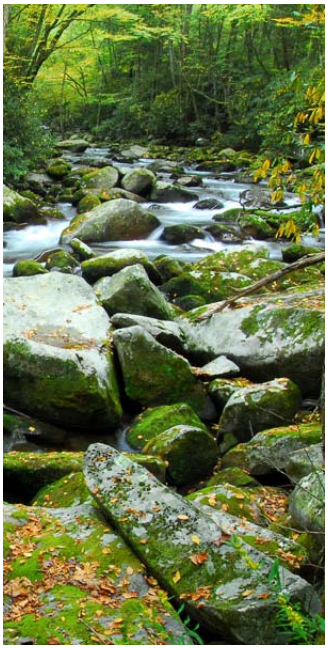

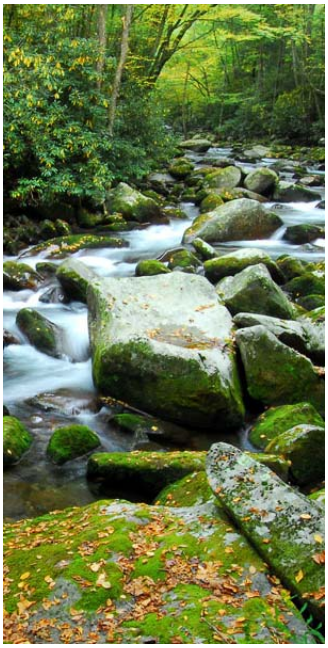

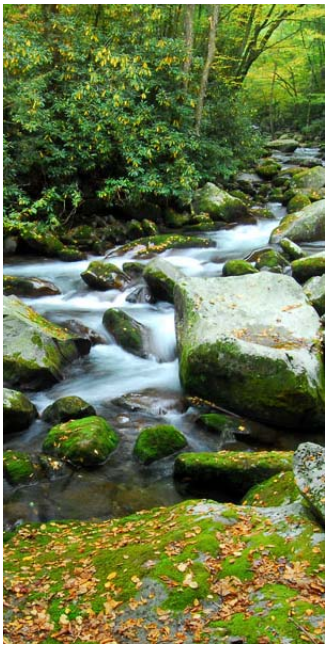

ALTAMONT ENVIRONMENTAL, INC.

ENGINEERING & HYDROGEOLOGY

Spring 2012 Semiannual Water Quality Monitoring Report

Madison County Operating Solid Waste Facility

Madison County, North Carolina Permit #58-03

July 11, 2012

Prepared for
Madison County, North Carolina
Project Number 2313.12

Prepared by
Altamont Environmental, Inc.
231 Haywood Street
Asheville, NC 28801
(828) 281-3350

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Joel Lenk, P.G.
Project Geologist

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1.0 Introduction

The Madison County Solid Waste Department operates a solid waste facility (Operating Landfill) located on Craig Rudisill Road, west of U.S. Highway 25/70 near Marshall, North Carolina. The site location map is included as Figure 1. The Operating Landfill includes the following permitted components:

- Operating Construction and Demolition Debris (C&D) landfill cell
- Operating transfer station
- Closed C&D landfill cell
- Closed Municipal Solid Waste (MSW) landfill cell (Figure 2)

The facility also contains a leachate underground holding tank that was installed in August 2011. Previously, the leachate sample was collected from a lined leachate basin that is no longer in use.

State regulations applicable to landfills are enforced by the North Carolina Department of Environment and Natural Resources (DENR), Division of Waste Management (DWM). This solid waste facility is permitted by the DENR DWM under Permit No. 58-03. The permit requires semiannual monitoring of groundwater, surface water, and leachate quality.

This report documents the first semiannual groundwater, surface water, and leachate monitoring event for 2012, and is being submitted in accordance with requirements stipulated in the DENR Solid Waste Management Rules, Title 15A, Subchapter 13B, of the North Carolina Administrative Code (15A NCAC 13B).

This semiannual report provides an evaluation of groundwater, surface water, and leachate quality for the solid waste facility.

The water quality monitoring network for the operating landfill consists of nine compliance monitoring wells (MW-01, MW-02, MW-03, MW-04, MW-05, MW-06R, MW-07R, MW-08 and MW-09), surface water sample locations (SW-01 and SW-02R) located along a tributary to Walnut Creek, and leachate sample (LP-1) collected from the fill port on the underground holding tank.

2.0 Methods

On April 24 and 25, 2012, Altamont Environmental, Inc. (Altamont) collected nine groundwater samples from monitoring wells, two surface water samples from a tributary to Walnut Creek, and one aqueous sample from the leachate underground holding tank located at the Madison County Operating Solid Waste Facility. One of the monitoring wells sampled, MW-06R, is upgradient from the landfill. Groundwater collected from this well is assumed to represent background groundwater quality at the site. This monitoring well was installed on September 30, 2008 as a replacement for the pre-existing background monitoring well, MW-06, which has historically been dry and has contained only approximately one foot of water during this event. Sampling locations are shown on Figures 2 and 3.

2.1 Groundwater Purging and Sampling Methods

Prior to collecting groundwater samples from the monitoring wells, the static water level was measured and recorded for each well. The monitoring wells were purged and sampled using low-flow techniques in accordance with the procedures described in *Low-Flow (Minimal Drawdown) Ground-Water Sampling Procedures*, United States Environmental Protection Agency (EPA), Groundwater Issues (April 1996). During purging, pH, specific conductivity (SC), dissolved oxygen (DO), oxidation-reduction potential (ORP), turbidity, and temperature were measured and recorded approximately every three minutes. Well purging continued until these parameters stabilized for three consecutive readings. The required stabilization criteria are as follows:

- pH values within +/- 0.1 pH unit
- SC values within +/- 3 percent
- Temperature, DO, and turbidity values within +/- 10 percent
- ORP values within +/- 10 millivolts

Following stabilization of these parameters, a groundwater sample was collected using laboratory-supplied sample containers by a technician wearing a new pair of non-reactive nitrile gloves. Low-flow sampling logs are included in Appendix A.

2.2 Surface Water Sampling Methods

Surface water samples SW-01 and SW-02R were collected at designated locations from an unnamed tributary to Walnut Creek that flows in a northerly direction adjacent to the western border of the Operating Landfill (Figure 2). Sample SW-01 is considered representative of surface water quality upstream of the Operating Landfill; sample SW-02R is considered representative of surface water quality downstream from the landfill. Surface water samples were collected in laboratory-supplied sample containers by a technician wearing a new pair of non-reactive nitrile gloves. As with groundwater sampling: temperature, pH, SC, DO, ORP, and turbidity were measured and recorded at each surface water sampling location prior to sample collection. Field parameters and observations pertaining to surface water quality are provided on sampling logs included in Appendix A.

2.3 Leachate Sampling Methods

One aqueous sample was collected from the leachate underground holding tank (LP-1). Leachate was previously collected from a lined storage basin. Please note that the leachate sample nomenclature remains the same in this report as in previous reports, but that the sample is now collected from an underground holding tank instead of the lined leachate basin. In future reports, leachate sample

nomenclature will be changed to "LT-1", which will stand for "Leachate Tank Sample Location 1". On August 12, 2011, the leachate underground holding tank was installed and connected to the leachate collection piping associated with the closed MSW landfill cell. Shortly thereafter during August 2011, the lined leachate basin was closed. The leachate sample LP-1 was collected from one of the tank's fill ports using a new disposable polyethylene bailer. One round of field parameters (as described above) was measured and recorded for the sample LP-1 (see Appendix A). Leachate collected in the holding tank at the site is trucked, as needed, to the Metropolitan Sewerage District (MSD) treatment facility for the town of Marshall, North Carolina.

2.4 Sample Handling, Documentation, and Analysis

Field parameters for groundwater and surface water were measured and the results are provided on sampling logs (Appendix A). Following sample collection, each sample was immediately placed on ice in a sample cooler for transport to Pace Analytical Laboratories (Pace), a North Carolina certified laboratory located in Asheville, North Carolina. Well construction details are included on Table 1. Altamont submitted the groundwater samples, and surface water samples for the required analysis summarized on Table 2.

Proper chain-of-custody documentation procedures were followed during collection and transport of each sample. A trip blank provided by the laboratory was placed in the sample cooler and analyzed for Appendix I volatile organic compounds (VOCs). The laboratory analytical reports and chain-of-custody documentation are provided in Appendix B.

3.0 Findings

3.1 Analytical Results

The laboratory analytical results and field parameters data for groundwater, surface water, the leachate sample, and trip blank collected at the operating landfill are included in Appendices A and B in hard copy and also in Appendix C, in the Electronic Data Deliverable (EDD) format specified by the DENR Solid Waste Section (SWS) of the DWM (in a memorandum dated October 27, 2006 and its addendum dated February 23, 2007).

As stipulated in the DWM documents referenced above, non-detections were reported at the laboratory-specific method detection limit (MDL), and all concentrations exceeding the MDL were reported and appropriately qualified (Tables 3, 4, and 5). The MDL is the minimum concentration of a substance that can be measured and reported by a laboratory with 99 percent confidence that the analyte concentration is greater than zero. The laboratory's method reporting limit (MRL) is the minimum concentration of a target analyte that can be accurately determined by the referenced method. MRL is listed in the "Practical Quantitation Limit" (PQL) column in the Pace laboratory analytical report. All detections were compared to analyte-specific Solid Waste Section Limits (SWSLs) established by the SWS. The SWSL is the lowest concentration, determined by the SWS, of an analyte in a sample that can be quantitatively determined with suitable precision and accuracy. If the reported concentration is greater than the laboratory MDL and less than the SWSL, the analytical result is qualified as estimated, and is flagged with a "*J*" qualifier (italicized *J*-flag) by Altamont per the DENR requirement. A "J" qualifier (non-italicized) is assigned by the laboratory and is used for parameters detected at estimated concentrations greater than the MDL but less than the MRL. Detected concentrations of constituents below the applicable SWSLs are not reported in the text of this report, unless they exceed their applicable North Carolina water quality standard.

Detected concentrations of analytes in groundwater samples were compared to the value specified by 15A NCAC 2L.0202 groundwater quality standards (2L standards). Detected concentrations of analytes in groundwater with no established 2L standards were compared to an updated list of the interim maximum allowable concentrations (IMACs) for Class GA and GSA groundwater (in accordance with 15A NCAC 02L .0202 [c]) or to the Groundwater Protection Standard (GWPS) pursuant to 15A NCAC 13B.1634. Detections of analytes in surface water samples were compared to the standard from the 15A NCAC 2B.0200 surface water quality standards (2B standard).

3.1.1 Groundwater Monitoring Wells

The following statements summarize detections of metals, VOCs, and field parameters in groundwater.

3.1.1.1 Appendix I Metals

Eight metals, barium, chromium, cobalt, copper, nickel, thallium, vanadium, and zinc, were detected in the groundwater samples collected from one or more monitoring wells (Table 3).

Three metals (barium, cobalt, and zinc) were detected at concentrations above their associated SWSLs in one or more of the samples collected from monitoring wells (Table 4).

Two metals (cobalt and vanadium) were detected at concentrations above their respective groundwater quality standards in one or more of the samples collected from monitoring wells (Table 5).

It should be noted that the measured turbidity values for the groundwater samples from all of the monitoring wells ranged from 0.00 (for MW-01, MW-04 and MW-05) to 454.2 (for MW-03) nephelometric turbidity units (NTUs) (Table 3).

3.1.1.2 Appendix I VOCs

No VOCs were detected in groundwater samples at concentrations above their associated SWSLs or applicable groundwater quality standards.

3.1.1.3 Field Parameters

Field parameters were recorded during sampling activities on April 24 and 25, 2012. Measured pH values for some samples collected from monitoring wells were slightly below the 2L standard pH range of 6.5 to 8.5 Standard Units (SU) (Table 3).

3.1.2 Surface Water

The following statements summarize detections of metals, VOCs, and field parameters in surface water.

3.1.2.1 Appendix I Metals

Barium, chromium, cobalt, vanadium, and zinc were detected in the surface water samples collected from either sampling location SW-01 (upstream of the landfill) or sampling location SW-02 (downstream of the landfill). Barium, cobalt, and zinc were present at concentrations above their respective SWSLs (Table 4).

Cobalt was detected in both surface water sample locations and its concentration exceeded its 2B standard.

3.1.2.2 Appendix I VOCs

No VOCs were detected at concentrations that exceeded either their associated SWSLs or 2B standards in either of the surface water samples. Turbidity in both surface water samples was measured to be above the standard for both C-class surface water and surface water classified as Trout.

3.1.3 Leachate

Analytical results for the leachate sample collected from the leachate underground holding tank are discussed below.

3.1.3.1 Appendix I Metals

Barium, chromium, cobalt, copper, nickel, and zinc were detected in the aqueous sample collected from the leachate storage tank (Table 3). Concentrations of barium, cobalt, and zinc were found above their associated SWSLs (Table 4).

3.1.3.2 Appendix I VOCs

No VOCs were detected in the aqueous leachate sample (LP-1) at concentrations exceeding their respective SWSLs.

3.1.3.3 Inorganics

The aqueous leachate sample (LP-1) was also analyzed for biological oxygen demand (BOD), chemical oxygen demand (COD), nitrate, phosphorus, and sulfate. The analytical results for these additional parameters are summarized in Table 3.

4.0 Hydrogeology

The predominant groundwater flow direction within the regolith overlying the bedrock at the operating landfill appears to be west-northwest, toward an unnamed tributary of Walnut Creek. Figure 3 depicts the generalized groundwater flow direction, based on groundwater measurements taken by Altamont on April 24 and 25, 2012. Water-level data are summarized on Table 1.

5.0 Summary

Altamont completed the first semiannual water quality monitoring event of 2012 at the Madison County Operating Solid Waste Landfill on April 24 and 25, 2012.

Tables 3, 4, and 5 of this report, Pace Report of Laboratory Analysis in Appendix B, and the EDD in Appendix C provide detailed analytical results and field data used to interpret groundwater and surface water quality at the operating landfill.

5.1 Future Activities

Altamont will continue to measure field parameters and collect water quality samples from groundwater, surface water and leachate monitoring points associated with the operating landfill. Water quality samples will be submitted to a North Carolina certified laboratory for analysis for Appendix I metals and VOCs on a semiannual basis. The next sampling event is scheduled for October 2012.

6.0 References

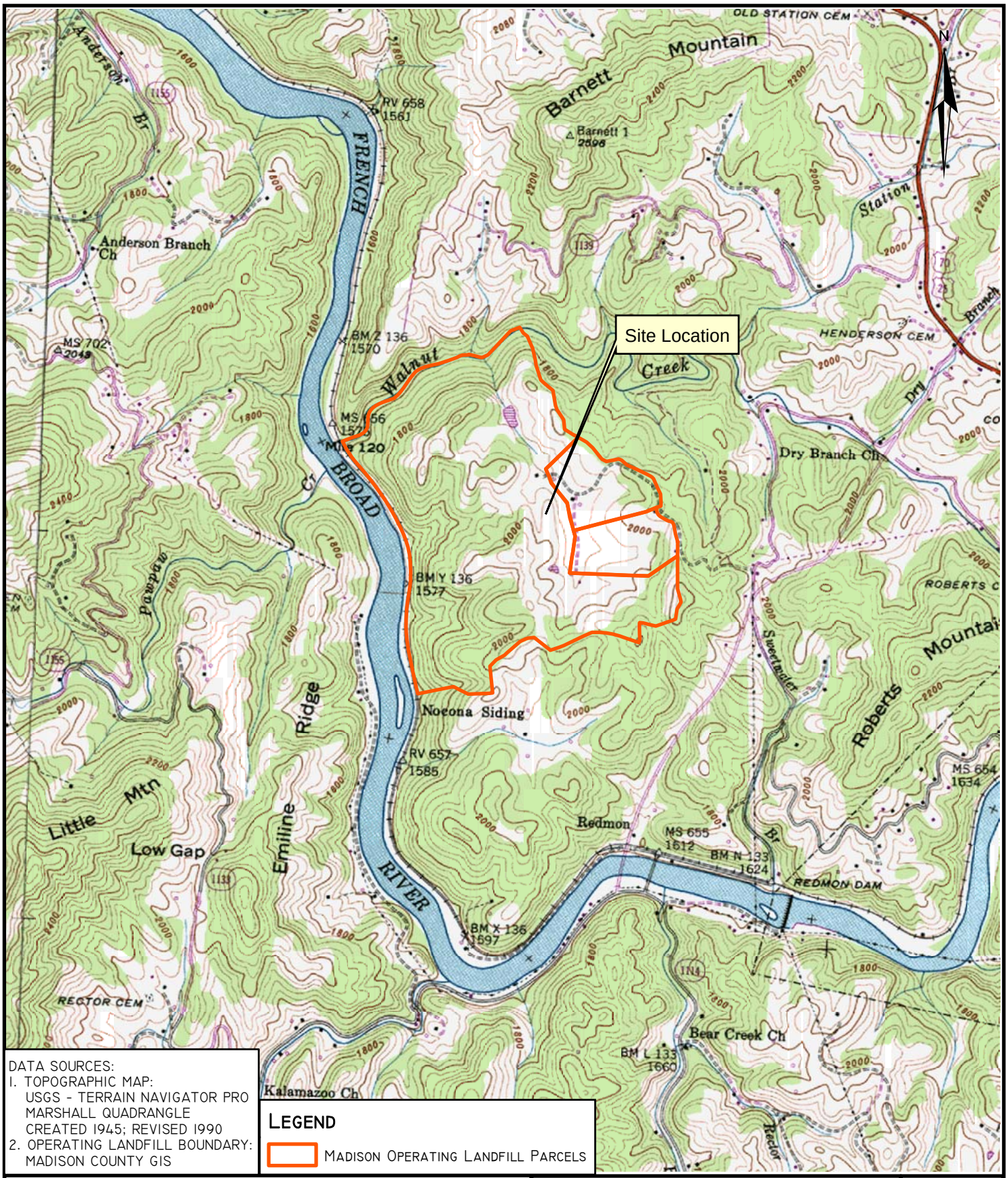
DENR DWM Solid Waste Section (SWS). October 27, 2006. *New Guidelines for Electronic Submittal of Environmental Monitoring Data.*

DENR DWM SWS, February 23, 2007. *Addendum to October 27, 2006, NC SWS Memorandum Regarding New Guidelines for Electronic Submittal of Environmental Data.*

Puls, R.W., and M. J. Barcelona. 1996. *Low-Flow (Minimal Drawdown) Ground-Water Sampling Procedures*, U.S. Environmental Protection Agency, OSWER, EPA/540/S-95/504.

State of North Carolina Department of Environment and Natural Resources, Division of Waste Management, Solid Waste Section. Rev 4-08. *Solid Waste Section Guidelines for Groundwater, Soil, and Surface Water Sampling.*

FIGURES



DATA SOURCES:
1. TOPOGRAPHIC MAP:
USGS - TERRAIN NAVIGATOR PRO
MARSHALL QUADRANGLE
CREATED 1945; REVISED 1990
2. OPERATING LANDFILL BOUNDARY:
MADISON COUNTY GIS

LEGEND

MADISON OPERATING LANDFILL PARCELS

ALTAMONT ENVIRONMENTAL, INC.
ENGINEERING & HYDROGEOLOGY
231 HAYWOOD STREET, ASHEVILLE, NC 28801
TEL.828.281.3350 FAC.828.281.3351
WWW.ALTAMONTENVIRONMENTAL.COM

DRAWN BY: MARTA VANDUSSEN
PROJECT MANAGER: JOEL LENK
CLIENT: MADISON COUNTY
DATE: 06/13/2012

SCALE
0 500 1,000 2,000
FEET

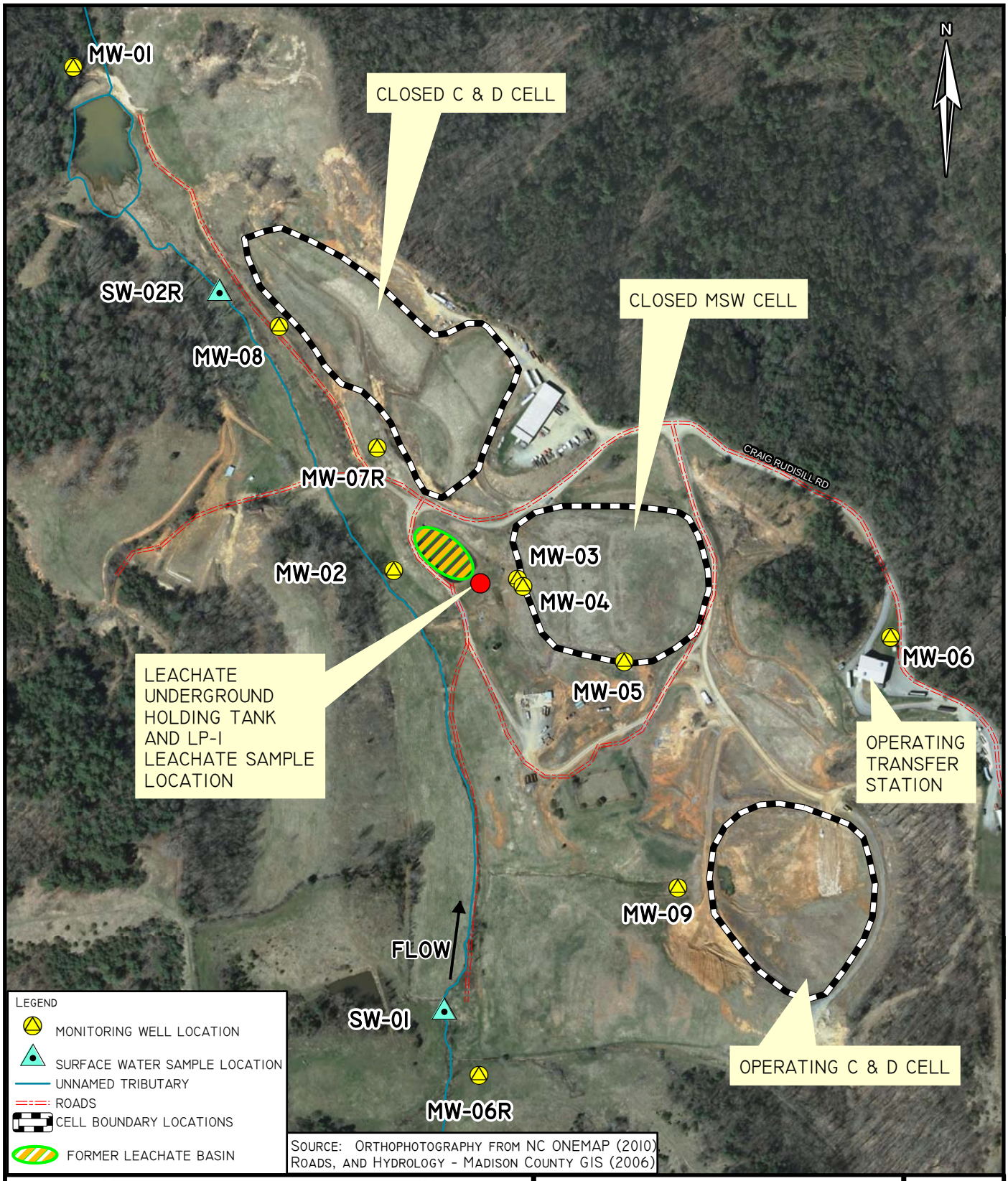
SITE LOCATION MAP

MADISON COUNTY OPERATING
SOLID WASTE FACILITY
PERMIT # 58-03

271 CRAIG RUDISILL ROAD, MARSHALL
NORTH CAROLINA 28753

FIGURE
1

P:\MADISON COUNTY\FIGURES\GIS\GIS USER\MXDS\2012\SPRING\5803FIGURE 1-SITE LOCATION MAP.MXD



SOURCE: ORTHOPHOTOGRAPHY FROM NC ONEMAP (2010), ROADS, AND HYDROLOGY - MADISON COUNTY GIS (2006)

ALTAMONT ENVIRONMENTAL, INC.
ENGINEERING & HYDROGEOLOGY
231 HAYWOOD STREET, ASHEVILLE, NC 28801
TEL.828.281.3350 FAC.828.281.3351
WWW.ALTAMONTENVIRONMENTAL.COM

DRAWN BY: MARTA VANDUSSEN
PROJECT MANAGER: JOEL LENK
CLIENT: MADISON COUNTY
DATE: 06/13/2012

SCALE
0 100 200 400 FEET

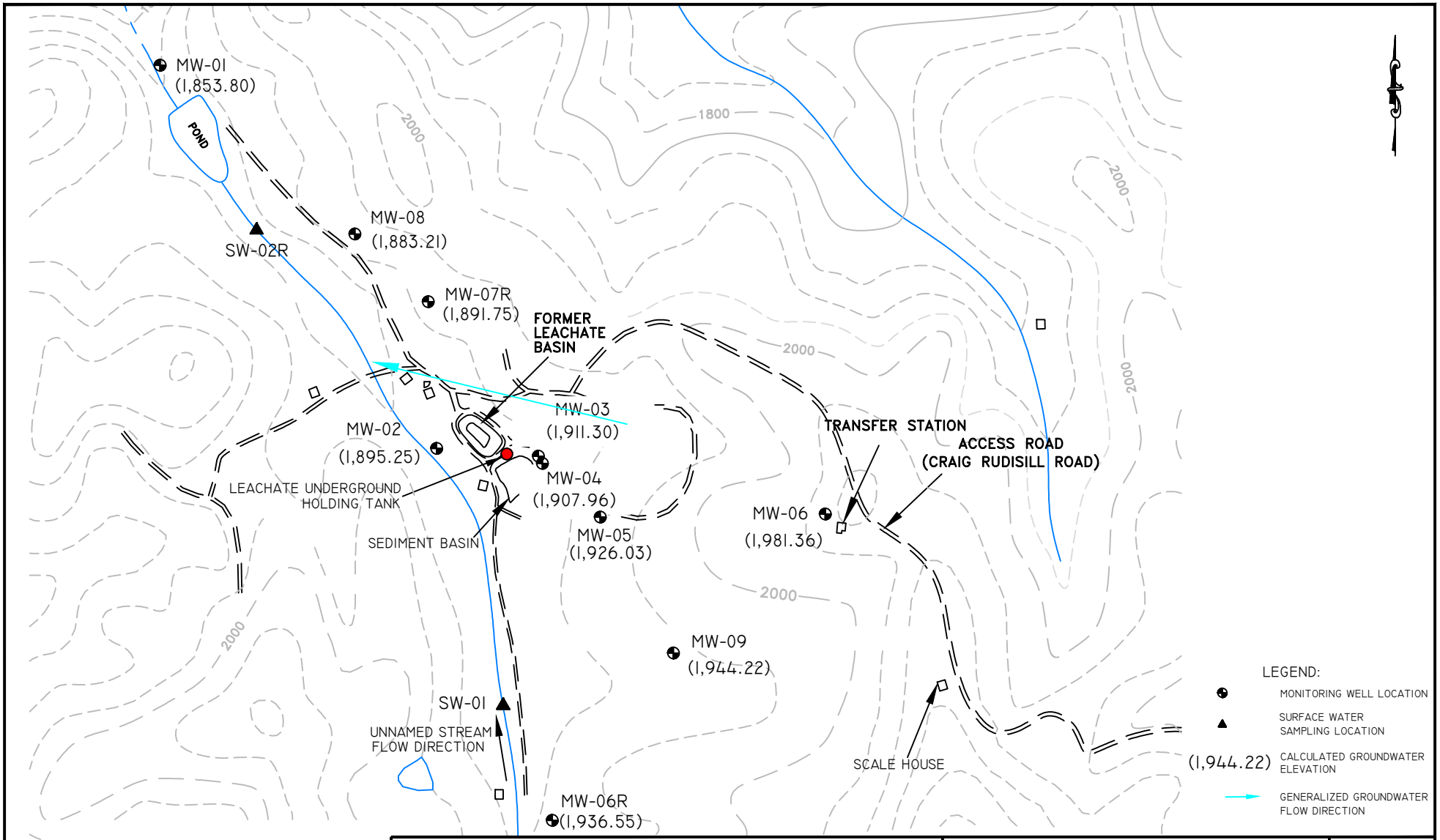
SAMPLE LOCATIONS

MADISON COUNTY OPERATING
SOLID WASTE FACILITY
PERMIT # 58-03

271 CRAIG RUDISILL ROAD, MARSHALL
NORTH CAROLINA 28753

FIGURE
2

P:\MADISON COUNTY\FIGURES\GIS\GIS USER\MXDS\2011\SPRING\5803FIGURE 2-SAMPLE LOCATION MAP.MXD



NOTES:

1. GROUNDWATER FLOW DIRECTION BASED ON GROUNDWATER ELEVATIONS IN WATER TABLE WELLS: MW-02, MW-03, MW-05, MW-08, MW-06R, AND MW-07R.
2. GROUNDWATER ELEVATIONS BASED ON DEPTH TO WATER MEASURED ON APRIL 24 AND 25, 2012.

ALTAMONT ENVIRONMENTAL, INC.
ENGINEERING & HYDROGEOLOGY
231 HAYWOOD STREET, ASHEVILLE, NC 28801
TEL.828.281.3350 FAX.828.281.3351
WWW.ALTAMONTENVIRONMENTAL.COM

DRAWN BY: MARTA VANDUSSEN
PROJECT MANAGER: JOEL LENK
CLIENT: MADISON COUNTY
DATE: 06/13/2012

SCALE (FEET)
250 0 250 500

GENERALIZED GROUNDWATER FLOW DIRECTION

MADISON COUNTY OPERATING SOLID WASTE FACILITY (PERMIT # 58-03)

271 CRAIG RUDISILL ROAD, MARSHALL NORTH CAROLINA 28753

FIGURE 3

FILE PATH: P:\MADISON COUNTY\FIGURES\CAD\5803APR2012FIGURE 3-GROUNDWATER FLOW.DWG

TABLES

Table 1
Well Construction Details and Corresponding Elevations
Madison County Operating Solid Waste Facility, Madison County, North Carolina

Facility Permit	Well ID	TOC Elevation	Ground Elevation	Depth To Water (from TOC)	Groundwater Elevation	Depth to Bedrock	Top of Bedrock Elevation	Screened Interval	Top of Screen Elevation
58-03	MW-01	1,859.04	1,857.04	5.24	1,853.80	7	1,850.0	2 to 17	1,855.04
58-03	MW-02	1,898.94	1,895.94	3.69	1,895.25	6	1,889.9	1 to 16	1,892.94
58-03	MW-03	1,932.96	1,929.46	21.66	1,911.30	NA	NA	15.5 to 25.5	1,913.96
58-03	MW-04	1,935.64	1,932.04	27.68	1,907.96	35.2	1,896.8	70.7 to 80.7	1,861.34
58-03	MW-05	1,972.76	1,969.26	46.73	1,926.03	NA	NA	46.5 to 61.5	1,922.76
58-03	MW-06	2,082.87	2,081.87	101.51	1,981.36	28	2,053.9	80 to 100	2,001.87
58-03	MW-06R	1,942.19	1,942.19	5.64	1,936.55	NA	NA	10 to 25	1,932.19
58-03	MW-07R	1,919.34	1,916.64	27.59	1,891.75	NA	NA	26 to 41	1,890.64
58-03	MW-08	1,899.92	1,896.92	16.71	1,883.21	NA	NA	16 to 26	1,880.92
58-03	MW-09	1,949.43	1,946.43	5.21	1,944.22	NA	NA	12.4 to 22.4	1,934.03

Notes:
1. Elevations are in feet, based on the NAVD 88 datum.
2. "TOC" means top of casing; "NA" means Not Applicable.
3. "Depth to Bedrock" and "Screened Interval" depths are measured in feet below ground surface.
4. For MW-01, MW-02, MW-05, and MW-06, TOC elevations are based on the report, Transition Plan Application (Law Engineering, April 1994). "Depth to Bedrock" and "Screened Interval" data were taken from boring logs completed on September 26, 27, 28, and 29, 1992 by Metro Drill, Inc. and April 12, 1995 by Engineering Tectonics.
5. MW-03 and MW-04 were installed during closure of MSW cell. TOC elevations are from the survey performed on December 14, 2006 by McGill Associates staff (J. Dallas Gordon, PLS). Ground survey data is included on the Closure Plan drawing generated by McGill Associates on January 4, 2007. Adjusted "Depth to Bedrock" and "Screened Interval" elevations were calculated using original data from September 1992 boring logs and new data from the December 14, 2006 survey.
6. For MW-07R and MW-08, TOC elevations were taken from survey data included on boring logs completed by Bunnell-Lammons Engineering, Inc. on July 28, 29, and 30, 2003.
7. For MW-09, TOC elevation was taken from survey data included on boring log completed by Bunnell-Lammons Engineering, Inc. on October 13, 2006.
8. Monitoring of background well MW-06 was terminated in Fall 2008 because the well was dry. MW-06R was installed on September 27, 2008 to replace MW-06. Survey data for MW-06R are based on a survey conducted on April 16, 2009 by Wes Cole Land Surveying, PA.
9. Ground elevations were calculated based on TOC elevations and field measurements.
10. Depth-to-Water measurements were obtained in the field on April 24 and 25, 2012. MW-06 was gauged and recorded if water was present, but not sampled.

Table 2
Summary of Laboratory Analyses Performed on Samples
Madison County Operating Solid Waste Facility, Madison County, North Carolina

Groundwater Samples

Sample Name	Collect Date	Metals	VOCs
		EPA 6010 EPA 6020 EPA 7470	EPA 8260
MW-01	04/24/2012	X	X
MW-02	04/25/2012	X	X
MW-03	04/24/2012	X	X
MW-04	04/24/2012	X	X
MW-05	04/24/2012	X	X
MW-06R	04/25/2012	X	X
MW-07R	04/25/2012	X	X
MW-08	04/24/2012	X	X
MW-09	04/24/2012	X	X

Surface Water Samples

Sample Name	Collect Date	Metals	VOCs
		EPA 6010 EPA 6020 EPA 7470	EPA 8260
SW-01	04/25/2012	X	X
SW-02R	04/24/2012	X	X

Quality Control Sample

Sample Name	Collect Date	VOCs
		EPA 8260
TRIP BLANK	04/25/2012	X

Leachate Sample

Sample Name	Collect Date	Metals	VOCs	Biochemical Oxygen Demand (BOD)	Chemical Oxygen Demand (COD)	Nitrogen/ Nitrate	Total Phosphorus	Sulfate
		EPA 6010 EPA 6020 EPA 7470	EPA 8260	SM 5210B	SM 5220D	EPA 353.2	EPA 365.1	EPA 300.0
LP-1	04/25/2012	X	X	X	X	X	X	X

Notes:
1. Metals analyses include Appendix I metals per 40 CFR Part 258 *"Appendix I Constituents for Detection Monitoring"* and mercury.
2. VOCs = volatile organic compounds.
3. VOCs analyses include Appendix I constituents per 40 CFR Part 258 and tetrahydrofuran.
4. Leachate sample was collected from the leachate underground holding tank.

Table 3
Summary of Detected Compounds
Madison County Operating Solid Waste Facility, Madison County, North Carolina

		Metals								VOCs			Field Parameters	
Lab Certification		40 and 530								12			5445 (pH only)	
Lab Method		EPA 6010 and EPA 6020 (Thallium)								EPA 8260				
Parameter		Barium	Chromium	Cobalt	Copper	Nickel	Thallium	Vanadium	Zinc	Bromomethane	Iodomethane	Tetrahydrofuran	pH	Turbidity
CAS Number		7440-39-3	7440-47-3	7440-48-4	7440-50-8	7440-02-0	7440-28-0	7440-62-2	7440-66-6	74-83-9	74-88-4	109-99-9	SW320	SW330
SWS ID		15	51	53	54	152	194	209	213	136	142	458	320	330
Units		µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	SU	NTU
Sample Name	Collect Date	Result	Result	Result	Result	Result	Result	Result	Result	Result	Result	Result	Result	Result
MW-01	04/24/2012	109	5.0 U	6.8 J	5.0 U	5.0 U	0.05 U	5.0 U	35.6	0.29 U	0.32 U	3.1 U	6.36	0.00
MW-02	04/25/2012	131	5.0 U	6.7 J	5.0 U	5.0 U	0.05 U	5.0 U	72.6	0.29 U	0.32 U	3.1 U	6.44	47.82
MW-03	04/24/2012	258	5.0 U	114	5.0 U	5.0 U	0.062 J	5.0 U	55.2	0.29 U	0.32 U	3.1 U	7.53	454.2
MW-04	04/24/2012	136	5.0 U	5.0 U	5.0 U	5.0 U	0.05 U	5.0 U	10.0 U	0.29 U	0.32 U	3.1 U	7.20	0.00
MW-05	04/24/2012	113	5.0 U	5.0 U	5.0 U	5.0 U	0.05 U	5.0 U	68.3	0.29 U	0.32 U	3.1 U	7.09	0.00
MW-06R	04/25/2012	87.9 J	5.0 U	5.0 U	5.0 U	6.4 J	0.05 U	7.7 J	25.5	0.29 U	0.32 U	3.1 U	6.88	90.58
MW-07R	04/25/2012	126	6.0 J	5.0 U	5.0 U	5.0 U	0.05 U	7.9 J	36.6	0.29 U	0.32 U	3.1 U	6.17	73.13
MW-08	04/24/2012	44.1 J	5.0 U	5.0 U	5.0 U	5.0 U	0.05 U	5.4 J	140	0.29 U	0.32 U	3.1 U	7.28	17.97
MW-09	04/24/2012	171	5.0 U	5.0 U	5.0 U	8.4 J	0.05 U	5.0 U	63.1	0.29 U	0.32 U	3.1 U	7.34	24.29
LP-1	04/25/2012	297	5.1 J	30.0	6.1 J	37.0 J	0.05 U	5.0 U	30.0	1.0 J	0.65 J	3.7 J	8.15	23.13
SW-01	04/25/2012	156	6.6 J	14.4	5.0 U	5.0 U	0.05 U	14.9 J	20.4	0.29 U	0.32 U	3.1 U	7.34	87.98
SW-02R	04/24/2012	93.9 J	5.0 U	11.4	5.0 U	5.0 U	0.05 U	6.5 J	10.0 U	0.29 U	0.32 U	3.1 U	6.75	116.10
TRIP BLANK	04/25/2012	NA	NA	NA	NA	NA	0.05 U	NA	NA	0.29 U	0.32 U	3.1 U	NA	NA
MDL		5.0	5.0	5.0	5.0	5.0	0.05 U	5.0	10.0	0.29	0.32	3.1	NA	NA
MRL		5.0	5.0	5.0	5.0	5.0	0.10 U	5.0	10.0	2.0	5.0	10.0	NA	NA
SWSL		100	10	10	10	50	5.5	25	10	10	10	NE	NE	NE
2L		700	10	NE	1,000	100	NE	NE	1,000	NE	NE	NE	6.5-8.5	NE
IMAC		NE	NE	1	NE	NE	0.2	0.3	NE	10	NE	NE	NE	NE
GWPS		NE	NE	NE	NE	NE	NE	NE	NE	NE	NE	NE	NE	NE
2B		200,000	50	4	7	88	0.47	NE	50	1,500	NE	NE	6.0-9.0	50/25

		Inorganics				
Lab Certification		40				
Lab Method		SM 5210B	SM 5220D	EPA 353.2	EPA 365.1	EPA 300.0
Parameter		BOD	COD	Nitrogen/ Nitrate	Phosphorus	Sulfate
CAS Number		SW316	SW317	SW419	7723-14-0	14808-79-8
SWS ID		316	317	467	412	315
Units		µg/L	µg/L	µg/L	µg/L	µg/L
Sample Name	Collect Date	Result	Result	Result	Result	Result
LP-1	04/25/2012	15,400	170,000	47,400	67	105,000 J
MDL		2,000	25,000	2,000	NE	25,000
MRL		2,000	25,000	2,000	50	25,000
SWSL		NE	NE	NE	NE	250,000

Table 3
Summary of Detected Compounds
Madison County Operating Solid Waste Facility, Madison County, North Carolina

Notes:

1. Only detected constituents are listed on this table. Please refer to Pace Analytical Report of Laboratory Analysis for further details.
2. "Lab Method" is the analytical method used to analyze the constituents.
3. "CAS NUMBER" is a unique number assigned by the Chemical Abstracts Service (CAS) to all identified parameters.
4. "SWS ID" is the Solid Waste Section Identification Number.
5. "Units" are micrograms per liter (µg/L) for analytical results, Standard Units (SU) for pH and nephelometric turbidity units (NTU) for turbidity.
6. "Collect Date" is the date on which the sample was collected in the field.
7. "Result" is analytical data reported by the laboratory or field data collected by Altamont.
8. "MDL" is the method detection limit, which is the minimum concentration of a substance that can be measured and reported with 99% confidence that the analyte concentration is greater than zero.
9. "MRL" is the method reporting limit, which is the minimum concentration of a target analyte that can be accurately determined by the referenced method. MRL equals PQL values in the Pace Analytical Reports.
10. "SWSL" is the Solid Waste Section Limit. This limit (identified by DENR) is the lowest amount of analyte in a sample that can be quantitatively determined with suitable precision and accuracy.
11. "U" is a laboratory data qualifier used for parameters not detected at concentrations above MDL.
12. "J" is a laboratory data qualifier used for parameters detected at estimated concentrations above MDL but below MRL and SWSL.
    An italicized "*J*" qualifier is assigned by Altamont to reflect a detected concentration that is greater than MRL and MDL but less than the SWSL.
13. VOCs mean volatile organic compunds. BOD means biological oxygen demand. COD means chemical oxygen demand.
14. "2L" and "IMAC" (Interim Maximum Allowable Concentration) are groundwater standards from "North Carolina Administrative Code, Title 15A: Department of Environment and Natural Resources, Subchapter 2L - Groundwater Classifications and Standards," DENR (Amended Eff January 1, 2010).
15. "GWPS" is the Groundwater Protection Standard pursuant to "15A NCAC 13B .1634," DENR. Current standards were obtained from http://portal.ncdenr.org/web/sw/envmonitoringlist (last updated June 13, 2011).
16. "2B" indicates surface water standard per "North Carolina Administrative Code, Title 15A: Department of Environment and Natural Resources, Subchapter 2B - Surface Water and Wetland Standards," (last amended on May 1, 2007).
17. "NE" means Not Established. "NA" means Not Applicable. Blank cells indicate that there is no information relevant to the respective row.
18. **Bold** numbers indicate a detection. Grayed cells indicate result in exceedance of the 2L or IMAC or 2B (surface water) standards, or greater than or equal to the GWPS (if no 2L or IMAC exist).

Table 4
Solid Waste Section Limits Exceedances Notification
Madison County Operating Solid Waste Facility, Madison County, North Carolina

FACILITY PERMIT	WELL ID	CAS NUMBER	SWS ID	PARAMETER	RESULT	UNITS	QUALIFIER	METHOD	MDL	MRL	SWSL	COLLECT DATE
58-03	MW-01	7440-39-3	15	Barium	**109**	ug/L		EPA 6010	5.0	5.0	100	04/24/2012
58-03	MW-01	7440-66-6	213	Zinc	**35.6**	ug/L		EPA 6010	10.0	10.0	10	04/24/2012
58-03	MW-02	7440-39-3	15	Barium	**131**	ug/L		EPA 6010	5.0	5.0	100	04/25/2012
58-03	MW-02	7440-66-6	213	Zinc	**72.6**	ug/L		EPA 6010	10.0	10.0	10	04/25/2012
58-03	MW-03	7440-39-3	15	Barium	**258**	ug/L		EPA 6010	5.0	5.0	100	04/24/2012
58-03	MW-03	7440-48-4	53	Cobalt	**114**	ug/L		EPA 6010	5.0	5.0	10	04/24/2012
58-03	MW-03	7440-66-6	213	Zinc	**55.2**	ug/L		EPA 6010	10.0	10.0	10	04/24/2012
58-03	MW-04	7440-39-3	15	Barium	**136**	ug/L		EPA 6010	5.0	5.0	100	04/24/2012
58-03	MW-05	7440-39-3	15	Barium	**113**	ug/L		EPA 6010	5.0	5.0	100	04/24/2012
58-03	MW-05	7440-66-6	213	Zinc	**68.3**	ug/L		EPA 6010	10.0	10.0	10	04/24/2012
58-03	MW-06R	7440-66-6	213	Zinc	**25.5**	ug/L		EPA 6010	10.0	10.0	10	04/25/2012
58-03	MW-07R	7440-39-3	15	Barium	**126**	ug/L		EPA 6010	5.0	5.0	100	04/25/2012
58-03	MW-07R	7440-66-6	213	Zinc	**36.6**	ug/L		EPA 6010	10.0	10.0	10	04/25/2012
58-03	MW-08	7440-66-6	213	Zinc	**140**	ug/L		EPA 6010	10.0	10.0	10	04/24/2012
58-03	MW-09	7440-39-3	15	Barium	**171**	ug/L		EPA 6010	5.0	5.0	100	04/24/2012
58-03	MW-09	7440-66-6	213	Zinc	**63.1**	ug/L		EPA 6010	10.0	10.0	10	04/24/2012
58-03	LP-1	7440-39-3	15	Barium	**297**	ug/L		EPA 6010	5.0	5.0	100	04/25/2012
58-03	LP-1	7440-48-4	53	Cobalt	**30.0**	ug/L		EPA 6010	5.0	5.0	10	04/25/2012
58-03	LP-1	7440-66-6	213	Zinc	**30.0**	ug/L		EPA 6010	10.0	10.0	10	04/25/2012
58-03	SW-01	7440-39-3	15	Barium	**156**	ug/L		EPA 6010	5.0	5.0	100	04/25/2012
58-03	SW-01	7440-48-4	53	Cobalt	**14.4**	ug/L		EPA 6010	5.0	5.0	10	04/25/2012
58-03	SW-01	7440-66-6	213	Zinc	**20.4**	ug/L		EPA 6010	10.0	10.0	10	04/25/2012
58-03	SW-02	7440-48-4	53	Cobalt	**11.4**	ug/L		EPA 6010	5.0	5.0	10	04/24/2012

Table 4
Solid Waste Section Limits Exceedances Notification
Madison County Operating Solid Waste Facility, Madison County, North Carolina

Notes:

1. "CAS NUMBER" is a unique number assigned by the Chemical Abstracts Service (CAS) to all identified parameters.
2. "SWS ID" is the Solid Waste Section Identification Number.
3. "RESULT" is the analytical data reported by the laboratory.
4. "UNITS" are micrograms per liter (µg/L) for analytical results.
5. "QUALIFIER" is a data qualifier or "flag". A blank cell indicates that there is no qualifier associated with the reported result.
6. "METHOD" is the analytical method used to analyze the constituents.
7. "MDL" is the method detection limit, which is the minimum concentration of a substance that can be measured and reported with 99% confidence that the analyte concentration is greater than zero.
8. "MRL" is the method reporting limit, which is the minimum concentration of a target analyte that can be accurately determined by the referenced method.
9. "SWSL" is the Solid Waste Section Limit. This limit (identified by DENR) is the lowest amount of analyte in a sample that can be quantitatively determined with suitable precision and accuracy.
10. "COLLECT DATE" is the date on which the sample was collected in the field.
11. **Bold** numbers indicate a detection. Grayed cells indicate result in exceedance of the 2L or Interim Maximum Allowable Concentration (IMAC) standards or greater than or equal to the Groundwater Protection Standard {GWPS (if no 2L or IMAC exist)} and 2B Standard (for surface water).
12. 2L Standard and IMAC are from "North Carolina Administrative Code, Title 15A: Department of Environment and Natural Resources, Subchapter 2L - Groundwater Classifications and Standards," DENR (Amended Eff January 1, 2010).
13. GWPS is pursuant to "15A NCAC 13B .1634," DENR. Current standards were obtained from http://portal.ncdenr.org/web/sw/envmonitoringlist (last updated June 13, 2011).
14. 2B Standard is per "North Carolina Administrative Code, Title 15A: Department of Environment and Natural Resources, Subchapter 2B - Surface Water and Wetland Standards" (last amended on May 1, 2007).

Table 5
Water Quality Standards Exceedances Notification
Madison County Operating Solid Waste Facility, Madison County, North Carolina

FACILITY PERMIT	WELL ID	CAS NUMBER	SWS ID	PARAMETER	RESULT	UNITS	QUALIFIER	METHOD	MDL	MRL	SWSL	WATER QUALITY STANDARD	COLLECT DATE	CAUSE AND SIGNIFICANCE
GROUNDWATER SAMPLES - 2L STANDARD, IMAC OR GWPS (ug/L)														
58-03	MW-01	7440-48-4	53	Cobalt	**6.8**	ug/L	*J*	EPA 6010	5.0	5.0	10	1	04/24/2012	Possibly naturally occurring. Turbidity of sample at 0.00 NTU.
58-03	MW-01	SW320	320	pH	**6.36**	SU						6.5-8.5	04/24/2012	Consistent with historic readings.
58-03	MW-02	7440-48-4	53	Cobalt	**6.7**	ug/L	*J*	EPA 6010	5.0	5.0	10	1	04/25/2012	Possibly naturally occurring. Turbidity of sample at 47.82 NTU.
58-03	MW-02	SW320	320	pH	**6.44**	SU						6.5-8.5	04/25/2012	Consistent with historic readings.
58-03	MW-03	7440-48-4	53	Cobalt	**114**	ug/L		EPA 6010	5.0	5.0	10	1	04/24/2012	Possibly naturally occurring. Turbidity of sample at 454.2 NTU.
58-03	MW-06R	7440-62-2	209	Vanadium	**7.7**	ug/L	*J*	EPA 6010	5.0	5.0	25	0.3	04/25/2012	Possibly naturally occurring. Turbidity of sample at 90.58 NTU.
58-03	MW-07R	7440-62-2	209	Vanadium	**7.9**	ug/L	*J*	EPA 6010	5.0	5.0	25	0.3	04/25/2012	Possibly naturally occurring. Turbidity of sample at 73.13 NTU.
58-03	MW-07R	SW320	320	pH	**6.17**	SU						6.5-8.5	04/24/2012	Consistent with historic readings.
58-03	MW-08	7440-62-2	209	Vanadium	**5.4**	ug/L	*J*	EPA 6010	5.0	5.0	25	0.3	04/24/2012	Possibly naturally occurring. Turbidity of sample at 17.97 NTU.
58-03	LP-1	7440-48-4	53	Cobalt	**30.0**	ug/L		EPA 6010	5.0	5.0	10	1	04/25/2012	Possibly naturally occurring. Turbidity of sample at 23.13 NTU.
SURFACE WATER SAMPLES - 2B STANDARD OR NATIONAL CRITERIA PER EPA FOR CLASS C WATERS (ug/L)														
58-03	SW-01	7440-48-4	53	Cobalt	**14.4**	ug/L		EPA 6010	5.0	5.0	10	4	04/25/2012	Unknown, possibly naturally occurring or source upstream. Turbidity of sample at 87.98 NTU.
58-03	SW-02	7440-48-4	53	Cobalt	**11.4**	ug/L		EPA 6010	5.0	5.0	10	4	04/24/2012	Possibly naturally occurring. Turbidity of sample at 116.10 NTU.

Notes:

1. "CAS NUMBER" is a unique number assigned by the Chemical Abstracts Service (CAS) to all identified parameters.
2. "SWS ID" is the Solid Waste Section Identification Number.
3. "RESULT" is analytical data reported by the laboratory or field data collected by Altamont.
4. "UNITS" are micrograms per liter (µg/L) for analytical results and Standard Units (SU) for pH.
5. "QUALIFIER" is a data qualifier or "flag". A blank cell indicates that there is no qualifier associated with the reported result.
6. "METHOD" is the analytical method used to analyze the constituents.
7. "MDL" is the method detection limit, which is the minimum concentration of a substance that can be measured and reported with 99% confidence that the analyte concentration is greater than zero.
8. "MRL" is the method reporting limit, which is the minimum concentration of a target analyte that can be accurately determined by the referenced method.
9. "SWSL" is the Solid Waste Section Limit. This limit (identified by DENR) is the lowest amount of analyte in a sample that can be quantitatively determined with suitable precision and accuracy.
10. "WATER QUALITY STANDARD" refers to the 2L Standard, Interim Maximum Allowable Concentration (IMAC), or Groundwater Protection Standard (GWPS) for groundwater.
11. "COLLECT DATE" is the date on which the sample was collected in the field.
12. "NE" means Not Established.
13. "U" is a laboratory data qualifier used for parameters not detected at concentrations above MDL.
14. "J" is a laboratory data qualifier used for parameters detected at estimated concentrations above MDL but below MRL and SWSL.
    An italicized "*J*" qualifier is assigned by Altamont to reflect a detected concentration that is greater than MRL and MDL but less than the SWSL.
15. **Bold** numbers indicate a detection. Grayed cells indicate result in exceedance of the 2B (surface water), 2L, IMAC (groundwater) or greater than or equal to the GWP (if no 2L or IMAC exist).
16. 2L Standard and IMAC are from "North Carolina Administrative Code, Title 15A: Department of Environment and Natural Resources, Subchapter 2L - Groundwater Classifications and Standards," DENR (Amended Eff January 1, 2010).
17. GWPS is pursuant to "15A NCAC 13B .1634," DENR. Current standards were obtained from http://portal.ncdenr.org/web/sw/envmonitoringlist (last updated June 13, 2011).
18. 2B standard per "North Carolina Administrative Code, Title 15A: Department of Environment and Natural Resources, Subchapter 2B - Surface Water and Wetland Standards," (last amended on May 1, 2007).

APPENDICES

APPENDIX A
Sampling Logs and Equipment Documentation and Instrument Calibration Data Sheet(s)

ALTAMONT ENVIRONMENTAL, INC.
ENGINEERING & HYDROGEOLOGY
231 HAYWOOD STREET, ASHEVILLE, NC 28801
TEL.828.281.3350 FAC.828.281.3351
WWW.ALTAMONTENVIRONMENTAL.COM

Low-Flow Sampling Log

PROJECT NAME: Madison Co. LF
PROJECT NUMBER: 2313
LOCATION: Marshall, NC
DATE: 4/24/12
SAMPLING PERSONNEL: P Brooks + A Moore
WEATHER: 50's clear

Well ID: MW-01
Screen Interval: 2 to 17' bgs
Depth to Water: 5.24 toc
Stickup: 2 ft
Depth of Pump Intake: 15.0 toc
Drawdown Set: 6.24 toc

Arrive at Well: 925
Start Time: 932
Sample Time: 1005
Finish Sample Time: 1010
Leave Well: 1018
Well Diameter: 2"

COMMENTS:

Time	DTW (feet)	Temp (°C)	Specific Cond. (µS)	DO (mg/L)	pH (S.U.) *report to 0.1 S.U.*	ORP (mV)	Turbidity (NTU)
935	5.54	11.85	83	7.35	6.17	80.6	41.65
938	6.24	11.68	73	2.10	6.34	100.7	47.73
941	6.24	11.69	66	1.45	6.26	97.8	39.67
944	6.24	11.78	62	1.27	6.24	96.6	29.39
947	6.24	11.80	65	1.18	6.27	97.2	17.37
950	6.24	11.78	66	1.14	6.29	101.0	15.06
953	6.24	11.76	67	1.11	6.30	102.5	1.74
956	6.24	11.73	69	1.00	6.32	102.8	0.97
959	6.24	11.70	72	0.94	6.36	103.3	0.00
1002	6.24	11.65	75	0.94	6.37	103.7	0.00
1005	6.24	11.63	77	0.90	6.36	104.7	0.00

Time between recharge during sample collection: 40 sec @ 3CPM

Sampling Personnel Signature: [signature]
Date: 4/24/12

NOTES:

STABILIZATION
3 successive readings, 3 minutes apart:
within +/- 10% DO and turbidity; +/- 3% Conductivity; +/- 0.1 pH unit; +/- 10 mV for ORP
from *EPA - Low-Flow (Minimal Drawdown) Groundwater Sampling Procedures*, April 1996

bgs = below ground surface
toc = top of casing
°C = degrees Celsius
µS = micro-Siemen
DO = dissolved oxygen
mg/L = milligrams per liter
Samples are analyzed immediately upon collection.

S.U. = standard units
ORP = oxidation reduction potential
mV = millivolt
NTU = nephelometric turbidity units

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Low-Flow Sampling Log

PROJECT NAME: Madison Co. Operating Landfill
PROJECT NUMBER: 2313
LOCATION: Marshall, NC
DATE: 4/25/12
SAMPLING PERSONNEL: P Brooke
WEATHER: 50's cloudy, lt. rain

Well ID: MW-02
Screen Interval: 1 to 16 bgs
Depth to Water: 3.69 toc
Stickup: 3"
Depth of Pump Intake: 10 ft toc
Drawdown Set: 3.99 toc

Arrive at Well: 1040
Start Time: 1052
Sample Time: ~~1111~~ 1114
Finish Sample Time: 1120
Leave Well: 1135
Well Diameter: 2"

COMMENTS:

Time	DTW (feet)	Temp (°C)	Specific Cond. (µS)	DO (mg/L)	pH (S.U.) *report to 0.1 S.U.*	ORP (mV)	Turbidity (NTU)
1053	3.99	12.02	175	7.83	6.73	-80.2	98.18 ←98.18
1056	3.99	12.01	175	3.22	6.57	-73.8	90.28
1059	3.99	12.05	174	1.11	6.45	-76.9	93.51
~~10~~ 1102	3.99	12.08	175	0.92	6.50	-79.0	72.01
1105	3.99	12.11	174	0.89	6.47	-76.4	66.98
1108	3.99	12.15	175	0.82	6.44	-77.9	53.87
1111	3.99	12.18	175	0.77	6.40	-78.7	48.91
~~1114~~ 1114	3.99	12.20	175	0.77	6.44	-82.2	47.82

Time between recharge during sample collection: 30 sec @ 3CPM

Sampling Personnel Signature: [signature] Date: 4/25/12

NOTES:

STABILIZATION
3 successive readings, 3 minutes apart:
within +/- 10% DO and turbidity; +/- 3% Conductivity; +/- 0.1 pH unit; +/- 10 mV for ORP
from *EPA - Low-Flow (Minimal Drawdown) Groundwater Sampling Procedures*, April 1996

bgs = below ground surface
toc = top of casing
°C = degrees Celsius
µS = micro-Siemen
DO = dissolved oxygen
mg/L = milligrams per liter
S.U. = standard units
ORP = oxidation reduction potential
mV = millivolt
NTU = nephelometric turbidity units
Samples are analyzed immediately upon collection.

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Low-Flow Sampling Log

PROJECT NAME: Madison Co. LF GW Sampling
PROJECT NUMBER: 2313
LOCATION: Marshall, NC
DATE: 4/24/12
SAMPLING PERSONNEL: P Brooks / A Moore
WEATHER: 60s cloudy, windy

Well ID: MW-03
Screen Interval: 15.5 to 25.5 bgs
Depth to Water: 21.66 toc
Stickup: ≈ 3.5'
Depth of Pump Intake: 27' toc
Drawdown Set: 22.26 toc

Arrive at Well: 1128
Start Time: 1134
Sample Time: 1205
Finish Sample Time: 1216
Leave Well: 1228
Well Diameter: 2"

COMMENTS: Broken hinge; flow thru cell contained many solids; outlet line looks clear

Time	DTW (feet)	Temp (°C)	Specific Cond. (µS)	DO (mg/L)	pH (S.U.) report to 0.1 S.U.	ORP (mV)	Turbidity (NTU)	
	~~21.96~~							
1135	22.26	13.83	403	6.74	7.10	77.3	884.6	
1138	22.26	14.01	386	3.65	6.95	71.8	1100	(>>>)
1141	22.26	14.02	365	2.44	7.10	24.0	870.3	
1144	22.26	13.90	367	1.90	7.33	-19.6	783.5	
1147	22.26	13.99	377	1.49	7.44	-33.1	~~656.7~~	656.7
1150	22.26	14.00	380	1.41	7.40	-35.3	507.2	
1153	22.26	14.00	387	1.26	7.45	-38.7	415.1	
1156	22.26	14.07	393	1.10	7.48	-41.0	532.3	
1159	22.26	14.11	397	0.92	7.50	-42.1	510.0	
1202	22.26	14.15	401	0.88	7.51	-43.3	486.9	
1205	22.26	14.18	408	0.87	7.53	-44.0	454.2	

Time between recharge during sample collection: 45 sec @ 3CPM

Sampling Personnel Signature: [signature]
Date: 4/24/12

NOTES:

STABILIZATION
3 successive readings, 3 minutes apart:
within +/- 10% DO and turbidity; +/- 3% Conductivity; +/- 0.1 pH unit; +/- 10 mV for ORP
from *EPA - Low-Flow (Minimal Drawdown) Groundwater Sampling Procedures*, April 1996

bgs = below ground surface
toc = top of casing
°C = degrees Celsius
µS = micro-Siemen
DO = dissolved oxygen
mg/L = milligrams per liter
S.U. = standard units
ORP = oxidation reduction potential
mV = millivolt
NTU = nephelometric turbidity units
Samples are analyzed immediately upon collection.

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WWW.ALTAMONTENVIRONMENTAL.COM

Low-Flow Sampling Log

PROJECT NAME: Madison Co. LF GW Sampling
PROJECT NUMBER: 2313
LOCATION: Marshall, NC
DATE: 4/~~23~~24/12
SAMPLING PERSONNEL: P Brooks, A Moore
WEATHER: 60's cloudy, windy

Well ID: MW-04
Screen Interval: 70.7 - 80.7 bgs
Depth to Water: 27.68 toc
Stickup: 3.6 ft
Depth of Pump Intake: 75 ft toc
Drawdown Set: 27.98 toc

Arrive at Well: 1229
Start Time: 1236
Sample Time: 1256
Finish Sample Time: 1330
Leave Well: 1335
Well Diameter: 2"

COMMENTS:

Time	DTW (feet)	Temp (°C)	Specific Cond. (µS)	DO (mg/L)	pH (S.U.) *report to 0.1 S.U.*	ORP (mV)	Turbidity (NTU)
1238 ~~1236~~	27.98	14.39	177	5.49	7.21	134.0	399.3
1241	27.98	14.45	177	4.84	7.27	121.5	2.79
~~1248~~ 1244	27.98	14.44	176	3.61	7.27	104.6	0.00
1247	27.98	14.54	176	3.16	7.25	94.1	0.00
1250	27.98	14.45	176	2.98	7.23	84.6	0.00
1253	27.98	14.42	174	2.89	7.20	77.3	0.00
1256	27.98	14.41	174	2.82	7.20	69.4	0.00

Time between recharge during sample collection: 20 sec @ 3GPM

Sampling Personnel Signature: [signature] Date: 4/24/12

NOTES:

STABILIZATION
3 successive readings, 3 minutes apart:
within +/- 10% DO and turbidity; +/- 3% Conductivity; +/- 0.1 pH unit; +/- 10 mV for ORP
from *EPA - Low-Flow (Minimal Drawdown) Groundwater Sampling Procedures*, April 1996

bgs = below ground surface
toc = top of casing
°C = degrees Celsius
µS = micro-Siemen
DO = dissolved oxygen
mg/L = milligrams per liter
S.U. = standard units
ORP = oxidation reduction potential
mV = millivolt
NTU = nephelometric turbidity units
Samples are analyzed immediately upon collection.

ALTAMONT ENVIRONMENTAL, INC.
ENGINEERING & HYDROGEOLOGY
231 HAYWOOD STREET, ASHEVILLE, NC 28801
TEL.828.281.3350 FAC.828.281.3351
WWW.ALTAMONTENVIRONMENTAL.COM

Low-Flow Sampling Log

PROJECT NAME: Madison Co. Operating Landfill
PROJECT NUMBER: 2313
LOCATION: Marshall, NC
DATE: 4/24/12
SAMPLING PERSONNEL: P Brooks / A Moore
WEATHER: 60's cloudy, windy

Well ID: MW-05
Screen Interval: 46.5 - 61.5 bgs
Depth to Water: 46.73 toc
Stickup: 1 ft.
Depth of Pump Intake: 56 ft. toc
Drawdown Set: 47.73 toc

Arrive at Well: 1437
Start Time: 1444
Sample Time: 1509
Finish Sample Time: 1520
Leave Well: 1538
Well Diameter: 2"

COMMENTS:

Time	DTW (feet)	Temp (°C)	Specific Cond. (µS)	DO (mg/L)	pH (S.U.) *report to 0.1 S.U.*	ORP (mV)	Turbidity (NTU)
1448	47.03	14.18	203	5.31	6.89	50.7	138.7
1451 47.73	~~47.73~~	13.90	207	4.95	7.06	37.4	2.20
1454	47.73	13.88	204	1.90	7.13	26.1	0.00
1457	47.73	14.12	203	1.88	7.10	24.3	0.00
1500	47.73	14.27	203	1.49	7.09	19.8	0.00
1503	47.73	14.32	202	1.41	7.09	18.9	0.00
1506	47.73	14.41	203	1.26	7.08	16.5	0.00
1509	47.73	14.44	202	1.18	7.09	15.2	0.00

Time between recharge during sample collection:

Sampling Personnel Signature: [signature] Date: 4/24/12

NOTES:

STABILIZATION
3 successive readings, 3 minutes apart:
within +/- 10% DO and turbidity; +/- 3% Conductivity; +/- 0.1 pH unit; +/- 10 mV for ORP
from *EPA - Low-Flow (Minimal Drawdown) Groundwater Sampling Procedures*, April 1996

bgs = below ground surface
toc = top of casing
°C = degrees Celsius
µS = micro-Siemen
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mg/L = milligrams per liter
S.U. = standard units
ORP = oxidation reduction potential
mV = millivolt
NTU = nephelometric turbidity units
Samples are analyzed immediately upon collection.

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Low-Flow Sampling Log

PROJECT NAME: Madison Co. Operating Landfill
PROJECT NUMBER: 2313
LOCATION: Marshall, NC
DATE: 4/25/12
SAMPLING PERSONNEL: P Brooks
WEATHER: 50's cloudy, lt. rain

Well ID: MW-6R
Screen Interval: 10 to 25' bgs
Depth to Water: 5.64' toc
Stickup: 0.0 (flush mount)
Depth of Pump Intake: 18.0' toc
Drawdown Set: 5.94' toc

Arrive at Well: 1155
Start Time: 1205
Sample Time: 1231
Finish Sample Time: 1235
Leave Well: 1247
Well Diameter: 2"

COMMENTS: horse interlopers

Time	DTW (feet)	Temp (°C)	Specific Cond. (µS)	DO (mg/L)	pH (S.U.) *report to 0.1 S.U.*	ORP (mV)	Turbidity (NTU)
1207	5.94	13.21	124	6.10	7.02	-84.1	133.8
1210	5.94	12.91	124	5.57	6.96	-86.6	180.0
1213	5.94	12.76	123	5.00	6.87	-83.3	226.0
1216	5.94	12.66	123	4.75	6.87	-82.2	189.5
1219	5.94	12.62	123	4.69	6.87	-80.8	169.2
1222	5.94	12.60	123	4.62	6.87	-80.1	128.2
1225	5.94	12.59	123	4.59	6.86	-79.5	87.68
1228	5.94	12.59	123	4.52	6.86	-78.5	93.27
1231	5.94	12.57	123	4.46	6.88	-78.0	90.58

Time between recharge during sample collection: 2 sec @ 3CPM

Sampling Personnel Signature: [signature] Date: 4/25/12

NOTES:

STABILIZATION
3 successive readings, 3 minutes apart:
within +/- 10% DO and turbidity; +/- 3% Conductivity; +/- 0.1 pH unit; +/- 10 mV for ORP
from *EPA - Low-Flow (Minimal Drawdown) Groundwater Sampling Procedures*, April 1996

bgs = below ground surface
toc = top of casing
°C = degrees Celsius
µS = micro-Siemen
DO = dissolved oxygen
mg/L = milligrams per liter
Samples are analyzed immediately upon collection.

S.U. = standard units
ORP = oxidation reduction potential
mV = millivolt
NTU = nephelometric turbidity units

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WWW.ALTAMONTENVIRONMENTAL.COM

Low-Flow Sampling Log

PROJECT NAME: Madison Co. Operating Land Fill
PROJECT NUMBER: 2313
LOCATION: Marshall, NC
DATE: ~~4/24/12~~ 4/25/12
SAMPLING PERSONNEL: P Brooks
WEATHER: 50's cloudy, rain

Well ID: MW-07R
Screen Interval: 26 to 41' bgs
Depth to Water: 27.59' toc
Stickup: 2.7'
Depth of Pump Intake: 37' toc
Drawdown Set: 28.59 toc

Arrive at Well: 933
Start Time: 942
Sample Time: ~~1005~~ 1011
Finish Sample Time: ~~1028~~ 1024
Leave Well: 1036
Well Diameter: 2"

COMMENTS: Well slow to recharge

Time	DTW (feet)	Temp (°C)	Specific Cond. (µS)	DO (mg/L)	pH (S.U.) *report to 0.1 S.U.*	ORP (mV)	Turbidity (NTU)
944	28.59	13.21	49	9.97	6.19	-17.4	96.68
947	28.59	13.36	51	8.99	6.01	-29.3	114.9
950	28.59	13.32	49	8.81	6.11	-42.5	101.2
953	28.59	13.34	48	8.63	6.16	-47.8	87.78
956	28.59	13.25	48	8.43	6.18	-51.4	93.12
959	28.59	13.33	49	8.54	6.20	-54.8	97.29
1002	28.59	13.22	48	8.44	6.29	-55.3	96.84
1005	28.59	13.13	48	8.30	6.24	-57.4	72.07
1008	28.59	13.07	48	8.38	6.20	-59.1	67.05
1011	28.59	13.08	48	8.33	6.17	-58.4	73.13

Time between recharge during sample collection: 2 minutes @ 3CPM

Sampling Personnel Signature: [signature]
Date: 4/24/12

NOTES:

STABILIZATION
3 successive readings, 3 minutes apart:
within +/- 10% DO and turbidity; +/- 3% Conductivity; +/- 0.1 pH unit; +/- 10 mV for ORP
from *EPA - Low-Flow (Minimal Drawdown) Groundwater Sampling Procedures*, April 1996

bgs = below ground surface
toc = top of casing
°C = degrees Celsius
µS = micro-Siemen
DO = dissolved oxygen
mg/L = milligrams per liter
S.U. = standard units
ORP = oxidation reduction potential
mV = millivolt
NTU = nephelometric turbidity units
Samples are analyzed immediately upon collection.

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Low-Flow Sampling Log

PROJECT NAME: Madison Co. LF GW Sampling
PROJECT NUMBER: 2313
LOCATION: Marshall, NC
DATE: 4/24/12
SAMPLING PERSONNEL: P Brooks + A Moore
WEATHER: 60's cloudy

Well ID: MW-08
Screen Interval: 16 to 26 bgs
Depth to Water: 16.71 toc
Stickup: ~~3.5~~ 3'
Depth of Pump Intake: 25 ft toc
Drawdown Set: 17.71 toc

Arrive at Well: 1028
Start Time: 1033
Sample Time: 1053
Finish Sample Time: 1109
Leave Well: 1125
Well Diameter: 2"

COMMENTS: 1 gallon purged

Time	DTW (feet)	Temp (°C)	Specific Cond. (µS)	DO (mg/L)	pH (S.U.) *report to 0.1 S.U.*	ORP (mV)	Turbidity (NTU)
1035	17.31	12.56	380	5.35	7.26	66.2	5.64
1038	17.31	12.60	385	5.42	7.25	75.3	10.84
1041	17.71	12.68	385	5.36	7.24	78.7	22.97
1044	17.71	12.80	385	5.20	7.23	80.8	26.52
1047	17.71	12.91	387	5.11	7.24	82.9	16.93
1050	17.71	12.92	387	5.09	7.26	79.1	16.96
1053	17.71	13.01	388	5.08	7.28	79.3	17.97

Time between recharge during sample collection: 1 min 10 sec @ 3 GPM

Sampling Personnel Signature: [signature]
Date: 4/24/12

NOTES:

STABILIZATION
3 successive readings, 3 minutes apart:
within +/- 10% DO and turbidity; +/- 3% Conductivity; +/- 0.1 pH unit; +/- 10 mV for ORP
from *EPA - Low-Flow (Minimal Drawdown) Groundwater Sampling Procedures*, April 1996

bgs = below ground surface
toc = top of casing
°C = degrees Celsius
µS = micro-Siemen
DO = dissolved oxygen
mg/L = milligrams per liter
S.U. = standard units
ORP = oxidation reduction potential
mV = millivolt
NTU = nephelometric turbidity units
Samples are analyzed immediately upon collection.

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Low-Flow Sampling Log

PROJECT NAME: Madison Co. LF GW Sampling
PROJECT NUMBER: 2313
LOCATION: Marshall, NC
DATE: 4/24/12
SAMPLING PERSONNEL: PBrooks / A Moore
WEATHER: 60's cloudy, windy

Well ID: MW-09
Screen Interval: 12.4 - 22.4 bgs
Depth to Water: 5.21 toc
Stickup: 3 ft.
Depth of Pump Intake: 20 ft. toc
Drawdown Set: 6.21 toc

Arrive at Well: 1346
Start Time: 1351
Sample Time: 1411
Finish Sample Time: 1420
Leave Well: 1430
Well Diameter: 2"

COMMENTS:

Time	DTW (feet)	Temp (°C)	Specific Cond. (µS)	DO (mg/L)	pH (S.U.) *report to 0.1 S.U.*	ORP (mV)	Turbidity (NTU)
1353	5.51	13.23	142	4.45	7.18	64.5	55.21
1356	6.21	12.96	142	3.01	7.37	62.5	50.83
1359	6.21	12.80	141	2.55	7.42	47.6	38.85
1402	6.21	12.88	141	2.09	7.31	50.6	34.90
1405	6.21	13.17	140	1.88	7.34	52.8	24.13
1408	6.21	13.27	141	1.77	7.37	53.9	25.70
1411	6.21	13.29	141	1.70	7.34	56.5	24.29

Time between recharge during sample collection: 70 sec @ 3 CPM

Sampling Personnel Signature: [signature]
Date: 4/24/12

NOTES:

STABILIZATION
3 successive readings, 3 minutes apart:
within +/- 10% DO and turbidity; +/- 3% Conductivity; +/- 0.1 pH unit; +/- 10 mV for ORP
from *EPA - Low-Flow (Minimal Drawdown) Groundwater Sampling Procedures*, April 1996

bgs = below ground surface
toc = top of casing
°C = degrees Celsius
µS = micro-Siemen
DO = dissolved oxygen
mg/L = milligrams per liter
S.U. = standard units
ORP = oxidation reduction potential
mV = millivolt
NTU = nephelometric turbidity units
Samples are analyzed immediately upon collection.

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Surface Water Sampling Log

PROJECT NAME: Madison Co. Operating LandfAll
DATE: 4/25/12
PROJECT NUMBER: 2313
WEATHER: 60°F cloudy
SAMPLING PERSONNEL: P Brooks

SAMPLE NAME: LP-1

COMMENTS: taken from leachate tank

SAMPLE METHOD: GRAB SYRINGE PUMP BAILER-DISP. OTHER: w/ bailer

TIME	TEMP (°C)	SPECIFIC COND. (µS)	DISSOLVED OXYGEN (mg/L)	pH (S.U.) *report to 0.1 S.U.*	OXIDATION REDUCTION POTENTIAL (mV)	TURBIDITY (NTU)	COMMENTS
1310	14.16	3620	4.21	8.15	-144.1	23.13	

SAMPLING CONTAINER	NUMBER OF CONTAINERS	REQUESTED ANALYSIS
500 mL PLASTIC		
250 mL PLASTIC		
125 mL PLASTIC		
40 mL GLASS		
1 L GLASS		
OTHER		

VEGETATION: n/c ACCESS: n/c

Sampling Personnel Signature: [signature] Date: 4/25/12

Notes: °C = degrees Celsius
µS = micro-Siemen per cubic centimeter
mg/L = milligrams per liter
S.U. = standard units
mV = millivolt
NTU = nephelometric turbidity units
Samples are analyzed immediately upon collection.

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Surface Water Sampling Log

PROJECT NAME: Madison Co. Operating Landfill
DATE: 4/25/12
PROJECT NUMBER: 2313
WEATHER: 60s cloudy
SAMPLING PERSONNEL: P Brooks

SAMPLE NAME: SW-01

COMMENTS: taken on other side of stream from MW-06R as indicated on map

SAMPLE METHOD: GRAB SYRINGE PUMP BAILER-DISP. OTHER:

TIME	TEMP (°C)	SPECIFIC COND. (µS)	DISSOLVED OXYGEN (mg/L)	pH (S.U.) *report to 0.1 S.U.*	OXIDATION REDUCTION POTENTIAL (mV)	TURBIDITY (NTU)	COMMENTS
1250	15.61	97	4.56	7.34	-88.2	81.98	

SAMPLING CONTAINER	NUMBER OF CONTAINERS	REQUESTED ANALYSIS
500 mL PLASTIC		
250 mL PLASTIC	1	Metals by 6010; Hg by 7470
125 mL PLASTIC		
40 mL GLASS	3	VOCs
1 L GLASS		
OTHER		

VEGETATION: ok ACCESS: ok

Sampling Personnel Signature: Date: 4/25/12

Notes: °C = degrees Celsius
mS = micro-Siemen per cubic centimeter
mg/L = milligrams per liter
S.U. = standard units
mV = millivolt
NTU = nephelometric turbidity units
Samples are analyzed immediately upon collection.

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Surface Water Sampling Log

PROJECT NAME: Madison Co. Operating Landfill
DATE: 4/24/12
PROJECT NUMBER: 2313
WEATHER: 60s cloudy, windy
SAMPLING PERSONNEL: P Brooks / A Moore

SAMPLE NAME: SW-2R

COMMENTS:

SAMPLE METHOD: (GRAB) SYRINGE PUMP BAILER-DISP. OTHER:

TIME	TEMP (°C)	SPECIFIC COND. (µS)	DISSOLVED OXYGEN (mg/L)	pH (S.U.) *report to 0.1 S.U.*	OXIDATION REDUCTION POTENTIAL (mV)	TURBIDITY (NTU)	COMMENTS
15:50	12.22	161	6.13	6.75	-49.1	116.1	oily sheen on top orange cloudy material suspended

SAMPLING CONTAINER	NUMBER OF CONTAINERS	REQUESTED ANALYSIS
500 mL PLASTIC		
250 mL PLASTIC	1	~~App I~~ Metals by 6010; Hg by 7470
125 mL PLASTIC		
40 mL GLASS	3	VOCs
1 L GLASS		
OTHER		

VEGETATION: ok ACCESS: ok

Sampling Personnel Signature: [signature] Date: 4/24/12

Notes: °C = degrees Celsius
mS = micro-Siemen per cubic centimeter
mg/L = milligrams per liter
S.U. = standard units
mV = millivolt
NTU = nephelometric turbidity units
Samples are analyzed immediately upon collection.

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Equipment Documentation & Instrument Calibration Data Sheet

Project Name: Madison Co. Operating Landfill GW
Project Number: 2313
Project Location: Marshall, NC

Calibration Documentation
Person Conducting Calibration: P. Brooks
Date of Calibration: 4/25/12
Date of Field Measurements: 4/25/12

Equipment Documentation

Equipment or meters used to take measurements (e.g. water level meters, survey equipment, etc.):

Equipment Type	Serial Number	Brand	Date of Use
150-ft Water Level	26154	Solinist	
150-ft Water Level	22754	Solinist	
150-ft Water Level	150	Testwell	
150-ft Drawdown	MP30-1527	QED	4/25/12
Other			

Micro TPW Turbidity Meter

Calibration Standards Exp Date	Instrument Serial #	Instrument Reading		
		0.02 NTU	10.0 NTU	1000 NTU
8/13	200601045	Initial: 0.00	Initial: 2.08	Initial: 1100
		Cal: 0.02	Cal: 10.0	Cal: 1000
		Time: 8:27	Time: 826	Time: 824

YSI 556 Multiparameter Meter

Instrument Serial Number	07D100979						
Instrument Readings							Calibration Expiration Date
Dissolved Oxygen	Initial: 6.57	Cal: 8.62	mmHg: 702.6	Time: 822			NA
QC*	AM Time:	Meas:	Mid Day Time:	Check:	PM Time:	Check:	NA
pH 7 S.U. *report to 0.1 S.U.*	Initial: 6.79	pHmV:	Cal: 6.99	pHmV:	Time: 801		3/13
pH 4 S.U. *report to 0.1 S.U.*	Initial: 4.27	pHmV:	Cal: 4.01	pHmV:	Time: 803		3/13
pH 10 S.U. *report to 0.1 S.U.*	Initial: 9.49	pHmV:	Cal: 10.02	pHmV:	Time: 808		11/12
QC* pH 7 S.U. *report to 0.1 S.U.*	AM Time: 825	Meas: 7.09	Mid Day Time:	Check:	PM Time:	Check:	
Spec. Cond. 1413/447/84/23 mS**	Initial: 1269	Cal: 1413	Time: 757				7/12
QC* 84 mS	AM Time:	Meas:	Mid Day Time:	Check:	PM Time:	Check:	
ORP 200 mV	Initial:	Cal:	Time:	calib 4/24/12			

Comments:
Signature: [signature] Date: 4/25/12

Notes:
1. Electronic equipment calibrated according to the manufacturer's operation manual.
2. Specific Conductivity should be calibrated according to values representative of historic range.
3. Order of Calibration is as follows : Specific Conductivity, pH 7, pH 4, pH 10, ORP, QC checks.
4. QC Acceptable Ranges: pH +/- 0.1 S.U. and Specific Conductivity 10% of the true value. If readings are out of these ranges, meter needs to be recalibrated.
5. * Indicates that a QC check must be performed in the morning, afternoon, and the end of the day, or every four hours.
6. ** Indicates to choose a Specific Conductivity buffer of 447, 84, or 23 mS which is closest to historical readings from the project location.

APPENDIX B
Report of Laboratory Analysis and Chain-of-Custody Documentation

Pace Analytical Services, Inc.
205 East Meadow Road - Suite A
Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

May 15, 2012

Mr. Joel Lenk
Altamont Environmental
321 Haywood Street
Asheville, NC 28801

RE: Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Dear Mr. Lenk:
Enclosed are the analytical results for sample(s) received by the laboratory on April 25, 2012. The results relate only to the samples included in this report. Results reported herein conform to the most current TNI standards and the laboratory's Quality Assurance Manual, where applicable, unless otherwise noted in the body of the report.

Analyses were performed at the Pace Analytical Services location indicated on the sample analyte page for analysis unless otherwise footnoted.

If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Lorri Patton

Lorri Patton

lorri.patton@pacelabs.com
Project Manager

Enclosures

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205 East Meadow Road - Suite A
Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
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(704)875-9092

CERTIFICATIONS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Minnesota Certification IDs
1700 Elm Street SE Suite 200, Minneapolis, MN 55414
A2LA Certification #: 2926.01
Alaska Certification #: UST-078
Alaska Certification #MN00064
Arizona Certification #: AZ-0014
Arkansas Certification #: 88-0680
California Certification #: 01155CA
EPA Region 8 Certification #: Pace
Florida/NELAP Certification #: E87605
Georgia Certification #: 959
Idaho Certification #: MN00064
Illinois Certification #: 200011
Iowa Certification #: 368
Kansas Certification #: E-10167
Louisiana Certification #: 03086
Louisiana Certification #: LA080009
Maine Certification #: 2007029
Maryland Certification #: 322
Michigan DEQ Certification #: 9909
Minnesota Certification #: 027-053-137
Mississippi Certification #: Pace
Montana Certification #: MT CERT0092
Nebraska Certification #: Pace
Nevada Certification #: MN_00064
New Jersey Certification #: MN-002
New Mexico Certification #: Pace
New York Certification #: 11647
North Carolina Certification #: 530
North Dakota Certification #: R-036
North Dakota Certification #: R-036A
Ohio VAP Certification #: CL101
Oklahoma Certification #: D9921
Oklahoma Certification #: 9507
Oregon Certification #: MN200001
Pennsylvania Certification #: 68-00563
Puerto Rico Certification
Tennessee Certification #: 02818
Texas Certification #: T104704192
Washington Certification #: C754
Wisconsin Certification #: 999407970

Charlotte Certification IDs
9800 Kincey Ave. Ste 100, Huntersville, NC 28078
North Carolina Drinking Water Certification #: 37706
North Carolina Field Services Certification #: 5342
North Carolina Wastewater Certification #: 12
South Carolina Certification #: 99006001
South Carolina Drinking Water Cert. #: 99006003
Virginia Drinking Water Certification #: 00213
Connecticut Certification #: PH-0104
Florida/NELAP Certification #: E87627
Kentucky UST Certification #: 84
Louisiana DHH Drinking Water # LA 100031
West Virginia Certification #: 357
Virginia/VELAP Certification #: 460144

Asheville Certification IDs
2225 Riverside Dr., Asheville, NC 28804
Florida/NELAP Certification #: E87648
Massachusetts Certification #: M-NC030
North Carolina Drinking Water Certification #: 37712
North Carolina Wastewater Certification #: 40
South Carolina Certification #: 99030001
Virginia Certification #: 00072
West Virginia Certification #: 356
Virgina/VELAP Certification #: 460147

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Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

SAMPLE SUMMARY

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Lab ID	Sample ID	Matrix	Date Collected	Date Received
92117181001	**MW-01**	Water	04/24/12 10:05	04/25/12 14:42
92117181002	**MW-02**	Water	04/25/12 11:20	04/25/12 14:42
92117181003	**MW-03**	Water	04/24/12 12:05	04/25/12 14:42
92117181004	**MW-04**	Water	04/24/12 12:56	04/25/12 14:42
92117181005	**MW-05**	Water	04/24/12 15:09	04/25/12 14:42
92117181006	**MW-06 R**	Water	04/25/12 12:31	04/25/12 14:42
92117181007	**MW-07 R**	Water	04/25/12 10:11	04/25/12 14:42
92117181008	**SW-01**	Water	04/25/12 12:50	04/25/12 14:42
92117181009	**SW-02**	Water	04/24/12 15:50	04/25/12 14:42
92117181010	**LP-1**	Water	04/25/12 13:10	04/25/12 14:42
92117181011	**MW-08**	Water	04/24/12 10:53	04/25/12 14:42
92117181012	**MW-09**	Water	04/24/12 14:11	04/25/12 14:42
92117181013	**TRIP BLANK**	Water	04/25/12 00:00	04/25/12 14:42

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Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

SAMPLE ANALYTE COUNT

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Lab ID	Sample ID	Method	Analysts	Analytes Reported	Laboratory
92117181001	**MW-01**	EPA 6010	JDA	14	PASI-A
		EPA 6020	RJS	1	PASI-M
		EPA 7470	SHB	1	PASI-A
		EPA 8260	MCK	52	PASI-C
92117181002	**MW-02**	EPA 6010	JDA	14	PASI-A
		EPA 6020	RJS	1	PASI-M
		EPA 7470	SHB	1	PASI-A
		EPA 8260	MCK	52	PASI-C
92117181003	**MW-03**	EPA 6010	JDA	14	PASI-A
		EPA 6020	RJS	1	PASI-M
		EPA 7470	SHB	1	PASI-A
		EPA 8260	MCK	52	PASI-C
92117181004	**MW-04**	EPA 6010	JDA	14	PASI-A
		EPA 6020	RJS	1	PASI-M
		EPA 7470	SHB	1	PASI-A
		EPA 8260	MCK	52	PASI-C
92117181005	**MW-05**	EPA 6010	JDA	14	PASI-A
		EPA 6020	RJS	1	PASI-M
		EPA 7470	SHB	1	PASI-A
		EPA 8260	MCK	52	PASI-C
92117181006	**MW-06 R**	EPA 6010	JDA	14	PASI-A
		EPA 6020	RJS	1	PASI-M
		EPA 7470	SHB	1	PASI-A
		EPA 8260	MCK	52	PASI-C
92117181007	**MW-07 R**	EPA 6010	JDA	14	PASI-A
		EPA 6020	RJS	1	PASI-M
		EPA 7470	SHB	1	PASI-A
		EPA 8260	MCK	52	PASI-C
92117181008	**SW-01**	EPA 6010	JDA	14	PASI-A
		EPA 6020	RJS	1	PASI-M
		EPA 7470	SHB	1	PASI-A
		EPA 8260	MCK	52	PASI-C
92117181009	**SW-02**	EPA 6010	JDA	14	PASI-A
		EPA 6020	RJS	1	PASI-M
		EPA 7470	SHB	1	PASI-A
		EPA 8260	MCK	52	PASI-C
92117181010	**LP-1**	EPA 6010	JDA	14	PASI-A

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Eden, NC 27288
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2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

SAMPLE ANALYTE COUNT

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Lab ID	Sample ID	Method	Analysts	Analytes Reported	Laboratory
		EPA 6020	RJS	1	PASI-M
		EPA 7470	SHB	1	PASI-A
		EPA 8260	MCK	52	PASI-C
		SM 5210B	LMD	1	PASI-A
		EPA 300.0	SAJ	1	PASI-A
		EPA 353.2	DMN	1	PASI-A
		EPA 365.1	JDA	1	PASI-A
		SM 5220D	DMN	1	PASI-A
92117181011	**MW-08**	EPA 6010	JDA	14	PASI-A
		EPA 6020	RJS	1	PASI-M
		EPA 7470	SHB	1	PASI-A
		EPA 8260	MCK	52	PASI-C
92117181012	**MW-09**	EPA 6010	JDA	14	PASI-A
		EPA 6020	RJS	1	PASI-M
		EPA 7470	SHB	1	PASI-A
		EPA 8260	MCK	52	PASI-C
92117181013	**TRIP BLANK**	EPA 8260	MCK	52	PASI-C

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9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-01 **Lab ID: 92117181001** Collected: 04/24/12 10:05 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:13	7440-36-0	
Arsenic	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:13	7440-38-2	
Barium	**109**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:13	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:13	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:13	7440-43-9	
Chromium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:13	7440-47-3	
Cobalt	**6.8**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:13	7440-48-4	
Copper	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:13	7440-50-8	
Lead	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:13	7439-92-1	
Nickel	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:13	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:13	7782-49-2	
Silver	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:13	7440-22-4	
Vanadium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:13	7440-62-2	
Zinc	**35.6**	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:13	7440-66-6	
6020 MET ICPMS	Analytical Method: EPA 6020								
Thallium	ND	ug/L	0.10	0.050	1	05/02/12 12:13	05/11/12 15:16	7440-28-0	M1
7470 Mercury	Analytical Method: EPA 7470 Preparation Method: EPA 7470								
Mercury	ND	ug/L	0.20	0.10	1	05/02/12 09:30	05/03/12 10:54	7439-97-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 19:04	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 19:04	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 19:04	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 19:04	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 19:04	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 19:04	75-25-2	
Bromomethane	ND	ug/L	2.0	0.29	1		05/03/12 19:04	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 19:04	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 19:04	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 19:04	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 19:04	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 19:04	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 19:04	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 19:04	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 19:04	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 19:04	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 19:04	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 19:04	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 19:04	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 19:04	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 19:04	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 19:04	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 19:04	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 19:04	75-35-4	

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Eden, NC 27288
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Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-01 **Lab ID: 92117181001** Collected: 04/24/12 10:05 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 19:04	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 19:04	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 19:04	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 19:04	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 19:04	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 19:04	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 19:04	591-78-6	
Iodomethane	ND	ug/L	5.0	0.32	1		05/03/12 19:04	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 19:04	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 19:04	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 19:04	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 19:04	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 19:04	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 19:04	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		05/03/12 19:04	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 19:04	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 19:04	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 19:04	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 19:04	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 19:04	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 19:04	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 19:04	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 19:04	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 19:04	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	103	%	70-130		1		05/03/12 19:04	460-00-4	
Dibromofluoromethane (S)	101	%	70-130		1		05/03/12 19:04	1868-53-7	
1,2-Dichloroethane-d4 (S)	104	%	70-130		1		05/03/12 19:04	17060-07-0	
Toluene-d8 (S)	98	%	70-130		1		05/03/12 19:04	2037-26-5	

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Eden, NC 27288
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Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-02 **Lab ID: 92117181002** Collected: 04/25/12 11:20 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:20	7440-36-0	
Arsenic	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:20	7440-38-2	
Barium	**131**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:20	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:20	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:20	7440-43-9	
Chromium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:20	7440-47-3	
Cobalt	**6.7**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:20	7440-48-4	
Copper	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:20	7440-50-8	
Lead	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:20	7439-92-1	
Nickel	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:20	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:20	7782-49-2	
Silver	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:20	7440-22-4	
Vanadium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:20	7440-62-2	
Zinc	**72.6**	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:20	7440-66-6	
6020 MET ICPMS	Analytical Method: EPA 6020								
Thallium	ND	ug/L	0.10	0.050	1	05/02/12 12:13	05/11/12 14:57	7440-28-0	
7470 Mercury	Analytical Method: EPA 7470 Preparation Method: EPA 7470								
Mercury	ND	ug/L	0.20	0.10	1	05/02/12 09:30	05/03/12 10:57	7439-97-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 19:20	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 19:20	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 19:20	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 19:20	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 19:20	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 19:20	75-25-2	
Bromomethane	ND	ug/L	2.0	0.29	1		05/03/12 19:20	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 19:20	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 19:20	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 19:20	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 19:20	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 19:20	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 19:20	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 19:20	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 19:20	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 19:20	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 19:20	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 19:20	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 19:20	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 19:20	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 19:20	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 19:20	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 19:20	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 19:20	75-35-4	

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Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-02 **Lab ID: 92117181002** Collected: 04/25/12 11:20 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 19:20	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 19:20	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 19:20	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 19:20	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 19:20	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 19:20	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 19:20	591-78-6	
Iodomethane	ND	ug/L	5.0	0.32	1		05/03/12 19:20	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 19:20	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 19:20	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 19:20	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 19:20	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 19:20	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 19:20	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		05/03/12 19:20	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 19:20	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 19:20	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 19:20	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 19:20	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 19:20	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 19:20	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 19:20	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 19:20	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 19:20	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	105	%	70-130		1		05/03/12 19:20	460-00-4	
Dibromofluoromethane (S)	100	%	70-130		1		05/03/12 19:20	1868-53-7	
1,2-Dichloroethane-d4 (S)	104	%	70-130		1		05/03/12 19:20	17060-07-0	
Toluene-d8 (S)	98	%	70-130		1		05/03/12 19:20	2037-26-5	

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205 East Meadow Road - Suite A
Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-03 **Lab ID: 92117181003** Collected: 04/24/12 12:05 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:26	7440-36-0	
Arsenic	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:26	7440-38-2	
Barium	**258**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:26	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:26	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:26	7440-43-9	
Chromium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:26	7440-47-3	
Cobalt	**114**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:26	7440-48-4	
Copper	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:26	7440-50-8	
Lead	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:26	7439-92-1	
Nickel	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:26	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:26	7782-49-2	
Silver	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:26	7440-22-4	
Vanadium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:26	7440-62-2	
Zinc	**55.2**	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:26	7440-66-6	
6020 MET ICPMS	Analytical Method: EPA 6020								
Thallium	**0.062J**	ug/L	0.10	0.050	1	05/02/12 12:13	05/11/12 15:02	7440-28-0	
7470 Mercury	Analytical Method: EPA 7470 Preparation Method: EPA 7470								
Mercury	ND	ug/L	0.20	0.10	1	05/02/12 09:30	05/03/12 11:00	7439-97-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 19:37	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 19:37	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 19:37	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 19:37	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 19:37	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 19:37	75-25-2	
Bromomethane	ND	ug/L	2.0	0.29	1		05/03/12 19:37	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 19:37	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 19:37	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 19:37	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 19:37	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 19:37	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 19:37	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 19:37	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 19:37	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 19:37	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 19:37	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 19:37	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 19:37	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 19:37	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 19:37	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 19:37	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 19:37	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 19:37	75-35-4	

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205 East Meadow Road - Suite A
Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-03 **Lab ID: 92117181003** Collected: 04/24/12 12:05 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 19:37	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 19:37	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 19:37	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 19:37	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 19:37	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 19:37	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 19:37	591-78-6	
Iodomethane	ND	ug/L	5.0	0.32	1		05/03/12 19:37	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 19:37	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 19:37	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 19:37	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 19:37	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 19:37	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 19:37	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		05/03/12 19:37	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 19:37	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 19:37	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 19:37	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 19:37	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 19:37	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 19:37	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 19:37	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 19:37	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 19:37	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	101	%	70-130		1		05/03/12 19:37	460-00-4	
Dibromofluoromethane (S)	102	%	70-130		1		05/03/12 19:37	1868-53-7	
1,2-Dichloroethane-d4 (S)	104	%	70-130		1		05/03/12 19:37	17060-07-0	
Toluene-d8 (S)	99	%	70-130		1		05/03/12 19:37	2037-26-5	

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Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-04 **Lab ID: 92117181004** Collected: 04/24/12 12:56 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:30	7440-36-0	
Arsenic	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:30	7440-38-2	
Barium	**136**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:30	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:30	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:30	7440-43-9	
Chromium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:30	7440-47-3	
Cobalt	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:30	7440-48-4	
Copper	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:30	7440-50-8	
Lead	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:30	7439-92-1	
Nickel	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:30	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:30	7782-49-2	
Silver	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:30	7440-22-4	
Vanadium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:30	7440-62-2	
Zinc	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:30	7440-66-6	
6020 MET ICPMS	Analytical Method: EPA 6020								
Thallium	ND	ug/L	0.10	0.050	1	05/02/12 12:13	05/11/12 15:07	7440-28-0	
7470 Mercury	Analytical Method: EPA 7470 Preparation Method: EPA 7470								
Mercury	ND	ug/L	0.20	0.10	1	05/02/12 09:30	05/03/12 11:02	7439-97-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 19:53	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 19:53	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 19:53	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 19:53	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 19:53	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 19:53	75-25-2	
Bromomethane	ND	ug/L	2.0	0.29	1		05/03/12 19:53	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 19:53	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 19:53	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 19:53	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 19:53	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 19:53	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 19:53	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 19:53	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 19:53	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 19:53	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 19:53	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 19:53	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 19:53	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 19:53	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 19:53	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 19:53	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 19:53	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 19:53	75-35-4	

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Eden, NC 27288
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Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-04 **Lab ID: 92117181004** Collected: 04/24/12 12:56 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 19:53	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 19:53	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 19:53	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 19:53	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 19:53	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 19:53	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 19:53	591-78-6	
Iodomethane	ND	ug/L	5.0	0.32	1		05/03/12 19:53	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 19:53	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 19:53	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 19:53	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 19:53	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 19:53	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 19:53	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		05/03/12 19:53	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 19:53	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 19:53	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 19:53	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 19:53	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 19:53	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 19:53	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 19:53	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 19:53	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 19:53	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	102	%	70-130		1		05/03/12 19:53	460-00-4	
Dibromofluoromethane (S)	103	%	70-130		1		05/03/12 19:53	1868-53-7	
1,2-Dichloroethane-d4 (S)	103	%	70-130		1		05/03/12 19:53	17060-07-0	
Toluene-d8 (S)	100	%	70-130		1		05/03/12 19:53	2037-26-5	

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Huntersville, NC 28078
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ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-05 **Lab ID: 92117181005** Collected: 04/24/12 15:09 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:34	7440-36-0	
Arsenic	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:34	7440-38-2	
Barium	**113**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:34	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:34	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:34	7440-43-9	
Chromium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:34	7440-47-3	
Cobalt	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:34	7440-48-4	
Copper	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:34	7440-50-8	
Lead	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:34	7439-92-1	
Nickel	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:34	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:34	7782-49-2	
Silver	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:34	7440-22-4	
Vanadium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:34	7440-62-2	
Zinc	**68.3**	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:34	7440-66-6	
6020 MET ICPMS	Analytical Method: EPA 6020								
Thallium	ND	ug/L	0.10	0.050	1	05/02/12 12:13	05/11/12 15:11	7440-28-0	
7470 Mercury	Analytical Method: EPA 7470 Preparation Method: EPA 7470								
Mercury	ND	ug/L	0.20	0.10	1	05/02/12 09:30	05/03/12 11:05	7439-97-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 20:10	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 20:10	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 20:10	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 20:10	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 20:10	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 20:10	75-25-2	
Bromomethane	ND	ug/L	2.0	0.29	1		05/03/12 20:10	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 20:10	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 20:10	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 20:10	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 20:10	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 20:10	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 20:10	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 20:10	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 20:10	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 20:10	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 20:10	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 20:10	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 20:10	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 20:10	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 20:10	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 20:10	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 20:10	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 20:10	75-35-4	

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205 East Meadow Road - Suite A
Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-05 **Lab ID: 92117181005** Collected: 04/24/12 15:09 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 20:10	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 20:10	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 20:10	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 20:10	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 20:10	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 20:10	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 20:10	591-78-6	
Iodomethane	ND	ug/L	5.0	0.32	1		05/03/12 20:10	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 20:10	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 20:10	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 20:10	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 20:10	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 20:10	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 20:10	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		05/03/12 20:10	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 20:10	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 20:10	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 20:10	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 20:10	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 20:10	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 20:10	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 20:10	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 20:10	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 20:10	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	104	%	70-130		1		05/03/12 20:10	460-00-4	
Dibromofluoromethane (S)	103	%	70-130		1		05/03/12 20:10	1868-53-7	
1,2-Dichloroethane-d4 (S)	103	%	70-130		1		05/03/12 20:10	17060-07-0	
Toluene-d8 (S)	98	%	70-130		1		05/03/12 20:10	2037-26-5	

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Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-06 R **Lab ID: 92117181006** Collected: 04/25/12 12:31 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:37	7440-36-0	
Arsenic	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:37	7440-38-2	
Barium	**87.9**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:37	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:37	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:37	7440-43-9	
Chromium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:37	7440-47-3	
Cobalt	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:37	7440-48-4	
Copper	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:37	7440-50-8	
Lead	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:37	7439-92-1	
Nickel	**6.4**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:37	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:37	7782-49-2	
Silver	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:37	7440-22-4	
Vanadium	**7.7**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:37	7440-62-2	
Zinc	**25.5**	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:37	7440-66-6	
6020 MET ICPMS	Analytical Method: EPA 6020								
Thallium	ND	ug/L	0.10	0.050	1	05/02/12 12:13	05/11/12 15:46	7440-28-0	
7470 Mercury	Analytical Method: EPA 7470 Preparation Method: EPA 7470								
Mercury	ND	ug/L	0.20	0.10	1	05/02/12 09:30	05/03/12 11:13	7439-97-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 20:26	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 20:26	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 20:26	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 20:26	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 20:26	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 20:26	75-25-2	
Bromomethane	ND	ug/L	2.0	0.29	1		05/03/12 20:26	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 20:26	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 20:26	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 20:26	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 20:26	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 20:26	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 20:26	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 20:26	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 20:26	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 20:26	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 20:26	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 20:26	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 20:26	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 20:26	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 20:26	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 20:26	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 20:26	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 20:26	75-35-4	

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9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-06 R **Lab ID: 92117181006** Collected: 04/25/12 12:31 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 20:26	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 20:26	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 20:26	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 20:26	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 20:26	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 20:26	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 20:26	591-78-6	
Iodomethane	ND	ug/L	5.0	0.32	1		05/03/12 20:26	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 20:26	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 20:26	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 20:26	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 20:26	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 20:26	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 20:26	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		05/03/12 20:26	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 20:26	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 20:26	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 20:26	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 20:26	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 20:26	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 20:26	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 20:26	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 20:26	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 20:26	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	104	%	70-130		1		05/03/12 20:26	460-00-4	
Dibromofluoromethane (S)	101	%	70-130		1		05/03/12 20:26	1868-53-7	
1,2-Dichloroethane-d4 (S)	104	%	70-130		1		05/03/12 20:26	17060-07-0	
Toluene-d8 (S)	99	%	70-130		1		05/03/12 20:26	2037-26-5	

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Eden, NC 27288
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Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-07 R **Lab ID: 92117181007** Collected: 04/25/12 10:11 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:40	7440-36-0	
Arsenic	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:40	7440-38-2	
Barium	**126**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:40	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:40	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:40	7440-43-9	
Chromium	**6.0**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:40	7440-47-3	
Cobalt	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:40	7440-48-4	
Copper	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:40	7440-50-8	
Lead	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:40	7439-92-1	
Nickel	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:40	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:40	7782-49-2	
Silver	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:40	7440-22-4	
Vanadium	**7.9**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:40	7440-62-2	
Zinc	**36.6**	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:40	7440-66-6	
6020 MET ICPMS	Analytical Method: EPA 6020								
Thallium	ND	ug/L	0.10	0.050	1	05/02/12 12:13	05/11/12 15:51	7440-28-0	
7470 Mercury	Analytical Method: EPA 7470 Preparation Method: EPA 7470								
Mercury	ND	ug/L	0.20	0.10	1	05/02/12 09:30	05/03/12 11:15	7439-97-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 20:43	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 20:43	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 20:43	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 20:43	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 20:43	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 20:43	75-25-2	
Bromomethane	ND	ug/L	2.0	0.29	1		05/03/12 20:43	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 20:43	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 20:43	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 20:43	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 20:43	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 20:43	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 20:43	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 20:43	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 20:43	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 20:43	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 20:43	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 20:43	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 20:43	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 20:43	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 20:43	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 20:43	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 20:43	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 20:43	75-35-4	

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205 East Meadow Road - Suite A
Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-07 R **Lab ID: 92117181007** Collected: 04/25/12 10:11 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 20:43	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 20:43	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 20:43	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 20:43	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 20:43	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 20:43	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 20:43	591-78-6	
Iodomethane	ND	ug/L	5.0	0.32	1		05/03/12 20:43	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 20:43	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 20:43	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 20:43	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 20:43	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 20:43	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 20:43	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		05/03/12 20:43	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 20:43	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 20:43	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 20:43	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 20:43	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 20:43	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 20:43	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 20:43	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 20:43	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 20:43	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	102	%	70-130		1		05/03/12 20:43	460-00-4	
Dibromofluoromethane (S)	102	%	70-130		1		05/03/12 20:43	1868-53-7	
1,2-Dichloroethane-d4 (S)	102	%	70-130		1		05/03/12 20:43	17060-07-0	
Toluene-d8 (S)	101	%	70-130		1		05/03/12 20:43	2037-26-5	

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205 East Meadow Road - Suite A
Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: SW-01 **Lab ID: 92117181008** Collected: 04/25/12 12:50 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:44	7440-36-0	
Arsenic	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:44	7440-38-2	
Barium	**156**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:44	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:44	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:44	7440-43-9	
Chromium	**6.6**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:44	7440-47-3	
Cobalt	**14.4**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:44	7440-48-4	
Copper	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:44	7440-50-8	
Lead	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:44	7439-92-1	
Nickel	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:44	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:44	7782-49-2	
Silver	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:44	7440-22-4	
Vanadium	**14.9**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:44	7440-62-2	
Zinc	**20.4**	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:44	7440-66-6	
6020 MET ICPMS	Analytical Method: EPA 6020								
Thallium	ND	ug/L	0.10	0.050	1	05/02/12 12:13	05/11/12 15:55	7440-28-0	
7470 Mercury	Analytical Method: EPA 7470 Preparation Method: EPA 7470								
Mercury	ND	ug/L	0.20	0.10	1	05/02/12 09:30	05/03/12 11:18	7439-97-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 20:59	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 20:59	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 20:59	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 20:59	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 20:59	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 20:59	75-25-2	
Bromomethane	ND	ug/L	2.0	0.29	1		05/03/12 20:59	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 20:59	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 20:59	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 20:59	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 20:59	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 20:59	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 20:59	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 20:59	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 20:59	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 20:59	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 20:59	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 20:59	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 20:59	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 20:59	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 20:59	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 20:59	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 20:59	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 20:59	75-35-4	

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Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: SW-01 **Lab ID: 92117181008** Collected: 04/25/12 12:50 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 20:59	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 20:59	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 20:59	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 20:59	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 20:59	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 20:59	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 20:59	591-78-6	
Iodomethane	ND	ug/L	5.0	0.32	1		05/03/12 20:59	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 20:59	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 20:59	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 20:59	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 20:59	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 20:59	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 20:59	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		05/03/12 20:59	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 20:59	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 20:59	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 20:59	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 20:59	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 20:59	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 20:59	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 20:59	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 20:59	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 20:59	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	101	%	70-130		1		05/03/12 20:59	460-00-4	
Dibromofluoromethane (S)	103	%	70-130		1		05/03/12 20:59	1868-53-7	
1,2-Dichloroethane-d4 (S)	104	%	70-130		1		05/03/12 20:59	17060-07-0	
Toluene-d8 (S)	98	%	70-130		1		05/03/12 20:59	2037-26-5	

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Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: SW-02 **Lab ID: 92117181009** Collected: 04/24/12 15:50 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:57	7440-36-0	
Arsenic	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:57	7440-38-2	
Barium	**93.9**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:57	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:57	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 20:57	7440-43-9	
Chromium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:57	7440-47-3	
Cobalt	**11.4**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:57	7440-48-4	
Copper	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:57	7440-50-8	
Lead	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:57	7439-92-1	
Nickel	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:57	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:57	7782-49-2	
Silver	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:57	7440-22-4	
Vanadium	**6.5**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 20:57	7440-62-2	
Zinc	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 20:57	7440-66-6	
6020 MET ICPMS	Analytical Method: EPA 6020								
Thallium	ND	ug/L	0.10	0.050	1	05/02/12 12:13	05/11/12 16:00	7440-28-0	
7470 Mercury	Analytical Method: EPA 7470 Preparation Method: EPA 7470								
Mercury	ND	ug/L	0.20	0.10	1	05/02/12 09:30	05/03/12 11:26	7439-97-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 21:16	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 21:16	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 21:16	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 21:16	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 21:16	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 21:16	75-25-2	
Bromomethane	ND	ug/L	2.0	0.29	1		05/03/12 21:16	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 21:16	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 21:16	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 21:16	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 21:16	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 21:16	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 21:16	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 21:16	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 21:16	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 21:16	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 21:16	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 21:16	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 21:16	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 21:16	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 21:16	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 21:16	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 21:16	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 21:16	75-35-4	

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Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: SW-02 **Lab ID: 92117181009** Collected: 04/24/12 15:50 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 21:16	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 21:16	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 21:16	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 21:16	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 21:16	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 21:16	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 21:16	591-78-6	
Iodomethane	ND	ug/L	5.0	0.32	1		05/03/12 21:16	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 21:16	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 21:16	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 21:16	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 21:16	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 21:16	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 21:16	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		05/03/12 21:16	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 21:16	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 21:16	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 21:16	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 21:16	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 21:16	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 21:16	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 21:16	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 21:16	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 21:16	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	103	%	70-130		1		05/03/12 21:16	460-00-4	
Dibromofluoromethane (S)	100	%	70-130		1		05/03/12 21:16	1868-53-7	
1,2-Dichloroethane-d4 (S)	105	%	70-130		1		05/03/12 21:16	17060-07-0	
Toluene-d8 (S)	100	%	70-130		1		05/03/12 21:16	2037-26-5	

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205 East Meadow Road - Suite A
Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: LP-1 **Lab ID: 92117181010** Collected: 04/25/12 13:10 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:01	7440-36-0	
Arsenic	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:01	7440-38-2	
Barium	**297**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:01	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 21:01	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 21:01	7440-43-9	
Chromium	**5.1**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:01	7440-47-3	
Cobalt	**30.0**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:01	7440-48-4	
Copper	**6.1**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:01	7440-50-8	
Lead	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:01	7439-92-1	
Nickel	**37.0**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:01	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 21:01	7782-49-2	
Silver	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:01	7440-22-4	
Vanadium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:01	7440-62-2	
Zinc	**30.0**	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 21:01	7440-66-6	
6020 MET ICPMS	Analytical Method: EPA 6020								
Thallium	ND	ug/L	0.10	0.050	1	05/02/12 12:13	05/11/12 16:05	7440-28-0	
7470 Mercury	Analytical Method: EPA 7470 Preparation Method: EPA 7470								
Mercury	ND	ug/L	0.20	0.10	1	05/02/12 09:30	05/03/12 11:34	7439-97-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 21:33	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 21:33	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 21:33	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 21:33	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 21:33	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 21:33	75-25-2	
Bromomethane	**1.0J**	ug/L	2.0	0.29	1		05/03/12 21:33	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 21:33	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 21:33	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 21:33	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 21:33	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 21:33	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 21:33	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 21:33	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 21:33	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 21:33	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 21:33	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 21:33	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 21:33	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 21:33	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 21:33	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 21:33	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 21:33	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 21:33	75-35-4	

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205 East Meadow Road - Suite A
Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: LP-1 **Lab ID: 92117181010** Collected: 04/25/12 13:10 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 21:33	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 21:33	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 21:33	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 21:33	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 21:33	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 21:33	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 21:33	591-78-6	
Iodomethane	**0.65J**	ug/L	5.0	0.32	1		05/03/12 21:33	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 21:33	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 21:33	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 21:33	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 21:33	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 21:33	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 21:33	127-18-4	
Tetrahydrofuran	**3.7J**	ug/L	10.0	3.1	1		05/03/12 21:33	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 21:33	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 21:33	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 21:33	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 21:33	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 21:33	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 21:33	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 21:33	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 21:33	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 21:33	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	103	%	70-130		1		05/03/12 21:33	460-00-4	
Dibromofluoromethane (S)	101	%	70-130		1		05/03/12 21:33	1868-53-7	
1,2-Dichloroethane-d4 (S)	103	%	70-130		1		05/03/12 21:33	17060-07-0	
Toluene-d8 (S)	99	%	70-130		1		05/03/12 21:33	2037-26-5	
5210B BOD, 5 day	Analytical Method: SM 5210B								
BOD, 5 day	**15.4**	mg/L	2.0	2.0	1	04/25/12 20:02	04/30/12 19:14		
300.0 IC Anions 28 Days	Analytical Method: EPA 300.0								
Sulfate	**105**	mg/L	25.0	25.0	5		04/30/12 19:52	14808-79-8	
353.2 Nitrogen, NO2/NO3 unpres	Analytical Method: EPA 353.2								
Nitrogen, Nitrate	**47.4**	mg/L	2.0	2.0	10		04/26/12 01:26		
365.1 Phosphorus, Total	Analytical Method: EPA 365.1								
Phosphorus	**0.067**	mg/L	0.050		1		05/04/12 16:16	7723-14-0	
5220D COD	Analytical Method: SM 5220D								
Chemical Oxygen Demand	**170**	mg/L	25.0	25.0	1		05/01/12 20:10		

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Eden, NC 27288
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Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-08 **Lab ID: 92117181011** Collected: 04/24/12 10:53 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:05	7440-36-0	
Arsenic	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:05	7440-38-2	
Barium	**44.1**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:05	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 21:05	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 21:05	7440-43-9	
Chromium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:05	7440-47-3	
Cobalt	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:05	7440-48-4	
Copper	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:05	7440-50-8	
Lead	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:05	7439-92-1	
Nickel	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:05	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 21:05	7782-49-2	
Silver	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:05	7440-22-4	
Vanadium	**5.4**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:05	7440-62-2	
Zinc	**140**	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 21:05	7440-66-6	
6020 MET ICPMS	Analytical Method: EPA 6020								
Thallium	ND	ug/L	0.10	0.050	1	05/02/12 12:13	05/11/12 16:27	7440-28-0	
7470 Mercury	Analytical Method: EPA 7470 Preparation Method: EPA 7470								
Mercury	ND	ug/L	0.20	0.10	1	05/02/12 09:30	05/03/12 11:37	7439-97-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 21:49	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 21:49	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 21:49	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 21:49	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 21:49	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 21:49	75-25-2	
Bromomethane	ND	ug/L	2.0	0.29	1		05/03/12 21:49	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 21:49	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 21:49	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 21:49	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 21:49	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 21:49	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 21:49	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 21:49	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 21:49	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 21:49	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 21:49	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 21:49	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 21:49	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 21:49	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 21:49	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 21:49	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 21:49	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 21:49	75-35-4	

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Eden, NC 27288
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Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
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Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-08 **Lab ID: 92117181011** Collected: 04/24/12 10:53 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 21:49	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 21:49	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 21:49	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 21:49	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 21:49	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 21:49	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 21:49	591-78-6	
Iodomethane	ND	ug/L	5.0	0.32	1		05/03/12 21:49	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 21:49	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 21:49	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 21:49	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 21:49	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 21:49	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 21:49	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		05/03/12 21:49	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 21:49	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 21:49	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 21:49	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 21:49	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 21:49	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 21:49	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 21:49	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 21:49	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 21:49	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	101	%	70-130		1		05/03/12 21:49	460-00-4	
Dibromofluoromethane (S)	100	%	70-130		1		05/03/12 21:49	1868-53-7	
1,2-Dichloroethane-d4 (S)	102	%	70-130		1		05/03/12 21:49	17060-07-0	
Toluene-d8 (S)	100	%	70-130		1		05/03/12 21:49	2037-26-5	

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Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-09 **Lab ID: 92117181012** Collected: 04/24/12 14:11 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:09	7440-36-0	
Arsenic	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:09	7440-38-2	
Barium	**171**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:09	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 21:09	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	04/26/12 15:40	04/27/12 21:09	7440-43-9	
Chromium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:09	7440-47-3	
Cobalt	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:09	7440-48-4	
Copper	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:09	7440-50-8	
Lead	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:09	7439-92-1	
Nickel	**8.4**	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:09	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 21:09	7782-49-2	
Silver	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:09	7440-22-4	
Vanadium	ND	ug/L	5.0	5.0	1	04/26/12 15:40	04/27/12 21:09	7440-62-2	
Zinc	**63.1**	ug/L	10.0	10.0	1	04/26/12 15:40	04/27/12 21:09	7440-66-6	
6020 MET ICPMS	Analytical Method: EPA 6020								
Thallium	ND	ug/L	0.10	0.050	1	05/02/12 12:13	05/11/12 16:10	7440-28-0	
7470 Mercury	Analytical Method: EPA 7470 Preparation Method: EPA 7470								
Mercury	ND	ug/L	0.20	0.10	1	05/02/12 09:30	05/03/12 11:47	7439-97-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 22:06	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 22:06	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 22:06	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 22:06	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 22:06	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 22:06	75-25-2	
Bromomethane	ND	ug/L	2.0	0.29	1		05/03/12 22:06	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 22:06	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 22:06	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 22:06	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 22:06	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 22:06	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 22:06	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 22:06	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 22:06	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 22:06	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 22:06	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 22:06	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 22:06	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 22:06	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 22:06	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 22:06	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 22:06	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 22:06	75-35-4	

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Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: MW-09 **Lab ID: 92117181012** Collected: 04/24/12 14:11 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 22:06	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 22:06	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 22:06	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 22:06	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 22:06	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 22:06	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 22:06	591-78-6	
Iodomethane	ND	ug/L	5.0	0.32	1		05/03/12 22:06	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 22:06	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 22:06	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 22:06	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 22:06	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 22:06	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 22:06	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		05/03/12 22:06	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 22:06	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 22:06	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 22:06	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 22:06	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 22:06	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 22:06	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 22:06	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 22:06	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 22:06	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	103	%	70-130		1		05/03/12 22:06	460-00-4	
Dibromofluoromethane (S)	100	%	70-130		1		05/03/12 22:06	1868-53-7	
1,2-Dichloroethane-d4 (S)	104	%	70-130		1		05/03/12 22:06	17060-07-0	
Toluene-d8 (S)	100	%	70-130		1		05/03/12 22:06	2037-26-5	

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Eden, NC 27288
(336)623-8921

Pace Analytical Services, Inc.
2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: TRIP BLANK **Lab ID: 92117181013** Collected: 04/25/12 00:00 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	25.0	2.2	1		05/03/12 22:22	67-64-1	
Acrylonitrile	ND	ug/L	10.0	1.9	1		05/03/12 22:22	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		05/03/12 22:22	71-43-2	
Bromochloromethane	ND	ug/L	1.0	0.17	1		05/03/12 22:22	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		05/03/12 22:22	75-27-4	
Bromoform	ND	ug/L	1.0	0.26	1		05/03/12 22:22	75-25-2	
Bromomethane	ND	ug/L	2.0	0.29	1		05/03/12 22:22	74-83-9	
2-Butanone (MEK)	ND	ug/L	5.0	0.96	1		05/03/12 22:22	78-93-3	
Carbon disulfide	ND	ug/L	2.0	1.2	1		05/03/12 22:22	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		05/03/12 22:22	56-23-5	
Chlorobenzene	ND	ug/L	1.0	0.23	1		05/03/12 22:22	108-90-7	
Chloroethane	ND	ug/L	1.0	0.54	1		05/03/12 22:22	75-00-3	
Chloroform	ND	ug/L	1.0	0.14	1		05/03/12 22:22	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		05/03/12 22:22	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	5.0	2.5	1		05/03/12 22:22	96-12-8	
Dibromochloromethane	ND	ug/L	1.0	0.21	1		05/03/12 22:22	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		05/03/12 22:22	106-93-4	
Dibromomethane	ND	ug/L	1.0	0.21	1		05/03/12 22:22	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	1.0	0.30	1		05/03/12 22:22	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		05/03/12 22:22	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	1.0	1.0	1		05/03/12 22:22	110-57-6	
1,1-Dichloroethane	ND	ug/L	1.0	0.32	1		05/03/12 22:22	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		05/03/12 22:22	107-06-2	
1,1-Dichloroethene	ND	ug/L	1.0	0.56	1		05/03/12 22:22	75-35-4	
cis-1,2-Dichloroethene	ND	ug/L	1.0	0.19	1		05/03/12 22:22	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	1.0	0.49	1		05/03/12 22:22	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		05/03/12 22:22	78-87-5	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		05/03/12 22:22	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		05/03/12 22:22	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		05/03/12 22:22	100-41-4	
2-Hexanone	ND	ug/L	5.0	0.46	1		05/03/12 22:22	591-78-6	
Iodomethane	ND	ug/L	5.0	0.32	1		05/03/12 22:22	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		05/03/12 22:22	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	5.0	0.33	1		05/03/12 22:22	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		05/03/12 22:22	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	1.0	0.33	1		05/03/12 22:22	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	1.0	0.40	1		05/03/12 22:22	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		05/03/12 22:22	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		05/03/12 22:22	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		05/03/12 22:22	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		05/03/12 22:22	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		05/03/12 22:22	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		05/03/12 22:22	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		05/03/12 22:22	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		05/03/12 22:22	96-18-4	
Vinyl acetate	ND	ug/L	2.0	0.35	1		05/03/12 22:22	108-05-4	

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Eden, NC 27288
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2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

ANALYTICAL RESULTS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Sample: TRIP BLANK **Lab ID: 92117181013** Collected: 04/25/12 00:00 Received: 04/25/12 14:42 Matrix: Water

Parameters	Results	Units	PQL	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Vinyl chloride	ND	ug/L	1.0	0.62	1		05/03/12 22:22	75-01-4	
Xylene (Total)	ND	ug/L	2.0	0.66	1		05/03/12 22:22	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	105	%	70-130		1		05/03/12 22:22	460-00-4	
Dibromofluoromethane (S)	100	%	70-130		1		05/03/12 22:22	1868-53-7	
1,2-Dichloroethane-d4 (S)	104	%	70-130		1		05/03/12 22:22	17060-07-0	
Toluene-d8 (S)	100	%	70-130		1		05/03/12 22:22	2037-26-5	

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9800 Kincey Ave. Suite 100
Huntersville, NC 28078
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QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

QC Batch: ICPM/32120 Analysis Method: EPA 6020
QC Batch Method: EPA 6020 Analysis Description: 6020 MET
Associated Lab Samples: 92117181001, 92117181002, 92117181003, 92117181004, 92117181005, 92117181006, 92117181007, 92117181008, 92117181009, 92117181010, 92117181011, 92117181012

METHOD BLANK: 1185809 Matrix: Water
Associated Lab Samples: 92117181001, 92117181002, 92117181003, 92117181004, 92117181005, 92117181006, 92117181007, 92117181008, 92117181009, 92117181010, 92117181011, 92117181012

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Thallium	ug/L	ND	0.10	05/11/12 14:47	

LABORATORY CONTROL SAMPLE: 1185810

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Thallium	ug/L	80	79.2	99	80-120	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 1185811 1185812

Parameter	Units	92117181001 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Thallium	ug/L	ND	80	80	89.4	102	112	127	75-125	13	20	M1

MATRIX SPIKE SAMPLE: 1185813

Parameter	Units	92117181011 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Thallium	ug/L	ND	80	83.8	105	75-125	

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Pace Analytical Services, Inc.
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Huntersville, NC 28078
(704)875-9092

QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

QC Batch: MERP/4202 Analysis Method: EPA 7470
QC Batch Method: EPA 7470 Analysis Description: 7470 Mercury
Associated Lab Samples: 92117181001, 92117181002, 92117181003, 92117181004, 92117181005, 92117181006, 92117181007, 92117181008

METHOD BLANK: 756690 Matrix: Water
Associated Lab Samples: 92117181001, 92117181002, 92117181003, 92117181004, 92117181005, 92117181006, 92117181007, 92117181008

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Mercury	ug/L	ND	0.20	05/03/12 09:59	

LABORATORY CONTROL SAMPLE: 756691

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Mercury	ug/L	2.5	2.2	90	80-120	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 756692 756693

Parameter	Units	92116883001 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Mercury	ug/L	ND	2.5	2.5	2.2	2.2	89	89	75-125	0	25	

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(828)254-7176

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Huntersville, NC 28078
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QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

QC Batch: MERP/4203 Analysis Method: EPA 7470
QC Batch Method: EPA 7470 Analysis Description: 7470 Mercury
Associated Lab Samples: 92117181009, 92117181010, 92117181011, 92117181012

METHOD BLANK: 756695 Matrix: Water
Associated Lab Samples: 92117181009, 92117181010, 92117181011, 92117181012

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Mercury	ug/L	ND	0.20	05/03/12 11:21	

LABORATORY CONTROL SAMPLE: 756696

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Mercury	ug/L	2.5	2.3	93	80-120	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 756697 756698

Parameter	Units	92117181009 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Mercury	ug/L	ND	2.5	2.5	2.3	2.2	90	89	75-125	1	25	

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Asheville, NC 28804
(828)254-7176

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9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

QC Batch: MPRP/10460 Analysis Method: EPA 6010
QC Batch Method: EPA 3010 Analysis Description: 6010 MET NC Groundwater
Associated Lab Samples: 92117181001, 92117181002, 92117181003, 92117181004, 92117181005, 92117181006, 92117181007, 92117181008, 92117181009, 92117181010, 92117181011, 92117181012

METHOD BLANK: 755610 Matrix: Water
Associated Lab Samples: 92117181001, 92117181002, 92117181003, 92117181004, 92117181005, 92117181006, 92117181007, 92117181008, 92117181009, 92117181010, 92117181011, 92117181012

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Antimony	ug/L	ND	5.0	04/27/12 19:56	
Arsenic	ug/L	ND	5.0	04/27/12 19:56	
Barium	ug/L	ND	5.0	04/27/12 19:56	
Beryllium	ug/L	ND	1.0	04/27/12 19:56	
Cadmium	ug/L	ND	1.0	04/27/12 19:56	
Chromium	ug/L	ND	5.0	04/27/12 19:56	
Cobalt	ug/L	ND	5.0	04/27/12 19:56	
Copper	ug/L	ND	5.0	04/27/12 19:56	
Lead	ug/L	ND	5.0	04/27/12 19:56	
Nickel	ug/L	ND	5.0	04/27/12 19:56	
Selenium	ug/L	ND	10.0	04/27/12 19:56	
Silver	ug/L	ND	5.0	04/27/12 19:56	
Vanadium	ug/L	ND	5.0	04/27/12 19:56	
Zinc	ug/L	ND	10.0	04/27/12 19:56	

LABORATORY CONTROL SAMPLE: 755611

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Antimony	ug/L	500	488	98	80-120	
Arsenic	ug/L	500	494	99	80-120	
Barium	ug/L	500	489	98	80-120	
Beryllium	ug/L	500	506	101	80-120	
Cadmium	ug/L	500	497	99	80-120	
Chromium	ug/L	500	499	100	80-120	
Cobalt	ug/L	500	491	98	80-120	
Copper	ug/L	500	496	99	80-120	
Lead	ug/L	500	491	98	80-120	
Nickel	ug/L	500	494	99	80-120	
Selenium	ug/L	500	497	99	80-120	
Silver	ug/L	250	249	100	80-120	
Vanadium	ug/L	500	499	100	80-120	
Zinc	ug/L	500	494	99	80-120	

MATRIX SPIKE SAMPLE: 755642

Parameter	Units	92117181001 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Antimony	ug/L	ND	500	493	99	75-125	
Arsenic	ug/L	ND	500	496	99	75-125	

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Asheville, NC 28804
(828)254-7176

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QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

MATRIX SPIKE SAMPLE: 755642

Parameter	Units	92117181001 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Barium	ug/L	109	500	596	97	75-125	
Beryllium	ug/L	ND	500	501	100	75-125	
Cadmium	ug/L	ND	500	491	98	75-125	
Chromium	ug/L	ND	500	499	100	75-125	
Cobalt	ug/L	6.8	500	497	98	75-125	
Copper	ug/L	ND	500	503	101	75-125	
Lead	ug/L	ND	500	479	96	75-125	
Nickel	ug/L	ND	500	494	98	75-125	
Selenium	ug/L	ND	500	493	98	75-125	
Silver	ug/L	ND	250	247	99	75-125	
Vanadium	ug/L	ND	500	502	100	75-125	
Zinc	ug/L	35.6	500	524	98	75-125	

SAMPLE DUPLICATE: 755643

Parameter	Units	92117181002 Result	Dup Result	RPD	Max RPD	Qualifiers
Antimony	ug/L	ND	ND		25	
Arsenic	ug/L	ND	ND		25	
Barium	ug/L	131	135	3	25	
Beryllium	ug/L	ND	ND		25	
Cadmium	ug/L	ND	ND		25	
Chromium	ug/L	ND	ND		25	
Cobalt	ug/L	6.7	7.1	6	25	
Copper	ug/L	ND	ND		25	
Lead	ug/L	ND	ND		25	
Nickel	ug/L	ND	ND		25	
Selenium	ug/L	ND	ND		25	
Silver	ug/L	ND	ND		25	
Vanadium	ug/L	ND	ND		25	
Zinc	ug/L	72.6	73.7	2	25	

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QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

QC Batch: MSV/18996 Analysis Method: EPA 8260
QC Batch Method: EPA 8260 Analysis Description: 8260 MSV Low Level Landfill
Associated Lab Samples: 92117181001, 92117181002, 92117181003, 92117181004, 92117181005, 92117181006, 92117181007, 92117181008, 92117181009, 92117181010, 92117181011, 92117181012, 92117181013

METHOD BLANK: 758666 Matrix: Water
Associated Lab Samples: 92117181001, 92117181002, 92117181003, 92117181004, 92117181005, 92117181006, 92117181007, 92117181008, 92117181009, 92117181010, 92117181011, 92117181012, 92117181013

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
1,1,1,2-Tetrachloroethane	ug/L	ND	1.0	05/03/12 12:58	
1,1,1-Trichloroethane	ug/L	ND	1.0	05/03/12 12:58	
1,1,2,2-Tetrachloroethane	ug/L	ND	1.0	05/03/12 12:58	
1,1,2-Trichloroethane	ug/L	ND	1.0	05/03/12 12:58	
1,1-Dichloroethane	ug/L	ND	1.0	05/03/12 12:58	
1,1-Dichloroethene	ug/L	ND	1.0	05/03/12 12:58	
1,2,3-Trichloropropane	ug/L	ND	1.0	05/03/12 12:58	
1,2-Dibromo-3-chloropropane	ug/L	ND	5.0	05/03/12 12:58	
1,2-Dibromoethane (EDB)	ug/L	ND	1.0	05/03/12 12:58	
1,2-Dichlorobenzene	ug/L	ND	1.0	05/03/12 12:58	
1,2-Dichloroethane	ug/L	ND	1.0	05/03/12 12:58	
1,2-Dichloropropane	ug/L	ND	1.0	05/03/12 12:58	
1,4-Dichlorobenzene	ug/L	ND	1.0	05/03/12 12:58	
2-Butanone (MEK)	ug/L	ND	5.0	05/03/12 12:58	
2-Hexanone	ug/L	ND	5.0	05/03/12 12:58	
4-Methyl-2-pentanone (MIBK)	ug/L	ND	5.0	05/03/12 12:58	
Acetone	ug/L	ND	25.0	05/03/12 12:58	
Acrylonitrile	ug/L	ND	10.0	05/03/12 12:58	
Benzene	ug/L	ND	1.0	05/03/12 12:58	
Bromochloromethane	ug/L	ND	1.0	05/03/12 12:58	
Bromodichloromethane	ug/L	ND	1.0	05/03/12 12:58	
Bromoform	ug/L	ND	1.0	05/03/12 12:58	
Bromomethane	ug/L	ND	2.0	05/03/12 12:58	
Carbon disulfide	ug/L	ND	2.0	05/03/12 12:58	
Carbon tetrachloride	ug/L	ND	1.0	05/03/12 12:58	
Chlorobenzene	ug/L	ND	1.0	05/03/12 12:58	
Chloroethane	ug/L	ND	1.0	05/03/12 12:58	
Chloroform	ug/L	ND	1.0	05/03/12 12:58	
Chloromethane	ug/L	ND	1.0	05/03/12 12:58	
cis-1,2-Dichloroethene	ug/L	ND	1.0	05/03/12 12:58	
cis-1,3-Dichloropropene	ug/L	ND	1.0	05/03/12 12:58	
Dibromochloromethane	ug/L	ND	1.0	05/03/12 12:58	
Dibromomethane	ug/L	ND	1.0	05/03/12 12:58	
Ethylbenzene	ug/L	ND	1.0	05/03/12 12:58	
Iodomethane	ug/L	ND	5.0	05/03/12 12:58	
Methylene Chloride	ug/L	ND	1.0	05/03/12 12:58	
Styrene	ug/L	ND	1.0	05/03/12 12:58	
Tetrachloroethene	ug/L	ND	1.0	05/03/12 12:58	
Tetrahydrofuran	ug/L	ND	10.0	05/03/12 12:58	
Toluene	ug/L	ND	1.0	05/03/12 12:58	
trans-1,2-Dichloroethene	ug/L	ND	1.0	05/03/12 12:58	

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Eden, NC 27288
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(828)254-7176

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9800 Kincey Ave. Suite 100
Huntersville, NC 28078
(704)875-9092

QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

METHOD BLANK: 758666 Matrix: Water

Associated Lab Samples: 92117181001, 92117181002, 92117181003, 92117181004, 92117181005, 92117181006, 92117181007, 92117181008, 92117181009, 92117181010, 92117181011, 92117181012, 92117181013

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
trans-1,3-Dichloropropene	ug/L	ND	1.0	05/03/12 12:58	
trans-1,4-Dichloro-2-butene	ug/L	ND	1.0	05/03/12 12:58	
Trichloroethene	ug/L	ND	1.0	05/03/12 12:58	
Trichlorofluoromethane	ug/L	ND	1.0	05/03/12 12:58	
Vinyl acetate	ug/L	ND	2.0	05/03/12 12:58	
Vinyl chloride	ug/L	ND	1.0	05/03/12 12:58	
Xylene (Total)	ug/L	ND	2.0	05/03/12 12:58	
1,2-Dichloroethane-d4 (S)	%	103	70-130	05/03/12 12:58	
4-Bromofluorobenzene (S)	%	105	70-130	05/03/12 12:58	
Dibromofluoromethane (S)	%	101	70-130	05/03/12 12:58	
Toluene-d8 (S)	%	98	70-130	05/03/12 12:58	

LABORATORY CONTROL SAMPLE: 758667

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
1,1,1,2-Tetrachloroethane	ug/L	50	46.8	94	70-130	
1,1,1-Trichloroethane	ug/L	50	44.0	88	70-130	
1,1,2,2-Tetrachloroethane	ug/L	50	48.3	97	70-130	
1,1,2-Trichloroethane	ug/L	50	49.8	100	70-130	
1,1-Dichloroethane	ug/L	50	40.8	82	70-130	
1,1-Dichloroethene	ug/L	50	48.3	97	70-132	
1,2,3-Trichloropropane	ug/L	50	46.9	94	70-130	
1,2-Dibromo-3-chloropropane	ug/L	50	45.0	90	70-130	
1,2-Dibromoethane (EDB)	ug/L	50	47.5	95	70-130	
1,2-Dichlorobenzene	ug/L	50	48.6	97	70-130	
1,2-Dichloroethane	ug/L	50	45.5	91	70-130	
1,2-Dichloropropane	ug/L	50	47.4	95	70-130	
1,4-Dichlorobenzene	ug/L	50	48.2	96	70-130	
2-Butanone (MEK)	ug/L	100	93.4	93	70-145	
2-Hexanone	ug/L	100	97.4	97	70-144	
4-Methyl-2-pentanone (MIBK)	ug/L	100	99.4	99	70-140	
Acetone	ug/L	100	104	104	50-175	
Acrylonitrile	ug/L	250	222	89	70-143	
Benzene	ug/L	50	48.4	97	70-130	
Bromochloromethane	ug/L	50	50.4	101	70-130	
Bromodichloromethane	ug/L	50	45.9	92	70-130	
Bromoform	ug/L	50	48.8	98	70-130	
Bromomethane	ug/L	50	63.0	126	54-130	F3
Carbon disulfide	ug/L	50	50.8	102	70-131	
Carbon tetrachloride	ug/L	50	48.6	97	70-132	
Chlorobenzene	ug/L	50	47.7	95	70-130	
Chloroethane	ug/L	50	58.2	116	64-134	
Chloroform	ug/L	50	49.4	99	70-130	
Chloromethane	ug/L	50	41.4	83	64-130	

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2225 Riverside Dr.
Asheville, NC 28804
(828)254-7176

Pace Analytical Services, Inc.
9800 Kincey Ave. Suite 100
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(704)875-9092

QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

LABORATORY CONTROL SAMPLE: 758667

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
cis-1,2-Dichloroethene	ug/L	50	46.1	92	70-131	
cis-1,3-Dichloropropene	ug/L	50	47.5	95	70-130	
Dibromochloromethane	ug/L	50	47.7	95	70-130	
Dibromomethane	ug/L	50	49.2	98	70-131	
Ethylbenzene	ug/L	50	47.2	94	70-130	
Iodomethane	ug/L	100	91.1	91	49-180	
Methylene Chloride	ug/L	50	50.7	101	63-130	
Styrene	ug/L	50	47.0	94	70-130	
Tetrachloroethene	ug/L	50	47.4	95	70-130	
Tetrahydrofuran	ug/L	500	478	96	70-130	
Toluene	ug/L	50	46.8	94	70-130	
trans-1,2-Dichloroethene	ug/L	50	44.8	90	70-130	
trans-1,3-Dichloropropene	ug/L	50	47.1	94	70-132	
trans-1,4-Dichloro-2-butene	ug/L	50	55.6	111	70-141	
Trichloroethene	ug/L	50	48.8	98	70-130	
Trichlorofluoromethane	ug/L	50	49.9	100	62-133	
Vinyl acetate	ug/L	100	88.3	88	66-157	
Vinyl chloride	ug/L	50	45.1	90	69-130	
Xylene (Total)	ug/L	150	137	91	70-130	
1,2-Dichloroethane-d4 (S)	%			96	70-130	
4-Bromofluorobenzene (S)	%			103	70-130	
Dibromofluoromethane (S)	%			96	70-130	
Toluene-d8 (S)	%			98	70-130	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 758668 758669

Parameter	Units	92117231001 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
1,1-Dichloroethene	ug/L	ND	50	50	53.9	49.4	107	98	70-166	9	30	
Benzene	ug/L	0.61J	50	50	47.3	42.8	93	84	70-148	10	30	
Chlorobenzene	ug/L	0.43J	50	50	55.4	49.7	110	99	70-146	11	30	
Toluene	ug/L	ND	50	50	53.0	48.3	106	97	70-155	9	30	
Trichloroethene	ug/L	0.67J	50	50	56.7	51.0	112	101	69-151	11	30	
1,2-Dichloroethane-d4 (S)	%						102	102	70-130			
4-Bromofluorobenzene (S)	%						103	104	70-130			
Dibromofluoromethane (S)	%						100	100	70-130			
Toluene-d8 (S)	%						100	99	70-130			

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(828)254-7176

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QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

QC Batch: WET/20607
QC Batch Method: SM 5210B
Analysis Method: SM 5210B
Analysis Description: 5210B BOD, 5 day
Associated Lab Samples: 92117181010

METHOD BLANK: 755279
Matrix: Water
Associated Lab Samples: 92117181010

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
BOD, 5 day	mg/L	ND	2.0	04/30/12 19:14	

LABORATORY CONTROL SAMPLE: 755280

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
BOD, 5 day	mg/L	198	182	92	84-115	

SAMPLE DUPLICATE: 755281

Parameter	Units	92117002001 Result	Dup Result	RPD	Max RPD	Qualifiers
BOD, 5 day	mg/L	2490	3690	39	20	R1

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(828)254-7176

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QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

QC Batch: WETA/12039
QC Batch Method: EPA 300.0
Analysis Method: EPA 300.0
Analysis Description: 300.0 IC Anions
Associated Lab Samples: 92117181010

METHOD BLANK: 757025
Matrix: Water
Associated Lab Samples: 92117181010

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Sulfate	mg/L	ND	5.0	04/30/12 15:07	

LABORATORY CONTROL SAMPLE: 757026

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Sulfate	mg/L	20	19.3	96	90-110	

MATRIX SPIKE SAMPLE: 757027

Parameter	Units	92117205002 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Sulfate	mg/L	6.0	20	26.6	103	90-110	

MATRIX SPIKE SAMPLE: 757029

Parameter	Units	92117219004 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Sulfate	mg/L	ND	20	19.0	87	90-110	M1

SAMPLE DUPLICATE: 757028

Parameter	Units	92117205002 Result	Dup Result	RPD	Max RPD	Qualifiers
Sulfate	mg/L	6.0	6.0	0	20	

SAMPLE DUPLICATE: 757030

Parameter	Units	92117219004 Result	Dup Result	RPD	Max RPD	Qualifiers
Sulfate	mg/L	ND	ND		20	

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2225 Riverside Dr.
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(828)254-7176

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9800 Kincey Ave. Suite 100
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(704)875-9092

QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

QC Batch: WETA/12018
QC Batch Method: EPA 353.2
Analysis Method: EPA 353.2
Analysis Description: 353.2 Nitrate + Nitrite, Unpres.
Associated Lab Samples: 92117181010

METHOD BLANK: 755289
Matrix: Water
Associated Lab Samples: 92117181010

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Nitrogen, Nitrate	mg/L	ND	0.20	04/26/12 01:00	

LABORATORY CONTROL SAMPLE: 755290

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Nitrogen, Nitrate	mg/L	5	5.3	105	90-110	

MATRIX SPIKE SAMPLE: 755291

Parameter	Units	92117099001 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Nitrogen, Nitrate	mg/L	ND	5	5.7	113	90-110	M1

SAMPLE DUPLICATE: 755292

Parameter	Units	92117099001 Result	Dup Result	RPD	Max RPD	Qualifiers
Nitrogen, Nitrate	mg/L	ND	ND		20	

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Asheville, NC 28804
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Huntersville, NC 28078
(704)875-9092

QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

QC Batch: WETA/12066
QC Batch Method: EPA 365.1
Analysis Method: EPA 365.1
Analysis Description: 365.1 Phosphorus, Total
Associated Lab Samples: 92117181010

METHOD BLANK: 759192
Matrix: Water
Associated Lab Samples: 92117181010

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Phosphorus	mg/L	0.0035J	0.050	05/04/12 15:48	

LABORATORY CONTROL SAMPLE: 759193

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Phosphorus	mg/L	2.5	2.7	108	90-110	

MATRIX SPIKE SAMPLE: 759194

Parameter	Units	92117298001 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Phosphorus	mg/L	0.13	2.5	2.6	98	90-110	

MATRIX SPIKE SAMPLE: 759196

Parameter	Units	92117099001 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Phosphorus	mg/L	0.075	2.5	2.7	107	90-110	

SAMPLE DUPLICATE: 759195

Parameter	Units	92117452001 Result	Dup Result	RPD	Max RPD	Qualifiers
Phosphorus	mg/L	0.052	0.0J		20	

SAMPLE DUPLICATE: 759197

Parameter	Units	92117099002 Result	Dup Result	RPD	Max RPD	Qualifiers
Phosphorus	mg/L	ND	0.022J		20	

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Eden, NC 27288
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Asheville, NC 28804
(828)254-7176

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Huntersville, NC 28078
(704)875-9092

QUALITY CONTROL DATA

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

QC Batch: WETA/12049
QC Batch Method: SM 5220D
Analysis Method: SM 5220D
Analysis Description: 5220D COD
Associated Lab Samples: 92117181010

METHOD BLANK: 757734
Matrix: Water
Associated Lab Samples: 92117181010

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Chemical Oxygen Demand	mg/L	ND	25.0	05/01/12 20:10	

LABORATORY CONTROL SAMPLE: 757735

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Chemical Oxygen Demand	mg/L	750	770	103	90-110	

MATRIX SPIKE SAMPLE: 757736

Parameter	Units	92117019001 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Chemical Oxygen Demand	mg/L	1360	750	2000	85	75-125	

MATRIX SPIKE SAMPLE: 757738

Parameter	Units	92117256001 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Chemical Oxygen Demand	mg/L	841	750	1480	85	75-125	

SAMPLE DUPLICATE: 757737

Parameter	Units	92117019001 Result	Dup Result	RPD	Max RPD	Qualifiers
Chemical Oxygen Demand	mg/L	1360	1360	1	20	

SAMPLE DUPLICATE: 757739

Parameter	Units	92117256001 Result	Dup Result	RPD	Max RPD	Qualifiers
Chemical Oxygen Demand	mg/L	841	837	0	20	

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QUALIFIERS

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

DEFINITIONS

DF - Dilution Factor, if reported, represents the factor applied to the reported data due to changes in sample preparation, dilution of the sample aliquot, or moisture content.

ND - Not Detected at or above adjusted reporting limit.

J - Estimated concentration above the adjusted method detection limit and below the adjusted reporting limit.

MDL - Adjusted Method Detection Limit.

S - Surrogate

1,2-Diphenylhydrazine (8270 listed analyte) decomposes to Azobenzene.

Consistent with EPA guidelines, unrounded data are displayed and have been used to calculate % recovery and RPD values.

LCS(D) - Laboratory Control Sample (Duplicate)

MS(D) - Matrix Spike (Duplicate)

DUP - Sample Duplicate

RPD - Relative Percent Difference

NC - Not Calculable.

SG - Silica Gel - Clean-Up

U - Indicates the compound was analyzed for, but not detected.

N-Nitrosodiphenylamine decomposes and cannot be separated from Diphenylamine using Method 8270. The result reported for each analyte is a combined concentration.

Acid preservation may not be appropriate for 2-Chloroethylvinyl ether, Styrene, and Vinyl chloride.

Pace Analytical is TNI accredited. Contact your Pace PM for the current list of accredited analytes.

TNI - The NELAC Institute.

LABORATORIES

PASI-A	Pace Analytical Services - Asheville
PASI-C	Pace Analytical Services - Charlotte
PASI-M	Pace Analytical Services - Minneapolis

ANALYTE QUALIFIERS

F3	The recovery of the second source standard used to verify the initial calibration curve for this analyte is outside the laboratory's control limits. The result is estimated.
M1	Matrix spike recovery exceeded QC limits. Batch accepted based on laboratory control sample (LCS) recovery.
R1	RPD value was outside control limits.

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QUALITY CONTROL DATA CROSS REFERENCE TABLE

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Lab ID	Sample ID	QC Batch Method	QC Batch	Analytical Method	Analytical Batch
92117181001	**MW-01**	EPA 3010	MPRP/10460	EPA 6010	ICP/9630
92117181002	**MW-02**	EPA 3010	MPRP/10460	EPA 6010	ICP/9630
92117181003	**MW-03**	EPA 3010	MPRP/10460	EPA 6010	ICP/9630
92117181004	**MW-04**	EPA 3010	MPRP/10460	EPA 6010	ICP/9630
92117181005	**MW-05**	EPA 3010	MPRP/10460	EPA 6010	ICP/9630
92117181006	**MW-06 R**	EPA 3010	MPRP/10460	EPA 6010	ICP/9630
92117181007	**MW-07 R**	EPA 3010	MPRP/10460	EPA 6010	ICP/9630
92117181008	**SW-01**	EPA 3010	MPRP/10460	EPA 6010	ICP/9630
92117181009	**SW-02**	EPA 3010	MPRP/10460	EPA 6010	ICP/9630
92117181010	**LP-1**	EPA 3010	MPRP/10460	EPA 6010	ICP/9630
92117181011	**MW-08**	EPA 3010	MPRP/10460	EPA 6010	ICP/9630
92117181012	**MW-09**	EPA 3010	MPRP/10460	EPA 6010	ICP/9630
92117181001	**MW-01**	EPA 6020	ICPM/32120	EPA 6020	ICPM/12727
92117181002	**MW-02**	EPA 6020	ICPM/32120	EPA 6020	ICPM/12727
92117181003	**MW-03**	EPA 6020	ICPM/32120	EPA 6020	ICPM/12727
92117181004	**MW-04**	EPA 6020	ICPM/32120	EPA 6020	ICPM/12727
92117181005	**MW-05**	EPA 6020	ICPM/32120	EPA 6020	ICPM/12727
92117181006	**MW-06 R**	EPA 6020	ICPM/32120	EPA 6020	ICPM/12727
92117181007	**MW-07 R**	EPA 6020	ICPM/32120	EPA 6020	ICPM/12727
92117181008	**SW-01**	EPA 6020	ICPM/32120	EPA 6020	ICPM/12727
92117181009	**SW-02**	EPA 6020	ICPM/32120	EPA 6020	ICPM/12727
92117181010	**LP-1**	EPA 6020	ICPM/32120	EPA 6020	ICPM/12727
92117181011	**MW-08**	EPA 6020	ICPM/32120	EPA 6020	ICPM/12727
92117181012	**MW-09**	EPA 6020	ICPM/32120	EPA 6020	ICPM/12727
92117181001	**MW-01**	EPA 7470	MERP/4202	EPA 7470	MERC/4126
92117181002	**MW-02**	EPA 7470	MERP/4202	EPA 7470	MERC/4126
92117181003	**MW-03**	EPA 7470	MERP/4202	EPA 7470	MERC/4126
92117181004	**MW-04**	EPA 7470	MERP/4202	EPA 7470	MERC/4126
92117181005	**MW-05**	EPA 7470	MERP/4202	EPA 7470	MERC/4126
92117181006	**MW-06 R**	EPA 7470	MERP/4202	EPA 7470	MERC/4126
92117181007	**MW-07 R**	EPA 7470	MERP/4202	EPA 7470	MERC/4126
92117181008	**SW-01**	EPA 7470	MERP/4202	EPA 7470	MERC/4126
92117181009	**SW-02**	EPA 7470	MERP/4203	EPA 7470	MERC/4127
92117181010	**LP-1**	EPA 7470	MERP/4203	EPA 7470	MERC/4127
92117181011	**MW-08**	EPA 7470	MERP/4203	EPA 7470	MERC/4127
92117181012	**MW-09**	EPA 7470	MERP/4203	EPA 7470	MERC/4127
92117181001	**MW-01**	EPA 8260	MSV/18996		
92117181002	**MW-02**	EPA 8260	MSV/18996		
92117181003	**MW-03**	EPA 8260	MSV/18996		
92117181004	**MW-04**	EPA 8260	MSV/18996		
92117181005	**MW-05**	EPA 8260	MSV/18996		
92117181006	**MW-06 R**	EPA 8260	MSV/18996		
92117181007	**MW-07 R**	EPA 8260	MSV/18996		
92117181008	**SW-01**	EPA 8260	MSV/18996		
92117181009	**SW-02**	EPA 8260	MSV/18996		
92117181010	**LP-1**	EPA 8260	MSV/18996		
92117181011	**MW-08**	EPA 8260	MSV/18996		

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QUALITY CONTROL DATA CROSS REFERENCE TABLE

Project: Madison Co Operating LF 4/24
Pace Project No.: 92117181

Lab ID	Sample ID	QC Batch Method	QC Batch	Analytical Method	Analytical Batch
92117181012	**MW-09**	EPA 8260	MSV/18996		
92117181013	**TRIP BLANK**	EPA 8260	MSV/18996		
92117181010	**LP-1**	SM 5210B	WET/20607	SM 5210B	WET/20608
92117181010	**LP-1**	EPA 300.0	WETA/12039		
92117181010	**LP-1**	EPA 353.2	WETA/12018		
92117181010	**LP-1**	EPA 365.1	WETA/12066		
92117181010	**LP-1**	SM 5220D	WETA/12049		

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CHAIN-OF-CUSTODY / Analytical Request Document

The Chain-of-Custody is a LEGAL DOCUMENT. All relevant fields must be completed accurately.

Page: 1 of 1

1565253

Section A Required Client Information:

Company: Altamont Environmental
Address: 231 Haywood St, Asheville, NC 28801
Email To: cgilbert@altamontenvironmental.com
Phone: 8282813350 Fax: 8282813351
Requested Due Date/TAT:

Section B Required Project Information:

Report To: Chris Gilbert
Copy To: Evan Yurkovich
Purchase Order No.:
Project Name: Madison Co. Operating Landfill
Project Number: 2313

Section C Invoice Information:

Attention: Sue Brewere
Company Name: Same
Address:
Pace Quote Reference:
Pace Project Manager:
Pace Profile #:

REGULATORY AGENCY: ☐ NPDES ☒ GROUND WATER ☐ DRINKING WATER ☐ UST ☐ RCRA ☐ OTHER

Site Location STATE: NC

Section D Required Client Information

Matrix Codes (MATRIX / CODE): Drinking Water DW, Water WT, Waste Water WW, Product P, Soil/Solid SL, Oil OL, Wipe WP, Air AR, Tissue TS, Other OT

SAMPLE ID (A-Z, 0-9 / ,-) Sample IDs MUST BE UNIQUE

Requested Analysis Filtered (Y/N)

ITEM #	SAMPLE ID	MATRIX CODE (see valid codes to left)	SAMPLE TYPE (G=GRAB C=COMP)	COLLECTED Composite Start DATE	COLLECTED Composite Start TIME	COLLECTED Composite End/GRAB DATE	COLLECTED Composite End/GRAB TIME	SAMPLE TEMP AT COLLECTION	# OF CONTAINERS	Preservatives: Unpreserved	H_2SO_4	HNO_3	HCl	NaOH	$Na_2S_2O_3$	Methanol	Other	Analysis Test (Y/N): Metals 6010, Hg 7470	Appl Volatiles	Appl Metals	Metals 6020	BOD	COD	Nitrate	Phosphorus	Sulfates	Residual Chlorine (Y/N)	Pace Project No./ Lab I.D. 92117181
1	MW-01	WT	G	4/24/12	1005				4				X					X	X									921171810 01
2	MW-02	WT	G	4/25/12	1120				4				X					X	X									921171810 02
3	MW-03	WT	G	4/24/12	~~1256~~ 1205				4				X					X	X									921171810 03
4	MW-04	WT	G	4/24/12	1256				4				X					X	X									921171810 04
5	MW-05	WT	G	4/24/12	1509				4				X					X	X									921171810 05
6	MW-06R	WT	G	4/25/12	1231				4				X					X	X									921171810 06
7	MW-07R	WT	G	4/25/12	1011				4				X					X	X									921171810 07
8	SW-01	WT	G	4/25/12	1250				4				X					X	X									921171810 08
9	SW-02	WT	G	4/24/12	1550				4				X					X	X									921171810 09
10	LP-1	WT	G	4/25/12	1310				11	X	X	X	X					X	X	X	X	X	X	X	X	X		921171810 10
11	Trip Blanks	WT							2				X															921171810 13
12																												921171810 DUP 012

ADDITIONAL COMMENTS	RELINQUISHED BY / AFFILIATION	DATE	TIME	ACCEPTED BY / AFFILIATION	DATE	TIME	SAMPLE CONDITIONS			
	Parker Brooks/Altamont	4/25/12	1442	[signature]	4/25/12	14:42	5.7	Y	—	X

Temp in °C | Received on Ice (Y/N) | Custody Sealed Cooler (Y/N) | Samples Intact (Y/N)

SAMPLER NAME AND SIGNATURE

PRINT Name of SAMPLER: Parker Brooks

SIGNATURE of SAMPLER: [signature] DATE Signed (MM/DD/YY): 4/25/2012

ORIGINAL

*Important Note: By signing this form you are accepting Pace's NET 30 day payment terms and agreeing to late charges of 1.5% per month for any invoices not paid within 30 days.

Pace Analytical www.pacelabs.com	Document Name: **Sample Condition Upon Receipt (SCUR)**	Document Revised: October 19, 2011 Page 1 of 2
	Document No.: F-ASV-CS-003-rev.07	Issuing Authorities: Pace Asheville Quality Office

Client Name: AltaroT Project # 92117181

Where Received: ☐ Huntersville ☑ Asheville ☐ Eden

Courier (Circle): Fed Ex UPS USPS ~~Client~~ Commercial Pace Other_____

Custody Seal on Cooler/Box Present: ☐ yes ☑ no Seals intact: ☐ yes ☑ no

Optional
Proj. Due Date:
Proj. Name:

Packing Material: ☑ Bubble Wrap ☑ Bubble Bags ☐ None ☐ Other_____

Circle Thermometer Used: IR Gun#2 -80344039 **Type of Ice:** Wet Blue None ☑ Samples on ice, cooling process has begun

IR Gun Back Up- 111565135

Temp Correction Factor: Add / Subtract 0.2 C

Corrected Cooler Temp.: 5.7 C **Biological Tissue is Frozen:** Yes No N/A

Temp should be above freezing to 6°C

Date and Initials of person examining contents: 4/25/12

Comments:

Chain of Custody Present:	☑Yes ☐No ☐N/A	1.
Chain of Custody Filled Out:	☑Yes ☐No ☐N/A	2.
Chain of Custody Relinquished:	☑Yes ☐No ☐N/A	3.
Sampler Name & Signature on COC:	☑Yes ☐No ☐N/A	4.
Samples Arrived within Hold Time:	☑Yes ☐No ☐N/A	5.
Short Hold Time Analysis (<72hr):	☑Yes ☐No ☐N/A	6. BOD
Rush Turn Around Time Requested:	☐Yes ☑No ☐N/A	7.
Sufficient Volume:	☑Yes ☐No ☐N/A	8.
Correct Containers Used:	☑Yes ☐No ☐N/A	9.
-Pace Containers Used:	☑Yes ☐No ☐N/A	
Containers Intact:	☑Yes ☐No ☐N/A	10.
Filtered volume received for Dissolved tests	☑Yes ☐No ☐N/A	11.
Sample Labels match COC:	☑Yes ☐No ☐N/A	12.
-Includes date/time/ID/Analysis Matrix: WT		
All containers needing preservation have been checked.	☑Yes ☐No ☐N/A	13.
All containers needing preservation are found to be in compliance with EPA recommendation.	☑Yes ☐No ☐N/A	
exceptions: VOA, coliform, TOC, O&G, WI-DRO (water)	☑Yes ☐No	Initial when completed
Samples checked for dechlorination:	☑Yes ☐No ☐N/A	14.
Headspace in VOA Vials (>6mm):	☑Yes ☐No ☐N/A	15.
Trip Blank Present:	☑Yes ☐No ☐N/A	16.
Trip Blank Custody Seals Present	☑Yes ☐No ☐N/A	
Pace Trip Blank Lot # (if purchased):_____		

Client Notification/ Resolution: Field Data Required? Y / N

Person Contacted: _____ Date/Time: _____

Comments/ Resolution: MW-08 / MW-09 not listed on COC, Rec'd containers

SCURF Review: LP **Date:** 4/26/12 **SRF Review:** LP **Date:** 4/26/12

Note: Whenever there is a discrepancy affecting North Carolina compliance samples, a copy of this form will be sent to the North Carolina DEHNR Certification Office (i.e out of hold, incorrect preservative, out of temp, incorrect containers)

APPENDIX C
Environmental Monitoring Form
and
Electronic Submittal of Environmental Monitoring Data 5803Apr2012 (CD only)

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).
- 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):

Altamont Environmental, Inc.

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

Name: Marta A. VanDussen, E.I. Phone: (828) 281-3350

E-mail: mvandussen@altamontenvironmental.com

Facility name:	Facility Address:	Facility Permit #	NC Landfill Rule: (.0500 or .1600)	Actual sampling dates (e.g., October 20-24, 2006)
Madison County Operating Solid Waste Facility	271 Craig Rudisill Road Marshall, NC 28714	58-03	.0500 & .1600	April 24-25, 2012

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.

Joel D. Lenk, PG — Project Geologist — (828) 281-3350

Facility Representative Name (Print) — Title — (Area Code) Telephone Number

Signature — 7/5/12 Date

Affix NC Licensed/ Professional Geologist Seal

NORTH CAROLINA LICENSED SEAL 2044 GEOLOGIST JOEL D. LENK

231 Haywood Street, Asheville, North Carolina 28801

Facility Representative Address

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

Revised 6/2009