	--	
Effluent 2nd drum		NM	--	--	--	--	--	--	--	

Combined 155 scfm per 23 wells = 6.8 scfm per well = 0.019 inches DP per well.

Baselines:

Landtec: O2 = 20.1, CO2 = 0.0, CH4 = 0, LEL = 0.0%
 OVM: 93.2 ppmv

Name: Angela Harvey
 Date: June 30, 2009
 Hour meter: 12109

TABLE 2
EXTERIOR SVE SYSTEM
 Charbert Facility
 Alton, Rhode Island

Location	Order	TVOC (ppm)	O2 (%)	CO2 (%)	CH4 (%)	LEL (%)	Vacuum (in.)	Diff Pressure (in of water)	Flow (ft ³ /min)	Notes:
SVE-17	1	1.8	18.8	0.3	0.0	0	1.9	0.009	5.2	
SVE-18	2	2.6	18.6	0.4	0.0	0	2.4	0.006	4.4	Valve fully open.
SVE-19	3	3.6	18.4	0.6	0.0	0	2.4	0.003	0.3	Valve fully open.
SVE-20	4	1.7	18.8	0.3	0.0	0	2.4	0.010	5.6	
SVE-21	5	0.7	18.6	0.2	0.0	0	2.1	0.008	5.0	Valve fully open.
SVE-22	6	9.6	18.4	0.3	0.0	0	2.0		7.8*	Valve fully open.
SVE-23	7	2.5	18.4	0.3	0.0	0	2.1	0.005	3.9	Valve fully open.
SVE-24	8	2.4	18.5	0.2	0.0	0	1.4	0.008	5.0	
SVE-25	9	1.4	18.3	0.2	0.0	0	2.1		7.8*	Valve fully open.
SVE-26	10	1.7	18.2	0.2	0.0	0	0.4	0.012	5.9	
SVE-27	11	1.3	18.1	0.1	0.0	0	1.7	0.010	5.6	
SVE-28	12	1.4	18.1	0.1	0.0	0	2.1	0.012	5.9	
SVE-29	13	1.5	18.1	0.1	0.0	0	1.9	0.009	5.2	Valve fully open.
SVE-30	14	1.7	18.0	0.0	0.0	0	1.9	0.006	4.4	Valve fully open.
Combine (BD)		1.0	20.2	0.2	0.0	0	5.8	--	--	
Combine (DH)		--	--	--	--	--	8.0	--	--	
Combine (AD)		--	--	--	--	--	14.5	--	--	
Combine (AB)		--	--	--	--	--	14.9	--	80	
Effluent 1st drum		9.8	--	--	--	--	--	--	--	
Effluent 2nd drum		1.0	--	--	--	--	--	--	--	

Combined 80 scfm per 16 wells = 5 scfm per well = 0.009 inches DP per well.

*Estimated flow rate

Name: Angela Harvey
Date: 6/30/09

TABLE 3
INTERIOR AS SYSTEM
Charbert Facility
Alton, Rhode Island

Location	Pressure (psi)	Diff Pressure (in of water)	Flow (ft ³ /min)	Notes:
AS-1	14	1.3	1.8	
AS-2		1.3	1.8	
AS-3		1.2	1.8	
AS-4	14	1.3	1.8	
AS-5		1.2	1.8	
AS-6		1.4	2.0	
AS-7	14	1.2	1.8	
AS-8		1.2	1.8	
AS-9		1.2	1.8	
AS-10	14	1.1	1.7	
AS-11		1.3	1.8	
AS-12		1.4	2.0	
AS-13	16	1.1	1.8	
AS-14		1.3	2	
AS-15	14	1.2	2.0	
AS-16	14	1.4	2.1	
Combine	19	6.8	27	

Combined 6.8 inches DP @ 19 psi = 27 scfm per 16 wells = 1.7 scfm per well = 1.3 inches DP per well.

Name: Angela Harvey
Date: 6/30/09

TABLE 4

EXTERIOR AS SYSTEM

Charbert Facility
Alton, Rhode Island

Location	Pressure (psi)	Diff Pressure (in of water)	Flow (ft ³ /min)	Notes:
AS-17	17	1.7	2.3	
AS-18		1.9	2.4	
AS-19		1.8	2.4	
AS-20		1.8	2.4	
AS-21	12	1.9	2.2	
AS-22		2.0	2.3	
AS-23		1.7	2.1	
AS-24		1.8	2.2	
AS-25		1.8	2.2	
AS-26	14	1.8	2.3	
AS-27		1.7	2.2	
AS-28		1.8	2.3	
AS-29		1.7	2.2	
AS-30		1.9	2.3	
Combine	18	6.4	30	

Combined 6.4 inches DP @ 18 psi = 30 scfm per 14 wells = 2.14 scfm per well = 1.8 inches DP per well.

APPENDIX D
SECOND QUARTER 2009 UIC REPORT

July 2, 2009
File No. 32795.33



Mr. Craig Roy
Senior Environmental Scientist
RI Department of Environmental Management
Office of Water Resources
235 Promenade Street
Providence, Rhode Island 02908

530 Broadway
Providence
Rhode Island
02909
401-421-4140
FAX 401-751-8613
www.gza.net

Re: Second Quarter 2009 UIC Monitoring Report
Charbert, Division of N.F.A.
Richmond, Rhode Island
(*UIC Order of Approval # 1108*)

Dear Mr. Roy:

This letter with attachments serves as the second Quarterly UIC Monitoring Report of 2009, in compliance with the above referenced UIC Order of Approval for the Charbert facility located at 299 Church Street in Richmond (Alton), Rhode Island. It was prepared by GZA GeoEnvironmental, Inc., on behalf of our client Charbert, a Division of N.F.A. As you are aware, the Charbert facility stopped production in late February of 2008. Thus, there is no wastewater to sample in the pump house and no wastewater volume to report. This report includes the following information:

- Analytical test results from the six monitoring wells (designated MW-1A, MW-2A, MW-3, MW-4A, MW-5B and MW-6), which were analyzed for total and dissolved chromium, volatile organic compounds (VOCs), the semi-volatile organic compound bis(2-Ethylhexyl) phthalate, and total petroleum hydrocarbons (TPH). The detected analytes have been summarized and compared to RIDEM's GA Groundwater Objectives and Groundwater Quality Preventative Action Limits (PALs) in Table 1, attached.
- Disposal system usage and monitoring well maintenance activities are summarized in Table 2.
- Static groundwater elevation measurements and field screening logs for each monitoring well are provided in Attachment A.
- Laboratory Certificates of Analysis are provided in Attachment B.

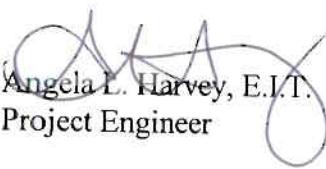
The groundwater results have been compared to the applicable groundwater standards for Rhode Island and there are no VOC, SVOC, TPH or chromium exceedances.

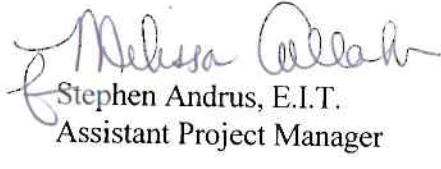
We trust that this information fulfills your present needs. If you have any questions please call Angela Harvey or Edward Summerly at (401) 421-4140.

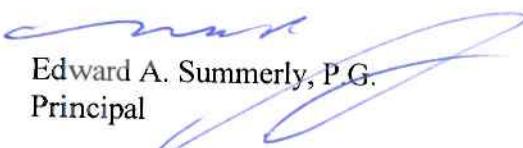
Very truly yours,



GZA GEOENVIRONMENTAL, INC.


Angela L. Harvey, E.I.T.
Project Engineer


Stephen Andrus, E.I.T.
Assistant Project Manager


Edward A. Summerly, P.G.
Principal

EAS/ALH:mac

CC: Tracy Nelson Hay, Richmond Town Clerk
Clark Memorial Library – Charbert Repository

Attachments: Tables - Table 1 Detected Constituents

Table 2 Lagoon Influent Schedule and Maintenance Schedules

Attachment A - Low Flow Sampling Logs

Attachment B - Laboratory Certificates of Analysis

TABLES

TABLE 1
UIC MONITORING DETECTED CONSTITUENTS
JUNE 2009

Charbert Facility
Richmond, Rhode Island

	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	UNITS	MW-1A (GP-29)		MW-2A		MW-3 (RIZ-15)		MW-4A		MW-5B (GP-30)		MW-6 (RIZ-20)	
				12/02/2008		12/02/2008		12/02/2008		12/02/2008		12/02/2008		12/02/2008	
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit
VOLATILE ORGANICS:															
Acetone	NS	NS	ug/L (ppb)	<	25	<	25	<	25	<	25	<	25	<	25
SEMI-VOLATILE ORGANICS:															
bis(2-Ethylhexyl)Phthalate	NS	NS	ug/L (ppb)	<	10	<	10	<	10	<	10	<	10.0	<	10.0
TOTAL PETROLEUM HYDROCARBONS:															
Hydrocarbon Content	NS	NS	ug/L (ppb)	360	200	3700	200	300	200	2800	200	<	200	<	200
TOTAL METALS:															
Chromium	100	50	ug/L (ppb)	19	5	10	5	<	5	11	5	<	5	<	5
DISSOLVED METALS:															
Chromium	NS	NS	ug/L (ppb)	14.0	5	7.9	5	<	5	9.5	5	<	5	<	5

PAL = RIDEMs Preventative Action Limit

DETECTED ANALYTES ARE IN BOLD AND HIGHLIGHTED

< = NOT DETECTED

NT = NOT TESTED

NS = NO STANDARD

INDICATES DETECTED CONSTITUANT
INDICATES RIDEM GA EXCEEDANCE
INDICATES RIDEM PAL EXCEEDANCE

TABLE 2
UIC MONITORING
LAGOON INFLUENT SCHEDULE AND MAINTENANCE SCHEDULES
JUNE 2009

Charbert Facility
Richmond, Rhode Island

LAGOON INFLUENT SCHEDULE			
DATE	RECEIVING LAGOON	CHANGED TO LAGOON	REMARKS
March 2008 to June 2009	None	Cessation of Discharge	Facility closed February 24, 2008.
January 2006 to March 2008	1	No Change	All industrial waste water is discharged to Lagoon 1. Lagoon 1 is used as a settling pond, waste water is then transferred by an electric powered pump from Lagoon 1 to Lagoon 2. A second electric powered pump transfers waste water from Lagoon 2 to Lagoon 3.
LAGOON MAINTENANCE SCHEDULE			
Date	Remarks		
Lagoon 1	There was no significant lagoon maintenance performed this quarter.		
Lagoon 2	There was no significant lagoon maintenance performed this quarter.		
Lagoon 3	There was no significant lagoon maintenance performed this quarter.		
MONITORING WELL MAINTENANCE			
Well ID	Date	Remarks	
MW-1A (GP-29)		Required No Maintenance	
MW-2A		Required No Maintenance	
MW-3 (RIZ-15)		Required No Maintenance	
MW-4A		Required No Maintenance	
MW-5B		Required No Maintenance	
MW-6 (RIZ-20)		Required No Maintenance	

ATTACHEMENT A
LOW FLOW LOGS

LOW FLOW GROUNDWATER SAMPLING LOG

Charbert Facility
Richmond, Rhode Island

LOCATION:	Charbert	DATE:	Monday, June 1, 2009
GZA JOB NO.:	32795.33	WELL ID:	MW-1A (GP-29)
WEATHER:	Sunny	AIR TEMP (°F):	32
PUMP TYPE:	Bailed	DATUM:	66.90 TOP OF PVC ELEVATION
SAMPLED BY:	EMB		TOP OF CASING ELEVATION

WELL DEPTH (FT):	31.34	LENGTH OF WATER COLUMN (FT):	8.52
WATER DEPTH (FT):	22.82	WELL DIAMETER:	2"
UPPER PRODUCT LAYER (FT):	NA	WELL VOLUME: LITERS	5.26
LOWER PRODUCT LAYER (FT):	NA	2" WELL = 0.163 GALLONS /FT WATER = 0.617 LITERS/FT 1" WELL = 0.013 GALLONS /FT WATER = 0.0492 LITERS/FT	

FLOW RATE CALCULATIONS:		START FLOW	
VOLUME:	Liters	SAMPLE TIME:	1:55 p.m.
START TIME		DELTA TIME (MIN):	
END TIME	Seconds	FLOW RATE: (L/min)	
MINIMUM PURGE TIME (MINUTES):		WELL DRAW DOWN (FT):	Flow Depth
VOLUME PURGED (Liters):	16.2		Drawdown

TIME	ORP (mV)	pH (SU)	COND (mS/cm)	TURB (NTU)	DO (mg/L)	TEMP (°C)
1:55 p.m.	66	5.5	0.462	5.0	2.5	13.9

COLOR: Pinkish WELL LOCKED YES

ODOR: Slight chem NO _____

NOTES: _____

Sampled for VOCS, bis(2-Ethylhexyl)Phthalate, TPH, Total Chromium, and Dissolved Chromium

Samples collected with disposable polyethylene bailer.

GUIDELINES:

TURBIDITY < 5NTU AND +/-10 %
ORP +/- 10 mV
DO 10%
TEMP 3%
SPEC COND 3%
pH +/- 0.10 UNITS

LOW FLOW GROUNDWATER SAMPLING LOG

Charbert Facility
Richmond, Rhode Island

LOCATION:	Charbert	DATE:	Monday, June 1, 2009
GZA JOB NO.:	32795.33	WELL ID:	MW-2A
WEATHER:	Sunny	AIR TEMP (°F):	25
PUMP TYPE:	Peristaltic	DATUM:	63.59 TOP OF PVC ELEVATION
SAMPLED BY:	EMB	TOP OF CASING ELEVATION	

WELL DEPTH (FT):	19.72	LENGTH OF WATER COLUMN (FT):	5.59
WATER DEPTH (FT):	14.13	WELL DIAMETER:	2"
UPPER PRODUCT LAYER (FT):	NA	WELL VOLUME: LITERS	3.45
LOWER PRODUCT LAYER (FT):	NA	2" WELL = 0.163 GALLONS /FT WATER = 0.617 LITERS/FT 1" WELL = 0.013 GALLONS /FT WATER = 0.0492 LITERS/FT	

FLOW RATE CALCULATIONS:	START FLOW	11:15	
VOLUME:	0.4 Liters	SAMPLE TIME:	12:25
START TIME	0.0	DELTA TIME (MIN):	70
END TIME	60 Seconds	FLOW RATE: (L/min)	0.40
MINIMUM PURGE TIME (MINUTES):	8.6	WELL DRAW DOWN (FT):	14.17 Flow Depth
VOLUME PURGED (Liters):	28.0		0.04 Drawdown

TIME	ORP (mV)	pH (SU)	COND (mS/cm)	TURB (NTU)	DO (mg/L)	TEMP (°C)
12:21	16	6.0	1.360	55	2.4	15.5
12:22	16	6.0	1.360	56	2.4	15.5
12:23	16	6.0	1.360	55	2.4	15.5

COLOR: bluish / purple WELL LOCKED YES _____

ODOR: Chemical NO X _____

NOTES: Sampled for VOCs, bis(2-Ethylhexyl)Phthalate, TPH, Total Chromium, and Dissolved Chromium

GUIDELINES:

TURBIDITY <5 NTU AND +/-10 %

ORP +/- 10 mV

DO 10%

TEMP 3%

SPEC COND 3%

pH +/- 0.10 UNITS

LOW FLOW GROUNDWATER SAMPLING LOG

Charbert Facility
Richmond, Rhode Island

LOCATION:	Charbert	DATE:	Monday, June 1, 2009
GZA JOB NO.:	32795.33	WELL ID:	MW-3 (RIZ-15)
WEATHER:	Sunny	AIR TEMP (°F):	25
PUMP TYPE:	Peristaltic	DATUM:	62.51 TOP OF PVC ELEVATION
SAMPLED BY:	EMB		TOP OF CASING ELEVATION

WELL DEPTH (FT):	<u>21.55</u>	LENGTH OF WATER COLUMN (FT):	<u>7.26</u>
WATER DEPTH (FT):	<u>14.29</u>	WELL DIAMETER:	<u>2"</u>
UPPER PRODUCT LAYER (FT):	<u>NA</u>	WELL VOLUME: LITERS	<u>4.48</u>
LOWER PRODUCT LAYER (FT):	<u>NA</u>	2" WELL = 0.163 GALLONS /FT WATER = 0.617 LITERS/FT 1" WELL = 0.013 GALLONS /FT WATER = 0.0492 LITERS/FT	

FLOW RATE CALCULATIONS:	START FLOW	8.45
VOLUME: 0.4 Liters	SAMPLE TIME:	9:55
START TIME 0	DELTA TIME (MIN):	75
END TIME 60 Seconds	FLOW RATE: (L/min)	0.40
MINIMUM PURGE TIME (MINUTES): 11.2	WELL DRAW DOWN (FT):	14.31 Flow Depth
VOLUME PURGED (Liters): 30.0		0.02 Drawdown

COLOR: None WELL LOCKED YES X

ODOR: Slight chemical NO

NOTES: Sampled for VOCS, bis(2-Ethylhexyl)Phthalate, TPH, Total Chromium, and Dissolved Chromium

GUIDELINES:
TURBIDITY <5 NTU AND +/- 10 %
ORP +/- 10 mV
DO 10%
TEMP 3%
SPEC COND 3%
pH +/- 0.10 UNITS

LOW FLOW GROUNDWATER SAMPLING LOG

Charbert Facility
Richmond, Rhode Island

LOCATION:	Charbert	DATE:	Monday, June 1, 2009
GZA JOB NO.:	32795.33	WELL ID:	MW-4A
WEATHER:	Sunny	AIR TEMP (°F):	25
PUMP TYPE:	Peristaltic	DATUM:	58.43 TOP OF PVC ELEVATION
SAMPLED BY:	EMB		TOP OF CASING ELEVATION

WELL DEPTH (FT):	14.10	LENGTH OF WATER COLUMN (FT):	4.72
WATER DEPTH (FT):	9.38	WELL DIAMETER:	2"
UPPER PRODUCT LAYER (FT):	NA	WELL VOLUME: LITERS	2.91
LOWER PRODUCT LAYER (FT):	NA	2" WELL = 0.163 GALLONS /FT WATER = 0.617 LITERS/FT 1" WELL = 0.013 GALLONS /FT WATER = 0.0492 LITERS/FT	

FLOW RATE CALCULATIONS:	START FLOW	9:25
VOLUME: 0.4 Liters	SAMPLE TIME:	10:45
START TIME 0	DELTA TIME (MIN):	80
END TIME 60 Seconds	FLOW RATE: (L/min)	0.40
MINIMUM PURGE TIME (MINUTES): 7.3	WELL DRAW DOWN (FT):	9.4 Flow Depth
VOLUME PURGED (Liters): 32.0		0.02 Drawdown

TIME	ORP (mV)	pH (SU)	COND (mS/cm)	TURB (NTU)	DO (mg/L)	TEMP (°C)
10:41	20	5.9	0.605	14.0	3.5	13.5
10:42	20	5.9	0.605	13.0	4.6	13.5
10:43	20	5.9	0.605	14.0	3.6	13.5

COLOR: Very Slight Pink WELL LOCKED YES

ODOR: Very Slight Chemical Odor NO _____

NOTES: Sampled for VOCS, bis(2-Ethylhexyl)Phthalate, TPH, Total Chromium, and Dissolved Chromium

GUIDELINES:

TURBIDITY <5 NTU AND +/-10 %

ORP +/- 10 mV

DO 10%

TEMP 3%

SPEC COND 3%

pH +/- 0.10 UNITS

LOW FLOW GROUNDWATER SAMPLING LOG

Charbert Facility
Richmond, Rhode Island

LOCATION:	Charbert	DATE:	Monday, June 1, 2009
GZA JOB NO.:	32795.33	WELL ID:	MW-5B (GP-30)
WEATHER:	Sunny	AIR TEMP (°F):	25
PUMP TYPE:	Peristaltic	DATUM:	63.16 TOP OF PVC ELEVATION
SAMPLED BY:	EMB		TOP OF CASING ELEVATION

WELL DEPTH (FT):	22.83	LENGTH OF WATER COLUMN (FT):	10.8
WATER DEPTH (FT):	12.03	WELL DIAMETER:	2"
UPPER PRODUCT LAYER (FT):	NA	WELL VOLUME: LITERS	6.66
LOWER PRODUCT LAYER (FT):	NA	2" WELL = 0.163 GALLONS /FT WATER = 0.617 LITERS/FT 1" WELL = 0.013 GALLONS /FT WATER = 0.0492 LITERS/FT	

FLOW RATE CALCULATIONS:		START FLOW	10:35
VOLUME:	0.5 Liters	SAMPLE TIME:	11:55
START TIME	0	DELTA TIME (MIN):	85
END TIME	60 Seconds	FLOW RATE: (L/min)	0.50
MINIMUM PURGE TIME (MINUTES):	13.3	WELL DRAW DOWN (FT):	12.07 Flow Depth
VOLUME PURGED (Liters):	42.5		0.04 Drawdown

TIME	ORP (mV)	pH (SU)	COND (mS/cm)	TURB (NTU)	DO (mg/L)	TEMP (oC)
11:51	105	5.7	0.086	4	6.1	12.2
11:52	105	5.6	0.086	4	6.1	12.2
11:53	105	5.6	0.086	4	6.1	12.2

COLOR: None observed WELL LOCKED YES

ODOR: None observed NO

NOTES: Sampled for VOCS, bis(2-Ethylhexyl)Phthalate, TPH, Total Chromium, and Dissolved Chromium

GUIDELINES:

TURBIDITY <5 NTU AND +/-10 %

ORP +/- 10 mV

DO 10%

TEMP 3%

SPEC COND 3%

pH +/- 0.10 UNITS

LOW FLOW GROUNDWATER SAMPLING LOG

Charbert Facility
Richmond, Rhode Island

LOCATION:	Charbert	DATE:	Monday, June 1, 2009
GZA JOB NO.:	32795.33	WELL ID:	MW-6 (RIZ-20)
WEATHER:	Sunny	AIR TEMP (°F):	25
PUMP TYPE:	Peristaltic	DATUM:	60.79 TOP OF PVC ELEVATION
SAMPLED BY:	EMB		TOP OF CASING ELEVATION

WELL DEPTH (FT):	20.85	LENGTH OF WATER COLUMN (FT):	6.65
WATER DEPTH (FT):	14.2	WELL DIAMETER:	2"
UPPER PRODUCT LAYER (FT):	NA	WELL VOLUME: LITERS	4.10
LOWER PRODUCT LAYER (FT):	NA	2" WELL = 0.163 GALLONS /FT WATER = 0.617 LITERS/FT 1" WELL = 0.013 GALLONS /FT WATER = 0.0492 LITERS/FT	

FLOW RATE CALCULATIONS:	START FLOW	8:00
VOLUME: 0.5 Liters	SAMPLE TIME:	9:05
START TIME 0	DELTA TIME (MIN):	65
END TIME 60 Seconds	FLOW RATE: (L/min)	0.50
MINIMUM PURGE TIME (MINUTES): 8.2	WELL DRAW DOWN (FT):	14.26 Flow Depth
VOLUME PURGED (Liters): 32.5		0.06 Drawdown

TIME	ORP (mV)	pH (SU)	COND (mS/cm)	TURB (NTU)	DO (mg/L)	TEMP (°C)
9:01	202	4.9	0.414	2.0	0.3	12.7
9:02	204	4.9	0.389	1.0	0.3	12.7
9:03	204	4.9	0.383	2.0	0.4	12.7

COLOR: None WELL LOCKED YES

ODOR: Slight chemical NO _____

NOTES: Sampled for VOCs, bis(2-Ethylhexyl)Phthalate, TPH, Total Chromium, and Dissolved Chromium

GUIDELINES:

TURBIDITY <5 NTU AND +/- 10 %
ORP +/- 10 mV
DO 10%
TEMP 3%
SPEC COND 3%
pH +/- 0.10 UNITS

ATTACHEMENT B
LABORATORY CERTIFICATES



GZA GeoEnvironmental, Inc.
106 South Street
Hopkinton, MA 01748
(781) 278-4700

Laboratory Identification Numbers:
MA and ME: **MA092** NH: **2028**
CT: **PH0579** RI: **LA000236**
NELAC - NYS DOH: **11063**

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus

Project No.: **03.0032795.33**
Work Order No.: **0906-00017**
Date Received: **06/02/2009**
Date Reported: **06/10/2009**

SAMPLE INFORMATION

Date Sampled	Matrix	Laboratory ID	Sample ID
06/01/2009	Aqueous	0906-00017 001	MW - 4A
06/01/2009	Aqueous	0906-00017 002	MW - 4A / Dissolved Metal
06/01/2009	Aqueous	0906-00017 003	MW - 2A
06/01/2009	Aqueous	0906-00017 004	MW - 2A / Dissolved Metal
06/01/2009	Aqueous	0906-00017 005	MW - 1A
06/01/2009	Aqueous	0906-00017 006	MW - 1A / Dissolved Metal
06/01/2009	Aqueous	0906-00017 007	MW - 5B
06/01/2009	Aqueous	0906-00017 008	MW - 5B / Dissolved Metal
06/01/2009	Aqueous	0906-00017 009	MW - 3
06/01/2009	Aqueous	0906-00017 010	MW - 3 / Dissolved Metal
06/01/2009	Aqueous	0906-00017 011	MW - 6
06/01/2009	Aqueous	0906-00017 012	MW - 6 / Dissolved Metal
06/01/2009	Aqueous	0906-00017 013	TBLK 060109



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Page 2 of 29

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

PROJECT NARRATIVE:

1. Sample Receipt

The samples were received on 06/02/09 via x GZA courier, EC, FEDEX, or hand delivered. The temperature of the x temperature blank/cooler air, was 4.2 & 3.9 degrees C. The temperature requirement for most analyses is above freezing to 6 degrees C. The samples were received intact for all requested analyses.

The chain of custody indicates that the samples, when required, were chemically preserved in accordance with the method they reference.

2. EPA Method 6010B - Metals

Attach QC 6010B 06/03/09 - Aqueous

3. Total Petroleum Hydrocarbons

The surrogate recovery for sample 0906-00017-009 (MW-3) exceeded the acceptance criteria of 40-130 at 35.0% due to matrix interference. The results were not confirmed by reextraction and reanalysis as the entire sample was consumed during the extraction process.

4. EPA Method 8270 - SVOCs

Per the Project Manager report bis(2-ethylhexyl)phthalate only.

* The low surrogate recoveries could not be confirmed by re-extraction and analysis as the entire sample was consumed during the extraction process.

Attach QC 8270 06/04/09 - Aqueous

5. EPA Method 8260 - VOCs

The continuing calibration verification standard (CCV) (06/09/09) had an analyte outside of the 30%D QC acceptance limit. The outlier includes carbon disulfide (35%).

The Laboratory Control Sample (LCS) (06/09/09 S) had an 8260 list analyte outside of the 70-130% QC acceptance limits. Specific outlier includes carbon disulfide (135%). This analyte was not detected in the associated samples.

Attach QC 8260 06/09/09 S - Aqueous



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Page 3 of 29

ANALYTICAL REPORT

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Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Data Authorized By:

NELAC certification, as indicated by the NELAC Lab ID Number, is per analyte. For a complete list of NELAC validated analytes, please contact the laboratory.

Abbreviations:

% R = % Recovery
DF = Dilution Factor
DFS = Dilution Factor Solids
CF = Calculation Factor
DO = Diluted Out

Method Key:

Method 8260: The current version of the method is 8260B.
Method 8270: The current version of the method is 8270D.
Method 6010: The current version of the method is 6010B.

Please note that the laboratory signed copy of the chain of custody record is an integral part of the data report.

The laboratory report shall not be reproduced except in full without the written consent of the laboratory.

Soil data is reported on a dry weight basis unless otherwise specified.
Matrix Spike / Matrix Spike Duplicate sets are performed as per method and are reported at the end of the analytical report if assigned on the Chain of Custody.



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Page 4 of 29

ANALYTICAL REPORT

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Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 4A** Sample No.: **001**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260			MQS	06/09/2009
Dichlorodifluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Vinyl Chloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromomethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichlorofluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Diethyl ether	EPA 8260	<5.0	ug/L	MQS	06/09/2009
Acetone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,1-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dichloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Butanone	EPA 8260	<25	ug/L	MQS	06/09/2009
2,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Chloroform	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrahydrofuran	EPA 8260	<10	ug/L	MQS	06/09/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Carbon Tetrachloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Benzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromodichloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dibromomethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Methyl-2-Pentanone	EPA 8260	<25	ug/L	MQS	06/09/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Toluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Hexanone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,3-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrachloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009



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Page 5 of 29

ANALYTICAL REPORT

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140 Broadway
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Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 4A** Sample No.: **001**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Dibromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Ethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
m&p-Xylene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
o-Xylene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Styrene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromoform	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Isopropylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
N-Propylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
tert-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
sec-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
p-Isopropyltoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
n-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	ug/L	MQS	06/09/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Hexachlorobutadiene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Naphthalene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Surrogates:					
***1,2-Dichloroethane-D4	EPA 8260	88.4	% R	MQS	06/09/2009
***Toluene-D8	EPA 8260	98.5	% R	MQS	06/09/2009
***4-Bromofluorobenzene	EPA 8260	98.1	% R	MQS	06/09/2009
Preparation	EPA 5030B	1.0	CF	MQS	06/09/2009
SEMI-VOLATILE ORGANICS	EPA 8270			CMG	06/05/2009
bis(2-Ethylhexyl)Phthalate	EPA 8270	<10	ug/L	CMG	06/05/2009



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Page 6 of 29

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
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Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 4A** Sample No.: **001**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Surrogates:	EPA 8270				
***Nitrobenzene-D5	EPA 8270	44.9	% R	CMG	06/05/2009
***2-Fluorobiphenyl	EPA 8270	46.3	% R	CMG	06/05/2009
***P-Terphenyl-D14	EPA 8270	39.7	% R	CMG	06/05/2009
Extraction	EPA 3510C	1.0	DF	KEF	06/04/2009
TOTAL PETROLEUM HYDROCARBON	Mod. EPA 8100			RJD	06/04/2009
Hydrocarbon Content		2800	ug/L	RJD	06/04/2009
Surrogate:					
***p-Terphenyl		52.2	% R	RJD	06/04/2009
Extraction	EPA 3510C	1.0	DF	KEF	06/03/2009
TOTAL METALS					
Chromium	EPA 6010B	0.011	mg/L	LLZ	06/03/2009



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Page 7 of 29

A N A L Y T I C A L R E P O R T

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Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 4A / Dissolved Metal** Sample No.: **002**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
DISSOLVED METALS					
Chromium	EPA 6010B	0.0095	mg/L	LLZ	06/03/2009



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Page 8 of 29

ANALYTICAL REPORT

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Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 2A** Sample No.: **003**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260			MQS	06/09/2009
Dichlorodifluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Vinyl Chloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromomethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichlorofluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Diethylether	EPA 8260	<5.0	ug/L	MQS	06/09/2009
Acetone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,1-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dichloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Butanone	EPA 8260	<25	ug/L	MQS	06/09/2009
2,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Chloroform	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrahydrofuran	EPA 8260	<10	ug/L	MQS	06/09/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Carbon Tetrachloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Benzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromodichloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dibromomethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Methyl-2-Pentanone	EPA 8260	<25	ug/L	MQS	06/09/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Toluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Hexanone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,3-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrachloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009



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Page 9 of 29

ANALYTICAL REPORT

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Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 2A** Sample No.: **003**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Dibromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Ethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
m&p-Xylene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
o-Xylene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Styrene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromoform	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Isopropylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
N-Propylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
tert-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
sec-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
p-Isopropyltoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
n-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	ug/L	MQS	06/09/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Hexachlorobutadiene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Naphthalene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Surrogates:					
***1,2-Dichloroethane-D4	EPA 8260	89.0	% R	MQS	06/09/2009
***Toluene-D8	EPA 8260	99.5	% R	MQS	06/09/2009
***4-Bromofluorobenzene	EPA 8260	94.5	% R	MQS	06/09/2009
Preparation	EPA 5030B	1.0	CF	MQS	06/09/2009
SEMI-VOLATILE ORGANICS	EPA 8270			CMG	06/05/2009
bis(2-Ethylhexyl)Phthalate	EPA 8270	<10	ug/L	CMG	06/05/2009



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Page 10 of 29

ANALYTICAL REPORT

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Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 2A** Sample No.: **003**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Surrogates:	EPA 8270				
***Nitrobenzene-D5	EPA 8270	6.00	*	% R	CMG 06/05/2009
***2-Fluorobiphenyl	EPA 8270	46.1	% R	CMG	06/05/2009
***P-Terphenyl-D14	EPA 8270	35.7	% R	CMG	06/05/2009
Extraction	EPA 3510C	1.0	DF	KEF	06/04/2009
TOTAL PETROLEUM HYDROCARBON	Mod. EPA 8100			RJD	06/04/2009
Hydrocarbon Content		3700	ug/L	RJD	06/04/2009
Surrogate:					
***p-Terphenyl		50.7	% R	RJD	06/04/2009
Extraction	EPA 3510C	1.0	DF	KEF	06/03/2009
TOTAL METALS					
Chromium	EPA 6010B	0.010	mg/L	LLZ	06/03/2009



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Page 11 of 29

A N A L Y T I C A L R E P O R T

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Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 2A / Dissolved Metal** Sample No.: **004**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
DISSOLVED METALS					
Chromium	EPA 6010B	0.0079	mg/L	LLZ	06/03/2009



GZA GeoEnvironmental, Inc.
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Page 12 of 29

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
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Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 1A** Sample No.: **005**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260			MQS	06/09/2009
Dichlorodifluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Vinyl Chloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromomethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichlorofluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Diethyleneether	EPA 8260	<5.0	ug/L	MQS	06/09/2009
Acetone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,1-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dichloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Butanone	EPA 8260	<25	ug/L	MQS	06/09/2009
2,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Chloroform	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrahydrofuran	EPA 8260	<10	ug/L	MQS	06/09/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Carbon Tetrachloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Benzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromodichloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dibromomethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Methyl-2-Pentanone	EPA 8260	<25	ug/L	MQS	06/09/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Toluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Hexanone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,3-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrachloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009



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Page 13 of 29

A N A L Y T I C A L R E P O R T

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Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 1A** Sample No.: **005**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Dibromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Ethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
m&p-Xylene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
o-Xylene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Styrene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromoform	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Isopropylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
N-Propylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
tert-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
sec-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
p-Isopropyltoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
n-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	ug/L	MQS	06/09/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Hexachlorobutadiene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Naphthalene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Surrogates:	EPA 8260				
***1,2-Dichloroethane-D4	EPA 8260	78.9	% R	MQS	06/09/2009
***Toluene-D8	EPA 8260	97.9	% R	MQS	06/09/2009
***4-Bromofluorobenzene	EPA 8260	95.7	% R	MQS	06/09/2009
Preparation	EPA 5030B	1.0	CF	MQS	06/09/2009
TOTAL PETROLEUM HYDROCARBON	Mod. EPA 8100			RJD	06/04/2009
Hydrocarbon Content		360	ug/L	RJD	06/04/2009



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Page 14 of 29

A N A L Y T I C A L R E P O R T

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Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 1A** Sample No.: **005**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Surrogate:					
***p-Terphenyl		44.5	% R	RJD	06/04/2009
Extraction	EPA 3510C	1.0	DF	KEF	06/03/2009
TOTAL METALS					
Chromium	EPA 6010B	0.019	mg/L	LLZ	06/03/2009
SEMI-VOLATILE ORGANICS	EPA 8270			CMG	06/05/2009
bis(2-Ethylhexyl)Phthalate	EPA 8270	<10	ug/L	CMG	06/05/2009
Surrogates:	EPA 8270				
***Nitrobenzene-D5	EPA 8270	45.1	% R	CMG	06/05/2009
***2-Fluorobiphenyl	EPA 8270	45.3	% R	CMG	06/05/2009
***P-Terphenyl-D14	EPA 8270	40.3	% R	CMG	06/05/2009
Extraction	EPA 3510C	1.0	DF	KEF	06/04/2009



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Page 15 of 29

A N A L Y T I C A L R E P O R T

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Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 1A / Dissolved Metal** Sample No.: **006**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
DISSOLVED METALS					
Chromium	EPA 6010B	0.014	mg/L	LLZ	06/03/2009



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Page 16 of 29

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
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Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 5B** Sample No.: **007**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260			MQS	06/09/2009
Dichlorodifluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Vinyl Chloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromomethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichlorofluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Diethyl ether	EPA 8260	<5.0	ug/L	MQS	06/09/2009
Acetone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,1-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dichloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Butanone	EPA 8260	<25	ug/L	MQS	06/09/2009
2,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Chloroform	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrahydrofuran	EPA 8260	<10	ug/L	MQS	06/09/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Carbon Tetrachloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Benzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromodichloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dibromomethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Methyl-2-Pentanone	EPA 8260	<25	ug/L	MQS	06/09/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Toluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Hexanone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,3-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrachloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009



GZA GeoEnvironmental, Inc.
106 South Street
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Page 17 of 29

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 5B** Sample No.: **007**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Dibromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Ethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
m&p-Xylene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
o-Xylene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Styrene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromoform	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Isopropylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
N-Propylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
tert-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
sec-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
p-Isopropyltoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
n-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	ug/L	MQS	06/09/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Hexachlorobutadiene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Naphthalene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Surrogates:	EPA 8260				
***1,2-Dichloroethane-D4	EPA 8260	89.0	% R	MQS	06/09/2009
***Toluene-D8	EPA 8260	99.2	% R	MQS	06/09/2009
***4-Bromofluorobenzene	EPA 8260	94.8	% R	MQS	06/09/2009
Preparation	EPA 5030B	1.0	CF	MQS	06/09/2009
SEMI-VOLATILE ORGANICS	EPA 8270			CMG	06/05/2009
bis(2-Ethylhexyl)Phthalate	EPA 8270	<10	ug/L	CMG	06/05/2009



GZA GeoEnvironmental, Inc.
106 South Street
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Page 18 of 29

ANALYTICAL REPORT

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Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 5B** Sample No.: **007**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Surrogates:					
***Nitrobenzene-D5	EPA 8270	25.6	*	% R	CMG 06/05/2009
***2-Fluorobiphenyl	EPA 8270	26.9	*	% R	CMG 06/05/2009
***P-Terphenyl-D14	EPA 8270	29.6	*	% R	CMG 06/05/2009
Extraction	EPA 3510C	1.0	DF	KEF	06/04/2009
TOTAL PETROLEUM HYDROCARBON	Mod. EPA 8100			RJD	06/04/2009
Hydrocarbon Content		<200	ug/L	RJD	06/04/2009
Surrogate:					
***p-Terphenyl		45.1	% R	RJD	06/04/2009
Extraction	EPA 3510C	1.0	DF	KEF	06/03/2009
TOTAL METALS					
Chromium	EPA 6010B	<0.0050	mg/L	LLZ	06/03/2009



GZA GeoEnvironmental, Inc.
106 South Street
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Page 19 of 29

A N A L Y T I C A L R E P O R T

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Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 5B / Dissolved Metal** Sample No.: **008**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
DISSOLVED METALS					
Chromium	EPA 6010B	<0.0050	mg/L	LLZ	06/03/2009



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106 South Street
Hopkinton, MA 01748
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Page 20 of 29

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
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Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 3** Sample No.: **009**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260			MQS	06/09/2009
Dichlorodifluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Vinyl Chloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromomethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichlorofluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Diethyleneether	EPA 8260	<5.0	ug/L	MQS	06/09/2009
Acetone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,1-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dichloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Butanone	EPA 8260	<25	ug/L	MQS	06/09/2009
2,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Chloroform	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrahydrofuran	EPA 8260	<10	ug/L	MQS	06/09/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Carbon Tetrachloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Benzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromodichloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dibromomethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Methyl-2-Pentanone	EPA 8260	<25	ug/L	MQS	06/09/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Toluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Hexanone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,3-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrachloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009



GZA GeoEnvironmental, Inc.
106 South Street
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(781) 278-4700

Page 21 of 29

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
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Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 3** Sample No.: **009**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Dibromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Ethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
m&p-Xylene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
o-Xylene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Styrene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromoform	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Isopropylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
N-Propylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
tert-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
sec-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
p-Isopropyltoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
n-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	ug/L	MQS	06/09/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Hexachlorobutadiene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Naphthalene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Surrogates:					
***1,2-Dichloroethane-D4	EPA 8260	84.7	% R	MQS	06/09/2009
***Toluene-D8	EPA 8260	101	% R	MQS	06/09/2009
***4-Bromofluorobenzene	EPA 8260	96.3	% R	MQS	06/09/2009
Preparation	EPA 5030B	1.0	CF	MQS	06/09/2009
SEMI-VOLATILE ORGANICS	EPA 8270			CMG	06/05/2009
bis(2-Ethylhexyl)Phthalate	EPA 8270	<10	ug/L	CMG	06/05/2009



GZA GeoEnvironmental, Inc.
106 South Street
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Page 22 of 29

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
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Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 3** Sample No.: **009**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Surrogates:	EPA 8270				
***Nitrobenzene-D5	EPA 8270	39.6	% R	CMG	06/05/2009
***2-Fluorobiphenyl	EPA 8270	38.9	% R	CMG	06/05/2009
***P-Terphenyl-D14	EPA 8270	32.9	% R	CMG	06/05/2009
Extraction	EPA 3510C	1.0	DF	KEF	06/04/2009
TOTAL PETROLEUM HYDROCARBON	Mod. EPA 8100			RJD	06/04/2009
Hydrocarbon Content		300	ug/L	RJD	06/04/2009
Surrogate:					
***p-Terphenyl		35.0	*	RJD	06/04/2009
Extraction	EPA 3510C	1.0	DF	KEF	06/03/2009
TOTAL METALS					
Chromium	EPA 6010B	<0.0050	mg/L	LLZ	06/03/2009



GZA GeoEnvironmental, Inc.
106 South Street
Hopkinton, MA 01748
(781) 278-4700

Page 23 of 29

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
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Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 3 / Dissolved Metal** Sample No.: **010**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
DISSOLVED METALS					
Chromium	EPA 6010B	<0.0050	mg/L	LLZ	06/03/2009



GZA GeoEnvironmental, Inc.
106 South Street
Hopkinton, MA 01748
(781) 278-4700

Page 24 of 29

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
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Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 6** Sample No.: **011**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260			MQS	06/09/2009
Dichlorodifluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Vinyl Chloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromomethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichlorofluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Diethylether	EPA 8260	<5.0	ug/L	MQS	06/09/2009
Acetone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,1-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dichloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Butanone	EPA 8260	<25	ug/L	MQS	06/09/2009
2,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Chloroform	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrahydrofuran	EPA 8260	<10	ug/L	MQS	06/09/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Carbon Tetrachloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Benzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromodichloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dibromomethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Methyl-2-Pentanone	EPA 8260	<25	ug/L	MQS	06/09/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Toluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Hexanone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,3-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrachloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009



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Page 25 of 29

ANALYTICAL REPORT

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Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 6** Sample No.: **011**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Dibromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Ethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
m&p-Xylene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
o-Xylene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Styrene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromoform	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Isopropylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
N-Propylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
tert-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
sec-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
p-Isopropyltoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
n-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	ug/L	MQS	06/09/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Hexachlorobutadiene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Naphthalene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Surrogates:	EPA 8260				
***1,2-Dichloroethane-D4	EPA 8260	84.6	% R	MQS	06/09/2009
***Toluene-D8	EPA 8260	101	% R	MQS	06/09/2009
***4-Bromofluorobenzene	EPA 8260	95.4	% R	MQS	06/09/2009
Preparation	EPA 5030B	1.0	CF	MQS	06/09/2009
SEMI-VOLATILE ORGANICS	EPA 8270			CMG	06/05/2009
bis(2-Ethylhexyl)Phthalate	EPA 8270	<10	ug/L	CMG	06/05/2009



GZA GeoEnvironmental, Inc.
106 South Street
Hopkinton, MA 01748
(781) 278-4700

Page 26 of 29

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 6** Sample No.: **011**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Surrogates:	EPA 8270				
***Nitrobenzene-D5	EPA 8270	35.0	% R	CMG	06/05/2009
***2-Fluorobiphenyl	EPA 8270	35.7	% R	CMG	06/05/2009
***P-Terphenyl-D14	EPA 8270	31.8	% R	CMG	06/05/2009
Extraction	EPA 3510C	1.0	DF	KEF	06/04/2009
TOTAL PETROLEUM HYDROCARBON	Mod. EPA 8100			RJD	06/04/2009
Hydrocarbon Content		<200	ug/L	RJD	06/04/2009
Surrogate:					
***p-Terphenyl		45.0	% R	RJD	06/04/2009
Extraction	EPA 3510C	1.0	DF	KEF	06/03/2009
TOTAL METALS					
Chromium	EPA 6010B	<0.0050	mg/L	LLZ	06/03/2009



GZA GeoEnvironmental, Inc.
106 South Street
Hopkinton, MA 01748
(781) 278-4700

Page 27 of 29

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **MW - 6 / Dissolved Metal** Sample No.: **012**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
DISSOLVED METALS					
Chromium	EPA 6010B	<0.0050	mg/L	LLZ	06/03/2009



GZA GeoEnvironmental, Inc.
106 South Street
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Page 28 of 29

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **TBLK 060109**

Sample No.: **013**

Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260			MQS	06/09/2009
Dichlorodifluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Vinyl Chloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromomethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichlorofluoromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Diethyl ether	EPA 8260	<5.0	ug/L	MQS	06/09/2009
Acetone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,1-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dichloromethane	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Butanone	EPA 8260	<25	ug/L	MQS	06/09/2009
2,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Chloroform	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrahydrofuran	EPA 8260	<10	ug/L	MQS	06/09/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Carbon Tetrachloride	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Benzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Trichloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromodichloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Dibromomethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Methyl-2-Pentanone	EPA 8260	<25	ug/L	MQS	06/09/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Toluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Hexanone	EPA 8260	<25	ug/L	MQS	06/09/2009
1,3-Dichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Tetrachloroethene	EPA 8260	<1.0	ug/L	MQS	06/09/2009



GZA GeoEnvironmental, Inc.
106 South Street
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Page 29 of 29

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus

Project Name.: **Charbert UIC Quarterly Testing**
Project No.: **03.0032795.33**

Date Received: **06/02/2009**
Date Reported: **06/10/2009**
Work Order No.: **0906-00017**

Sample ID: **TBLK 060109** Sample No.: **013**
Sample Date: **06/01/2009**

Test Performed	Method	Results	Units	Tech	Analysis Date
Dibromochloromethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Chlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Ethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
m&p-Xylene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
o-Xylene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Styrene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromoform	EPA 8260	<2.0	ug/L	MQS	06/09/2009
Isopropylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Bromobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
N-Propylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
2-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
4-Chlorotoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
tert-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
sec-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
p-Isopropyltoluene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
n-Butylbenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	ug/L	MQS	06/09/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Hexachlorobutadiene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Naphthalene	EPA 8260	<2.0	ug/L	MQS	06/09/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	ug/L	MQS	06/09/2009
Surrogates:	EPA 8260				
***1,2-Dichloroethane-D4	EPA 8260	82.6	% R	MQS	06/09/2009
***Toluene-D8	EPA 8260	100	% R	MQS	06/09/2009
***4-Bromofluorobenzene	EPA 8260	94.6	% R	MQS	06/09/2009
Preparation	EPA 5030B	1.0	CF	MQS	06/09/2009

GZA GEOENVIRONMENTAL, INC.
 ENVIRONMENTAL CHEMISTRY LABORATORY
 106 SOUTH ST, HOPKINTON, MA 01748
 MASSACHUSETTS LABORATORY I.D. NO. MA092

EPA METHOD 6010B ANALYSIS
Metals by ICP

QUALITY CONTROL - AQUEOUS

DATE PREPARED: 6/3/2009

QC Sample Units Acceptance Limits	Method Blank mg/L Results	Lab Control Sample % Recovery 80-120	LC Duplicate % Recovery 80-120	LC/LCD Diff. RPD 20%
Analyte				
Silver (Ag)	NA	NA	NA	NA
Aluminum (Al)	NA	NA	NA	NA
Arsenic (As)	NA	NA	NA	NA
Boron (B)	NA	NA	NA	NA
Barium (Ba)	NA	NA	NA	NA
Beryllium (Be)	NA	NA	NA	NA
Calcium (Ca)	NA	NA	NA	NA
Cadmium (Cd)	NA	NA	NA	NA
Cobalt (Co)	NA	NA	NA	NA
Chromium (Cr)	<0.0050	101	99.9	0.68
Copper (Cu)	NA	NA	NA	NA
Iron (Fe)	<0.025	104	104	0.13
Magnesium (Mg)	NA	NA	NA	NA
Manganese (Mn)	NA	NA	NA	NA
Molybdenum (Mo)	NA	NA	NA	NA
Nickel (Ni)	<0.010	103	103	0.61
Lead (Pb)	<0.010	101	101	0.10
Antimony (Sb)	<0.025	103	103	0.31
Selenium (Se)	NA	NA	NA	NA
Strontium (Sr)	NA	NA	NA	NA
Titanium (Ti)	NA	NA	NA	NA
Thallium (Tl)	NA	NA	NA	NA
Vanadium (V)	NA	NA	NA	NA
Zinc (Zn)	<0.010	106	105	1.00
Zirconium (Zr)	NA	NA	NA	NA
Tin (Sn)	NA	NA	NA	NA

Matrix Spike / Duplicate Spike performed as per method and reported if assigned on Chain of Custody.

GZA GeoEnvironmental, Inc.
106 South Street
Hopkinton, MA 01748
MA052

EPA Method 8270/825 Aqueous Method Blank (MB) and Laboratory Control Sample (LCS) Data

Method Blank

Date Extracted: 06/04/09
Date Analyzed: 06/05/09
File Name: M1359

Laboratory Control Sample

Date Extracted: 06/04/09
Date Analyzed: 06/05/09
File Name: M1359

Semi-Volatile Organics	Result	Reporting Limit (ug/L)	Spike Concentration = 20ug/L	% Recovery	Acceptance Limits	Verdict
n-nitrosodimethylamine	ND	10	n-nitrosodimethylamine	50.2	40-140	ok
pyridine	ND	100	pyridine	33.2	40-140	out
phenol	ND	10	phenol	48.4	30-130	ok
bis(2-chloroethyl)ether	ND	10	bis(2-chloroethyl)ether	67.6	40-140	ok
2-chlorophenol	ND	10	2-chlorophenol	64.4	30-130	ok
1,3-dichlorobenzene	ND	10	1,3-dichlorobenzene	59.3	40-140	ok
1,4-dichlorobenzene	ND	10	1,4-dichlorobenzene	56.4	40-140	ok
benzyl alcohol	ND	20	benzyl alcohol	73.9	40-140	ok
1,2-dichlorobenzene	ND	10	1,2-dichlorobenzene	60.3	40-140	ok
2-methylophenol	ND	10	2-methylophenol	68.5	30-130	ok
butyl-2-chloropropyl ether	ND	10	butyl-2-chloropropyl ether	82.1	40-140	ok
3,4-methylenepheno	ND	10	3,4-methylenepheno	69.4	30-130	ok
n-nitroso-n-propylamine	ND	10	n-nitroso-n-propylamine	70.1	40-140	ok
acetophenone	ND	10	acetophenone	64.3	40-140	ok
hexachloroethane	ND	10	hexachloroethane	57.4	40-140	ok
nitrobenzene	ND	10	nitrobenzene	83.5	40-140	ok
isophorone	ND	10	isophorone	56.1	40-140	ok
2-nitrophenol	ND	10	2-nitrophenol	99.2	30-130	ok
2,4-cimaphorphenol	ND	10	2,4-cimaphorphenol	73.3	30-130	ok
benzidic acid	ND	10	benzidic acid	30.3	40-140	out
bis(2-chloroethyl)methane	ND	10	bis(2-chloroethyl)methane	72.8	40-140	ok
2,4-dichlorophenol	ND	10	2,4-dichlorophenol	70.7	30-130	ok
1,2,4-trichlorobenzene	ND	10	1,2,4-trichlorobenzene	80.3	40-140	ok
naphthalene	ND	2.0	naphthalene	85.8	40-140	ok
4-chloroniline	ND	10	4-chloroniline	72.7	40-140	ok
hexachlorobutadiene	ND	10	hexachlorobutadiene	57.8	40-140	ok
4-chloro-3-methyphenol	ND	20	4-chloro-3-methyphenol	74.7	30-130	ok
2-methylnaphthalene	ND	2.0	2-methylnaphthalene	80.4	40-140	ok
1,2,4,5-Tetrachlorobenzene	ND	10	1,2,4,5-Tetrachlorobenzene	82.2	40-140	ok
aniline	ND	10	aniline	66.9	40-140	ok
hexachlorocyclopentadiene	ND	50	hexachlorocyclopentadiene	52.8	40-140	ok
2,4,6-trichlorophenol	ND	10	2,4,6-trichlorophenol	69.2	30-130	ok
2,4,5-trichlorophenol	ND	10	2,4,5-trichlorophenol	71.9	30-130	ok
2-chloronaphthalene	ND	10	2-chloronaphthalene	65.5	40-140	ok
2-nitroaniline	ND	50	2-nitroaniline	71.5	40-140	ok
dimethylphthalate	ND	10	dimethylphthalate	73.4	40-140	ok
acenaphthylene	ND	2.0	acenaphthylene	69.6	40-140	ok
2,6-dinitrodiene	ND	10	2,6-dinitrodiene	72.7	40-140	ok
3-nitroaniline	ND	50	3-nitroaniline	75.6	40-140	ok
acenaphthene	ND	2.0	acenaphthene	68.3	40-140	ok
2,4-dinitrophenol	ND	100	2,4-dinitrophenol	53.4	30-130	ok
debenzofuran	ND	10	debenzofuran	88.7	40-140	ok
4-nitrophenol	ND	50	4-nitrophenol	48.8	30-130	ok
2,4-dinitrodiolure	ND	10	2,4-dinitrodiolure	73.1	40-140	ok
diethylphthalate	ND	10	diethylphthalate	72.9	40-140	ok
fluorene	ND	2.0	fluorene	70.1	40-140	ok
4-chlorophenyl phenyl ether	ND	10	4-chlorophenyl phenyl ether	66.9	40-140	ok
4-nitroaniline	ND	20	4-nitroaniline	74.8	30-130	ok
4,8-dinitro-2-methyphenol	ND	50	4,8-dinitro-2-methyphenol	65.5	30-130	ok
n-nitrosodiphenylamine	ND	10	n-nitrosodiphenylamine	71.5	40-140	ok
azobenzene	ND	10	azobenzene	68.7	40-140	ok
4-bromophenyl phenyl ether	ND	10	4-bromophenyl phenyl ether	67.6	40-140	ok
Pentachloronitrobenzene	ND	10	Pentachloronitrobenzene	71.3	40-140	ok
hexachlorobenzene	ND	10	hexachlorobenzene	69.5	40-140	ok
pentachlorophenol	ND	50	pentachlorophenol	65.1	30-130	ok
phenanthrene	ND	2.0	phenanthrene	70.9	40-140	ok
anthracene	ND	2.0	anthracene	73.1	40-140	ok
carbazole	ND	10	carbazole	74.9	40-140	ok
di-n-butylphthalate	ND	15	di-n-butylphthalate	76.8	40-140	ok
benzidine	ND	2.0	benzidine	75.5	40-140	ok
pyrene	ND	2.0	pyrene	15.5	40-140	out
butylbenzylphthalate	ND	10	butylbenzylphthalate	78.9	40-140	ok
benz[a]anthracene	ND	2.0	benz[a]anthracene	72.7	40-140	ok
3,3'-dichlorobenzidine	ND	20	3,3'-dichlorobenzidine	65.8	40-140	ok
chrysene	ND	2.0	chrysene	72.3	40-140	ok
bis(2-ethylhexyl)phthalate	ND	10	bis(2-ethylhexyl)phthalate	77.3	40-140	ok
di-n-octylphthalate	ND	10	di-n-octylphthalate	75.6	40-140	ok
benzo [a] fluoranthene	ND	2.0	benzo [a] fluoranthene	76.0	40-140	ok
benzo [k] fluoranthene	ND	2.0	benzo [k] fluoranthene	75.4	40-140	ok
benzo [a] pyrene	ND	2.0	benzo [a] pyrene	76.7	40-140	ok
indeno [1,2,3-cd] pyrene	ND	2.0	indeno [1,2,3-cd] pyrene	72.6	40-140	ok
dibenz [a,h] anthracene	ND	2.0	dibenz [a,h] anthracene	74.5	40-140	ok
benzo [ghi] perylene	ND	2.0	benzo [ghi] perylene	73.8	40-140	ok

CAM criteria allows 15% of analytes to exceed criteria.

Surrogates:	Recovery (%)	Acceptance Limits	Surrogates:	Recovery (%)	Acceptance Limits	Verdict
2-FLUOROPHENOL	43.6	15-110	2-FLUOROPHENOL	58.2	15-110	ok
PHENOL-D6	35.7	15-110	PHENOL-D6	48.4	15-115	ok
NITROBENZENE-D5	57.4	30-130	NITROBENZENE-D5	64.2	30-130	ok
2-FLUOROBIPHENYL	57.9	30-130	2-FLUOROBIPHENYL	54.5	30-130	ok
2,4,6-TRIBROMOPHENOL	60.4	15-100	2,4,6-TRIBROMOPHENOL	73.2	15-110	ok
p-TERPHENYL-D14	60.3	30-130	p-TERPHENYL-D14	69.4	30-130	ok

Method Blank

Date Analyzed: 6/9/2009

	Conc. ug/L	Acceptance Limit
Volatile Organics		
dichlorofluoromethane	< 1.0	< 1.0
chloromethane	< 1.0	< 1.0
vinyl chloride	< 0.5	< 0.5
bromomethane	< 1.0	< 1.0
chloroethane	< 0.5	< 0.5
trichlorofluoromethane	< 1.0	< 1.0
diethyl ether	< 2.5	< 2.5
acetone	< 13	< 13
1,1-dichloroethene	< 0.5	< 0.5
FREON-113	< 1.0	< 1.0
iodomethane	< 0.5	< 0.5
carbon disulfide	< 5.0	< 5.0
dichloromethane	< 1.0	< 1.0
tert-butyl alcohol (TBA)	< 13	< 13
acrylonitrile	< 0.5	< 0.5
methyl-tert-butyl-ether	< 0.5	< 0.5
trans-1,2-dichloroethene	< 0.5	< 0.5
1,1-dichloroethane	< 0.5	< 0.5
di-isopropyl ether (Dipe)	< 1.0	< 1.0
ethyl tert-butyl ether (EBE)	< 1.0	< 1.0
vinyl acetate	< 13	< 13
2-butanone	< 13	< 13
2,2-dichloropropane	< 0.5	< 0.5
cis-1,2-dichloroethane	< 0.5	< 0.5
chloroform	< 0.5	< 0.5
bromochloromethane	< 0.5	< 0.5
tetrahydrofuran	< 5.0	< 5.0
1,1,1-trichloroethane	< 0.5	< 0.5
1,1-dichloropropane	< 0.5	< 0.5
carbon tetrachloride	< 0.5	< 0.5
1,2-dichloroethane	< 0.5	< 0.5
benzene	< 0.5	< 0.5
tert-amyl methyl ether (TAME)	< 1.0	< 1.0
trichloroethene	< 0.5	< 0.5
1,2-dichloropropene	< 0.5	< 0.5
bromodichloromethane	< 0.5	< 0.5
1,4-Dioxane	< 50	< 50
dibromomethane	< 0.6	< 0.6
4-methyl-2-pentanone	< 13	< 13
cis-1,3-dichloropropene	< 0.5	< 0.5
toluene	< 0.5	< 0.5
trans-1,3-dichloropropene	< 1.0	< 1.0
1,1,2-trichloroethane	< 0.5	< 0.5
2-hexanone	< 13	< 13
1,3-dichloropropene	< 0.5	< 0.5
tetrachloroethene	< 0.5	< 0.5
dibromochloromethane	< 0.5	< 0.5
1,2-dibromoethane (EDB)	< 1.0	< 1.0
chlorobenzene	< 0.5	< 0.5
1,1,1-tetrachloroethane	< 0.5	< 0.5
ethylbenzene	< 0.5	< 0.5
1,1,2-tetrachloroethane	< 0.5	< 0.5
m&p-xylene	< 1.0	< 1.0
o-xylene	< 0.5	< 0.5
styrene	< 0.5	< 0.5
bromoform	< 1.0	< 1.0
isopropylbenzene	< 0.5	< 0.5
1,2,3-trichloropropene	< 0.5	< 0.5
bromobenzene	< 0.5	< 0.5
n-propylbenzene	< 0.5	< 0.5
2-chlorotoluene	< 0.5	< 0.5
1,3,5-trimethylbenzene	< 0.5	< 0.5
trans-1,4-dichloro-2-butene	< 1.0	< 1.0
4-chlorotoluene	< 0.5	< 0.5
tert-butyl-benzene	< 0.5	< 0.5
1,2,4-trimethylbenzene	< 0.5	< 0.5
sec-butyl-benzene	< 0.5	< 0.5
p-isopropylbenzene	< 0.5	< 0.5
1,3-dichlorobenzene	< 0.5	< 0.5
1,4-dichlorobenzene	< 0.5	< 0.5
n-butylbenzene	< 0.5	< 0.5
1,2-dichlorobenzene	< 0.5	< 0.5
1,2-dibromo-3-chloropropane	< 2.5	< 2.5
1,3,5-trichlorobenzene	< 0.5	< 0.5
1,2,4-trichlorobenzene	< 0.5	< 0.5
hexachlorobutadiene	< 0.5	< 0.5
naphthalene	< 1.0	< 1.0
1,2,3-trichlorobenzene	< 0.5	< 0.5

Laboratory Control Sample

	Conc. ug/L	Acceptance Limit	Data Analyzed: Spiked Concentration = 20ug/L	% Recovery	Acceptance Limits	Verdict	6/9/2009	% Recovery	Acceptance Limits	Verdict	RPD	Limit	Verdict
dichlorofluoromethane	122	70-130	dichlorofluoromethane	116	70-130	ok	2.79	<25	ok				
chloromethane	110	70-130	chloromethane	99.3	70-130	ok	10.5	<25	ok				
vinyl chloride	108	80-120	vinyl chloride	104	70-130	ok	3.25	<25	ok				
bromomethane	97.4	70-130	bromomethane	95.2	70-130	ok	2.29	<25	ok				
chloroethane	99.1	70-130	chloroethane	97.0	70-130	ok	2.07	<25	ok				
trichlorofluoromethane	95.1	70-130	trichlorofluoromethane	93.4	70-130	ok	1.79	<25	ok				
diethyl ether	96.1	70-130	diethyl ether	94.2	70-130	ok	0.95	<25	ok				
acetone	97.3	70-130	acetone	97.1	70-130	ok	0.24	<25	ok				
1,1-dichloroethene	101	80-120	1,1-dichloroethene	90.8	70-130	ok	4.53	<25	ok				
FREON-113	107	70-130	FREON-113	105	70-130	ok	1.82	<25	ok				
iodomethane	96.3	70-130	iodomethane	95.2	70-130	ok	3.18	<25	ok				
carbon disulfide	135	70-130	carbon disulfide	130	70-130	ok	3.71	<25	ok				
dichloromethane	96.3	70-130	dichloromethane	94.3	70-130	ok	2.11	<25	ok				
tert-butyl alcohol (TBA)	106	70-130	tert-butyl alcohol (TBA)	105	70-130	ok	3.23	<25	ok				
acrylonitrile	101	70-130	acrylonitrile	98.9	70-130	ok	2.51	<25	ok				
methyl-tert-butyl-ether	91.3	70-130	methyl-tert-butyl-ether	90.7	70-130	ok	0.65	<25	ok				
trans-1,2-dichloroethene	109	70-130	trans-1,2-dichloroethene	107	70-130	ok	2.08	<25	ok				
1,1-dichloroethane	97.3	70-130	1,1-dichloroethane	95.5	70-130	ok	1.88	<25	ok				
di-isopropyl ether (Dipe)	96.6	70-130	di-isopropyl ether (Dipe)	97.0	70-130	ok	0.42	<25	ok				
ethyl tert-butyl ether (EBE)	92.3	70-130	ethyl tert-butyl ether (EBE)	93.4	70-130	ok	1.18	<25	ok				
vinyl acetate	88.9	70-130	vinyl acetate	90.2	70-130	ok	1.48	<25	ok				
2-butanone	98.3	70-130	2-butanone	101	70-130	ok	2.42	<25	ok				
2,2-dichloropropane	94.2	70-130	2,2-dichloropropane	91.5	70-130	ok	2.95	<25	ok				
cis-1,2-dichloroethene	93.3	70-130	cis-1,2-dichloroethene	88.7	70-130	ok	1.73	<25	ok				
chloroform	99.2	80-120	chloroform	88.2	70-130	ok	1.09	<25	ok				
bromochloromethane	96.7	70-130	bromochloromethane	95.8	70-130	ok	0.87	<25	ok				
tetrahydrofuran	117	70-130	tetrahydrofuran	122	70-130	ok	4.10	<25	ok				
1,1,1-trichloroethane	89.9	70-130	1,1,1-trichloroethane	88.6	70-130	ok	1.55	<25	ok				
1,1-dichloropropane	98.1	70-130	1,1-dichloropropane	94.0	70-130	ok	4.35	<25	ok				
carbon tetrachloride	91.3	70-130	carbon tetrachloride	89.6	70-130	ok	1.89	<25	ok				
1,2-dichloroethane	86.7	70-130	1,2-dichloroethane	85.5	70-130	ok	1.38	<25	ok				
benzene	103	70-130	benzene	102	70-130	ok	0.98	<25	ok				
tert-amyl methyl ether (TAME)	93.0	70-130	tert-amyl methyl ether (TAME)	96.0	70-130	ok	2.12	<25	ok				
trichloroethene	99.7	70-130	trichloroethene	98.0	70-130	ok	1.77	<25	ok				
1,2-dichloropropene	96.3	80-120	1,2-dichloropropene	98.5	70-130	ok	0.73	<25	ok				
bromodichloromethane	87.8	70-130	bromodichloromethane	88.8	70-130	ok	1.18	<25	ok				
1,4-Dioxane	117	70-130	1,4-Dioxane	114	70-130	ok	2.50	<25	ok				
dibromomethane	93.6	70-130	dibromomethane	95.4	70-130	ok	1.05	<25	ok				
4-methyl-2-pentanone	90.4	70-130	4-methyl-2-pentanone	91.7	70-130	ok	1.41	<25	ok				
cis-1,3-dichloropropene	98.5	70-130	cis-1,3-dichloropropene	95.9	70-130	ok	0.82	<25	ok				
toluene	99.0	80-120	toluene	99.0	70-130	ok	0.01	<25	ok				
trans-1,3-dichloropropene	87.3	70-130	trans-1,3-dichloropropene	89.8	70-130	ok	2.68	<25	ok				
1,1,2-trichloroethane	94.0	70-130	1,1,2-trichloroethane	87.0	70-130	ok	7.77	<25	ok				
2-hexanone	99.1	70-130	2-hexanone	95.5	70-130	ok	3.70	<25	ok				
1,3-dichloropropene	101	70-130	1,3-dichloropropene	98.2	70-130	ok	3.09	<25	ok				
tetrachloroethene	107	70-130	tetrachloroethene	99.4	70-130	ok	7.83	<25	ok				
dibromochloromethane	99.4	70-130	dibromochloromethane	94.8	70-130	ok	4.93	<25	ok				
1,2-dibromoethane (EDB)	102	70-130	1,2-dibromoethane (EDB)	94.5	70-130	ok	7.31	<25	ok				
chlorobenzene	103	70-130	chlorobenzene	95.7	70-130	ok	8.88	<25	ok				
1,1,1-tetrachloroethane	97.6	70-130	1,1,1-tetrachloroethane	98.8	70-130	ok	3.66	<25	ok				
ethylbenzene	106	80-120	ethylbenzene	99.8	70-130	ok	6.32	<25	ok				
1,1,2,2-tetrachloroethane	95.4	70-130	1,1,2,2-tetrachloroethane	92.3	70-130	ok	3.27	<25	ok				
m&p-xylene	101	70-130	m&p-xylene	94.8	70-130	ok	6.64	<25	ok				
o-xylene	98.4	70-130	o-xylene	92.0	70-130	ok	4.69	<25	ok				
styrene	103	70-130	styrene	98.8	70-130	ok	3.73	<25	ok				
bromoform	96.5	70-130	bromoform	95.5	70-130	ok	0.08	<25	ok				
isopropylbenzene	118	70-130	isopropylbenzene	114	70-130	ok	3.68	<25	ok				
1,2,3-trichloropropene	94.1	70-130	1,2,3-trichloropropene	88.0	70-130	ok	6.73	<25	ok				
bromobenzene	98.7	70-130	bromobenzene	94.7	70-130	ok	4.14	<25	ok				
n-propylbenzene	105	70-130	n-propylbenzene	102	70-130	ok	3.61	<25	ok				
2-chlorotoluene	96.7	70-130	2-chlorotoluene	91.9	70-130	ok	5.10	<25	ok				
1,3,5-trimethylbenzene	102	70-130	1,3,5-trimethylbenzene	97.4	70-130	ok	5.12	<25	ok				
trans-1,4-dichloro-2-butene	90.2	70-130	trans-1,4-dichloro-2-butene	90.8	70-130	ok	0.73	<25	ok				
4-chlorotoluene	95.2	70-130	4-chlorotoluene	94.8	70-130	ok	3.58	<25	ok				
tert-butyl-benzene	119	70-130	tert-butyl-benzene	113	70-130	ok	4.63	<25	ok				
1,2,4-trimethylbenzene	98.0	70-130	1,2,4-trimethylbenzene	91.9	7								

CHAIN-OF-CUSTODY RECORD

W.O. # 006 - 0017

(for lab use only)

APPENDIX E

SIXTH QUARTERLY PERIMETER WELL MONITORING RESULTS

*****DRAFT FOR CLIENT REVIEW*****

August 13, 2009
File No. 32795.29

Mr. Gary Jablonski
Rhode Island Department of Environmental Management
Office of Waste Management
235 Promenade Street
Providence, Rhode Island 02908

Re: Sixth Quarterly (April-June 2009) Perimeter Well Monitoring Report
Charbert, Division of N.F.A.
Richmond, Rhode Island
RIDEM Case # 99-037

Dear Mr. Jablonski:

This letter with attachments serves as the sixth quarterly Perimeter Well Monitoring Report for the Charbert facility located at 299 Church Street in Richmond (Alton), Rhode Island. It was prepared by GZA GeoEnvironmental, Inc., on behalf of our client Charbert, Division of N.F.A.

In accordance with discussions during the conference call on April 23, 2008 between RIDEM and Charbert, it was agreed that, as part of the environmental monitoring, additional groundwater samples would be collected from perimeter wells located between the Charbert facility and nearby private wells and analyzed for VOCs, see Figure 1, attached. Perimeter monitoring wells included RIZ-1, GP-22, RIZ-21, GZ-1 and RIZ-14. Sample results from these wells were received on May 1, 2008. Based on previous results and the results of the Piezometric Monitoring Report dated May 2, 2008, RIDEM concurred with Charbert's recommendation (received via email 5/9/08) to sample these wells for a total of eight quarters, following which the need for any future monitoring will be assessed.

Groundwater Sampling

GZA personnel were on site on July 9, 2009 and collected samples from five monitoring wells, RIZ-1, RIZ-14, RIZ-21, GP-22 and GZ-1. Groundwater sampling was performed in general accordance with EPA's July 30, 1996 *Low Stress (low flow) Purging and Sampling Procedure* (Low Flow SOP). Low flow sampling equipment (exclusive of tubing which was dedicated to the wells) was decontaminated prior to use on-site and between each location following EPA's required protocols. Water quality monitoring for stabilization was conducted utilizing a Horiba multi-meter in a flow through cell.

Analysis

As agreed upon, groundwater was analyzed for volatile organic compounds (VOCs) via EPA Method 8260B in samples from all five monitoring wells. The detected analytes have been summarized and compared to RIDEM's Method 1 GA Groundwater Objectives and Groundwater Quality Preventative Action Limits (PALS) in the attached Table 1. The low flow field screening results are provided in Table 2, attached, and the laboratory certificates of analysis are provided in Attachment A.

Results

The July 9, 2009 groundwater results have been compared to the applicable groundwater standards for Rhode Island and there are GA Groundwater Objectives exceedances for VOCs in one of the five wells. The remaining four wells had no VOCs detected above the method detection limit.

The sample from monitoring well GZ-1 has five VOCs detected with cis-1,2-dichloroethene present at 50 µg/L, (above the PAL of 35 µg/L), and trichloroethene present at 10.0 µg/L, (above the GA Groundwater Objectives of 5 µg/L). The three other detects were 1,1-dichloroethane at 2.3 µg/L, tetrachloroethene at 2.1 µg/L, and 1,2,4-trichlorobenzene at 4.3 µg/L. These results are consistent with prior contaminant levels observed in samples from GZ-1. For reference, all previous analytical testing results for the five wells tested on July 9, 2009 have been included in Table 1.

At this time, we do not see any significant change in the pattern of migration of contaminants from the previously delineated areas of concern, and no changes in groundwater elevations that would suggest that a deleterious change in contaminant distribution is occurring. The perimeter wells will be sampled and analyzed on a quarterly basis for the next two quarters, after which the need to continue sampling these monitoring wells will be re-evaluated in conjunction with RIDEM.

Please feel free to call Ed, Steve or Angela at (401) 421-4140 (or via email at *esummerly@gza.com*, *stephen.andrus@gza.com*, or *angela.harvey@gza.com*) with any questions or comments.

Very truly yours,

GZA GEOENVIRONMENTAL, INC.

Angela L. Harvey, E.I.T.
Project Engineer

Stephen Andrus, P.E.
Assistant Project Manager

Edward A. Summerly, P.G.
Principal

ALH/EAS:mac

CC: Tracy Nelson Hay, Richmond Town Clerk
Clark Memorial Library – Charbert Repository

Attachments: Tables - Table 1 - Detected Constituents
Table 2 - Low Flow Field Screening Readings
Figure 1- Monitoring Well Locations
Attachment A – Laboratory Certification Sheets

TABLE 1
DETECTED CONSTITUENTS SUMMARY

July 2009 Perimeter Wells
Charbert Facility
Richmond, Rhode Island

GZ-1	UNITS	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	DATE															
				8/6/2004		2/15/2005		4/25/2008		7/7/2008		10/3/2008		1/6/2009		4/1/2009		7/9/2009	
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit
VOLATILE ORGANICS																			
1,2,4-Trimethylbenzene	ug/L (ppb)	NS	NS	<	1	<	1	<	1	4.2	1	4.2	1	3.9	1	<	1	<	1
1,1-Dichloroethane	ug/L (ppb)	---	---	2.2	1	2.0	1	1.0	1	<	1	1.5	1	1.8	1	1.8	1	2.3	1
1,2,3-Trichlorobenzene	ug/L (ppb)	---	---	<	1	8.3	1	<	1	<	1	<	1	<	1	<	1	<	1
1,2,4-Trichlorobenzene	ug/L (ppb)	70	35	9.5	1	<	1	3.0	1	<	1	<	1	<	1	3.6	1	4.3	1
cis-1,2-Dichloroethene	ug/L (ppb)	70	35	73	1	68	1	29	1	20	1	39	1	45	1	41	1	50	1
Tetrachloroethene	ug/L (ppb)	5	2.5	2.2	1	2.0	1	<	1	1.2	1	1.6	1	2.0	1	2.1	1	2.1	1
trans-1,2-Dichloroethene	ug/L (ppb)	100	50	<	1	1.0	1	<	1	<	1	<	1	<	1	<	1	<	1
Trichloroethene	ug/L (ppb)	5	2.5	12	1	8.6	1	5.0	1	4.2	1	8.0	1	10	1	9.6	1	10	1
Vinyl Chloride	ug/L (ppb)	2	1	1.1	1	1.4	1	<	1	<	1	<	1	<	1	<	1	<	1

RIZ-1	UNITS	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	DATE															
				01/02/2008		4/1/2008		4/25/2008		7/7/2008		10/3/2008		1/6/2009		4/1/2009		7/9/2009	
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit
VOLATILE ORGANICS																			
Tetrachloroethene	ug/L (ppb)	5	2.5	<	1.0	4.4	1.0	ND	1	ND	1	ND	1	ND	1	ND	1	ND	1

RIZ-14	UNITS	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	DATE													
				4/25/2008		7/7/2008		10/3/2008		1/6/2009		4/1/2009		7/9/2009			
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit		
VOLATILE ORGANICS																	
Tetrachloroethene	ug/L (ppb)	5	2.5	<	1.0	4.4	1.0	ND	1	ND	1	ND	1	ND	1	ND	1

RIZ-21	UNITS	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	DATE											
				4/25/2008		7/7/2008		10/3/2008		1/6/2009		4/1/2009		7/9/2009	
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit
VOLATILE ORGANICS															
Tetrachloroethene	ug/L (ppb)	5	2.5	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND

GP-22	UNITS	RIDEM GA Groundwater Objectives	RIDEM Groundwater Quality PALs	DATE											
				2/15/2005		4/25/2008		7/7/2008		10/3/2008		10/28/2008		1/6/2009	
				Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit	Result	Limit
VOLATILE ORGANICS															
Tetrachloroethene	ug/L (ppb)	5	2.5	<	1	<	1	<	1	12	1	<	1	<	1

Notes:

1. Cells shaded yellow have results above the method detection limit.

2. Cells shaded green are above RIDEM GA Groundwater Objective.

3. Cells shaded blue are above RIDEM Preventative Action Limit.

ND= Not Detected

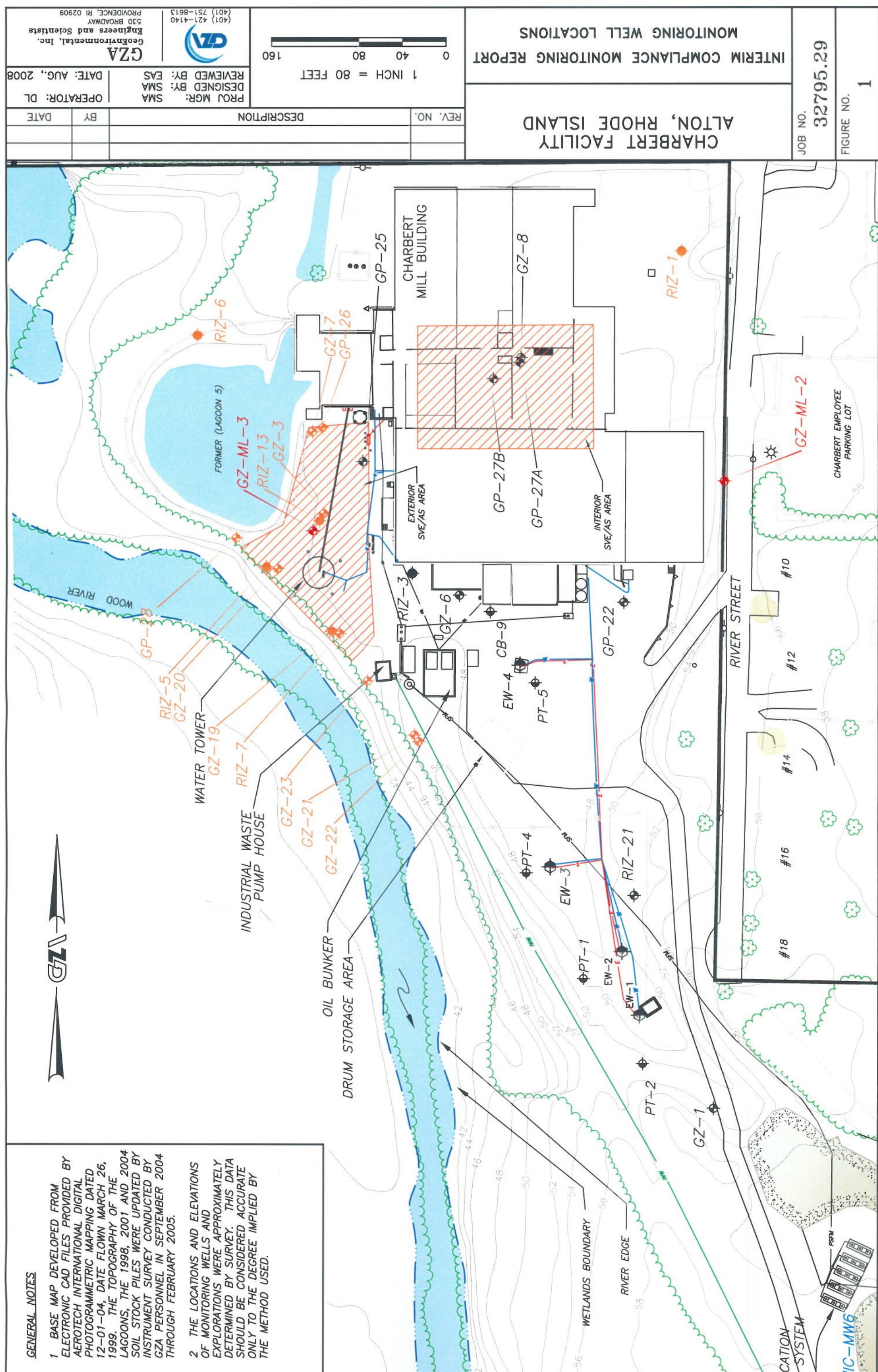
TABLE 2
LOW FLOW SCREENING RESULTS

*July 2009 Perimeter Wells
Charbert Facility
Richmond, RI*

APRIL 2009 GROUNDWATER SAMPLING FIELD DATA								
WELL ID	pH	CONDUCTIVITY	TURBIDITY	DISSOLVED OXYGEN	TEMPERATURE	ORP	DEPTH TO GWT	GW ELEV.
	SU	mS/cm	NTU	mg/l	°C	mV	FT	FT
RIZ-1	5.3	0.962	3.4	7.1	16.1	222	3.5	46.7
RIZ-14	4.4	0.034	5.1	8.0	13.2	303	13.7	49.0
RIZ-21	5.8	0.225	3.0	7.2	9.4	44	8.8	44.1
GZ-1	8.3	0.375	3.9	NT	13.1	-144	12.3	44.2
GP-22	6.5	0.276	23.4	6.8	16.2	119	3.8	44.8

Notes:

1. Field screening parameters were collected using a Horiba Model U-22 Water Quality Monitor.





GZA GeoEnvironmental, Inc.

106 South Street

Hopkinton, MA 01748

(781) 278-4700

Laboratory Identification Numbers:

MA and ME: **MA092** NH: **2028**

CT: **PH0579** RI: **LA000236**

NELAC - NYS DOH: **11063**

ANALYTICAL REPORT

GZA GeoEnvironmental, Inc.

140 Broadway

Providence, RI 02903

Stephen Andrus / Angela Harvey

Project No.: **03.0032795.29**

Work Order No.: **0907-00069**

Date Received: **07/10/2009**

Date Reported: **07/17/2009**

SAMPLE INFORMATION

Date Sampled	Matrix	Laboratory ID	Sample ID
07/09/2009	Aqueous	0907-00069 001	GP-22
07/09/2009	Aqueous	0907-00069 002	RIZ-21
07/09/2009	Aqueous	0907-00069 003	GZ-1
07/09/2009	Aqueous	0907-00069 004	RIZ-1
07/09/2009	Aqueous	0907-00069 005	RIZ-14
07/09/2009	Aqueous	0907-00069 006	Trip Blank



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Page 2 of 21

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

PROJECT NARRATIVE:

1. Sample Receipt

The samples were received on 07/10/09 via x GZA courier, EC, FEDEX, or hand delivered. The temperature of the temperature blank/x cooler air, was 1.3 degrees C. The temperature requirement for most analyses is above freezing to 6 degrees C. The samples were received intact for all requested analyses.

The chain of custody indicates that the samples, when required, were chemically preserved in accordance with the method they reference.

2. EPA Method 8260 - VOCs

Attach QC 8260 07/16/09 S - Aqueous



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Page 3 of 21

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Data Authorized By: D. J. P.

NELAC certification, as indicated by the NELAC Lab ID Number, is per analyte. For a complete list of NELAC validated analytes, please contact the laboratory.

Abbreviations:

% R = % Recovery
DF = Dilution Factor
DFS = Dilution Factor Solids
CF = Calculation Factor
DO = Diluted Out

Method Key:

Method 8260: The current version of the method is 8260B.
Method 8270: The current version of the method is 8270D.
Method 6010: The current version of the method is 6010B.

Please note that the laboratory signed copy of the chain of custody record is an integral part of the data report.

The laboratory report shall not be reproduced except in full without the written consent of the laboratory.

Soil data is reported on a dry weight basis unless otherwise specified.
Matrix Spike / Matrix Spike Duplicate sets are performed as per method and are reported at the end of the analytical report if assigned on the Chain of Custody.



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Page 4 of 21

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID:	GP-22	Sample No.:	001
Sample Date:	07/09/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/16/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Vinyl Chloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/16/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromoform	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Tetrahydrofuran	EPA 8260	<10	10	ug/L	MQS	07/16/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Trichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009



A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID:	GP-22	Sample No.:	001
Sample Date:	07/09/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Tetrachloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dibromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/16/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	94.2	70-130	% R	MQS	07/16/2009
***Toluene-D8	EPA 8260	101	70-130	% R	MQS	07/16/2009



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Page 6 of 21

A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID: **GP-22**

Sample No.: **001**

Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	104 1.0	70-130	% R CF	MQS MQS	07/16/2009 07/16/2009



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Page 7 of 21

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID:	RIZ-21	Sample No.:	002
Sample Date:	07/09/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/16/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Vinyl Chloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/16/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromoform	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Tetrahydrofuran	EPA 8260	<10	10	ug/L	MQS	07/16/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Trichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009



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Page 8 of 21

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID:	RIZ-21	Sample No.:	002
Sample Date:	07/09/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Tetrachloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dibromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/16/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	96.3	70-130	% R	MQS	07/16/2009
***Toluene-D8	EPA 8260	99.5	70-130	% R	MQS	07/16/2009



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Page 9 of 21

A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID: **RIZ-21**

Sample No.: **002**

Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	102 1.0	70-130	% R CF	MQS MQS	07/16/2009 07/16/2009



A N A L Y T I C A L R E P O R T

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Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID:	GZ-1	Sample No.:	003
Sample Date:	07/09/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/16/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Vinyl Chloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/16/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1-Dichloroethane	EPA 8260	2.3	1.0	ug/L	MQS	07/16/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
cis-1,2-Dichloroethene	EPA 8260	50	1.0	ug/L	MQS	07/16/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Tetrahydrofuran	EPA 8260	<10	10	ug/L	MQS	07/16/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Trichloroethene	EPA 8260	10	1.0	ug/L	MQS	07/16/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID:	GZ-1	Sample No.:	003
Sample Date:	07/09/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Tetrachloroethene	EPA 8260	2.1	1.0	ug/L	MQS	07/16/2009
Dibromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/16/2009
1,2,4-Trichlorobenzene	EPA 8260	4.3	1.0	ug/L	MQS	07/16/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	91.4	70-130	% R	MQS	07/16/2009
***Toluene-D8	EPA 8260	100	70-130	% R	MQS	07/16/2009



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Page 12 of 21

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID: **GZ-1** Sample No.: **003**
Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	104 1.0	70-130	% R CF	MQS MQS	07/16/2009 07/16/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID:	RIZ-1	Sample No.:	004
Sample Date:	07/09/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/16/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Vinyl Chloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/16/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromoform	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Tetrahydrofuran	EPA 8260	<10	10	ug/L	MQS	07/16/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Trichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009



A N A L Y T I C A L R E P O R T

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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID: **RIZ-1** Sample No.: **004**
Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Tetrachloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dibromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/16/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	94.9	70-130	% R	MQS	07/16/2009
***Toluene-D8	EPA 8260	100	70-130	% R	MQS	07/16/2009



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Page 15 of 21

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID: **RIZ-1** Sample No.: **004**
Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	103 1.0	70-130	% R CF	MQS MQS	07/16/2009 07/16/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID:	RIZ-14	Sample No.:	005
Sample Date:	07/09/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/16/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Vinyl Chloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/16/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromoform	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Tetrahydrofuran	EPA 8260	<10	10	ug/L	MQS	07/16/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Trichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID: **RIZ-14** Sample No.: **005**
Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Tetrachloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dibromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/16/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	96.3	70-130	% R	MQS	07/16/2009
***Toluene-D8	EPA 8260	101	70-130	% R	MQS	07/16/2009



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Page 18 of 21

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
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Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID: **RIZ-14**

Sample No.: **005**

Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	102 1.0	70-130	% R CF	MQS MQS	07/16/2009 07/16/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
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Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID:	Trip Blank	Sample No.:	006
Sample Date:	07/09/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
VOLATILE ORGANICS	EPA 8260				MQS	07/16/2009
Dichlorodifluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Vinyl Chloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromomethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Trichlorofluoromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Diethylether	EPA 8260	<5.0	5.0	ug/L	MQS	07/16/2009
Acetone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
1,1-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dichloromethane	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Methyl-Tert-Butyl-Ether	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
trans-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Butanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
2,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
cis-1,2-Dichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Chloroform	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromoform	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Tetrahydrofuran	EPA 8260	<10	10	ug/L	MQS	07/16/2009
1,1,1-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Carbon Tetrachloride	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Benzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Trichloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromodichloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dibromomethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
4-Methyl-2-Pentanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009
cis-1,3-Dichloropropene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Toluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
trans-1,3-Dichloropropene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
1,1,2-Trichloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Hexanone	EPA 8260	<25	25	ug/L	MQS	07/16/2009



A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID:	Trip Blank	Sample No.:	006
Sample Date:	07/09/2009		

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
1,3-Dichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Tetrachloroethene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Dibromochloromethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dibromoethane (EDB)	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Chlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1,1,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Ethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
m&p-Xylene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
o-Xylene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Styrene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromoform	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
Isopropylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,1,2,2-Tetrachloroethane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2,3-Trichloropropane	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Bromobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
N-Propylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
2-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,3,5-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
4-Chlorotoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
tert-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2,4-Trimethylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
sec-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
p-Isopropyltoluene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,3-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,4-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
n-Butylbenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
1,2-Dibromo-3-Chloropropane	EPA 8260	<5.0	5.0	ug/L	MQS	07/16/2009
1,2,4-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Hexachlorobutadiene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Naphthalene	EPA 8260	<2.0	2.0	ug/L	MQS	07/16/2009
1,2,3-Trichlorobenzene	EPA 8260	<1.0	1.0	ug/L	MQS	07/16/2009
Surrogates:	EPA 8260					
***1,2-Dichloroethane-D4	EPA 8260	96.9	70-130	% R	MQS	07/16/2009
***Toluene-D8	EPA 8260	100	70-130	% R	MQS	07/16/2009



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Page 21 of 21

A N A L Y T I C A L R E P O R T

GZA GeoEnvironmental, Inc.
140 Broadway
Providence, RI 02903

Stephen Andrus / Angela Harvey

Project Name.: **Charbert ICMP**
Project No.: **03.0032795.29**

Date Received: **07/10/2009**
Date Reported: **07/17/2009**
Work Order No.: **0907-00069**

Sample ID: **Trip Blank** Sample No.: **006**
Sample Date: **07/09/2009**

Test Performed	Method	Results	Reporting Limit	Units	Tech	Analysis Date
***4-Bromofluorobenzene Preparation	EPA 8260 EPA 5030B	102 1.0	70-130	% R CF	MQS MQS	07/16/2009 07/16/2009

Method Blank

Date Analyzed:	7/16/2009		Laboratory Control Sample				Laboratory Control Sample Duplicate						
	Conc. ug/L	Acceptance Limit	Date Analyzed:	Spike Concentration = 20ug/L	% Recovery	Acceptance Limits	Verdict	% Recovery	Acceptance Limits	Verdict	RPD	Limit	Verdict
Volatile Organics			dichlorodifluoromethane	82.5	70-130	ok	84.9	70-130	ok	2.84	<25	ok	
dichlorodifluoromethane	< 1.0	< 1.0	chloromethane	107	70-130	ok	111	70-130	ok	3.83	<25	ok	
chloromethane	< 1.0	< 1.0	vinyl chloride	94.0	80-120	ok	95.0	70-130	ok	1.08	<25	ok	
bromomethane	< 1.0	< 1.0	bromomethane	85.0	70-130	ok	84.1	70-130	ok	1.05	<25	ok	
chloroethane	< 0.5	< 0.5	chloroethane	89.3	70-130	ok	89.2	70-130	ok	0.04	<25	ok	
trichlorofluoromethane	< 1.0	< 1.0	trichlorofluoromethane	74.3	70-130	ok	75.9	70-130	ok	2.12	<25	ok	
diethyl ether	< 2.5	< 2.5	diethyl ether	91.4	70-130	ok	95.8	70-130	ok	4.70	<25	ok	
acetone	< 13	< 13	acetone	107	70-130	ok	107	70-130	ok	0.50	<25	ok	
1,1-dichloroethene	< 0.5	< 0.5	1,1-dichloroethene	88.5	80-120	ok	91.8	70-130	ok	3.68	<25	ok	
FREON-113	< 1.0	< 1.0	FREON-113	79.7	70-130	ok	81.3	70-130	ok	1.90	<25	ok	
iodomethane	< 0.5	< 0.5	iodomethane	73.7	70-130	ok	74.8	70-130	ok	1.40	<25	ok	
carbon disulfide	< 5.0	< 5.0	carbon disulfide	102	70-130	ok	105	70-130	ok	2.96	<25	ok	
dichloromethane	< 1.0	< 1.0	dichloromethane	97.4	70-130	ok	101	70-130	ok	3.23	<25	ok	
tert-butyl alcohol (TBA)	< 13	< 13	tert-butyl alcohol (TBA)	90.8	70-130	ok	93.2	70-130	ok	2.58	<25	ok	
acrylonitrile	< 0.5	< 0.5	acrylonitrile	115	70-130	ok	111	70-130	ok	3.18	<25	ok	
methyl-tert-butyl-ether	< 0.5	< 0.5	methyl-tert-butyl-ether	88.4	70-130	ok	92.5	70-130	ok	4.54	<25	ok	
trans-1,2-dichloroethene	< 0.5	< 0.5	trans-1,2-dichloroethene	101	70-130	ok	102	70-130	ok	0.53	<25	ok	
1,1-dichloroethene	< 0.5	< 0.5	1,1-dichloroethene	98.4	70-130	ok	96.1	70-130	ok	0.34	<25	ok	
di-isopropyl ether (DIPPE)	< 1.0	< 1.0	di-isopropyl ether (DIPPE)	107	70-130	ok	110	70-130	ok	2.27	<25	ok	
ethyl tert-butyl ether (EtBE)	< 1.0	< 1.0	ethyl tert-butyl ether (EtBE)	89.3	70-130	ok	91.3	70-130	ok	2.20	<25	ok	
vinyl acetate	< 13	< 13	vinyl acetate	93.3	70-130	ok	92.0	70-130	ok	1.37	<25	ok	
2-butanone	< 13	< 13	2-butanone	113	70-130	ok	116	70-130	ok	2.51	<25	ok	
2,2-dichloropropane	< 0.5	< 0.5	2,2-dichloropropane	89.4	70-130	ok	89.4	70-130	ok	0.00	<25	ok	
cis-1,2-dichloroethene	< 0.5	< 0.5	cis-1,2-dichloroethene	91.0	70-130	ok	89.2	70-130	ok	2.03	<25	ok	
chloroform	< 0.5	< 0.5	chloroform	83.6	80-120	ok	82.4	70-130	ok	1.43	<25	ok	
bromochloromethane	< 0.5	< 0.5	bromochloromethane	79.2	70-130	ok	78.7	70-130	ok	0.60	<25	ok	
tetrahydrofuran	< 5.0	< 5.0	tetrahydrofuran	114	70-130	ok	117	70-130	ok	2.33	<25	ok	
1,1,1-trichloroethane	< 0.5	< 0.5	1,1,1-trichloroethane	75.8	70-130	ok	77.1	70-130	ok	1.67	<25	ok	
1,1-dichloropropane	< 0.5	< 0.5	1,1-dichloropropane	94.2	70-130	ok	92.6	70-130	ok	1.68	<25	ok	
carbon tetrachloride	< 0.5	< 0.5	carbon tetrachloride	74.8	70-130	ok	75.1	70-130	ok	0.39	<25	ok	
1,2-dichloroethane	< 0.5	< 0.5	1,2-dichloroethane	74.9	70-130	ok	78.2	70-130	ok	1.73	<25	ok	
benzene	< 0.5	< 0.5	benzene	107	70-130	ok	107	70-130	ok	0.05	<25	ok	
tert-amyl methyl ether (TAME)	< 1.0	< 1.0	tert-amyl methyl ether (TAME)	88.4	70-130	ok	92.5	70-130	ok	4.51	<25	ok	
trichloroethene	< 0.5	< 0.5	trichloroethene	78.8	70-130	ok	80.1	70-130	ok	1.57	<25	ok	
1,2-dichloropropane	< 0.5	< 0.5	1,2-dichloropropane	107	80-120	ok	108	70-130	ok	1.00	<25	ok	
bromodichloromethane	< 0.5	< 0.5	bromodichloromethane	80.7	70-130	ok	81.0	70-130	ok	0.42	<25	ok	
1,4-Dioxane	< 50	< 50	1,4-Dioxane	107	70-130	ok	114	70-130	ok	6.80	<25	ok	
dibromomethane	< 0.5	< 0.5	dibromomethane	82.4	70-130	ok	82.9	70-130	ok	0.57	<25	ok	
4-methyl-2-pentanone	< 13	< 13	4-methyl-2-pentanone	105	70-130	ok	109	70-130	ok	3.42	<25	ok	
cis-1,3-dichloropropene	< 0.5	< 0.5	cis-1,3-dichloropropene	95.6	70-130	ok	95.1	70-130	ok	0.46	<25	ok	
toluene	< 0.5	< 0.5	toluene	96.6	80-120	ok	97.8	70-130	ok	1.19	<25	ok	
trans-1,3-dichloropropene	< 1.0	< 1.0	trans-1,3-dichloropropene	87.3	70-130	ok	89.3	70-130	ok	2.23	<25	ok	
1,1,2-trichloroethane	< 0.5	< 0.5	1,1,2-trichloroethane	86.2	70-130	ok	85.8	70-130	ok	0.45	<25	ok	
2-hexanone	< 13	< 13	2-hexanone	101	70-130	ok	102	70-130	ok	1.34	<25	ok	
1,3-dichloropropane	< 0.5	< 0.5	1,3-dichloropropane	94.2	70-130	ok	95.1	70-130	ok	0.87	<25	ok	
tetrachloroethene	< 0.5	< 0.5	tetrachloroethene	76.0	70-130	ok	75.2	70-130	ok	1.01	<25	ok	
dibromochloromethane	< 0.5	< 0.5	dibromochloromethane	72.8	70-130	ok	72.2	70-130	ok	0.81	<25	ok	
1,2-dibromoethane (EDB)	< 1.0	< 1.0	1,2-dibromoethane (EDB)	82.3	70-130	ok	82.7	70-130	ok	0.49	<25	ok	
chlorobenzene	< 0.5	< 0.5	chlorobenzene	78.7	70-130	ok	78.5	70-130	ok	0.23	<25	ok	
1,1,2-tetrachloroethane	< 0.5	< 0.5	1,1,2-tetrachloroethane	70.2	70-130	ok	69.4	70-130	out	1.12	<25	ok	
ethylbenzene	< 0.5	< 0.5	ethylbenzene	85.8	80-120	ok	83.7	70-130	ok	2.55	<25	ok	
1,1,2,2-tetrachloroethane	< 0.5	< 0.5	1,1,2,2-tetrachloroethane	94.0	70-130	ok	96.6	70-130	ok	2.71	<25	ok	
m&p-xylene	< 1.0	< 1.0	m&p-xylene	84.9	70-130	ok	82.5	70-130	ok	2.87	<25	ok	
o-xylene	< 0.5	< 0.5	o-xylene	113	70-130	ok	111	70-130	ok	1.58	<25	ok	
styrene	< 0.5	< 0.5	styrene	113	70-130	ok	110	70-130	ok	2.30	<25	ok	
bromoform	< 1.0	< 1.0	bromoform	102	70-130	ok	98.8	70-130	ok	2.14	<25	ok	
isopropylbenzene	< 0.5	< 0.5	isopropylbenzene	125	70-130	ok	124	70-130	ok	0.51	<25	ok	
1,2,3-trichloropropane	< 0.5	< 0.5	1,2,3-trichloropropane	105	70-130	ok	104	70-130	ok	1.71	<25	ok	
bromobenzene	< 0.5	< 0.5	bromobenzene	96.5	70-130	ok	97.1	70-130	ok	0.58	<25	ok	
n-propylbenzene	< 0.5	< 0.5	n-propylbenzene	123	70-130	ok	120	70-130	ok	2.84	<25	ok	
2-chlorotoluene	< 0.5	< 0.5	2-chlorotoluene	113	70-130	ok	112	70-130	ok	0.93	<25	ok	
1,3,5-trimethylbenzene	< 0.5	< 0.5	1,3,5-trimethylbenzene	107	70-130	ok	106	70-130	ok	1.05	<25	ok	
trans-1,4-dichloro-2-butene	< 1.0	< 1.0	trans-1,4-dichloro-2-butene	114	70-130	ok	117	70-130	ok	2.45	<25	ok	
4-chlorotoluene	< 0.5	< 0.5	4-chlorotoluene	113	70-130	ok	113	70-130	ok	0.45	<25	ok	
tert-butylbenzene	< 0.5	< 0.5	tert-butylbenzene	94.0	70-130	ok	91.8	70-130	ok	2.55	<25	ok	
1,2,4-trimethylbenzene	< 0.5	< 0.5	1,2,4-trimethylbenzene	105	70-130	ok	105	70-130	ok	0.19	<25	ok	
sec-butyl-benzene	< 0.5	< 0.5	sec-butyl-benzene	106	70-130	ok	104	70-130	ok	1.26	<25	ok	
p-isopropyltoluene	< 0.5	< 0.5	p-isopropyltoluene	97.3	70-130	ok	96.8	70-130	ok	0.51	<25	ok	
1,3-dichlorobenzene	< 0.5	< 0.5	1,3-dichlorobenzene	97.2	70-130	ok	97.5	70-130	ok	0.30	<25	ok	
1,4-dichlorobenzene	< 0.5	< 0.5	1,4-dichlorobenzene	97.6	70-130	ok	97.8	70-130	ok	0.04	<25	ok	
n-butylbenzene	< 0.5	< 0.5	n-butylbenzene	117	70-130	ok	114	70-130	ok	2.20	<25	ok	
1,2-dichlorobenzene	< 0.5	< 0.5	1,2-dichlorobenzene	94.4	70-130	ok	95.3	70-130	ok	0.90	<25	ok	
1,2-dibromo-3-chloropropane	< 2.5	< 2.5	1,2-dibromo-3-chloropropane	97.7	70-130	ok	99.9	70-130	ok	2.23	<25	ok	
1,3,5-trichlorobenzene	< 0.5	< 0.5	1,3,5-trichlorobenzene	104	70-130	ok	108	70-130	ok	2.56	<25	ok	
1,2,4-trichlorobenzene	< 0.5	< 0.5	1,2,4-trichlorobenzene	106	70-130	ok	109	70-130	ok	3.23	<25	ok	
hexachlorobutadiene	< 0.5	< 0.5	hexachlorobutadiene	106	70-130	ok	105	70-130	ok	1.07	<25	ok	
naphthalene	< 1.0	< 1.0	naphthalene	87.4	70-130	ok	92.0	70-130	ok	5.15	<25	ok	
1,2,3-trichlorobenzene	< 0.5	< 0.5	1,2,3-trichlorobenzene	97.3	70-130	ok	98.8	70-130	ok	1.37	<25	ok	

Surrogates:	Recovery (%)	Acceptance Limits	Surrogates:	Recovery (%)	Acceptance Limits	Verdict	Recovery (%)	Acceptance Limits	Verdict	RPD	Limits	Verdict
DIBROMOFLUOROMETHANE	83.9	70-130	DIBROMOFLUOROMETHANE	85.7	70-130	ok	86.5	70-130	ok	0.99	<25	ok
1,2-DICHLOROETHANE-D4	91.7	70-130	1,2-DICHLOROETHANE-D4	97.5	70-130	ok	91.9	70-130	ok	5.93	<25	ok
TOLUENE-D8	96.8	70-130	TOLUENE-D8	97.6	70-130	ok	97.7	70-130				

CHAIN-OF-CUSTODY RECORD

W.O. # 0507-CLN69
(for lab use only)

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