Wake County,
North Carolina

North Wake C&D Landfill Semi-Annual Sampling Report (May 2010 Sampling Event)

June 2010

Report

DENR USE ONLY: ☐ Paper Report ☐ Electronic Data - Email CD (data loaded: Yes / No) Doc/Event #:

NC DENR
Division of Waste Management - Solid Waste

Environmental Monitoring Reporting Form

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).
- In accordance with NC General Statutes Chapter 89C and 89E and NC Solid Waste Management Rules 15A NCAC 13B, be sure to affix a seal to the bottom of this page, when applicable.
- 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):

Consultant - Camp Dresser & McKee

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

Name: Mathew F. Colone Phone: 919-787-5620

E-mail: colonemf@cdm.com

Facility name:	Facility Address:	Facility Permit #	NC Landfill Rule: (.0500 or .1600)	Actual sampling dates (e.g., October 20-24, 2006)
Wake County North Wake C&D Landfill	9004 Deponie Drive Raleigh, NC 27615	92-09	.0500	May 6-7, 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
☐ Groundwater monitoring data from private water supply wells
☐ Leachate monitoring data
☐ Surface water monitoring data
☐ Methane gas monitoring data
☐ Corrective action data (specify) _____
☐ Other(specify)

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.

Mathew F. Colone	Consultant	(919) 787-5620
Facility Representative Name (Print)	Title	(Area Code) Telephone Number
Signature	06/29/10 Date	Affix NC Licensed/ Professional Geologist/Engineer Seal here:

NORTH CAROLINA GEOLOGIST SEAL 1851 MATHEW F. COLONE

6/29/2010

Revised 01/2007

CDM

5400 Glenwood Avenue, Suite 300
Raleigh, North Carolina 27612
tel: 919 787-5620
fax: 919 781-5730

June 29, 2010

Ms. Jaclynne Drummond
Solid Waste Section
Division of Waste Management
401 Oberlin Road
Suite 150
Raleigh, North Carolina 27605-1350

Subject: May 2010 Semi-Annual Monitoring Sampling Report
North Wake C&D Landfill
Facility Permit # - 9209

Dear Ms. Drummond:

CDM, on behalf of Wake County, is submitting one copy of the May 2010 semi-annual sampling event report. This letter report presents the results of the most recent semi-annual sampling event at the North Wake C&D Landfill and constitutes the first semi-annual sampling for 2010. The approved groundwater monitoring network consists of the background well (MW-1) and 3 downgradient compliance wells (CD-1, CD-2, and CD–3). Sampling results from the May 2010 event are discussed below.

Field Activities

Groundwater samples from the North Wake C&D Landfill were collected on May 6-7, 2010 by use of disposable, laboratory decontaminated, Teflon™ bailers. Groundwater elevations were measured at each well prior to sampling and are presented in **Table 1**. These groundwater elevations were used to construct potentiometric contours for this sampling event. The potentiometric contours and sampling locations are presented on **Figure 1**.

After depth to groundwater was determined, three well volumes of water were removed from each well prior to sampling to provide fresh formation water within the well water column. Each well volume was measured in the field for pH, conductivity, temperature, turbidity, dissolved oxygen, and oxidation-reduction potential. Turbidity was elevated in each well after purging and was allowed to stabilize prior to sample collection. The water quality parameters at the time of sampling and groundwater elevations are presented in **Table 1**.

CDM

Sampling Results
ENCO Laboratories, Inc. in Cary, North Carolina analyzed groundwater samples for the North Carolina Appendix I Volatile Organic Compounds (VOC's) and metals (arsenic, barium, cadmium, chromium, lead, mercury, selenium, and silver).

In accordance with Solid Waste Section guidelines the analytical results were reported to the laboratory specific method detection limit (MDL) and are quantifiable at or below Solid Waste Section Limits (SWSLs). All monitoring wells for the C&D Landfill had detections of analytes above the MDL with a majority of the detections below SWSLs. These detections were qualified as estimated or "J" flags. "B" flags, which indicate the analyte was detected in the associated method blank, were also reported.

No Appendix I VOCs or metals were detected above North Carolina 2L Standards. Acetone and toluene were detected as "J" flags for the first time in samples from CD-3. The acetone detection is likely a result from laboratory decontamination procedures as it is a common laboratory contaminant. CDM will monitor future detections of acetone and toluene to determine if any trends appear. No analytes were detected in the equipment or trip blanks. A complete summary of all detected constituents, including detections above the MDL, is presented in **Table 2**. A copy of the analytical results from the May 2010 semi-annual sampling event is provided in **Appendix A**.

If you have any questions or require further explanation, do not hesitate to call me at 787-5620.

Very truly yours,

Mat Colone

Mathew F. Colone, P.G.
Camp Dresser & McKee

cc: Elliott Cornell, P.G., WCSWM
Bob Brossoie, CDM

Table 1
Water Quality Parameters
May 2010 Semi-Annual Sampling Event
North Wake C&D Landfill

	Field Measurements						Groundwater Elevations		
Monitoring Well I.D.	pH	Conductivity (μS/cm)	Temperature (deg. C)	Turbidity (NTUs)	DO (mg/L)	ORP	TOC Elevation (feet AMSL)	Depth to Groundwater (feet)	Groundwater Elevation (feet AMSL)
MW-1	5.96	80	16.4	763	5.18	126.1	333.80	46.31	287.49
CD-1	6.24	111	15.8	>1,000	4.80	52.8	296.26	13.89	282.37
CD-2	6.01	126	15.1	858	5.10	190.6	282.64	11.82	270.82
CD-3	5.74	63	17.7	974	3.41	167.2	301.49	21.36	280.13

NOTES:
1. AMSL - Above Mean Sea Level
2. TOC - Top of Casing
3. uS/cm - Microsiemens per centimeter
4. mg/L - Milligrams per liter
5. ORP - Oxidation Reduction Potential
6. NTU - Nephelometric Turbidity Units

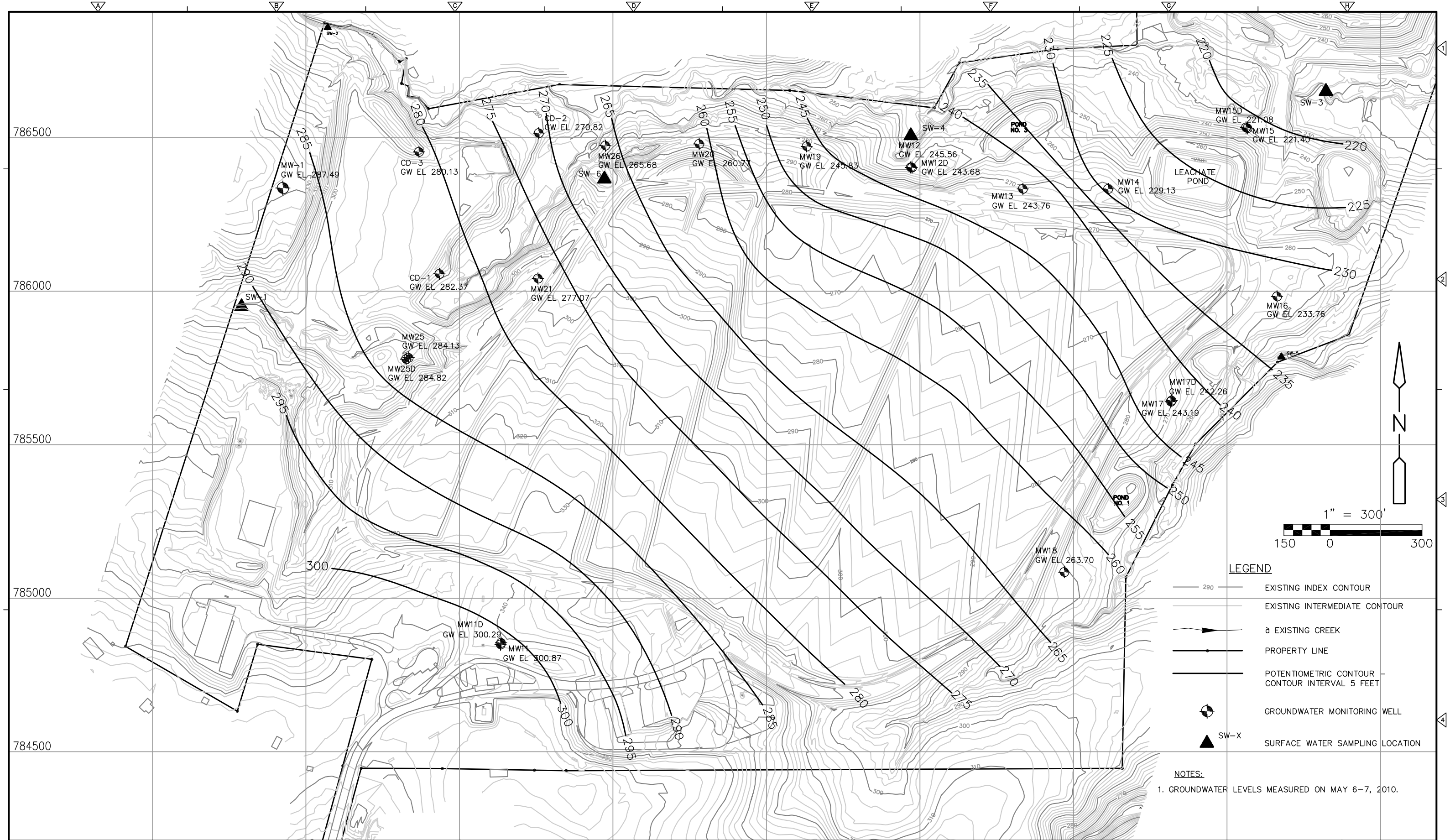
Table 2
Detected Groundwater Constituents - Metals and Volatile Organic Compounds
May 2010 Semi-Annual Sampling Event
North Wake C&D Landfill

		Metals								VOCs		
Monitor Well	**Sample Date**	**Arsenic**	**Barium**	**Cadmium**	**Chromium**	**Lead**	**Mercury**	**Selenium**	**Silver**	**Acetone**	**Chloroform**	**Toluene**
NC 2L		**0.01**	**0.7**	**0.002**	**0.01**	**0.015**	**0.001**	**0.02**	**0.02**	**6,000**	**70**	**600**
SWSL		**0.01**	**0.1**	**0.001**	**0.01**	**0.01**	**0.0002**	**0.01**	**0.01**	**100**	**5**	**1**
MW-1	5-Jun-01											
MW-1	29-Nov-01											
MW-1	5-Apr-02											
MW-1	7-Nov-02											
MW-1	16-Apr-03											
MW-1	30-Oct-03											
MW-1	7-Apr-04											
MW-1	19-Nov-04											
MW-1	22-Apr-05					**0.016**						
MW-1	10-Nov-05					**0.015**						
MW-1	13-Apr-06											
MW-1	8-Nov-06											
MW-1	18-Apr-07											
MW-1	7-Nov-07		0.151		0.011	**0.028**						
MW-1	13-May-08	0.00187JB	0.0452JB		0.00263J							
MW-1	3-Nov-08		0.0329J						0.00123JB			
MW-1	18-Mar-09		0.0308J						0.00127JB			
MW-1	19-Oct-09		0.0418J		0.00265J				0.00091JB			
MW-1	7-May-10		0.0439J		0.00132J	0.00236J						
CD-1	5-Jun-01		0.102									
CD-1	29-Nov-01		0.371									
CD-1	5-Apr-02											
CD-1	7-Nov-02											
CD-1	16-Apr-03											
CD-1	30-Oct-03											
CD-1	7-Apr-04											
CD-1	19-Nov-04			0.001								
CD-1	22-Apr-05		**0.735**		0.011	0.015						
CD-1	10-Nov-05											
CD-1	13-Apr-06											
CD-1	8-Nov-06					0.011						
CD-1	18-Apr-07		0.501		0.015	0.011						
CD-1	7-Nov-07		0.501		0.013	0.011						
CD-1	13-May-08	0.00417JB	0.257B		0.0138	**0.015**						
CD-1	3-Nov-08		0.131		0.00739J	0.00691J						
CD-1	18-Mar-08		0.135		0.00632J				0.00148JB			
CD-1	19-Oct-09		0.258		**0.0148**	0.00871J			0.00612J		0.11J	
CD-1	7-May-10		0.195		0.0095J	0.00272J						
CD-2	5-Jun-01											
CD-2	29-Nov-01		0.357									
CD-2	5-Apr-02											
CD-2	7-Nov-02											
CD-2	16-Apr-03											
CD-2	30-Oct-03											
CD-2	7-Apr-04											
CD-2	19-Nov-04				0.015	0.011						
CD-2	22-Apr-05					**0.018**						
CD-2	10-Nov-05											
CD-2	13-Apr-06											
CD-2	8-Nov-06					**0.016**						
CD-2	18-Apr-07		0.192									
CD-2	7-Nov-07		0.224			0.012						
CD-2	13-May-08		0.0451JB		0.0049J	0.00552J			0.00112J			
CD-2	3-Nov-08		0.0357J		0.00401J				0.00126JB			
CD-2	18-Mar-09		0.0418J		0.00116J				0.00124JB		0.00572	
CD-2	19-Oct-09		0.0637J		0.00716J				0.00333J		0.38J	
CD-2	7-May-10		0.137		0.00743J	0.00197J						

Table 2
Detected Groundwater Constituents - Metals and Volatile Organic Compounds
May 2010 Semi-Annual Sampling Event
North Wake C&D Landfill

		Metals								VOCs		
Monitor Well	**Sample Date**	**Arsenic**	**Barium**	**Cadmium**	**Chromium**	**Lead**	**Mercury**	**Selenium**	**Silver**	**Acetone**	**Chloroform**	**Toluene**
NC 2L		**0.01**	**0.7**	**0.002**	**0.01**	**0.015**	**0.001**	**0.02**	**0.02**	**6,000**	**70**	**600**
SWSL		**0.01**	**0.1**	**0.001**	**0.01**	**0.01**	**0.0002**	**0.01**	**0.01**	**100**	**5**	**1**
CD-3	5-Jun-01											
CD-3	29-Nov-01											
CD-3	5-Apr-02											
CD-3	7-Nov-02											
CD-3	16-Apr-03											
CD-3	30-Oct-03											
CD-3	7-Apr-04											
CD-3	19-Nov-04											
CD-3	22-Apr-05											
CD-3	10-Nov-05											
CD-3	13-Apr-06											
CD-3	8-Nov-06											
CD-3	18-Apr-07		0.109									
CD-3	7-Nov-07		0.269			**0.015**						
CD-3	13-May-08		0.0312JB		0.00197J							
CD-3	3-Nov-08		0.0265J		0.00124J	0.0041J			0.00119JB			
CD-3	18-Mar-09		0.0423J						0.00109JB			
CD-3	19-Oct-09		0.0461J					0.00351J			0.15J	
CD-3	7-May-10		0.122		0.00161J	0.00517J				11J		0.63J

Notes:
Metal detections are in milligrams per liter (parts per million)
Volatile Organic Compound (VOC) detections are in micrograms per liter (parts per billion)
- Concentration exceeds NC 2L Groundwater Standards
- Indicates result below detection limits
J - Indicates the analytical result is an estimated concentration between the Method Detection Limit (MDL) and the Solid Waste Section Reporting Limit (SWSL)
B - Indicates the analyte was detected in the associated method blank



REV. NO.	DATE	DRWN	CHKD	REMARKS

DESIGNED BY: AARON WEISPFENNING
DRAWN BY: AARON WEISPFENNING
SHEET CHK'D BY: MAT COLONE
CROSS CHK'D BY:
APPROVED BY: MAT COLONE
DATE: JUNE 2010

CDM
Camp Dresser & McKee
5400 Glenwood Avenue, Suite 300
Raleigh, NC 27612
Tel: (919) 787-5620 Fax: (919) 781-5730
consulting • engineering • construction • operations

WAKECOUNTY
NORTH CAROLINA

NORTH WAKE LINED LANDFILL

POTENTIOMETRIC CONTOUR MAP

PROJECT NO. 6172-76963
FILE NAME: NW-LINED-S-10

SHEET NO.
1

Environmental Conservation Laboratories, Inc.
102-A Woodwinds Industrial Court
Cary NC, 27511
Phone: 919.467.3090 FAX: 919.467.3515
www.encolabs.com

Thursday, May 20, 2010

CDM (CD004)

Attn: Aaron Weispfenning

5400 GLENWOOD AVE SUITE 300

RALEIGH, NC 27612-

RE: Laboratory Results for
Project Number: [none], Project Name/Desc: N Wake C&D Landfill
ENCO Workorder: C005103

Dear Aaron Weispfenning,

Enclosed is a copy of your laboratory report for test samples received by our laboratory on Friday, May 7, 2010.

Unless otherwise noted in an attached project narrative, all samples were received in acceptable condition and processed in accordance with the referenced methods/procedures. Results for these procedures apply only to the samples as submitted.

The analytical results contained in this report are in compliance with NELAC standards, except as noted in the project narrative. This report shall not be reproduced except in full, without the written approval of the Laboratory.

This report contains only those analyses performed by Environmental Conservation Laboratories. Unless otherwise noted, all analyses were performed at ENCO Cary. Data from outside organizations will be reported under separate cover.

If you have any questions or require further information, please do not hesitate to contact me.

Sincerely,

Chuck Smith

Project Manager

Enclosure(s)

The total number of pages in this report, including this page is 31.

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SAMPLE SUMMARY/LABORATORY CHRONICLE

Client ID: 9209-MW1 **Lab ID: C005103-01** **Sampled: 05/07/10 07:40** **Received: 05/07/10 15:25**

Parameter	Hold Date/Time(s)	Prep Date/Time(s)	Analysis Date/Time(s)
EPA 6010C	11/03/10	05/10/10 10:25	5/12/2010 12:53
EPA 7470A	06/04/10	05/11/10 10:41	5/11/2010 17:54
EPA 8260B	05/21/10	05/11/10 13:30	5/11/2010 19:44

Client ID: 9209-CD1 **Lab ID: C005103-02** **Sampled: 05/07/10 09:00** **Received: 05/07/10 15:25**

Parameter	Hold Date/Time(s)	Prep Date/Time(s)	Analysis Date/Time(s)
EPA 6010C	11/03/10	05/10/10 10:25	5/12/2010 12:55
EPA 7470A	06/04/10	05/11/10 10:41	5/11/2010 17:57
EPA 8260B	05/21/10	05/11/10 13:30	5/11/2010 20:12

Client ID: 9209-CD2 **Lab ID: C005103-03** **Sampled: 05/07/10 08:30** **Received: 05/07/10 15:25**

Parameter	Hold Date/Time(s)	Prep Date/Time(s)	Analysis Date/Time(s)
EPA 6010C	11/03/10	05/10/10 10:25	5/12/2010 12:58
EPA 7470A	06/04/10	05/11/10 10:41	5/11/2010 18:00
EPA 8260B	05/21/10	05/11/10 13:30	5/11/2010 20:41

Client ID: 9209-CD3 **Lab ID: C005103-04** **Sampled: 05/07/10 08:10** **Received: 05/07/10 15:25**

Parameter	Hold Date/Time(s)	Prep Date/Time(s)	Analysis Date/Time(s)
EPA 6010C	11/03/10	05/10/10 10:25	5/12/2010 13:00
EPA 7470A	06/04/10	05/11/10 10:41	5/11/2010 18:03
EPA 8260B	05/21/10	05/11/10 13:30	5/11/2010 21:10

Client ID: 9209-EQBlank **Lab ID: C005103-05** **Sampled: 05/06/10 08:35** **Received: 05/07/10 15:25**

Parameter	Hold Date/Time(s)	Prep Date/Time(s)	Analysis Date/Time(s)
EPA 6010C	11/02/10	05/10/10 10:25	5/12/2010 13:03
EPA 7470A	06/03/10	05/11/10 10:41	5/11/2010 18:07
EPA 8260B	05/20/10	05/11/10 13:30	5/11/2010 19:15

Client ID: 9209-TripBlank **Lab ID: C005103-06** **Sampled: 05/06/10 08:35** **Received: 05/07/10 15:25**

Parameter	Hold Date/Time(s)	Prep Date/Time(s)	Analysis Date/Time(s)
EPA 8260B	05/20/10	05/11/10 13:30	5/11/2010 18:47

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NORTH CAROLINA SWS SAMPLE DETECTION SUMMARY

Client ID: 9209-MW1 **Lab ID: C005103-01**

Analyte	Results	Flag	DF	MDL	MRL	NC SWSL	Units	Method	Notes
Barium - Total	43.9	J	1	1.00	10.0	100	ug/L	EPA 6010C	
Chromium - Total	1.32	J	1	1.00	10.0	10	ug/L	EPA 6010C	
Lead - Total	2.36	J	1	1.90	10.0	10	ug/L	EPA 6010C	

Client ID: 9209-CD1 **Lab ID: C005103-02**

Analyte	Results	Flag	DF	MDL	MRL	NC SWSL	Units	Method	Notes
Barium - Total	195		1	1.00	10.0	100	ug/L	EPA 6010C	
Chromium - Total	9.50	J	1	1.00	10.0	10	ug/L	EPA 6010C	
Lead - Total	2.72	J	1	1.90	10.0	10	ug/L	EPA 6010C	

Client ID: 9209-CD2 **Lab ID: C005103-03**

Analyte	Results	Flag	DF	MDL	MRL	NC SWSL	Units	Method	Notes
Barium - Total	137		1	1.00	10.0	100	ug/L	EPA 6010C	
Chromium - Total	7.43	J	1	1.00	10.0	10	ug/L	EPA 6010C	
Lead - Total	1.97	J	1	1.90	10.0	10	ug/L	EPA 6010C	

Client ID: 9209-CD3 **Lab ID: C005103-04**

Analyte	Results	Flag	DF	MDL	MRL	NC SWSL	Units	Method	Notes
Acetone	11	J	1	1.5	5.0	100	ug/L	EPA 8260B	
Barium - Total	122		1	1.00	10.0	100	ug/L	EPA 6010C	
Chromium - Total	1.61	J	1	1.00	10.0	10	ug/L	EPA 6010C	
Lead - Total	5.17	J	1	1.90	10.0	10	ug/L	EPA 6010C	
Toluene	0.63	J	1	0.053	1.0	1	ug/L	EPA 8260B	

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ANALYTICAL RESULTS

Description: 9209-MW1 | **Lab Sample ID:** C005103-01 | **Received:** 05/07/10 15:25

Matrix: Ground Water | **Sampled:** 05/07/10 07:40 | **Work Order:** C005103

Project: N Wake C&D Landfill | **Sampled By:** Aaron Weispfenning

Volatile Organic Compounds by GCMS

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
1,1,1,2-Tetrachloroethane [630-20-6] ^	0.091	U	ug/L	1	0.091	1.0	5	EPA 8260B	05/11/10 19:44	JKG	
1,1,1-Trichloroethane [71-55-6] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
1,1,2,2-Tetrachloroethane [79-34-5] ^	0.085	U	ug/L	1	0.085	1.0	3	EPA 8260B	05/11/10 19:44	JKG	
1,1,2-Trichloroethane [79-00-5] ^	0.068	U	ug/L	1	0.068	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
1,1-Dichloroethane [75-34-3] ^	0.050	U	ug/L	1	0.050	1.0	5	EPA 8260B	05/11/10 19:44	JKG	
1,1-Dichloroethene [75-35-4] ^	0.15	U	ug/L	1	0.15	1.0	5	EPA 8260B	05/11/10 19:44	JKG	
1,2,3-Trichloropropane [96-18-4] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
1,2-Dibromo-3-chloropropane [96-12-8] ^	0.48	U	ug/L	1	0.48	1.0	13	EPA 8260B	05/11/10 19:44	JKG	
1,2-Dibromoethane [106-93-4] ^	0.42	U	ug/L	1	0.42	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
1,2-Dichlorobenzene [95-50-1] ^	0.052	U	ug/L	1	0.052	1.0	5	EPA 8260B	05/11/10 19:44	JKG	
1,2-Dichloroethane [107-06-2] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
1,2-Dichloropropane [78-87-5] ^	0.098	U	ug/L	1	0.098	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
1,4-Dichlorobenzene [106-46-7] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
2-Butanone [78-93-3] ^	1.0	U	ug/L	1	1.0	5.0	100	EPA 8260B	05/11/10 19:44	JKG	
2-Hexanone [591-78-6] ^	0.69	U	ug/L	1	0.69	5.0	50	EPA 8260B	05/11/10 19:44	JKG	
4-Methyl-2-pentanone [108-10-1] ^	1.1	U	ug/L	1	1.1	5.0	100	EPA 8260B	05/11/10 19:44	JKG	
Acetone [67-64-1] ^	1.5	U	ug/L	1	1.5	5.0	100	EPA 8260B	05/11/10 19:44	JKG	
Acrylonitrile [107-13-1] ^	2.1	U	ug/L	1	2.1	10	200	EPA 8260B	05/11/10 19:44	JKG	
Benzene [71-43-2] ^	0.050	U	ug/L	1	0.050	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
Bromochloromethane [74-97-5] ^	0.11	U	ug/L	1	0.11	1.0	3	EPA 8260B	05/11/10 19:44	JKG	
Bromodichloromethane [75-27-4] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
Bromoform [75-25-2] ^	0.20	U	ug/L	1	0.20	1.0	3	EPA 8260B	05/11/10 19:44	JKG	
Bromomethane [74-83-9] ^	0.28	U	ug/L	1	0.28	1.0	10	EPA 8260B	05/11/10 19:44	JKG	
Carbon disulfide [75-15-0] ^	0.54	U	ug/L	1	0.54	5.0	100	EPA 8260B	05/11/10 19:44	JKG	
Carbon tetrachloride [56-23-5] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
Chlorobenzene [108-90-7] ^	0.069	U	ug/L	1	0.069	1.0	3	EPA 8260B	05/11/10 19:44	JKG	
Chloroethane [75-00-3] ^	0.18	U	ug/L	1	0.18	1.0	10	EPA 8260B	05/11/10 19:44	JKG	
Chloroform [67-66-3] ^	0.083	U	ug/L	1	0.083	1.0	5	EPA 8260B	05/11/10 19:44	JKG	
Chloromethane [74-87-3] ^	0.050	U	ug/L	1	0.050	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
cis-1,2-Dichloroethene [156-59-2] ^	0.075	U	ug/L	1	0.075	1.0	5	EPA 8260B	05/11/10 19:44	JKG	
cis-1,3-Dichloropropene [10061-01-5] ^	0.073	U	ug/L	1	0.073	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
Dibromochloromethane [124-48-1] ^	0.067	U	ug/L	1	0.067	1.0	3	EPA 8260B	05/11/10 19:44	JKG	
Dibromomethane [74-95-3] ^	0.13	U	ug/L	1	0.13	1.0	10	EPA 8260B	05/11/10 19:44	JKG	
Ethylbenzene [100-41-4] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
Iodomethane [74-88-4] ^	0.52	U	ug/L	1	0.52	5.0	10	EPA 8260B	05/11/10 19:44	JKG	
Methylene chloride [75-09-2] ^	0.070	U	ug/L	1	0.070	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
Styrene [100-42-5] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
Tetrachloroethene [127-18-4] ^	0.099	U	ug/L	1	0.099	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
Toluene [108-88-3] ^	0.053	U	ug/L	1	0.053	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
trans-1,2-Dichloroethene [156-60-5] ^	0.11	U	ug/L	1	0.11	1.0	5	EPA 8260B	05/11/10 19:44	JKG	
trans-1,3-Dichloropropene [10061-02-6] ^	0.080	U	ug/L	1	0.080	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
trans-1,4-Dichloro-2-butene [110-57-6] ^	0.54	U	ug/L	1	0.54	1.0	100	EPA 8260B	05/11/10 19:44	JKG	
Trichloroethene [79-01-6] ^	0.13	U	ug/L	1	0.13	1.0	1	EPA 8260B	05/11/10 19:44	JKG	

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Description: 9209-MW1 | **Lab Sample ID:** C005103-01 | **Received:** 05/07/10 15:25

Matrix: Ground Water | **Sampled:** 05/07/10 07:40 | **Work Order:** C005103

Project: N Wake C&D Landfill | **Sampled By:** Aaron Weispfenning

Volatile Organic Compounds by GCMS

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Trichlorofluoromethane [75-69-4] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
Vinyl acetate [108-05-4] ^	0.98	U	ug/L	1	0.98	5.0	50	EPA 8260B	05/11/10 19:44	JKG	
Vinyl chloride [75-01-4] ^	0.083	U	ug/L	1	0.083	1.0	1	EPA 8260B	05/11/10 19:44	JKG	
Xylenes (Total) [1330-20-7] ^	0.22	U	ug/L	1	0.22	1.0	5	EPA 8260B	05/11/10 19:44	JKG	

Surrogates	*Results*	*DF*	*Spike Lvl*	*% Rec*	*% Rec Limits*	*Batch*	*Method*	*Analyzed*	*By*	Notes
4-Bromofluorobenzene	*47*	*1*	*50.0*	*94 %*	*51-122*	*0E11020*	*EPA 8260B*	*05/11/10 19:44*	*JKG*	
Dibromofluoromethane	*48*	*1*	*50.0*	*96 %*	*68-117*	*0E11020*	*EPA 8260B*	*05/11/10 19:44*	*JKG*	
Toluene-d8	*46*	*1*	*50.0*	*93 %*	*69-110*	*0E11020*	*EPA 8260B*	*05/11/10 19:44*	*JKG*	

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Description: 9209-MW1
Matrix: Ground Water
Project: N Wake C&D Landfill

Lab Sample ID: C005103-01
Sampled: 05/07/10 07:40
Sampled By: Aaron Weispfenning

Received: 05/07/10 15:25
Work Order: C005103

Metals by EPA 6000/7000 Series Methods

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Mercury [7439-97-6] ^	0.170	U	ug/L	1	0.170	0.200	0.2	EPA 7470A	05/11/10 17:54	NLH	

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Description: 9209-MW1 | **Lab Sample ID:** C005103-01 | **Received:** 05/07/10 15:25

Matrix: Ground Water | **Sampled:** 05/07/10 07:40 | **Work Order:** C005103

Project: N Wake C&D Landfill | **Sampled By:** Aaron Weispfenning

Metals (total recoverable) by EPA 6000/7000 Series Methods

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Arsenic [7440-38-2] ^	2.80	U	ug/L	1	2.80	10.0	10	EPA 6010C	05/12/10 12:53	JDH	
Barium [7440-39-3] ^	**43.9**	J	ug/L	1	1.00	10.0	100	EPA 6010C	05/12/10 12:53	JDH	
Cadmium [7440-43-9] ^	0.360	U	ug/L	1	0.360	1.00	1	EPA 6010C	05/12/10 12:53	JDH	
Chromium [7440-47-3] ^	**1.32**	J	ug/L	1	1.00	10.0	10	EPA 6010C	05/12/10 12:53	JDH	
Lead [7439-92-1] ^	**2.36**	J	ug/L	1	1.90	10.0	10	EPA 6010C	05/12/10 12:53	JDH	
Selenium [7782-49-2] ^	2.70	U	ug/L	1	2.70	10.0	10	EPA 6010C	05/12/10 12:53	JDH	
Silver [7440-22-4] ^	1.90	U	ug/L	1	1.90	10.0	10	EPA 6010C	05/12/10 12:53	JDH	

This report relates only to the sample as received by the laboratory, and may only be reproduced in full.

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Description: 9209-CD1 | **Lab Sample ID:** C005103-02 | **Received:** 05/07/10 15:25

Matrix: Ground Water | **Sampled:** 05/07/10 09:00 | **Work Order:** C005103

Project: N Wake C&D Landfill | **Sampled By:** Aaron Weispfenning

Volatile Organic Compounds by GCMS

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
1,1,1,2-Tetrachloroethane [630-20-6] ^	0.091	U	ug/L	1	0.091	1.0	5	EPA 8260B	05/11/10 20:12	JKG	
1,1,1-Trichloroethane [71-55-6] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
1,1,2,2-Tetrachloroethane [79-34-5] ^	0.085	U	ug/L	1	0.085	1.0	3	EPA 8260B	05/11/10 20:12	JKG	
1,1,2-Trichloroethane [79-00-5] ^	0.068	U	ug/L	1	0.068	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
1,1-Dichloroethane [75-34-3] ^	0.050	U	ug/L	1	0.050	1.0	5	EPA 8260B	05/11/10 20:12	JKG	
1,1-Dichloroethene [75-35-4] ^	0.15	U	ug/L	1	0.15	1.0	5	EPA 8260B	05/11/10 20:12	JKG	
1,2,3-Trichloropropane [96-18-4] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
1,2-Dibromo-3-chloropropane [96-12-8] ^	0.48	U	ug/L	1	0.48	1.0	13	EPA 8260B	05/11/10 20:12	JKG	
1,2-Dibromoethane [106-93-4] ^	0.42	U	ug/L	1	0.42	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
1,2-Dichlorobenzene [95-50-1] ^	0.052	U	ug/L	1	0.052	1.0	5	EPA 8260B	05/11/10 20:12	JKG	
1,2-Dichloroethane [107-06-2] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
1,2-Dichloropropane [78-87-5] ^	0.098	U	ug/L	1	0.098	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
1,4-Dichlorobenzene [106-46-7] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
2-Butanone [78-93-3] ^	1.0	U	ug/L	1	1.0	5.0	100	EPA 8260B	05/11/10 20:12	JKG	
2-Hexanone [591-78-6] ^	0.69	U	ug/L	1	0.69	5.0	50	EPA 8260B	05/11/10 20:12	JKG	
4-Methyl-2-pentanone [108-10-1] ^	1.1	U	ug/L	1	1.1	5.0	100	EPA 8260B	05/11/10 20:12	JKG	
Acetone [67-64-1] ^	1.5	U	ug/L	1	1.5	5.0	100	EPA 8260B	05/11/10 20:12	JKG	
Acrylonitrile [107-13-1] ^	2.1	U	ug/L	1	2.1	10	200	EPA 8260B	05/11/10 20:12	JKG	
Benzene [71-43-2] ^	0.050	U	ug/L	1	0.050	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
Bromochloromethane [74-97-5] ^	0.11	U	ug/L	1	0.11	1.0	3	EPA 8260B	05/11/10 20:12	JKG	
Bromodichloromethane [75-27-4] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
Bromoform [75-25-2] ^	0.20	U	ug/L	1	0.20	1.0	3	EPA 8260B	05/11/10 20:12	JKG	
Bromomethane [74-83-9] ^	0.28	U	ug/L	1	0.28	1.0	10	EPA 8260B	05/11/10 20:12	JKG	
Carbon disulfide [75-15-0] ^	0.54	U	ug/L	1	0.54	5.0	100	EPA 8260B	05/11/10 20:12	JKG	
Carbon tetrachloride [56-23-5] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
Chlorobenzene [108-90-7] ^	0.069	U	ug/L	1	0.069	1.0	3	EPA 8260B	05/11/10 20:12	JKG	
Chloroethane [75-00-3] ^	0.18	U	ug/L	1	0.18	1.0	10	EPA 8260B	05/11/10 20:12	JKG	
Chloroform [67-66-3] ^	0.083	U	ug/L	1	0.083	1.0	5	EPA 8260B	05/11/10 20:12	JKG	
Chloromethane [74-87-3] ^	0.050	U	ug/L	1	0.050	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
cis-1,2-Dichloroethene [156-59-2] ^	0.075	U	ug/L	1	0.075	1.0	5	EPA 8260B	05/11/10 20:12	JKG	
cis-1,3-Dichloropropene [10061-01-5] ^	0.073	U	ug/L	1	0.073	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
Dibromochloromethane [124-48-1] ^	0.067	U	ug/L	1	0.067	1.0	3	EPA 8260B	05/11/10 20:12	JKG	
Dibromomethane [74-95-3] ^	0.13	U	ug/L	1	0.13	1.0	10	EPA 8260B	05/11/10 20:12	JKG	
Ethylbenzene [100-41-4] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
Iodomethane [74-88-4] ^	0.52	U	ug/L	1	0.52	5.0	10	EPA 8260B	05/11/10 20:12	JKG	
Methylene chloride [75-09-2] ^	0.070	U	ug/L	1	0.070	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
Styrene [100-42-5] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
Tetrachloroethene [127-18-4] ^	0.099	U	ug/L	1	0.099	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
Toluene [108-88-3] ^	0.053	U	ug/L	1	0.053	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
trans-1,2-Dichloroethene [156-60-5] ^	0.11	U	ug/L	1	0.11	1.0	5	EPA 8260B	05/11/10 20:12	JKG	
trans-1,3-Dichloropropene [10061-02-6] ^	0.080	U	ug/L	1	0.080	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
trans-1,4-Dichloro-2-butene [110-57-6] ^	0.54	U	ug/L	1	0.54	1.0	100	EPA 8260B	05/11/10 20:12	JKG	
Trichloroethene [79-01-6] ^	0.13	U	ug/L	1	0.13	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
Trichlorofluoromethane [75-69-4] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 20:12	JKG	
Vinyl acetate [108-05-4] ^	0.98	U	ug/L	1	0.98	5.0	50	EPA 8260B	05/11/10 20:12	JKG	
Vinyl chloride [75-01-4] ^	0.083	U	ug/L	1	0.083	1.0	1	EPA 8260B	05/11/10 20:12	JKG	

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Description: 9209-CD1 | **Lab Sample ID:** C005103-02 | **Received:** 05/07/10 15:25

Matrix: Ground Water | **Sampled:** 05/07/10 09:00 | **Work Order:** C005103

Project: N Wake C&D Landfill | **Sampled By:** Aaron Weispfenning

Volatile Organic Compounds by GCMS

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Xylenes (Total) [1330-20-7] ^	0.22	U	ug/L	1	0.22	1.0	5	EPA 8260B	05/11/10 20:12	JKG	

Surrogates	*Results*	*DF*	*Spike Lvl*	*% Rec*	*% Rec Limits*	*Batch*	*Method*	*Analyzed*	*By*	Notes
4-Bromofluorobenzene	*46*	*1*	*50.0*	*93 %*	*51-122*	*0E11020*	*EPA 8260B*	*05/11/10 20:12*	*JKG*	
Dibromofluoromethane	*48*	*1*	*50.0*	*96 %*	*68-117*	*0E11020*	*EPA 8260B*	*05/11/10 20:12*	*JKG*	
Toluene-d8	*46*	*1*	*50.0*	*93 %*	*69-110*	*0E11020*	*EPA 8260B*	*05/11/10 20:12*	*JKG*	

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Description: 9209-CD1
Matrix: Ground Water
Project: N Wake C&D Landfill

Lab Sample ID: C005103-02
Sampled: 05/07/10 09:00
Sampled By: Aaron Weispfenning

Received: 05/07/10 15:25
Work Order: C005103

Metals by EPA 6000/7000 Series Methods

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Mercury [7439-97-6] ^	0.170	U	ug/L	1	0.170	0.200	0.2	EPA 7470A	05/11/10 17:57	NLH	

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Description: 9209-CD1 | **Lab Sample ID:** C005103-02 | **Received:** 05/07/10 15:25

Matrix: Ground Water | **Sampled:** 05/07/10 09:00 | **Work Order:** C005103

Project: N Wake C&D Landfill | **Sampled By:** Aaron Weispfenning

Metals (total recoverable) by EPA 6000/7000 Series Methods

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Arsenic [7440-38-2] ^	2.80	U	ug/L	1	2.80	10.0	10	EPA 6010C	05/12/10 12:55	JDH	
Barium [7440-39-3] ^	**195**		ug/L	1	1.00	10.0	100	EPA 6010C	05/12/10 12:55	JDH	
Cadmium [7440-43-9] ^	0.360	U	ug/L	1	0.360	1.00	1	EPA 6010C	05/12/10 12:55	JDH	
Chromium [7440-47-3] ^	**9.50**	J	ug/L	1	1.00	10.0	10	EPA 6010C	05/12/10 12:55	JDH	
Lead [7439-92-1] ^	**2.72**	J	ug/L	1	1.90	10.0	10	EPA 6010C	05/12/10 12:55	JDH	
Selenium [7782-49-2] ^	2.70	U	ug/L	1	2.70	10.0	10	EPA 6010C	05/12/10 12:55	JDH	
Silver [7440-22-4] ^	1.90	U	ug/L	1	1.90	10.0	10	EPA 6010C	05/12/10 12:55	JDH	

This report relates only to the sample as received by the laboratory, and may only be reproduced in full.

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Description: 9209-CD2 | **Lab Sample ID:** C005103-03 | **Received:** 05/07/10 15:25

Matrix: Ground Water | **Sampled:** 05/07/10 08:30 | **Work Order:** C005103

Project: N Wake C&D Landfill | **Sampled By:** Aaron Weispfenning

Volatile Organic Compounds by GCMS

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
1,1,1,2-Tetrachloroethane [630-20-6] ^	0.091	U	ug/L	1	0.091	1.0	5	EPA 8260B	05/11/10 20:41	JKG	
1,1,1-Trichloroethane [71-55-6] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
1,1,2,2-Tetrachloroethane [79-34-5] ^	0.085	U	ug/L	1	0.085	1.0	3	EPA 8260B	05/11/10 20:41	JKG	
1,1,2-Trichloroethane [79-00-5] ^	0.068	U	ug/L	1	0.068	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
1,1-Dichloroethane [75-34-3] ^	0.050	U	ug/L	1	0.050	1.0	5	EPA 8260B	05/11/10 20:41	JKG	
1,1-Dichloroethene [75-35-4] ^	0.15	U	ug/L	1	0.15	1.0	5	EPA 8260B	05/11/10 20:41	JKG	
1,2,3-Trichloropropane [96-18-4] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
1,2-Dibromo-3-chloropropane [96-12-8] ^	0.48	U	ug/L	1	0.48	1.0	13	EPA 8260B	05/11/10 20:41	JKG	
1,2-Dibromoethane [106-93-4] ^	0.42	U	ug/L	1	0.42	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
1,2-Dichlorobenzene [95-50-1] ^	0.052	U	ug/L	1	0.052	1.0	5	EPA 8260B	05/11/10 20:41	JKG	
1,2-Dichloroethane [107-06-2] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
1,2-Dichloropropane [78-87-5] ^	0.098	U	ug/L	1	0.098	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
1,4-Dichlorobenzene [106-46-7] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
2-Butanone [78-93-3] ^	1.0	U	ug/L	1	1.0	5.0	100	EPA 8260B	05/11/10 20:41	JKG	
2-Hexanone [591-78-6] ^	0.69	U	ug/L	1	0.69	5.0	50	EPA 8260B	05/11/10 20:41	JKG	
4-Methyl-2-pentanone [108-10-1] ^	1.1	U	ug/L	1	1.1	5.0	100	EPA 8260B	05/11/10 20:41	JKG	
Acetone [67-64-1] ^	1.5	U	ug/L	1	1.5	5.0	100	EPA 8260B	05/11/10 20:41	JKG	
Acrylonitrile [107-13-1] ^	2.1	U	ug/L	1	2.1	10	200	EPA 8260B	05/11/10 20:41	JKG	
Benzene [71-43-2] ^	0.050	U	ug/L	1	0.050	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
Bromochloromethane [74-97-5] ^	0.11	U	ug/L	1	0.11	1.0	3	EPA 8260B	05/11/10 20:41	JKG	
Bromodichloromethane [75-27-4] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
Bromoform [75-25-2] ^	0.20	U	ug/L	1	0.20	1.0	3	EPA 8260B	05/11/10 20:41	JKG	
Bromomethane [74-83-9] ^	0.28	U	ug/L	1	0.28	1.0	10	EPA 8260B	05/11/10 20:41	JKG	
Carbon disulfide [75-15-0] ^	0.54	U	ug/L	1	0.54	5.0	100	EPA 8260B	05/11/10 20:41	JKG	
Carbon tetrachloride [56-23-5] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
Chlorobenzene [108-90-7] ^	0.069	U	ug/L	1	0.069	1.0	3	EPA 8260B	05/11/10 20:41	JKG	
Chloroethane [75-00-3] ^	0.18	U	ug/L	1	0.18	1.0	10	EPA 8260B	05/11/10 20:41	JKG	
Chloroform [67-66-3] ^	0.083	U	ug/L	1	0.083	1.0	5	EPA 8260B	05/11/10 20:41	JKG	
Chloromethane [74-87-3] ^	0.050	U	ug/L	1	0.050	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
cis-1,2-Dichloroethene [156-59-2] ^	0.075	U	ug/L	1	0.075	1.0	5	EPA 8260B	05/11/10 20:41	JKG	
cis-1,3-Dichloropropene [10061-01-5] ^	0.073	U	ug/L	1	0.073	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
Dibromochloromethane [124-48-1] ^	0.067	U	ug/L	1	0.067	1.0	3	EPA 8260B	05/11/10 20:41	JKG	
Dibromomethane [74-95-3] ^	0.13	U	ug/L	1	0.13	1.0	10	EPA 8260B	05/11/10 20:41	JKG	
Ethylbenzene [100-41-4] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
Iodomethane [74-88-4] ^	0.52	U	ug/L	1	0.52	5.0	10	EPA 8260B	05/11/10 20:41	JKG	
Methylene chloride [75-09-2] ^	0.070	U	ug/L	1	0.070	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
Styrene [100-42-5] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
Tetrachloroethene [127-18-4] ^	0.099	U	ug/L	1	0.099	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
Toluene [108-88-3] ^	0.053	U	ug/L	1	0.053	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
trans-1,2-Dichloroethene [156-60-5] ^	0.11	U	ug/L	1	0.11	1.0	5	EPA 8260B	05/11/10 20:41	JKG	
trans-1,3-Dichloropropene [10061-02-6] ^	0.080	U	ug/L	1	0.080	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
trans-1,4-Dichloro-2-butene [110-57-6] ^	0.54	U	ug/L	1	0.54	1.0	100	EPA 8260B	05/11/10 20:41	JKG	
Trichloroethene [79-01-6] ^	0.13	U	ug/L	1	0.13	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
Trichlorofluoromethane [75-69-4] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 20:41	JKG	
Vinyl acetate [108-05-4] ^	0.98	U	ug/L	1	0.98	5.0	50	EPA 8260B	05/11/10 20:41	JKG	
Vinyl chloride [75-01-4] ^	0.083	U	ug/L	1	0.083	1.0	1	EPA 8260B	05/11/10 20:41	JKG	

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Description: 9209-CD2
Matrix: Ground Water
Project: N Wake C&D Landfill

Lab Sample ID: C005103-03
Sampled: 05/07/10 08:30
Sampled By: Aaron Weispfenning

Received: 05/07/10 15:25
Work Order: C005103

Volatile Organic Compounds by GCMS

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Xylenes (Total) [1330-20-7] ^	0.22	U	ug/L	1	0.22	1.0	5	EPA 8260B	05/11/10 20:41	JKG	

Surrogates	*Results*	*DF*	*Spike Lvl*	*% Rec*	*% Rec Limits*	*Batch*	*Method*	*Analyzed*	*By*	Notes
4-Bromofluorobenzene	*46*	*1*	*50.0*	*91 %*	*51-122*	*0E11020*	*EPA 8260B*	*05/11/10 20:41*	*JKG*	
Dibromofluoromethane	*49*	*1*	*50.0*	*97 %*	*68-117*	*0E11020*	*EPA 8260B*	*05/11/10 20:41*	*JKG*	
Toluene-d8	*47*	*1*	*50.0*	*93 %*	*69-110*	*0E11020*	*EPA 8260B*	*05/11/10 20:41*	*JKG*	

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Description: 9209-CD2
Matrix: Ground Water
Project: N Wake C&D Landfill

Lab Sample ID: C005103-03
Sampled: 05/07/10 08:30
Sampled By: Aaron Weispfenning

Received: 05/07/10 15:25
Work Order: C005103

Metals by EPA 6000/7000 Series Methods

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Mercury [7439-97-6] ^	0.170	U	ug/L	1	0.170	0.200	0.2	EPA 7470A	05/11/10 18:00	NLH	

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Description: 9209-CD2 | **Lab Sample ID:** C005103-03 | **Received:** 05/07/10 15:25

Matrix: Ground Water | **Sampled:** 05/07/10 08:30 | **Work Order:** C005103

Project: N Wake C&D Landfill | **Sampled By:** Aaron Weispfenning

Metals (total recoverable) by EPA 6000/7000 Series Methods

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Arsenic [7440-38-2] ^	2.80	U	ug/L	1	2.80	10.0	10	EPA 6010C	05/12/10 12:58	JDH	
Barium [7440-39-3] ^	**137**		ug/L	1	1.00	10.0	100	EPA 6010C	05/12/10 12:58	JDH	
Cadmium [7440-43-9] ^	0.360	U	ug/L	1	0.360	1.00	1	EPA 6010C	05/12/10 12:58	JDH	
Chromium [7440-47-3] ^	**7.43**	J	ug/L	1	1.00	10.0	10	EPA 6010C	05/12/10 12:58	JDH	
Lead [7439-92-1] ^	**1.97**	J	ug/L	1	1.90	10.0	10	EPA 6010C	05/12/10 12:58	JDH	
Selenium [7782-49-2] ^	2.70	U	ug/L	1	2.70	10.0	10	EPA 6010C	05/12/10 12:58	JDH	
Silver [7440-22-4] ^	1.90	U	ug/L	1	1.90	10.0	10	EPA 6010C	05/12/10 12:58	JDH	

This report relates only to the sample as received by the laboratory, and may only be reproduced in full.

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Description: 9209-CD3 | **Lab Sample ID:** C005103-04 | **Received:** 05/07/10 15:25

Matrix: Ground Water | **Sampled:** 05/07/10 08:10 | **Work Order:** C005103

Project: N Wake C&D Landfill | **Sampled By:** Aaron Weispfenning

Volatile Organic Compounds by GCMS

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
1,1,1,2-Tetrachloroethane [630-20-6] ^	0.091	U	ug/L	1	0.091	1.0	5	EPA 8260B	05/11/10 21:10	JKG	
1,1,1-Trichloroethane [71-55-6] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
1,1,2,2-Tetrachloroethane [79-34-5] ^	0.085	U	ug/L	1	0.085	1.0	3	EPA 8260B	05/11/10 21:10	JKG	
1,1,2-Trichloroethane [79-00-5] ^	0.068	U	ug/L	1	0.068	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
1,1-Dichloroethane [75-34-3] ^	0.050	U	ug/L	1	0.050	1.0	5	EPA 8260B	05/11/10 21:10	JKG	
1,1-Dichloroethene [75-35-4] ^	0.15	U	ug/L	1	0.15	1.0	5	EPA 8260B	05/11/10 21:10	JKG	
1,2,3-Trichloropropane [96-18-4] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
1,2-Dibromo-3-chloropropane [96-12-8] ^	0.48	U	ug/L	1	0.48	1.0	13	EPA 8260B	05/11/10 21:10	JKG	
1,2-Dibromoethane [106-93-4] ^	0.42	U	ug/L	1	0.42	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
1,2-Dichlorobenzene [95-50-1] ^	0.052	U	ug/L	1	0.052	1.0	5	EPA 8260B	05/11/10 21:10	JKG	
1,2-Dichloroethane [107-06-2] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
1,2-Dichloropropane [78-87-5] ^	0.098	U	ug/L	1	0.098	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
1,4-Dichlorobenzene [106-46-7] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
2-Butanone [78-93-3] ^	1.0	U	ug/L	1	1.0	5.0	100	EPA 8260B	05/11/10 21:10	JKG	
2-Hexanone [591-78-6] ^	0.69	U	ug/L	1	0.69	5.0	50	EPA 8260B	05/11/10 21:10	JKG	
4-Methyl-2-pentanone [108-10-1] ^	1.1	U	ug/L	1	1.1	5.0	100	EPA 8260B	05/11/10 21:10	JKG	
Acetone [67-64-1] ^	**11**	J	ug/L	1	1.5	5.0	100	EPA 8260B	05/11/10 21:10	JKG	
Acrylonitrile [107-13-1] ^	2.1	U	ug/L	1	2.1	10	200	EPA 8260B	05/11/10 21:10	JKG	
Benzene [71-43-2] ^	0.050	U	ug/L	1	0.050	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
Bromochloromethane [74-97-5] ^	0.11	U	ug/L	1	0.11	1.0	3	EPA 8260B	05/11/10 21:10	JKG	
Bromodichloromethane [75-27-4] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
Bromoform [75-25-2] ^	0.20	U	ug/L	1	0.20	1.0	3	EPA 8260B	05/11/10 21:10	JKG	
Bromomethane [74-83-9] ^	0.28	U	ug/L	1	0.28	1.0	10	EPA 8260B	05/11/10 21:10	JKG	
Carbon disulfide [75-15-0] ^	0.54	U	ug/L	1	0.54	5.0	100	EPA 8260B	05/11/10 21:10	JKG	
Carbon tetrachloride [56-23-5] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
Chlorobenzene [108-90-7] ^	0.069	U	ug/L	1	0.069	1.0	3	EPA 8260B	05/11/10 21:10	JKG	
Chloroethane [75-00-3] ^	0.18	U	ug/L	1	0.18	1.0	10	EPA 8260B	05/11/10 21:10	JKG	
Chloroform [67-66-3] ^	0.083	U	ug/L	1	0.083	1.0	5	EPA 8260B	05/11/10 21:10	JKG	
Chloromethane [74-87-3] ^	0.050	U	ug/L	1	0.050	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
cis-1,2-Dichloroethene [156-59-2] ^	0.075	U	ug/L	1	0.075	1.0	5	EPA 8260B	05/11/10 21:10	JKG	
cis-1,3-Dichloropropene [10061-01-5] ^	0.073	U	ug/L	1	0.073	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
Dibromochloromethane [124-48-1] ^	0.067	U	ug/L	1	0.067	1.0	3	EPA 8260B	05/11/10 21:10	JKG	
Dibromomethane [74-95-3] ^	0.13	U	ug/L	1	0.13	1.0	10	EPA 8260B	05/11/10 21:10	JKG	
Ethylbenzene [100-41-4] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
Iodomethane [74-88-4] ^	0.52	U	ug/L	1	0.52	5.0	10	EPA 8260B	05/11/10 21:10	JKG	
Methylene chloride [75-09-2] ^	0.070	U	ug/L	1	0.070	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
Styrene [100-42-5] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
Tetrachloroethene [127-18-4] ^	0.099	U	ug/L	1	0.099	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
Toluene [108-88-3] ^	**0.63**	J	ug/L	1	0.053	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
trans-1,2-Dichloroethene [156-60-5] ^	0.11	U	ug/L	1	0.11	1.0	5	EPA 8260B	05/11/10 21:10	JKG	
trans-1,3-Dichloropropene [10061-02-6] ^	0.080	U	ug/L	1	0.080	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
trans-1,4-Dichloro-2-butene [110-57-6] ^	0.54	U	ug/L	1	0.54	1.0	100	EPA 8260B	05/11/10 21:10	JKG	
Trichloroethene [79-01-6] ^	0.13	U	ug/L	1	0.13	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
Trichlorofluoromethane [75-69-4] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 21:10	JKG	
Vinyl acetate [108-05-4] ^	0.98	U	ug/L	1	0.98	5.0	50	EPA 8260B	05/11/10 21:10	JKG	
Vinyl chloride [75-01-4] ^	0.083	U	ug/L	1	0.083	1.0	1	EPA 8260B	05/11/10 21:10	JKG	

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Description: 9209-CD3
Matrix: Ground Water
Project: N Wake C&D Landfill

Lab Sample ID: C005103-04
Sampled: 05/07/10 08:10
Sampled By: Aaron Weispfenning

Received: 05/07/10 15:25
Work Order: C005103

Volatile Organic Compounds by GCMS

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Xylenes (Total) [1330-20-7] ^	0.22	U	ug/L	1	0.22	1.0	5	EPA 8260B	05/11/10 21:10	JKG	

Surrogates	*Results*	*DF*	*Spike Lvl*	*% Rec*	*% Rec Limits*	*Batch*	*Method*	*Analyzed*	*By*	Notes
4-Bromofluorobenzene	*46*	*1*	*50.0*	*93 %*	*51-122*	*0E11020*	*EPA 8260B*	*05/11/10 21:10*	*JKG*	
Dibromofluoromethane	*49*	*1*	*50.0*	*98 %*	*68-117*	*0E11020*	*EPA 8260B*	*05/11/10 21:10*	*JKG*	
Toluene-d8	*46*	*1*	*50.0*	*93 %*	*69-110*	*0E11020*	*EPA 8260B*	*05/11/10 21:10*	*JKG*	

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Description: 9209-CD3
Matrix: Ground Water
Project: N Wake C&D Landfill

Lab Sample ID: C005103-04
Sampled: 05/07/10 08:10
Sampled By: Aaron Weispfenning

Received: 05/07/10 15:25
Work Order: C005103

Metals by EPA 6000/7000 Series Methods

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Mercury [7439-97-6] ^	0.170	U	ug/L	1	0.170	0.200	0.2	EPA 7470A	05/11/10 18:03	NLH	

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Description: 9209-CD3 | **Lab Sample ID:** C005103-04 | **Received:** 05/07/10 15:25

Matrix: Ground Water | **Sampled:** 05/07/10 08:10 | **Work Order:** C005103

Project: N Wake C&D Landfill | **Sampled By:** Aaron Weispfenning

Metals (total recoverable) by EPA 6000/7000 Series Methods

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Arsenic [7440-38-2] ^	2.80	U	ug/L	1	2.80	10.0	10	EPA 6010C	05/12/10 13:00	JDH	
Barium [7440-39-3] ^	**122**		ug/L	1	1.00	10.0	100	EPA 6010C	05/12/10 13:00	JDH	
Cadmium [7440-43-9] ^	0.360	U	ug/L	1	0.360	1.00	1	EPA 6010C	05/12/10 13:00	JDH	
Chromium [7440-47-3] ^	**1.61**	J	ug/L	1	1.00	10.0	10	EPA 6010C	05/12/10 13:00	JDH	
Lead [7439-92-1] ^	**5.17**	J	ug/L	1	1.90	10.0	10	EPA 6010C	05/12/10 13:00	JDH	
Selenium [7782-49-2] ^	2.70	U	ug/L	1	2.70	10.0	10	EPA 6010C	05/12/10 13:00	JDH	
Silver [7440-22-4] ^	1.90	U	ug/L	1	1.90	10.0	10	EPA 6010C	05/12/10 13:00	JDH	

This report relates only to the sample as received by the laboratory, and may only be reproduced in full.

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Description: 9209-EQBlank
Matrix: Water
Project: N Wake C&D Landfill

Lab Sample ID: C005103-05
Sampled: 05/06/10 08:35
Sampled By: Aaron Weispfenning

Received: 05/07/10 15:25
Work Order: C005103

Volatile Organic Compounds by GCMS

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
1,1,1,2-Tetrachloroethane [630-20-6] ^	0.091	U	ug/L	1	0.091	1.0	5	EPA 8260B	05/11/10 19:15	JKG	
1,1,1-Trichloroethane [71-55-6] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
1,1,2,2-Tetrachloroethane [79-34-5] ^	0.085	U	ug/L	1	0.085	1.0	3	EPA 8260B	05/11/10 19:15	JKG	
1,1,2-Trichloroethane [79-00-5] ^	0.068	U	ug/L	1	0.068	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
1,1-Dichloroethane [75-34-3] ^	0.050	U	ug/L	1	0.050	1.0	5	EPA 8260B	05/11/10 19:15	JKG	
1,1-Dichloroethene [75-35-4] ^	0.15	U	ug/L	1	0.15	1.0	5	EPA 8260B	05/11/10 19:15	JKG	
1,2,3-Trichloropropane [96-18-4] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
1,2-Dibromo-3-chloropropane [96-12-8] ^	0.48	U	ug/L	1	0.48	1.0	13	EPA 8260B	05/11/10 19:15	JKG	
1,2-Dibromoethane [106-93-4] ^	0.42	U	ug/L	1	0.42	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
1,2-Dichlorobenzene [95-50-1] ^	0.052	U	ug/L	1	0.052	1.0	5	EPA 8260B	05/11/10 19:15	JKG	
1,2-Dichloroethane [107-06-2] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
1,2-Dichloropropane [78-87-5] ^	0.098	U	ug/L	1	0.098	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
1,4-Dichlorobenzene [106-46-7] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
2-Butanone [78-93-3] ^	1.0	U	ug/L	1	1.0	5.0	100	EPA 8260B	05/11/10 19:15	JKG	
2-Hexanone [591-78-6] ^	0.69	U	ug/L	1	0.69	5.0	50	EPA 8260B	05/11/10 19:15	JKG	
4-Methyl-2-pentanone [108-10-1] ^	1.1	U	ug/L	1	1.1	5.0	100	EPA 8260B	05/11/10 19:15	JKG	
Acetone [67-64-1] ^	1.5	U	ug/L	1	1.5	5.0	100	EPA 8260B	05/11/10 19:15	JKG	
Acrylonitrile [107-13-1] ^	2.1	U	ug/L	1	2.1	10	200	EPA 8260B	05/11/10 19:15	JKG	
Benzene [71-43-2] ^	0.050	U	ug/L	1	0.050	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
Bromochloromethane [74-97-5] ^	0.11	U	ug/L	1	0.11	1.0	3	EPA 8260B	05/11/10 19:15	JKG	
Bromodichloromethane [75-27-4] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
Bromoform [75-25-2] ^	0.20	U	ug/L	1	0.20	1.0	3	EPA 8260B	05/11/10 19:15	JKG	
Bromomethane [74-83-9] ^	0.28	U	ug/L	1	0.28	1.0	10	EPA 8260B	05/11/10 19:15	JKG	
Carbon disulfide [75-15-0] ^	0.54	U	ug/L	1	0.54	5.0	100	EPA 8260B	05/11/10 19:15	JKG	
Carbon tetrachloride [56-23-5] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
Chlorobenzene [108-90-7] ^	0.069	U	ug/L	1	0.069	1.0	3	EPA 8260B	05/11/10 19:15	JKG	
Chloroethane [75-00-3] ^	0.18	U	ug/L	1	0.18	1.0	10	EPA 8260B	05/11/10 19:15	JKG	
Chloroform [67-66-3] ^	0.083	U	ug/L	1	0.083	1.0	5	EPA 8260B	05/11/10 19:15	JKG	
Chloromethane [74-87-3] ^	0.050	U	ug/L	1	0.050	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
cis-1,2-Dichloroethene [156-59-2] ^	0.075	U	ug/L	1	0.075	1.0	5	EPA 8260B	05/11/10 19:15	JKG	
cis-1,3-Dichloropropene [10061-01-5] ^	0.073	U	ug/L	1	0.073	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
Dibromochloromethane [124-48-1] ^	0.067	U	ug/L	1	0.067	1.0	3	EPA 8260B	05/11/10 19:15	JKG	
Dibromomethane [74-95-3] ^	0.13	U	ug/L	1	0.13	1.0	10	EPA 8260B	05/11/10 19:15	JKG	
Ethylbenzene [100-41-4] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
Iodomethane [74-88-4] ^	0.52	U	ug/L	1	0.52	5.0	10	EPA 8260B	05/11/10 19:15	JKG	
Methylene chloride [75-09-2] ^	0.070	U	ug/L	1	0.070	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
Styrene [100-42-5] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
Tetrachloroethene [127-18-4] ^	0.099	U	ug/L	1	0.099	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
Toluene [108-88-3] ^	0.053	U	ug/L	1	0.053	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
trans-1,2-Dichloroethene [156-60-5] ^	0.11	U	ug/L	1	0.11	1.0	5	EPA 8260B	05/11/10 19:15	JKG	
trans-1,3-Dichloropropene [10061-02-6] ^	0.080	U	ug/L	1	0.080	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
trans-1,4-Dichloro-2-butene [110-57-6] ^	0.54	U	ug/L	1	0.54	1.0	100	EPA 8260B	05/11/10 19:15	JKG	
Trichloroethene [79-01-6] ^	0.13	U	ug/L	1	0.13	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
Trichlorofluoromethane [75-69-4] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 19:15	JKG	
Vinyl acetate [108-05-4] ^	0.98	U	ug/L	1	0.98	5.0	50	EPA 8260B	05/11/10 19:15	JKG	
Vinyl chloride [75-01-4] ^	0.083	U	ug/L	1	0.083	1.0	1	EPA 8260B	05/11/10 19:15	JKG	

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Description: 9209-EQBlank
Matrix: Water
Project: N Wake C&D Landfill

Lab Sample ID: C005103-05
Sampled: 05/06/10 08:35
Sampled By: Aaron Weispfenning

Received: 05/07/10 15:25
Work Order: C005103

Volatile Organic Compounds by GCMS

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Xylenes (Total) [1330-20-7] ^	0.22	U	ug/L	1	0.22	1.0	5	EPA 8260B	05/11/10 19:15	JKG	

Surrogates	*Results*	*DF*	*Spike Lvl*	*% Rec*	*% Rec Limits*	*Batch*	*Method*	*Analyzed*	*By*	Notes
4-Bromofluorobenzene	*45*	*1*	*50.0*	*90 %*	*51-122*	*0E11020*	*EPA 8260B*	*05/11/10 19:15*	*JKG*	
Dibromofluoromethane	*48*	*1*	*50.0*	*95 %*	*68-117*	*0E11020*	*EPA 8260B*	*05/11/10 19:15*	*JKG*	
Toluene-d8	*46*	*1*	*50.0*	*92 %*	*69-110*	*0E11020*	*EPA 8260B*	*05/11/10 19:15*	*JKG*	

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Description: 9209-EQBlank
Matrix: Water
Project: N Wake C&D Landfill

Lab Sample ID: C005103-05
Sampled: 05/06/10 08:35
Sampled By: Aaron Weispfenning

Received: 05/07/10 15:25
Work Order: C005103

Metals by EPA 6000/7000 Series Methods

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Mercury [7439-97-6] ^	0.170	U	ug/L	1	0.170	0.200	0.2	EPA 7470A	05/11/10 18:07	NLH	

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Description: 9209-EQBlank
Matrix: Water
Project: N Wake C&D Landfill

Lab Sample ID: C005103-05
Sampled: 05/06/10 08:35
Sampled By: Aaron Weispfenning

Received: 05/07/10 15:25
Work Order: C005103

Metals (total recoverable) by EPA 6000/7000 Series Methods

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Arsenic [7440-38-2] ^	2.80	U	ug/L	1	2.80	10.0	10	EPA 6010C	05/12/10 13:03	JDH	
Barium [7440-39-3] ^	1.00	U	ug/L	1	1.00	10.0	100	EPA 6010C	05/12/10 13:03	JDH	
Cadmium [7440-43-9] ^	0.360	U	ug/L	1	0.360	1.00	1	EPA 6010C	05/12/10 13:03	JDH	
Chromium [7440-47-3] ^	1.00	U	ug/L	1	1.00	10.0	10	EPA 6010C	05/12/10 13:03	JDH	
Lead [7439-92-1] ^	1.90	U	ug/L	1	1.90	10.0	10	EPA 6010C	05/12/10 13:03	JDH	
Selenium [7782-49-2] ^	2.70	U	ug/L	1	2.70	10.0	10	EPA 6010C	05/12/10 13:03	JDH	
Silver [7440-22-4] ^	1.90	U	ug/L	1	1.90	10.0	10	EPA 6010C	05/12/10 13:03	JDH	

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Description: 9209-TripBlank
Matrix: Water
Project: N Wake C&D Landfill

Lab Sample ID: C005103-06
Sampled: 05/06/10 08:35
Sampled By: ENCO

Received: 05/07/10 15:25
Work Order: C005103

Volatile Organic Compounds by GCMS

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
1,1,1,2-Tetrachloroethane [630-20-6] ^	0.091	U	ug/L	1	0.091	1.0	5	EPA 8260B	05/11/10 18:47	JKG	
1,1,1-Trichloroethane [71-55-6] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
1,1,2,2-Tetrachloroethane [79-34-5] ^	0.085	U	ug/L	1	0.085	1.0	3	EPA 8260B	05/11/10 18:47	JKG	
1,1,2-Trichloroethane [79-00-5] ^	0.068	U	ug/L	1	0.068	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
1,1-Dichloroethane [75-34-3] ^	0.050	U	ug/L	1	0.050	1.0	5	EPA 8260B	05/11/10 18:47	JKG	
1,1-Dichloroethene [75-35-4] ^	0.15	U	ug/L	1	0.15	1.0	5	EPA 8260B	05/11/10 18:47	JKG	
1,2,3-Trichloropropane [96-18-4] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
1,2-Dibromo-3-chloropropane [96-12-8] ^	0.48	U	ug/L	1	0.48	1.0	13	EPA 8260B	05/11/10 18:47	JKG	
1,2-Dibromoethane [106-93-4] ^	0.42	U	ug/L	1	0.42	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
1,2-Dichlorobenzene [95-50-1] ^	0.052	U	ug/L	1	0.052	1.0	5	EPA 8260B	05/11/10 18:47	JKG	
1,2-Dichloroethane [107-06-2] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
1,2-Dichloropropane [78-87-5] ^	0.098	U	ug/L	1	0.098	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
1,4-Dichlorobenzene [106-46-7] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
2-Butanone [78-93-3] ^	1.0	U	ug/L	1	1.0	5.0	100	EPA 8260B	05/11/10 18:47	JKG	
2-Hexanone [591-78-6] ^	0.69	U	ug/L	1	0.69	5.0	50	EPA 8260B	05/11/10 18:47	JKG	
4-Methyl-2-pentanone [108-10-1] ^	1.1	U	ug/L	1	1.1	5.0	100	EPA 8260B	05/11/10 18:47	JKG	
Acetone [67-64-1] ^	1.5	U	ug/L	1	1.5	5.0	100	EPA 8260B	05/11/10 18:47	JKG	
Acrylonitrile [107-13-1] ^	2.1	U	ug/L	1	2.1	10	200	EPA 8260B	05/11/10 18:47	JKG	
Benzene [71-43-2] ^	0.050	U	ug/L	1	0.050	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
Bromochloromethane [74-97-5] ^	0.11	U	ug/L	1	0.11	1.0	3	EPA 8260B	05/11/10 18:47	JKG	
Bromodichloromethane [75-27-4] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
Bromoform [75-25-2] ^	0.20	U	ug/L	1	0.20	1.0	3	EPA 8260B	05/11/10 18:47	JKG	
Bromomethane [74-83-9] ^	0.28	U	ug/L	1	0.28	1.0	10	EPA 8260B	05/11/10 18:47	JKG	
Carbon disulfide [75-15-0] ^	0.54	U	ug/L	1	0.54	5.0	100	EPA 8260B	05/11/10 18:47	JKG	
Carbon tetrachloride [56-23-5] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
Chlorobenzene [108-90-7] ^	0.069	U	ug/L	1	0.069	1.0	3	EPA 8260B	05/11/10 18:47	JKG	
Chloroethane [75-00-3] ^	0.18	U	ug/L	1	0.18	1.0	10	EPA 8260B	05/11/10 18:47	JKG	
Chloroform [67-66-3] ^	0.083	U	ug/L	1	0.083	1.0	5	EPA 8260B	05/11/10 18:47	JKG	
Chloromethane [74-87-3] ^	0.050	U	ug/L	1	0.050	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
cis-1,2-Dichloroethene [156-59-2] ^	0.075	U	ug/L	1	0.075	1.0	5	EPA 8260B	05/11/10 18:47	JKG	
cis-1,3-Dichloropropene [10061-01-5] ^	0.073	U	ug/L	1	0.073	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
Dibromochloromethane [124-48-1] ^	0.067	U	ug/L	1	0.067	1.0	3	EPA 8260B	05/11/10 18:47	JKG	
Dibromomethane [74-95-3] ^	0.13	U	ug/L	1	0.13	1.0	10	EPA 8260B	05/11/10 18:47	JKG	
Ethylbenzene [100-41-4] ^	0.10	U	ug/L	1	0.10	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
Iodomethane [74-88-4] ^	0.52	U	ug/L	1	0.52	5.0	10	EPA 8260B	05/11/10 18:47	JKG	
Methylene chloride [75-09-2] ^	0.070	U	ug/L	1	0.070	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
Styrene [100-42-5] ^	0.082	U	ug/L	1	0.082	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
Tetrachloroethene [127-18-4] ^	0.099	U	ug/L	1	0.099	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
Toluene [108-88-3] ^	0.053	U	ug/L	1	0.053	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
trans-1,2-Dichloroethene [156-60-5] ^	0.11	U	ug/L	1	0.11	1.0	5	EPA 8260B	05/11/10 18:47	JKG	
trans-1,3-Dichloropropene [10061-02-6] ^	0.080	U	ug/L	1	0.080	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
trans-1,4-Dichloro-2-butene [110-57-6] ^	0.54	U	ug/L	1	0.54	1.0	100	EPA 8260B	05/11/10 18:47	JKG	
Trichloroethene [79-01-6] ^	0.13	U	ug/L	1	0.13	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
Trichlorofluoromethane [75-69-4] ^	0.15	U	ug/L	1	0.15	1.0	1	EPA 8260B	05/11/10 18:47	JKG	
Vinyl acetate [108-05-4] ^	0.98	U	ug/L	1	0.98	5.0	50	EPA 8260B	05/11/10 18:47	JKG	
Vinyl chloride [75-01-4] ^	0.083	U	ug/L	1	0.083	1.0	1	EPA 8260B	05/11/10 18:47	JKG	

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Description: 9209-TripBlank
Matrix: Water
Project: N Wake C&D Landfill

Lab Sample ID: C005103-06
Sampled: 05/06/10 08:35
Sampled By: ENCO

Received: 05/07/10 15:25
Work Order: C005103

Volatile Organic Compounds by GCMS

^ - ENCO Cary certified analyte [NC 591]

Analyte [CAS Number]	Results	Flag	Units	DF	MDL	MRL	NC SWSL	Method	Analyzed	By	Notes
Xylenes (Total) [1330-20-7] ^	0.22	U	ug/L	1	0.22	1.0	5	EPA 8260B	05/11/10 18:47	JKG	

Surrogates	*Results*	*DF*	*Spike Lvl*	*% Rec*	*% Rec Limits*	*Batch*	*Method*	*Analyzed*	*By*	Notes
4-Bromofluorobenzene	*45*	*1*	*50.0*	*90 %*	*51-122*	*0E11020*	*EPA 8260B*	*05/11/10 18:47*	*JKG*	
Dibromofluoromethane	*47*	*1*	*50.0*	*94 %*	*68-117*	*0E11020*	*EPA 8260B*	*05/11/10 18:47*	*JKG*	
Toluene-d8	*46*	*1*	*50.0*	*93 %*	*69-110*	*0E11020*	*EPA 8260B*	*05/11/10 18:47*	*JKG*	

This report relates only to the sample as received by the laboratory, and may only be reproduced in full.

QUALITY CONTROL

Volatile Organic Compounds by GCMS - Quality Control

Batch 0E11020 - EPA 5030B_MS

Blank (0E11020-BLK1) Prepared: 05/11/2010 13:30 Analyzed: 05/11/2010 15:28

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
1,1,1,2-Tetrachloroethane	0.091	U	1.0	ug/L							
1,1,1-Trichloroethane	0.15	U	1.0	ug/L							
1,1,2,2-Tetrachloroethane	0.085	U	1.0	ug/L							
1,1,2-Trichloroethane	0.068	U	1.0	ug/L							
1,1-Dichloroethane	0.050	U	1.0	ug/L							
1,1-Dichloroethene	0.15	U	1.0	ug/L							
1,2,3-Trichloropropane	0.15	U	1.0	ug/L							
1,2-Dibromo-3-chloropropane	0.48	U	1.0	ug/L							
1,2-Dibromoethane	0.42	U	1.0	ug/L							
1,2-Dichlorobenzene	0.052	U	1.0	ug/L							
1,2-Dichloroethane	0.082	U	1.0	ug/L							
1,2-Dichloropropane	0.098	U	1.0	ug/L							
1,4-Dichlorobenzene	0.10	U	1.0	ug/L							
2-Butanone	1.0	U	5.0	ug/L							
2-Hexanone	0.69	U	5.0	ug/L							
4-Methyl-2-pentanone	1.1	U	5.0	ug/L							
Acetone	1.5	U	5.0	ug/L							
Acrylonitrile	2.1	U	10	ug/L							
Benzene	0.050	U	1.0	ug/L							
Bromochloromethane	0.11	U	1.0	ug/L							
Bromodichloromethane	0.10	U	1.0	ug/L							
Bromoform	0.20	U	1.0	ug/L							
Bromomethane	0.28	U	1.0	ug/L							
Carbon disulfide	0.54	U	5.0	ug/L							
Carbon tetrachloride	0.082	U	1.0	ug/L							
Chlorobenzene	0.069	U	1.0	ug/L							
Chloroethane	0.18	U	1.0	ug/L							
Chloroform	0.083	U	1.0	ug/L							
Chloromethane	0.050	U	1.0	ug/L							
cis-1,2-Dichloroethene	0.075	U	1.0	ug/L							
cis-1,3-Dichloropropene	0.073	U	1.0	ug/L							
Dibromochloromethane	0.067	U	1.0	ug/L							
Dibromomethane	0.13	U	1.0	ug/L							
Ethylbenzene	0.10	U	1.0	ug/L							
Iodomethane	0.52	U	5.0	ug/L							
Methylene chloride	0.070	U	1.0	ug/L							
Styrene	0.082	U	1.0	ug/L							
Tetrachloroethene	0.099	U	1.0	ug/L							
Toluene	0.053	U	1.0	ug/L							
trans-1,2-Dichloroethene	0.11	U	1.0	ug/L							
trans-1,3-Dichloropropene	0.080	U	1.0	ug/L							
trans-1,4-Dichloro-2-butene	0.54	U	1.0	ug/L							
Trichloroethene	0.13	U	1.0	ug/L							
Trichlorofluoromethane	0.15	U	1.0	ug/L							
Vinyl acetate	0.98	U	5.0	ug/L							
Vinyl chloride	0.083	U	1.0	ug/L							
Xylenes (Total)	0.22	U	1.0	ug/L							
Surrogate: 4-Bromofluorobenzene	*46*			*ug/L*	*50.0*		*93*	*51-122*			

QUALITY CONTROL

Volatile Organic Compounds by GCMS - Quality Control

Batch 0E11020 - EPA 5030B_MS

Blank (0E11020-BLK1) Continued Prepared: 05/11/2010 13:30 Analyzed: 05/11/2010 15:28

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Surrogate: Dibromofluoromethane	*49*			*ug/L*	*50.0*		*97*	*68-117*			
Surrogate: Toluene-d8	*47*			*ug/L*	*50.0*		*93*	*69-110*			

LCS (0E11020-BS1) Prepared: 05/11/2010 13:30 Analyzed: 05/11/2010 15:56

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
1,1-Dichloroethene	20		1.0	ug/L	20.0		100	75-133			
Benzene	21		1.0	ug/L	20.0		104	81-134			
Chlorobenzene	20		1.0	ug/L	20.0		100	83-117			
Toluene	22		1.0	ug/L	20.0		108	71-118			
Trichloroethene	20		1.0	ug/L	20.0		98	75-115			
Surrogate: 4-Bromofluorobenzene	*46*			*ug/L*	*50.0*		*92*	*51-122*			
Surrogate: Dibromofluoromethane	*47*			*ug/L*	*50.0*		*94*	*68-117*			
Surrogate: Toluene-d8	*48*			*ug/L*	*50.0*		*96*	*69-110*			

Matrix Spike (0E11020-MS1) Prepared: 05/11/2010 13:30 Analyzed: 05/11/2010 16:25

Source: C005247-10

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
1,1-Dichloroethene	20		1.0	ug/L	20.0	0.15 U	102	75-133			
Benzene	21		1.0	ug/L	20.0	0.050 U	103	81-134			
Chlorobenzene	19		1.0	ug/L	20.0	0.069 U	96	83-117			
Toluene	21		1.0	ug/L	20.0	0.053 U	103	71-118			
Trichloroethene	19		1.0	ug/L	20.0	0.13 U	94	75-115			
Surrogate: 4-Bromofluorobenzene	*46*			*ug/L*	*50.0*		*93*	*51-122*			
Surrogate: Dibromofluoromethane	*46*			*ug/L*	*50.0*		*92*	*68-117*			
Surrogate: Toluene-d8	*47*			*ug/L*	*50.0*		*94*	*69-110*			

Matrix Spike Dup (0E11020-MSD1) Prepared: 05/11/2010 13:30 Analyzed: 05/11/2010 16:53

Source: C005247-10

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
1,1-Dichloroethene	20		1.0	ug/L	20.0	0.15 U	98	75-133	4	20	
Benzene	20		1.0	ug/L	20.0	0.050 U	101	81-134	1	17	
Chlorobenzene	20		1.0	ug/L	20.0	0.069 U	99	83-117	3	16	
Toluene	21		1.0	ug/L	20.0	0.053 U	103	71-118	0.4	17	
Trichloroethene	19		1.0	ug/L	20.0	0.13 U	93	75-115	0.4	18	
Surrogate: 4-Bromofluorobenzene	*47*			*ug/L*	*50.0*		*94*	*51-122*			
Surrogate: Dibromofluoromethane	*47*			*ug/L*	*50.0*		*95*	*68-117*			
Surrogate: Toluene-d8	*48*			*ug/L*	*50.0*		*95*	*69-110*			

Metals by EPA 6000/7000 Series Methods - Quality Control

Batch 0E11009 - EPA 245.1

Blank (0E11009-BLK1) Prepared: 05/11/2010 10:41 Analyzed: 05/11/2010 16:47

QUALITY CONTROL

Metals by EPA 6000/7000 Series Methods - Quality Control

Batch 0E11009 - EPA 245.1

Blank (0E11009-BLK1) Continued Prepared: 05/11/2010 10:41 Analyzed: 05/11/2010 16:47

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Mercury	0.170	U	0.200	ug/L							

LCS (0E11009-BS1) Prepared: 05/11/2010 10:41 Analyzed: 05/11/2010 16:50

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Mercury	4.93		0.200	ug/L	5.00		99	85-115			

Matrix Spike (0E11009-MS1) Prepared: 05/11/2010 10:41 Analyzed: 05/11/2010 16:56

Source: C004829-03

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Mercury	4.60		0.200	ug/L	5.00	0.630	79	85-115			QM-07

Matrix Spike Dup (0E11009-MSD1) Prepared: 05/11/2010 10:41 Analyzed: 05/11/2010 16:58

Source: C004829-03

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Mercury	4.84		0.200	ug/L	5.00	0.630	84	85-115	5	15	QM-07

Post Spike (0E11009-PS1) Prepared: 05/11/2010 10:41 Analyzed: 05/11/2010 17:01

Source: C004829-03

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Mercury	4.37		0.200	ug/L	5.00	0.630	75	75-125			

Metals (total recoverable) by EPA 6000/7000 Series Methods - Quality Control

Batch 0E10016 - EPA 3005A

Blank (0E10016-BLK1) Prepared: 05/10/2010 10:25 Analyzed: 05/12/2010 11:47

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Arsenic	2.80	U	10.0	ug/L							
Barium	1.00	U	10.0	ug/L							
Cadmium	0.360	U	1.00	ug/L							
Chromium	1.00	U	10.0	ug/L							
Lead	1.90	U	10.0	ug/L							
Selenium	2.70	U	10.0	ug/L							
Silver	1.90	U	10.0	ug/L							

LCS (0E10016-BS1) Prepared: 05/10/2010 10:25 Analyzed: 05/12/2010 11:51

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Arsenic	1050		10.0	ug/L	1000		105	80-120			
Barium	1050		10.0	ug/L	1000		105	80-120			
Cadmium	526		1.00	ug/L	500		105	80-120			
Chromium	1050		10.0	ug/L	1000		105	80-120			

QUALITY CONTROL

Metals (total recoverable) by EPA 6000/7000 Series Methods - Quality Control

Batch 0E10016 - EPA 3005A

LCS (0E10016-BS1) Continued Prepared: 05/10/2010 10:25 Analyzed: 05/12/2010 11:51

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Lead	1050		10.0	ug/L	1000		105	80-120			
Selenium	1100		10.0	ug/L	1000		110	80-120			
Silver	100		10.0	ug/L	100		100	80-120			

Matrix Spike (0E10016-MS1) Prepared: 05/10/2010 10:25 Analyzed: 05/12/2010 12:02

Source: C004829-03

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Arsenic	1040		10.0	ug/L	1000	2.80 U	104	75-125			
Barium	1470		10.0	ug/L	1000	415	106	75-125			
Cadmium	517		1.00	ug/L	500	0.408	103	75-125			
Chromium	1040		10.0	ug/L	1000	1.00 U	104	75-125			
Lead	1040		10.0	ug/L	1000	1.90 U	104	75-125			
Selenium	1090		10.0	ug/L	1000	2.70 U	109	75-125			
Silver	98.9		10.0	ug/L	100	1.90 U	99	75-125			

Matrix Spike Dup (0E10016-MSD1) Prepared: 05/10/2010 10:25 Analyzed: 05/12/2010 12:05

Source: C004829-03

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Arsenic	1030		10.0	ug/L	1000	2.80 U	103	75-125	1	20	
Barium	1440		10.0	ug/L	1000	415	103	75-125	2	20	
Cadmium	507		1.00	ug/L	500	0.408	101	75-125	2	20	
Chromium	1010		10.0	ug/L	1000	1.00 U	101	75-125	2	20	
Lead	1020		10.0	ug/L	1000	1.90 U	102	75-125	2	20	
Selenium	1070		10.0	ug/L	1000	2.70 U	107	75-125	1	20	
Silver	96.4		10.0	ug/L	100	1.90 U	96	75-125	3	20	

Post Spike (0E10016-PS1) Prepared: 05/10/2010 10:25 Analyzed: 05/12/2010 12:14

Source: C004829-03

Analyte	Result	Flag	MRL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Arsenic	1.07		0.0100	mg/L	1.00	-4.12E-5	107	80-120			
Barium	1.50		0.0100	mg/L	1.00	0.415	108	80-120			
Cadmium	0.529		0.00100	mg/L	0.500	0.000408	106	80-120			
Chromium	1.07		0.0100	mg/L	1.00	-0.000540	107	80-120			
Lead	1.06		0.0100	mg/L	1.00	0.000777	106	80-120			
Selenium	1.11		0.0100	mg/L	1.00	-0.000551	111	80-120			
Silver	0.0946		0.0100	mg/L	0.100	0.000614	94	80-120			

FLAGS/NOTES AND DEFINITIONS

B	The analyte was detected in the associated method blank.
D	The sample was analyzed at dilution.
J	The reported value is between the laboratory method detection limit (MDL) and the laboratory method reporting limit (MRL), adjusted for actual sample preparation data and moisture content, where applicable.
U	The analyte was analyzed for but not detected to the level shown, adjusted for actual sample preparation data and moisture content, where applicable.
E	The concentration indicated for this analyte is an estimated value above the calibration range of the instrument. This value is considered an estimate.
MRL	Method Reporting Limit. The MRL is roughly equivalent to the practical quantitation limit (PQL) and is based on the low point of the calibration curve, when applicable, sample preparation factor, dilution factor, and, in the case of soil samples, moisture content.
QM-07	The spike recovery was outside acceptance limits for the MS and/or MSD. The batch was accepted based on acceptable LCS recovery.

ENVIRONMENTAL CONSERVATION LABORATORIES CHAIN-OF-CUSTODY RECORD

10775 Central Port Dr.
Orlando, FL 32824
(407) 826-5314 Fax (407) 850-6945

4810 Executive Park Court, Suite 211
Jacksonville, FL 32216-6069
(904) 296-3007 Fax (904) 296-6210

102-A Woodwinds Industrial Ct.
Cary, NC 27511
(919) 467-3090 Fax (919) 467-3515

Page 1 of 1

Client Name: CDM (CD004)	Project Number: [none]
Address: 5400 GLENWOOD AVE SUITE 300	Project Name/Desc: N Wake C&D Landfill
City/ST/Zip: RALEIGH, NC 27612-	PO # / Billing Info
Tel: 325-3500 Fax: ()-	Reporting Contact: Aaron Weispfenning
Sampler(s) Name, Affiliation (Print): Aaron Weispfenning, CDM	Billing Contact: Accounts Payable
Sampler(s) Signature: [signature]	Facility # (if required)

Requested Analyses: 8260B Appendix 1; Ag,As,Ba,Cd,Cr,Pb,Se; Hg

Requested Turnaround Times

Note : Rush requests subject to acceptance by the facility

X Standard

___ Expedited

Due __/__/__

Lab Workorder: C005103

Preservation (See Codes) (Combine as necessary)

Item #	Sample ID (Field Identification)	Collection Date	Collection Time	Comp / Grab	Matrix (see codes)	Total # of Containers	8260B Appendix 1	Ag,As,Ba,Cd,Cr,Pb,Se	Hg								Sample Comments
	9209-MW1	5-7-10	740	G	GW	4	X	X	X								-Provide EDD in SWS
	9209-CD1	5-7-10	900	G	GW	4	X	X	X								Format
	9209-CD2	5-7-10	830	G	GW	4	X	X	X								-Report results according to
	9209-CD3	5-7-10	810	G	GW	3*	X	X	X								SWS section. reporting limits
	9209-EQBlank	5-6-10	835	G	WA	4	X	X	X								-Report "ugr" values
	9209-TripBlank	—	—	—	WA	2	X										
																	* 1 VOA for CD3
																	broke; didn't have any
																	extras so only 2
																	VOAs are included
						21	<-- Total # of Containers										

Sample Kit Prepared By: [signature]	Date/Time: 5/4/10	Relinquished By: [signature]	Date/Time: 5-7-10 1525	Received By: [signature]	Date/Time: 5/7/10 1525
Comments:		Relinquished By	Date/Time	Received By	Date/Time
		Relinquished By	Date/Time	Received By	Date/Time
		Cooler #'s & Temps on Receipt: Blue 1.3°C		Condition Upon Receipt: X Acceptable ___ Unacceptable	

Matrix : GW-Groundwater SO-Soil SE-Sediment SW-Surface Water WW-Wastewater A-Air O-Other (detail in comments)

Preservation: I-Ice H-HCl N-HNO3 S-H2SO4 NO-NaOH O-Other (detail in comments)

Note : All samples submitted to ENCO Labs are in accordance with the terms and conditions listed on the reverse of this form, unless prior written agreements exist