

NC DENR **Environmental Monitoring Reporting Form**  
 Division of Waste Management - Solid Waste

**Notice:** This form and any information attached to it are "Public Records" as defined in NC General Statute 132-1. As such, these documents are available for inspection and examination by any person upon request (NC General Statute 132-6).

**Instructions:**

- Prepare one form for each individually monitored unit.
- Please type or print legibly.
- Attach a notification table with values that attain or exceed NC 2L groundwater standards or NC 2B surface water standards. The notification must include a preliminary analysis of the cause and significance of each value. (e.g. naturally occurring, off-site source, pre-existing condition, etc.).
- Attach a notification table of any groundwater or surface water values that equal or exceed the reporting limits.
- Attach a notification table of any methane gas values that attain or exceed explosive gas levels. This includes any structures on or nearby the facility (NCAC 13B .1629 (4)(a)(i)).
- Send the original signed and sealed form, any tables, and Electronic Data Deliverable to: Compliance Unit, NCDENR-DWM, Solid Waste Section, 1646 Mail Service Center, Raleigh, NC 27699-1646.

**Solid Waste Monitoring Data Submittal Information**

Name of entity submitting data (laboratory, consultant, facility owner):

Brian S. Boutin, PG

Contact for questions about data formatting. Include data preparer's name, telephone number and E-mail address:

Name: Brian S. Boutin, PG Phone: 919-366-3663 (office); 919-995-0363 (cell)  
 E-mail: bboutinpg@bellsouth.net

Facility name:	Facility Address:	Facility Permit #	NC Landfill Rule: (.0500 or .1600)	Actual sampling dates (e.g., October 20-24, 2006)
C&D Landfill, Inc. (Phase 2)	802 Recycling Lane Greenville, NC	7407-CDLF-2009	.0500	November 15, 2010

**Environmental Status: (Check all that apply)**

- Initial/Background Monitoring
  Detection Monitoring
  Assessment Monitoring
  Corrective Action

**Type of data submitted: (Check all that apply)**

- Groundwater monitoring data from monitoring wells
  Methane gas monitoring data  
 Groundwater monitoring data from private water supply wells
  Corrective action data (specify) \_\_\_\_\_  
 Leachate monitoring data
  Other(specify) \_\_\_\_\_  
 Surface water monitoring data

**Notification attached?**

- No. No groundwater or surface water standards were exceeded.  
 Yes, a notification of values exceeding a groundwater or surface water standard is attached. It includes a list of groundwater and surface water monitoring points, dates, analytical values, NC 2L groundwater standard, NC 2B surface water standard or NC Solid Waste GWPS and preliminary analysis of the cause and significance of any concentration.  
 Yes, a notification of values exceeding an explosive methane gas limit is attached. It includes the methane monitoring points, dates, sample values and explosive methane gas limits.

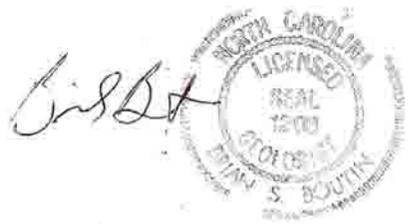
**Certification**

To the best of my knowledge, the information reported and statements made on this data submittal and attachments are true and correct. Furthermore, I have attached complete notification of any sampling values meeting or exceeding groundwater standards or explosive gas levels, and a preliminary analysis of the cause and significance of concentrations exceeding groundwater standards. I am aware that there are significant penalties for making any false statement, representation, or certification including the possibility of a fine and imprisonment.

Brian S. Boutin, PG Consultant for Facility 919-366-3663 (office); 919-995-0363 (cell)  
 Facility Representative Name (Print) Title (Area Code) Telephone Number  
*Brian S. Boutin* March 31, 2011 Affix NC Licensed/ Professional Geologist Seal  
 Signature Date

11112 Branding Iron Place, Wendell, NC 27591  
 Facility Representative Address

NC PE Firm License Number (if applicable effective May 1, 2009)



**Explanatory Text for Notification Table  
C&D Landfill, Inc., Phase 2  
Greenville, Pitt County, NC  
Permit # 74-07  
November 15, 2010 Detection Monitoring**

The results of the November 2010 water quality monitoring indicate that several Appendix I VOCs were reported in the groundwater sample collected from monitoring well MW-12s. The concentration of methylene chloride detected (11.2 µg/L) exceeds the NC 2L groundwater quality standard of 5 µg/L. The detected concentrations of the remaining VOCs are all well below the corresponding regulatory limits. Inasmuch as no VOCs were detected in the groundwater samples collected from MW-12s during the previous three sampling events, the VOC results for the November 15, 2010 sample are considered anomalous and are likely due to field and/or laboratory contamination. Vanadium was detected in all of the groundwater and surface water samples collected from the site on November 15, 2010 (including background samples) within a narrow range of concentrations (0.6 to 8.5 µg/L), all of which exceed the interim NC 2L standard effective October 1, 2010. These data are consistent with the results of previous sampling events conducted at the site and indicate that the concentrations of vanadium observed in groundwater and surface water at the site are representative of natural background conditions. The results of analyses for the remaining Appendix I metals in the groundwater and surface water samples indicate that all reported concentrations were well below the corresponding NC 2L groundwater quality standards.

March 31, 2011

Ms. Jaclynne Drummond  
North Carolina Department of Environment and Natural Resources  
Division of Waste Management  
Solid Waste Section  
P. O. Box 27687  
Raleigh, NC 27611-7687

**RE: Water Monitoring Report: November 2010  
C&D Landfill, Inc. – Phase 2  
Greenville, Pitt County, NC  
Permit # 74-04**

Dear Ms. Drummond:

This report presents the results of water quality monitoring conducted at Phase 2 of the construction and demolition debris (C&D) landfill site referenced above (**Sheet 6**) in November 2010. The scope of work performed included sampling and laboratory analysis of groundwater samples from six on-site monitoring wells (MW-9A, MW-10, MW-11, MW-12s, MW-13 and MW-14s) and surface water samples from two locations (SW-2 and SW-4) for 40 CFR Part 258 Appendix I constituents. The groundwater and surface water samples were collected in accordance with the NCDENR, Division of Waste Management (DWM), Solid Waste Section (SWS) Groundwater Monitoring Guidance Document and the facility Water Quality Monitoring Plan.

The six groundwater monitoring wells were installed at the site in August 2009 in accordance with the Phase 2 Groundwater Sampling and Analysis Plan. Monitoring well MW-9A is a shallow Type II monitoring well that serves as the upgradient, background monitoring location for Phase 2 of the landfill. Monitoring wells MW-10, MW-11, MW-12s and MW-14s are likewise Type II monitoring wells that monitor the surficial aquifer downgradient of Phase 2 of the landfill. Monitoring well MW-14d is a deep Type III monitoring well that monitors the deeper zone of the surficial aquifer downgradient of Phase 2 of the landfill and is installed adjacent to MW-14s. MW-14d was not sampled during November 2010 because it is on a biennial sampling schedule and was last sampled in January 2010. Surface water sampling location SW-4 serves as an upgradient sampling location for the facility for monitoring the quality of surface water entering the site; surface water sampling

location SW-2 serves as a downgradient sampling location for monitoring the quality of surface water exiting the site. The locations of the site monitoring wells and surface water sampling locations are shown in **Sheet 6** (attached). The sampling and data collection methods, as well as the results of field and laboratory testing of the water samples, are presented in the following sections.

## **1.0 POTENTIOMETRIC PATTERN AND GROUNDWATER FLOW**

Groundwater levels were gauged in the site groundwater monitoring wells on November 15, 2010 as part of the water quality monitoring. Depths to groundwater were measured using an electronic water-level meter that was thoroughly decontaminated between wells with a non-phosphate soap and water wash followed in order by multiple rinses with distilled water, an isopropyl alcohol rinse, and multiple distilled water rinses. Depth-to-water measurements were made after the wells were opened for a sufficient period of time to allow water levels to equilibrate with atmospheric pressure. The locations of the site monitoring wells are depicted in **Sheet 6**. Groundwater elevation data collected at the monitoring wells on November 15, 2010 are presented in **Table 1**. The depth to groundwater across the site measured relative to the top of the PVC casing of the Type II groundwater-monitoring wells and piezometers on November 15, 2010 ranged from 3.83 feet (MW-10) to 8.25 feet (MW-13) below grade.

A water-table elevation contour map that was developed based on the November 15, 2010 groundwater-gauging data for the Type II monitoring wells is attached. The pattern of the water-table contours indicates that the horizontal component of shallow groundwater flow at the site is generally to the south, which is consistent with the surface topography and drainage features at the site. The delineated direction of shallow groundwater flow is also consistent with previous estimates of groundwater flow direction at Phase 2.

## **2.0 RESULTS OF GROUNDWATER AND SURFACE WATER SAMPLING AND ANALYSIS**

Groundwater and surface water samples were collected from the site on November 15, 2010 for laboratory analysis to monitor the quality of groundwater at the site. The groundwater and surface water samples were collected and handled in accordance with the sampling protocols included in the site Water Quality Monitoring Plan as well as the SWS Groundwater Monitoring Guidance Document. Purging and sampling of groundwater from the monitoring wells was conducted using disposable, bottom-loading bailers at all wells. All reusable sampling equipment was properly decontaminated between sampling locations with a non-phosphate soap and water wash, followed by multiple rinses with distilled water. New disposable nitrile or latex gloves were worn during all sampling activities. Disposable sampling equipment/material (e.g., disposable bailers, gloves, etc.) was discarded after each use.

During purging, measurements were made in the field of the pH, temperature and specific conductance of the groundwater collected from the monitoring wells, in accordance with SWS requirements. The results of the field analyses of these parameters are presented in **Table 1**. The results of the field-measured water-quality parameters indicate that the values measured in groundwater collected from the site monitoring wells were within the applicable stabilization criteria. Groundwater at the site is slightly acidic to neutral based on the pH values measured in the field (5.60 to 7.30). Specific conductance values ranged from 356 (MW-13) to 799 (MW-12s)  $\mu\text{S}/\text{cm}$ .

All groundwater and surface water samples were analyzed at a North Carolina-certified laboratory for Appendix I volatile organic compounds (VOCs) by SW 846 Method 8260 and Appendix I metals by EPA 6000/7000 series methods. Summarized results of laboratory analyses for groundwater and surface water samples collected from the site on November 15, 2010 are presented in **Table 2**, along with historical laboratory results. Copies of the original laboratory reports are included in **Appendix A**.

The following VOCs were detected in the groundwater sample collected from monitoring well MW-12s on November 15, 2010: acetone (29  $\mu\text{g}/\text{L}$ ); 2-butanone (8.9  $\mu\text{g}/\text{L}$ ); ethylbenzene (2  $\mu\text{g}/\text{L}$ ); methylene chloride (11.2  $\mu\text{g}/\text{L}$ ); 4-methyl-2-pentanone (78.9  $\mu\text{g}/\text{L}$ ); tetrachloroethene (0.2  $\mu\text{g}/\text{L}$ ) and toluene (11.7  $\mu\text{g}/\text{L}$ ). The concentration of methylene chloride detected in the sample exceeds the NC 2L groundwater standard of 5  $\mu\text{g}/\text{L}$ ; the remaining VOCs were detected at concentrations well below the corresponding regulatory standards. No VOCs were detected in the groundwater samples collected from MW-12s during the previous three sampling events. Therefore, the VOC results for the November 15, 2010 sample are considered anomalous and are likely due to field and/or laboratory contamination. No VOCs were detected in the remaining groundwater and surface water samples collected from the Phase 2 site on November 15, 2010.

Vanadium was detected in all of the groundwater and surface water samples collected from the site on November 15, 2010 (including background samples) within a narrow range of concentrations (0.6 to 8.5  $\mu\text{g}/\text{L}$ ), all of which exceed the interim NC 2L standard effective October 1, 2010. This indicates that the concentrations of vanadium observed in groundwater and surface water at the site are representative of natural background conditions. The November 2010 results for vanadium are consistent with the results of previous sampling events conducted at the site. The results of analyses for the remaining Appendix I metals in the groundwater and surface water samples indicate that all reported concentrations were well below the corresponding NC 2L groundwater quality standards.

### 3.0 CONCLUSIONS AND RECOMMENDATIONS

The results of the November 2010 water quality monitoring indicate that several Appendix I VOCs were reported in the groundwater sample collected from monitoring well MW-12s. The concentration of methylene chloride detected (11.2 µg/L) exceeds the NC 2L groundwater quality standard of 5 µg/L. The detected concentrations of the remaining VOCs are all well below the corresponding regulatory limits. Inasmuch as no VOCs were detected in the groundwater samples collected from MW-12s during the previous three sampling events, the VOC results for the November 15, 2010 sample are considered anomalous and are likely due to field and/or laboratory contamination. Vanadium was detected in all of the groundwater and surface water samples collected from the site on November 15, 2010 (including background samples) within a narrow range of concentrations (0.6 to 8.5 µg/L), all of which exceed the interim NC 2L standard effective October 1, 2010. These data are consistent with the results of previous sampling events conducted at the site and indicate that the concentrations of vanadium observed in groundwater and surface water at the site are representative of natural background conditions. The results of analyses for the remaining Appendix I metals in the groundwater and surface water samples indicate that all reported concentrations were well below the corresponding NC 2L groundwater quality standards.

The next water quality monitoring event at Phase 2 is scheduled for May 2011.

If you have any questions or require further assistance regarding this report, please call me at 919-995-0363.

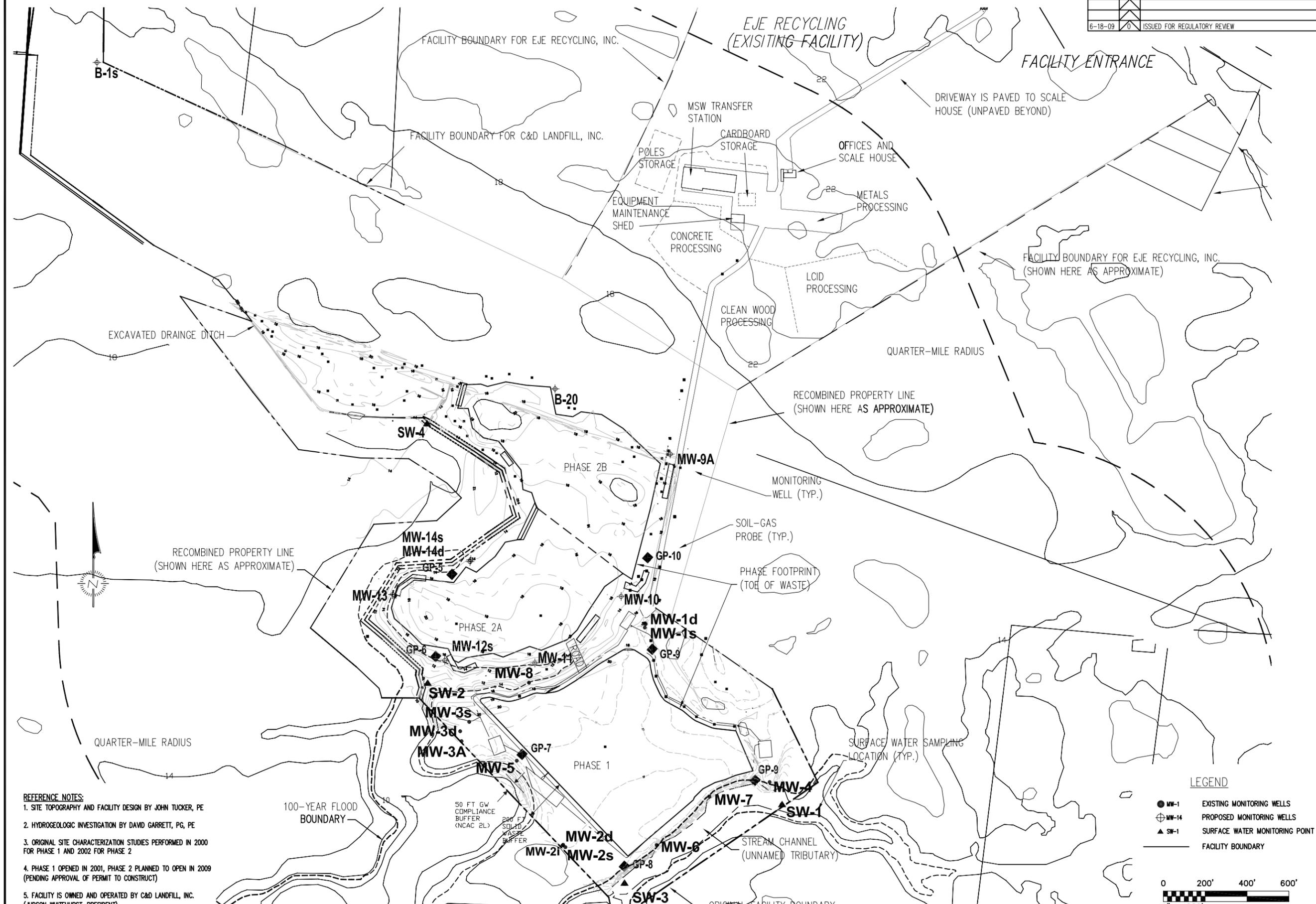
Sincerely,



Brian S. Boutin, P.G.  
Consulting Geologist

Cc: Judson Whitehurst, C&D Landfill, Inc.  
David Garrett, PE, PG

DATE	NO.	REVISION
6-18-09	0	ISSUED FOR REGULATORY REVIEW



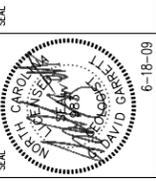
- REFERENCE NOTES:**
1. SITE TOPOGRAPHY AND FACILITY DESIGN BY JOHN TUCKER, PE
  2. HYDROGEOLOGIC INVESTIGATION BY DAVID GARRETT, PG, PE
  3. ORIGINAL SITE CHARACTERIZATION STUDIES PERFORMED IN 2000 FOR PHASE 1 AND 2002 FOR PHASE 2
  4. PHASE 1 OPENED IN 2001, PHASE 2 PLANNED TO OPEN IN 2009 (PENDING APPROVAL OF PERMIT TO CONSTRUCT)
  5. FACILITY IS OWNED AND OPERATED BY C&D LANDFILL, INC. (JUDSON WHITEHURST, PRESIDENT)

**LEGEND**

- MW-1 EXISTING MONITORING WELLS
- ⊕ MW-14 PROPOSED MONITORING WELLS
- ▲ SW-1 SURFACE WATER MONITORING POINT
- FACILITY BOUNDARY

0 200' 400' 600'  
1" = 200'

**David Garrett & Associates**  
 Engineering and Geology  
 5105 Harbour Towne Drive, Raleigh, North Carolina 27604  
 Email: david.garrett\_jg@mtsgspring.com 919-231-1818 (Office and Fax) 919-418-4375 (mobile)

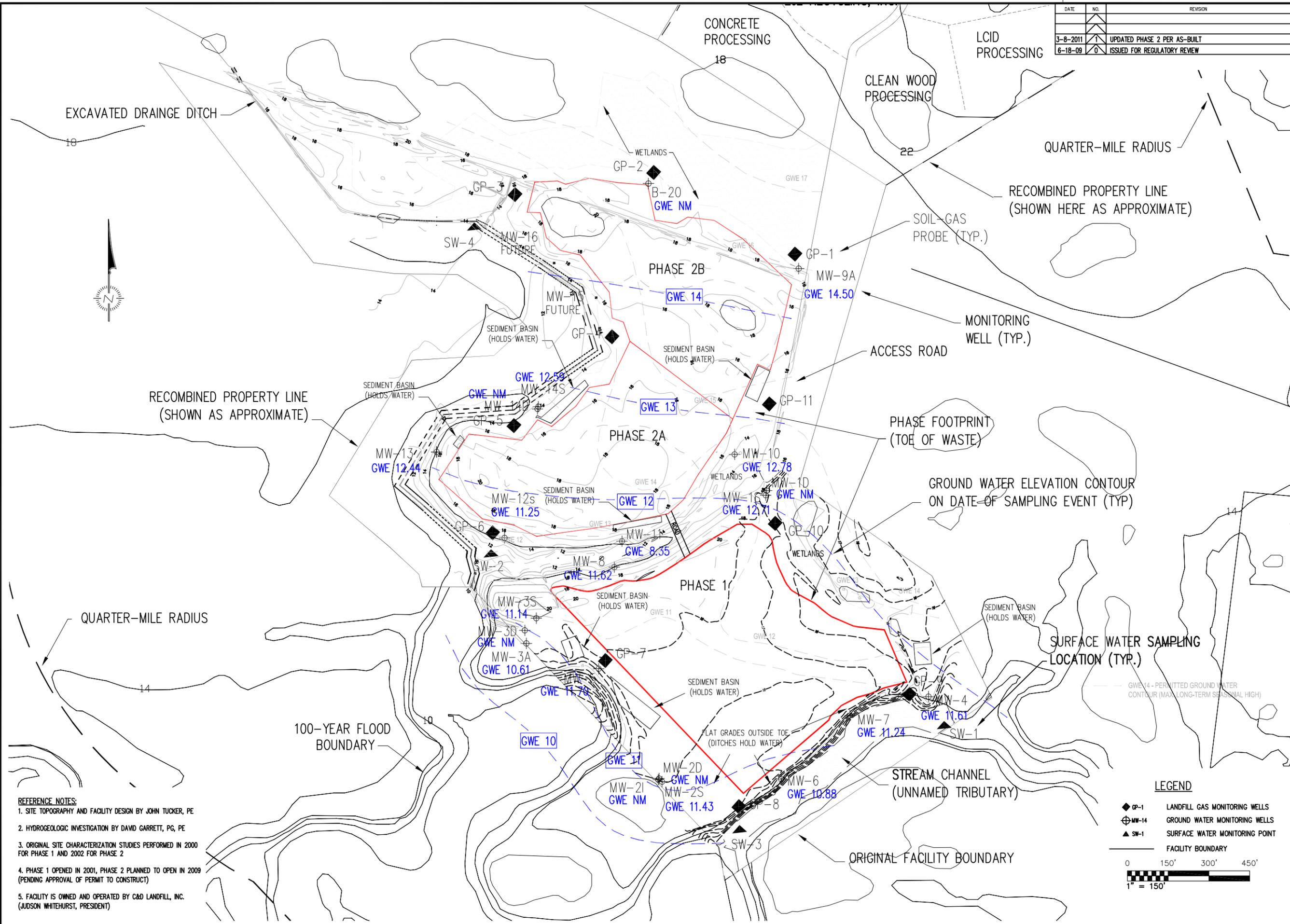


PROJECT TITLE: C&D LANDFILL, INC. ASSESSMENT MONITORING  
 PITT COUNTY, NC  
 PERMIT #74-07

DRAWING TITLE: GROUND WATER MONITORING LOCATIONS (PHASES 1 AND 2)

DESIGNED BY: G.D.G.	DRAWN BY: G.D.G.
CHECKED BY: J.A.T.	PROJECT NO.: CDLF-3
SCALE: AS SHOWN	DATE: JUNE 2009
FILE NAME: C&D LANDFILL ASSESSMENT	DRAWING NO.: AP4
SHEET NO.: 6	

DATE	NO.	REVISION
3-8-2011	1	UPDATED PHASE 2 PER AS-BUILT
6-18-09	0	ISSUED FOR REGULATORY REVIEW



**REFERENCE NOTES:**

1. SITE TOPOGRAPHY AND FACILITY DESIGN BY JOHN TUCKER, PE
2. HYDROGEOLOGIC INVESTIGATION BY DAVID GARRETT, PG, PE
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5. FACILITY IS OWNED AND OPERATED BY C&D LANDFILL, INC. (JUDSON WHITEHURST, PRESIDENT)

**LEGEND**

- ◆ GP-1 LANDFILL GAS MONITORING WELLS
- ⊕ MW-14 GROUND WATER MONITORING WELLS
- ▲ SW-1 SURFACE WATER MONITORING POINT
- FACILITY BOUNDARY

0 150' 300' 450'  
1" = 150'

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C&D LANDFILL, INC.  
GROUND WATER MONITORING  
PITT COUNTY, NC  
PERMIT #74-07

POTENTIOMETRIC CONTOURS  
FOR PHASES 1 AND 2  
OBSERVED NOV 15, 2010

DESIGNED BY: G.D.G.	DRAWN BY: G.D.G.
CHECKED BY: J.A.T.	PROJECT NO.: CDLF-3
SCALE: AS SHOWN	DATE: JUNE 2009
FILE NAME: C&D LANDFILL ASSESSMENT	SHEET NO. / DRAWING NO.:
1	MP1

**Table 1**  
**Monitoring Well and Groundwater Data**  
**Water Quality Monitoring**  
**November 15, 2010**  
**Phase 2 - C&D Landfill, Inc.**  
**Greenville, Pitt County, North Carolina**  
**Permit # 74-07**

Well Identity	Well Depth (Feet BGS)	Well Diameter (Inches)	Screen Interval (Feet BGS)	Depth to Groundwater (Feet BTOC)	Elevation Top of PVC Well Casing (Feet MSL)	Groundwater Elevation (Feet MSL)	Field Parameters			
							Temp. C°	pH	S.C. umhos/cm	Turbidity (ntu)
MW-9A	20.0	2.0	5 - 20	6.08	20.58	14.50	18.0	7.20	523	NM
MW-10	20.0	2.0	5 - 20	3.83	16.61	12.78	18.0	7.10	479	NM
MW-11	20.0	2.0	5 - 20	6.14	14.49	8.35	18.0	7.30	498	NM
MW-12s	20.0	2.0	5 - 20	4.93	16.18	11.25	18.0	6.30	799	NM
MW-13	20.0	2.0	5 - 20	8.25	20.69	12.44	20.0	5.60	356	NM
MW-14s	20.0	2.0	15 - 20	4.01	16.60	12.59	20.0	6.60	790	NM
MW-14d	40.0	2.0	35 - 40	NM	17.45	NM	NM	NM	NM	NM

Notes: BGS = Below Ground Surface

MSL = Mean Sea Level

BTOC = Below Top of Casing

NM = Not Measured

S.C. = Specific Conductance

ntu = Nephelometric Turbidity Units

\*Extent piezometers from site characterization studies by David Garrett, PG, PE

Monitoring well and piezometer construction data from records furnished by James L. Burgess, RLS and David Garrett, PG, PE

**Table 2**  
**Summarized Laboratory Analytical Results for Groundwater Samples**  
**Water Quality Monitoring**  
**Phase 2 - C&D Landfill, Inc.**  
**Greenville, Pitt County, North Carolina**  
**Permit # 74-04**

VOLATILE ORGANIC CONSTITUENTS SW 846 8260 (µg/L)	MW-9A				MW-10				MW-11				MW-12s				MW-13			
	8/11/2009	1/20/2010	5/25/2010	11/15/2010	8/11/2009	1/20/2010	5/25/2010	11/15/2010	8/11/2009	1/20/2010	5/25/2010	11/15/2010	8/11/2009	1/20/2010	5/25/2010	11/15/2010	8/11/2009	1/20/2010	5/25/2010	11/15/2010
Acetone	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	29	ND	ND	ND	ND
2-Butanone (MEK)	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	8.9	ND	ND	ND	ND
Bromochloromethane	0.480 J	ND	ND	ND	ND	ND	ND	ND												
Bromodichloromethane	<b>0.970 J</b>	ND	ND	ND	ND	ND	ND	ND												
Bromoform	3.48	ND	ND	ND	ND	ND	ND	ND												
Chloroform	0.640 J	ND	ND	ND	ND	0.40 J	ND	ND	ND	0.60 J	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Chloromethane	0.330 J	ND	ND	ND	ND	ND	ND	ND	0.290 J	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Dibromochloromethane	<b>2.80 J</b>	ND	ND	ND	ND	ND	ND	ND												
Dibromomethane (Methylene Dibromide)	<b>1.13 J</b>	ND	ND	ND	ND	ND	ND	ND												
Ethylbenzene	0.950 J	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	2	ND	ND	ND	ND
Methylene Chloride	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	<b>11.2</b>	ND	ND	ND	ND
4-Methyl-2-Pentanone (MIBK)	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	78.9	ND	ND	ND	ND
Tetrachloroethene	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.2	ND	ND	ND	ND
Total Xylenes	2.77 J	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	11.7	ND	ND	ND	ND
<b>METALS</b> (in ug/L)																				
Antimony	ND	0.4 J	ND	ND	ND	ND	ND	ND	ND	ND	0.7 J	ND	ND	ND	ND	0.8 J	ND	ND	ND	ND
Arsenic	ND	1.3 J	0.3 J	0.6 J	ND	0.5 J	0.5 J	1.1 J	ND	ND	ND	0.6 J	ND	ND	0.4 J	5.3 J	ND	2.4 J	1.4 J	1.8 J
Barium	112 B	55.4 J	29.4 J	32.9 J	76.1 JB	113	129	63.2 J	39.8 JB	23.4 J	14.2 J	31.4 J	56.6 JB	98.5 J	39.2 J	177.0	44.1 JB	82.8 J	86.7 J	106.0
Beryllium	ND	0.2 J	ND	ND	ND	0.2 J	0.1 J	0.1 J	ND	0.3 J	0.1 J	0.2 J	ND	ND	0.1 J	0.1 J	ND	0.3 J	0.3 J	0.3 J
Cadmium	0.16 J	0.1 J	0.2 J	0.1 J	0.17 J	ND	1.00	0.1 J	0.3 J	0.2 J	0.1 J	0.2 J	ND	0.2 J	0.2 J	0.1 J	0.16 J	0.2 J	0.4 J	0.2 J
Chromium	3 JB	2.7 J	0.3 J	ND	3 JB	0.9 J	0.6 J	0.1 J	3.09 JB	ND	0.3 J	0.1 J	2.48 JB	ND	0.6 J	1.7 J	1.77 JB	0.7 J	0.8 J	0.9 J
Cobalt	ND	0.7 J	0.2 J	0.2 J	ND	0.3 J	0.2 J	0.3 J	ND	0.5 J	0.3 J	0.3 J	ND	0.2 J	0.2 J	0.8 J	ND	1.3 J	0.9 J	1.0 J
Copper	2.13 J	1.3 J	0.1 J	ND	2.34 J	1.0 J	0.6 J	ND	2.44 J	0.8 J	0.2 J	ND	1.86 J	0.7 J	0.3 J	1.1 J	1.33 J	1.2 J	0.5 J	0.8 J
Lead	ND	1.8 J	0.1 J	ND	ND	1.4 J	2.0 J	1.1 J	ND	0.2 J	0.2 J	0.2 J	ND	0.4 J	1.1 J	1.9 J	ND	3.2 J	1.8 J	3.1 J
Nickel	ND	2.5 J	2.0 J	1.8 J	ND	0.8 J	1.5 J	4.1 J	2.75 J	2.2 J	1.8 J	1.6 J	2.43 J	0.9 J	0.9 J	4.1 J	2.44 J	1.6 J	1.7 J	2.2 J
Selenium	6.61 J	ND	ND	ND	ND	0.2 J	0.6 J	ND	4.22 J	ND	ND	ND	ND	0.2 J	ND	1.3 J	ND	0.5 J	ND	0.8 J
Silver	7.15 JB	0.1 J	ND	ND	6.95 JB	0.1 J	ND	ND	6.92 JB	ND	0.1 J	ND	6.87 JB	0.1 J	ND	0.1 J	6.91 JB	0.1 J	ND	ND
Thallium	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Vanadium	ND	4.9 J	0.6 J	<b>0.9 J</b>	ND	4.5 J	3.2 J	<b>1.9 J</b>	ND	1.3 J	1.0 J	<b>0.6 J</b>	1.42	2.4 J	3.7 J	<b>4.4 J</b>	ND	4.9 J	2.4 J	<b>3.6 J</b>
Zinc	1.66 JB	7.5 J	1.5 J	2.6 J	ND	2.6 J	4.0 J	2.1 J	ND	2.9 J	2.0 J	3.2 J	ND	2.8 J	1.1 J	3.1 J	4.63 JB	8.5 J	7.5 J	8.5 J

Notes:  
Values in boldface exceed the corresponding 15A NCAC 2L .0202 groundwater quality standard for Class GA groundwater. \* Solid Waste Section Groundwater Protection Standard  
NCAC 2L STD = North Carolina Groundwater Standard established in Title 15A of North Carolina Administrative Code Subchapter 2L  
J = Estimated value above laboratory method detection limit and below SWSL or reporting limit.  
B = Analyte found in associated field and/or laboratory blank. NE = Not Established  
NS = Not Sampled. No sample exists for this sampling period. ND = None detected above laboratory method detection limit.

Table 2 Summarized Laboratory Analytical Results for Groundwater Samples Water Quality Monitoring Phase 2 - C&D Landfill, Inc. Greenville, Pitt County, North Carolina Permit # 74-04													
VOLATILE ORGANIC CONSTITUENTS SW 846 8260 (µg/L)	MW-14s				MW-14d		SW-2			SW-4			NCAC 2L STD (µg/L)
Sampling Date	8/11/2009	1/20/2010	5/25/2010	11/15/2010	8/11/2009	1/20/2010	1/20/2010	5/25/2010	11/15/2010	1/20/2010	5/25/2010	11/15/2010	
Acetone	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	6000
2-Butanone (MEK)	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	4000
Bromochloromethane	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.6*
Bromodichloromethane	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.6
Bromoform	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	4
Chloroform	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	70
Chloromethane	ND	ND	ND	ND	0.210 J	ND	ND	ND	ND	ND	ND	ND	3
Dibromochloromethane	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.4
Dibromomethane (Methylene Dibromide)	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	70
Ethylbenzene	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	600
Methylene Chloride	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	5
4-Methyl-2-Pentanone (MIBK)	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	560*
Tetrachloroethene	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.7
Total Xylenes	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	500
METALS (in µg/L)													NCAC 2L STD (µg/L)
Antimony	ND	0.2 J	ND	ND	ND	0.1 J	0.1 J	ND	ND	0.2 J	ND	ND	1
Arsenic	ND	1.3 J	ND	1.6 J	ND	0.2 J	0.3 J	0.9 J	1.1 J	0.2 J	0.6 J	0.5 J	10
Barium	111 B	100	107	177	13.9 JB	13.1 J	71.3 J	33.3 J	59.1 J	70.9 J	82.1 J	94.2 J	700
Beryllium	ND	0.6 J	0.1 J	0.2 J	ND	ND	ND	0.1 J	0.1 J	0.1 J	0.1 J	0.1 J	4
Cadmium	0.23 J	0.2 J	0.1 J	0.3 J	0.4 J	1.0	1.2	0.2 J	0.1 J	0.1 J	0.1 J	0.2 J	2
Chromium	2.83 JB	2.6 J	0.5 J	0.5 J	4.24 JB	1.8 J	0.7 J	0.4 J	0.5 J	0.3 J	0.9 J	0.3 J	10
Cobalt	ND	0.4 J	0.2 J	0.3 J	ND	0.2 J	0.3 J	0.3 J	0.5 J	0.2 J	0.5 J	0.7 J	1
Copper	1.34 J	2.4 J	0.1 J	0.1 J	ND	2.4 J	0.8 J	0.4 J	0.1 J	0.7 J	0.5 J	0.3 J	1000
Lead	ND	21	1.5 J	2.2 J	ND	1.2 J	0.3 J	0.9 J	0.1 J	0.3 J	1.6 J	0.2 J	15
Nickel	ND	1.0 J	1.1 J	1.9 J	ND	2.14 J	0.9 J	0.4 J	1.6 J	0.6 J	0.8 J	0.8 J	100
Selenium	ND	0.4 J	ND	ND	ND	ND	ND	0.6 J	ND	ND	ND	ND	20
Silver	7.19 JB	0.1 J	ND	ND	6.77 JB	0.1 J	0.1 J	ND	ND	0.1 J	ND	ND	20
Thallium	ND	ND	ND	ND	ND	ND	0.1 J	ND	ND	ND	ND	ND	0.2
Vanadium	ND	35	3.3 J	8.5 J	ND	1.4 J	0.8 J	2.0 J	1.1 J	0.6 J	3.0 J	0.9 J	0.3
Zinc	1.48 JB	4.7 J	1.2 J	2.6 J	ND	21.0	8.1 J	2.3 J	6.8 J	8.8 J	3.0 J	3.9 J	1000

Notes:  
Values in boldface exceed the corresponding 15A NCAC 2L .021  
NCAC 2L STD = North Carolina Groundwater Standard established in Title 15/  
J = Estimated value above laboratory method detection limit and  
B = Analyte found in associated field and/or laboratory blank.  
NS = Not Sampled, No sample exists for this sampling period

**APPENDIX A**

**Laboratory Reports  
And  
Chain-of-Custody Records**

# Environment 1, Incorporated

Drinking Water ID: 37735  
Wastewater ID: 10

P.O. BOX 7085, 114 OAKMONT DRIVE  
GREENVILLE, N.C. 27835-7085

PHONE (252) 756-6208  
FAX (252) 756-0633

ID#: 6003 A

JUDSON WHITEHURST (C&D LANDFILL)  
C/O MR DAVID GARRETT  
5105 HARBOUR TOWNE DRIVE  
RALEIGH ,NC 27604

DATE COLLECTED: 11/15/10  
DATE REPORTED : 11/23/10

REVIEWED BY: 

PARAMETERS	MDL	SWSL	MW-9A	MW-10	MW-11	MW-13	MW-12s	Analysis		Method		
									Date	Analyst	Code	
PH (field measurement), Units			7.2	7.1	7.3	5.6	6.3	11/15/10	RJH	SM4500HB		
Antimony, ug/l	0.22	6.0	---	U	---	U	---	U	0.8 J	11/19/10	CMF	EPA200.8
Arsenic, ug/l	0.04	10.0	0.6 J	1.1 J	0.6 J	1.8 J	5.3 J	11/19/10	CMF	EPA200.8		
Barium, ug/l	0.03	100.0	32.9 J	63.2 J	31.4 J	106	177	11/19/10	CMF	EPA200.8		
Beryllium, ug/l	0.02	1.0	---	U	0.1 J	0.2 J	0.3 J	0.1 J	11/19/10	CMF	EPA200.8	
Cadmium, ug/l	0.02	1.0	0.1 J	0.1 J	0.2 J	0.2 J	0.1 J	11/19/10	CMF	EPA200.8		
Cobalt, ug/l	0.10	10.0	0.2 J	0.3 J	0.3 J	1.0 J	0.8 J	11/19/10	CMF	EPA200.8		
Copper, ug/l	0.03	10.0	---	U	---	U	0.8 J	1.1 J	11/19/10	CMF	EPA200.8	
Total Chromium, ug/l	0.03	10.0	---	U	0.1 J	0.1 J	0.9 J	1.7 J	11/19/10	CMF	EPA200.8	
Lead, ug/l	0.01	10.0	---	U	1.1 J	0.2 J	3.1 J	1.9 J	11/19/10	CMF	EPA200.8	
Nickel, ug/l	0.05	50.0	1.8 J	4.1 J	1.6 J	2.2 J	4.1 J	11/19/10	CMF	EPA200.8		
Selenium, ug/l	0.32	10.0	---	U	---	U	0.8 J	1.3 J	11/19/10	CMF	EPA200.8	
Silver, ug/l	0.03	10.0	---	U	---	U	---	U	0.1 J	11/19/10	CMF	EPA200.8
Thallium, ug/l	0.05	5.5	---	U	---	U	---	U	---	11/19/10	CMF	EPA200.8
Vanadium, ug/l	0.03	25.0	0.9 J	1.9 J	0.6 J	3.6 J	4.4 J	11/19/10	CMF	EPA200.8		
Zinc, ug/l	0.08	10.0	2.6 J	2.1 J	3.2 J	8.5 J	3.1 J	11/19/10	CMF	EPA200.8		
Conductivity (at 25c), uMhos	1.0	1.0	523	479	498	356	799	11/15/10	RJH	SM2510B		
Temperature, °C			18	18	18	20	18	11/15/10	RJH	SM2550B		
Static Water Level, feet			6.08	3.83	6.14	8.25	4.93	11/15/10	RJH			
Well Depth, feet			23.17	22.73	23.84	22.68	22.93	11/15/10	RJH			

J = Between MDL and SWSL, U = Below ALL Quantitation Limits.

# Environment 1, Incorporated

Drinking Water ID: 37715  
Wastewater ID: 10

P.O. BOX 7085, 114 OAKMONT DRIVE  
GREENVILLE, N.C. 27835-7085

PHONE (252) 756-6208  
FAX (252) 756-0633

ID#: 6003 A

JUDSON WHITEHURST (C&D LANDFILL)  
C/O MR DAVID GARRETT  
5105 HARBOUR TOWNE DRIVE  
RALEIGH, NC 27604

DATE COLLECTED: 11/15/10  
DATE REPORTED: 11/23/10

REVIEWED BY: 

PARAMETERS	MDL	MW-14S		Analysis		Method Code
		SWSL		Date	Analyst	
PH (field measurement), Units			6.6	11/15/10	RJH	SM4500HB
Antimony, ug/l	0.22	6.0	---	U	11/19/10	CMF EPA200.8
Arsenic, ug/l	0.04	10.0	1.6	J	11/19/10	CMF EPA200.8
Barium, ug/l	0.03	100.0	177	J	11/19/10	CMF EPA200.8
Beryllium, ug/l	0.02	1.0	0.2	J	11/19/10	CMF EPA200.8
Cadmium, ug/l	0.02	1.0	0.3	J	11/19/10	CMF EPA200.8
Cobalt, ug/l	0.10	10.0	0.3	J	11/19/10	CMF EPA200.8
Copper, ug/l	0.03	10.0	0.1	J	11/19/10	CMF EPA200.8
Total Chromium, ug/l	0.03	10.0	0.5	J	11/19/10	CMF EPA200.8
Lead, ug/l	0.01	10.0	2.2	J	11/19/10	CMF EPA200.8
Nickel, ug/l	0.05	50.0	1.9	J	11/19/10	CMF EPA200.8
Selenium, ug/l	0.32	10.0	---	U	11/19/10	CMF EPA200.8
Silver, ug/l	0.03	10.0	---	U	11/19/10	CMF EPA200.8
Thallium, ug/l	0.05	5.5	---	U	11/19/10	CMF EPA200.8
Vanadium, ug/l	0.03	25.0	8.5	J	11/19/10	CMF EPA200.8
Zinc, ug/l	0.08	10.0	2.6	J	11/19/10	CMF EPA200.8
Conductivity (at 25c), uMhos	1.0	1.0	490		11/15/10	RJH SM2510B
Temperature, °C			20		11/15/10	RJH SM2550B
Static Water Level, feet			4.01		11/15/10	RJH
Well Depth, feet			23.12		11/15/10	RJH

J = Between MDL and SWSL, U = Below ALL Quantitation Limits.

# Environment 1, Incorporated

Drinking Water ID: 57715  
Wastewater ID: 10

P.O. BOX 7085, 114 OAKMONT DRIVE  
GREENVILLE, N.C. 27835-7085

PHONE (252) 756-6208  
FAX (252) 756-0833

CLIENT: JUDSON WHITEHURST (C&D LANDFILL)  
C/O MR DAVID GARRETT  
5105 HARBOUR TOWNE DRIVE  
RALEIGH, NC 27604

CLIENT ID: 6003 A  
ANALYST: MO  
DATE COLLECTED: 11/15/10  
DATE REPORTED: 11/23/10

Page: 1

REVIEWED BY: 

## VOLATILE ORGANICS EPA METHOD 8260B

PARAMETERS, ug/l	Date Analyzed:		11/15/10	11/15/10	11/15/10	11/15/10	11/15/10	
	MDL	SWSL	MW-9A	MW-10	MW-11	MW-13	MW-12a	
1. Chloromethane	0.77	1.0	---	U	---	U	---	U
2. Vinyl Chloride	0.63	1.0	---	U	---	U	---	U
3. Bromomethane	0.67	10.0	---	U	---	U	---	U
4. Chloroethane	0.48	10.0	---	U	---	U	---	U
5. Trichlorofluoromethane	0.24	1.0	---	U	---	U	---	U
6. 1,1-Dichloroethene	0.17	5.0	---	U	---	U	---	U
7. Acetone	9.06	100.0	---	U	---	U	---	29.00 J
8. Iodomethane	0.26	10.0	---	U	---	U	---	---
9. Carbon Disulfide	0.23	100.0	---	U	---	U	---	---
10. Methylene Chloride	0.64	1.0	---	U	---	U	---	11.20
11. trans-1,2-Dichloroethene	0.23	5.0	---	U	---	U	---	---
12. 1,1-Dichloroethane	0.20	5.0	---	U	---	U	---	---
13. Vinyl Acetate	0.20	50.0	---	U	---	U	---	---
14. Cis-1,2-Dichloroethene	0.25	5.0	---	U	---	U	---	---
15. 2-Butanone	2.21	100.0	---	U	---	U	---	8.90 J
16. Bromochloromethane	0.27	3.0	---	U	---	U	---	---
17. Chloroform	0.25	5.0	---	U	---	U	---	---
18. 1,1,1-Trichloroethane	0.19	1.0	---	U	---	U	---	---
19. Carbon Tetrachloride	0.22	1.0	---	U	---	U	---	---
20. Benzene	0.24	1.0	---	U	---	U	---	---
21. 1,2-Dichloroethane	0.27	1.0	---	U	---	U	---	---
22. Trichloroethene	0.23	1.0	---	U	---	U	---	---
23. 1,2-Dichloropropane	0.21	1.0	---	U	---	U	---	---
24. Bromodichloromethane	0.21	1.0	---	U	---	U	---	---
25. Cis-1,3-Dichloropropene	0.24	1.0	---	U	---	U	---	---
26. 4-Methyl-2-Pentanone	1.19	100.0	---	U	---	U	---	78.90 J
27. Toluene	0.23	1.0	---	U	---	U	---	---
28. trans-1,3-Dichloropropene	0.28	1.0	---	U	---	U	---	---
29. 1,1,2-Trichloroethane	0.25	1.0	---	U	---	U	---	---
30. Tetrachloroethene	0.17	1.0	---	U	---	U	---	0.20 J
31. 2-Hexanone	1.57	50.0	---	U	---	U	---	---
32. Dibromochloromethane	0.24	3.0	---	U	---	U	---	---
33. 1,2-Dibromoethane	0.26	1.0	---	U	---	U	---	---
34. Chlorobenzene	0.30	3.0	---	U	---	U	---	---
35. 1,1,1,2-Tetrachloroethane	0.22	5.0	---	U	---	U	---	---
36. Ethylbenzene	0.21	1.0	---	U	---	U	---	2.00
37. Xylenes	0.68	5.0	---	U	---	U	---	11.70
38. Dibromomethane	0.28	10.0	---	U	---	U	---	---
39. Styrene	0.19	1.0	---	U	---	U	---	---
40. Bromoform	0.20	3.0	---	U	---	U	---	---
41. 1,1,2,2-Tetrachloroethane	0.26	3.0	---	U	---	U	---	---
42. 1,2,3-Trichloropropane	0.43	1.0	---	U	---	U	---	---
43. 1,4-Dichlorobenzene	0.39	1.0	---	U	---	U	---	---
44. 1,2-Dichlorobenzene	0.32	5.0	---	U	---	U	---	---
45. 1,2-Dibromo-3-Chloropropane	0.34	13.0	---	U	---	U	---	---
46. Acrylonitrile	2.72	200.0	---	U	---	U	---	---
47. trans-1,4-Dichloro-2-Butene	0.42	100.0	---	U	---	U	---	---

J = Between MDL and SWSL, U = Below ALL Quantitation Limits.

# Environment 1, Incorporated

Drinking Water ID: 17715  
Wastewater ID: 10

P.O. BOX 7085, 114 OAKMONT DRIVE  
GREENVILLE, N.C. 27835-7085

PHONE (252) 756-6208  
FAX (252) 756-0633

CLIENT: JUDSON WHITEHURST (C&D LANDFILL)  
C/O MR DAVID GARRETT  
5105 HARBOUR TOWNE DRIVE  
RALEIGH, NC 27604

CLIENT ID: 6003 A  
ANALYST: MO  
DATE COLLECTED: 11/15/10  
DATE REPORTED: 11/23/10

Page: 2

REVIEWED BY: 

## VOLATILE ORGANICS EPA METHOD 8260B

PARAMETERS, ug/l	Date Analyzed:		11/16/10 MW-14S
	MDL	SWSL	
1. Chloromethane	0.77	1.0	--- U
2. Vinyl Chloride	0.63	1.0	--- U
3. Bromomethane	0.67	10.0	--- U
4. Chloroethane	0.48	10.0	--- U
5. Trichlorofluoromethane	0.24	1.0	--- U
6. 1,1-Dichloroethene	0.17	5.0	--- U
7. Acetone	9.06	100.0	--- U
8. Iodomethane	0.26	10.0	--- U
9. Carbon Disulfide	0.23	100.0	--- U
10. Methylene Chloride	0.64	1.0	--- U
11. trans-1,2-Dichloroethene	0.23	5.0	--- U
12. 1,1-Dichloroethane	0.20	5.0	--- U
13. Vinyl Acetate	0.20	50.0	--- U
14. Cis-1,2-Dichloroethene	0.25	5.0	--- U
15. 2-Butanone	2.21	100.0	--- U
16. Bromochloromethane	0.27	3.0	--- U
17. Chloroform	0.25	5.0	--- U
18. 1,1,1-Trichloroethane	0.19	1.0	--- U
19. Carbon Tetrachloride	0.22	1.0	--- U
20. Benzene	0.24	1.0	--- U
21. 1,2-Dichloroethane	0.27	1.0	--- U
22. Trichloroethene	0.23	1.0	--- U
23. 1,2-Dichloropropane	0.21	1.0	--- U
24. Bromodichloromethane	0.21	1.0	--- U
25. Cis-1,3-Dichloropropene	0.24	1.0	--- U
26. 4-Methyl-2-Pentanone	1.19	100.0	--- U
27. Toluene	0.23	1.0	--- U
28. trans-1,3-Dichloropropene	0.28	1.0	--- U
29. 1,1,2-Trichloroethane	0.25	1.0	--- U
30. Tetrachloroethene	0.17	1.0	--- U
31. 2-Hexanone	1.57	50.0	--- U
32. Dibromochloromethane	0.24	3.0	--- U
33. 1,2-Dibromoethane	0.26	1.0	--- U
34. Chlorobenzene	0.30	3.0	--- U
35. 1,1,1,2-Tetrachloroethane	0.22	5.0	--- U
36. Ethylbenzene	0.21	1.0	--- U
37. Xylenes	0.68	5.0	--- U
38. Dibromomethane	0.28	10.0	--- U
39. Styrene	0.19	1.0	--- U
40. Bromoform	0.20	3.0	--- U
41. 1,1,2,2-Tetrachloroethane	0.26	3.0	--- U
42. 1,2,3-Trichloropropane	0.43	1.0	--- U
43. 1,4-Dichlorobenzene	0.39	1.0	--- U
44. 1,2-Dichlorobenzene	0.32	5.0	--- U
45. 1,2-Dibromo-3-Chloropropane	0.34	13.0	--- U
46. Acrylonitrile	2.72	200.0	--- U
47. trans-1,4-Dichloro-2-Butene	0.42	100.0	--- U

J = Between MDL and SWSL, U = Below ALL Quantitation Limits.

Environment I, Inc.  
 P.O. Box 7085, 114 Oakmont Dr.  
 Greenville, NC 27858

CHAIN OF CUSTODY RECORD

Phone (252) 756-6208 • Fax (252) 756-0633

CLIENT: 6003 A Week: 46

JUDSON WHITEHURST (C&D LANDFILL)  
 C/O MR DAVID GARRETT  
 5105 HARBOUR TOWNE DRIVE  
 RALEIGH NC 27604

(919) 231-1818

SAMPLE LOCATION	COLLECTION		TOTAL CHLORINE, mg/l AT COLLECTION	TEMPERATURE, °C AT COLLECTION	# OF CONTAINERS	DISINFECTED		Field pH	Metals	Conductivity	Temperature	Field Parameter	EPA 8260B	8260 Dup. 1	8260 Dup. 2	CHLORINE NEUTRALIZED AT COLLECTION	pH CHECK (LAB)	CONTAINER TYPE, P/G	CHEMICAL PRESERVATION
	DATE	TIME				CHLORINE	UV												
MTW-9A	11/15/10	1245	18	18	5	<input type="checkbox"/>	<input type="checkbox"/>												
MTW-10	11/15/10	1130	18	18	4	<input type="checkbox"/>	<input type="checkbox"/>												
MTW-11	11/15/10	1140	18	18	4	<input type="checkbox"/>	<input type="checkbox"/>												
MTW-13	11/15/10	1210	20	20	4	<input type="checkbox"/>	<input type="checkbox"/>												
MTW-12s	11/15/10	1155	18	18	4	<input type="checkbox"/>	<input type="checkbox"/>												
MTW-14S	11/15/10	1220	20	20	4	<input type="checkbox"/>	<input type="checkbox"/>												
REINQUISHED BY (SIG.)	DATE/TIME	DATE/TIME	RECEIVED BY (SIG.)	DATE/TIME	DATE/TIME	RECEIVED BY (SIG.)	DATE/TIME	DATE/TIME	DATE/TIME	DATE/TIME	DATE/TIME	DATE/TIME	DATE/TIME	DATE/TIME	DATE/TIME	DATE/TIME	DATE/TIME	DATE/TIME	DATE/TIME
<i>David N. Garrett</i>	11/15/10	11/15/10	<i>David N. Garrett</i>	11/15/10	11/15/10	<i>David N. Garrett</i>	11/15/10	11/15/10	11/15/10	11/15/10	11/15/10	11/15/10	11/15/10	11/15/10	11/15/10	11/15/10	11/15/10	11/15/10	11/15/10
COMMENTS:																CHLORINE NEUTRALIZED AT COLLECTION pH CHECK (LAB) CONTAINER TYPE, P/G CHEMICAL PRESERVATION A - NONE D - NaOH B - HNO <sub>3</sub> E - HCL C - H <sub>2</sub> SO <sub>4</sub> F - ZINC ACETATE G - Na THIOSULFATE CLASSIFICATION: <input type="checkbox"/> WASTEWATER (NPDES) <input type="checkbox"/> DRINKING WATER <input type="checkbox"/> DMQ/GW <input checked="" type="checkbox"/> SOLID WASTE SECTION CHAIN OF CUSTODY MAINTAINED DURING SHIPMENT/DELIVERY SAMPLES COLLECTED BY: <i>H. Garrett</i> (Please Print) SAMPLES RECEIVED IN LAB AT <i>4062</i> °C			

PLEASE READ Instructions for completing this form on the reverse side.

FORM #5

Sampler must place a "C" for composite sample or a "G" for Grab sample in the blocks above for each parameter requested. No 207953

# Environment 1, Incorporated

Drinking Water ID: 17715  
Wastewater ID: 10

P.O. BOX 7085, 114 OAKMONT DRIVE  
GREENVILLE, N.C. 27835-7085

PHONE (252) 756-6208  
FAX (252) 756-0633

ID#: 6003 C

JUDSON WHITEHURST (C&D LANDFILL)  
C/O MR DAVID GARRETT  
5105 HARBOUR TOWNE DRIVE  
RALEIGH, NC 27604

DATE COLLECTED: 11/15/10  
DATE REPORTED : 11/23/10

REVIEWED BY: 

PARAMETERS	MDL	SWSL	SW-1	SW-2	SW-3	SW-4	Analysis		Method
							Date	Analyst	Code
PH (field measurement), Units			6.1	6.4	7.3	6.5	11/15/10	RJH	SM4500HB
Antimony, ug/l	0.22	6.0	--- U	--- U	--- U	--- U	11/19/10	CMF	EPA200.8
Arsenic, ug/l	0.04	10.0	2.0 J	1.1 J	0.6 J	0.5 J	11/19/10	CMF	EPA200.8
Barium, ug/l	0.03	100.0	49.8 J	59.1 J	75.5 J	94.2 J	11/19/10	CMF	EPA200.8
Beryllium, ug/l	0.02	1.0	0.1 J	0.1 J	0.1 J	0.1 J	11/19/10	CMF	EPA200.8
Cadmium, ug/l	0.02	1.0	0.1 J	0.1 J	0.1 J	0.2 J	11/19/10	CMF	EPA200.8
Cobalt, ug/l	0.10	10.0	0.4 J	0.5 J	1.0 J	0.7 J	11/19/10	CMF	EPA200.8
Copper, ug/l	0.03	10.0	0.3 J	0.1 J	0.1 J	0.3 J	11/19/10	CMF	EPA200.8
Total Chromium, ug/l	0.03	10.0	0.5 J	0.5 J	0.2 J	0.3 J	11/19/10	CMF	EPA200.8
Lead, ug/l	0.01	10.0	1.0 J	0.1 J	0.5 J	0.2 J	11/19/10	CMF	EPA200.8
Nickel, ug/l	0.05	50.0	0.7 J	1.6 J	0.8 J	0.8 J	11/19/10	CMF	EPA200.8
Selenium, ug/l	0.32	10.0	--- U	0.6 J	--- U	--- U	11/19/10	CMF	EPA200.8
Silver, ug/l	0.03	10.0	--- U	--- U	--- U	--- U	11/19/10	CMF	EPA200.8
Thallium, ug/l	0.05	5.5	--- U	--- U	--- U	--- U	11/19/10	CMF	EPA200.8
Vanadium, ug/l	0.03	25.0	3.1 J	1.1 J	0.9 J	0.9 J	11/19/10	CMF	EPA200.8
Zinc, ug/l	0.08	10.0	5.6 J	6.8 J	17	3.9 J	11/19/10	CMF	EPA200.8
Conductivity (at 25c), uMhos	1.0	1.0	112	312	152	117	11/15/10	RJH	SM2510B
Temperature, °C			11	10	10	13	11/15/10	RJH	SM2550B

J = Between MDL and SWSL, U = Below ALL Quantitation Limits.

# Environment 1, Incorporated

Drinking Water ID: 13715  
Wastewater ID: 10

P.O. BOX 7085, 114 OAKMONT DRIVE  
GREENVILLE, N.C. 27835-7085

PHONE (252) 756-6208  
FAX (252) 756-0633

CLIENT: JUDSON WHITEHURST (C&D LANDFILL)  
C/O MR DAVID GARRETT  
5105 HARBOUR TOWNE DRIVE  
RALEIGH, NC 27604

CLIENT ID: 6003 C

ANALYST: MAO  
DATE COLLECTED: 11/15/10  
DATE ANALYZED: 11/16/10  
DATE REPORTED: 11/23/10

Page: 1

REVIEWED BY: 

## VOLATILE ORGANICS EPA METHOD 8260B

PARAMETERS, ug/l	MDL	SWSL	SW-1	SW-2	SW-3	SW-4
1. Chloromethane	0.77	1.0	---	U	---	U
2. Vinyl Chloride	0.63	1.0	---	U	---	U
3. Bromomethane	0.67	10.0	---	U	---	U
4. Chloroethane	0.48	10.0	---	U	---	U
5. Trichlorofluoromethane	0.24	1.0	---	U	---	U
6. 1,1-Dichloroethene	0.17	5.0	---	U	---	U
7. Acetone	9.06	100.0	---	U	---	U
8. Iodomethane	0.26	10.0	---	U	---	U
9. Carbon Disulfide	0.23	100.0	---	U	---	U
10. Methylene Chloride	0.64	1.0	---	U	---	U
11. trans-1,2-Dichloroethene	0.23	5.0	---	U	---	U
12. 1,1-Dichloroethane	0.20	5.0	---	U	---	U
13. Vinyl Acetate	0.20	50.0	---	U	---	U
14. Cis-1,2-Dichloroethene	0.25	5.0	---	U	---	U
15. 2-Butanone	2.21	100.0	---	U	---	U
16. Bromochloromethane	0.27	3.0	---	U	---	U
17. Chloroform	0.25	5.0	---	U	---	U
18. 1,1,1-Trichloroethane	0.19	1.0	---	U	---	U
19. Carbon Tetrachloride	0.22	1.0	---	U	---	U
20. Benzene	0.24	1.0	---	U	---	U
21. 1,2-Dichloroethane	0.27	1.0	---	U	---	U
22. Trichloroethene	0.23	1.0	---	U	---	U
23. 1,2-Dichloropropane	0.21	1.0	---	U	---	U
24. Bromodichloromethane	0.21	1.0	---	U	---	U
25. Cis-1,3-Dichloropropane	0.24	1.0	---	U	---	U
26. 4-Methyl-2-Pentanone	1.19	100.0	---	U	---	U
27. Toluene	0.23	1.0	---	U	---	U
28. trans-1,3-Dichloropropane	0.28	1.0	---	U	---	U
29. 1,1,2-Trichloroethane	0.25	1.0	---	U	---	U
30. Tetrachloroethene	0.17	1.0	---	U	---	U
31. 2-Hexanone	1.57	50.0	---	U	---	U
32. Dibromochloromethane	0.24	3.0	---	U	---	U
33. 1,2-Dibromoethane	0.26	1.0	---	U	---	U
34. Chlorobenzene	0.30	3.0	---	U	---	U
35. 1,1,1,2-Tetrachloroethane	0.22	5.0	---	U	---	U
36. Ethylbenzene	0.21	1.0	---	U	---	U
37. Xylenes	0.68	5.0	---	U	---	U
38. Dibromomethane	0.28	10.0	---	U	---	U
39. Styrene	0.19	1.0	---	U	---	U
40. Bromoform	0.20	3.0	---	U	---	U
41. 1,1,2,2-Tetrachloroethane	0.26	3.0	---	U	---	U
42. 1,2,3-Trichloropropane	0.43	1.0	---	U	---	U
43. 1,4-Dichlorobenzene	0.39	1.0	---	U	---	U
44. 1,2-Dichlorobenzene	0.32	5.0	---	U	---	U
45. 1,2-Dibromo-3-Chloropropane	0.34	13.0	---	U	---	U
46. Acrylonitrile	2.72	200.0	---	U	---	U
47. trans-1,4-Dichloro-2-Butene	0.42	100.0	---	U	---	U

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