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):

Municipal Engineering Services Co., PA

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

Name: Jonathan Pfohl Phone: (919)772-5393

E-mail: jpfohl@mesco.com

Facility name:	Facility Address:	Facility Permit #	NC Landfill Rule: (.0500 or .1600)	Actual sampling dates (e.g., October 20-24, 2006)
Iredell County Closed Unlined MSWLF	354 Twin Oaks Road Statesville, NC 28625	49-01	.0500	July 24-25, 2014

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.

Steven R. Gandy, Ph.D., P.E. | Senior Project Manager | (919) 772-5393

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

Signature | Date: 5/8/2015

Affix NC Licensed/ Professional Geologist Seal

NORTH CAROLINA PROFESSIONAL SEAL 31020 ENGINEER STEVEN R. GANDY

P.O. Box 97, Garner, NC 27529

Facility Representative Address

C-0281

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

Revised 6/2009

Semi-Annual Water Quality Monitoring Report

Prepared for

Iredell County Closed Unlined MSWLF
Statesville, North Carolina

July 2014

Permit Number: 49-01
MESCO Project Number: G14014.0

Submitted: May 8, 2015

P.O. Box 97
Garner, NC 27529
License No. C-0281

Municipal Services Garner, NC
Engineering Company, P.A. Boone, NC

Municipal Engineering Services Company, P.A.
Garner and Boone, North Carolina

TABLE OF CONTENTS

SECTION

Introduction ..... Page 1
Background ..... Page 1
Sampling Procedures ..... Page 2
Field Parameter Data ..... Page 2
Laboratory Results ..... Page 2
Quality Control Samples ..... Page 2
Groundwater Samples Above Standards ..... Page 2
Surface Water Samples Above Standards ..... Page 2
Groundwater and Surface Water Characterization ..... Page 2
Findings ..... Page 2
Closing ..... Page 3

FIGURES

Topographic Map with Site Location ..... Figure 1
Superimposed Aerial Photograph of Facility ..... Figure 2
Histograms of Total VOC Concentrations ..... Figure 3

TABLES

Sampling and Analysis Summary ..... Table 1
Detections that Attain or are Above SWSL, GWP, 2L, or 2B ..... Table 2
Field Observations of Monitoring Locations ..... Table 3
Groundwater Monitoring Well Construction ..... Table 4
Field Parameter Data Summary ..... Table 5
Groundwater Monitoring Well Construction Table ..... Table 6

APPENDICIES

Laboratory Analysis Reports and Chains of Custody ..... Appendix A
Field Sampling Data Sheet ..... Appendix B

License No. C-0281

CIVIL/SANITARY/ENVIRONMENTAL ENGINEERS

SOLID WASTE MANAGEMENT

Municipal Services

Engineering Company, P.A.

SITE PLANNING/SUBDIVISIONS

SUBSURFACE UTILITY ENGINEERING (SUE)

May 8, 2015

Mr. Ervin Lane
Solid Waste Section
NC DENR Division of Waste Management
1646 Mail Service Center
Raleigh, NC 27699-1646

Re: ***Semi-Annual Water Quality Monitoring Report***
Iredell County Closed Unlined Landfill
Permit No. 49-01
MESC0 Project No. G14014.0
Event Date(s): July 24-25, 2014

Dear Mr. Lane:

Introduction

On behalf of Iredell County, Municipal Engineering Services Company, P.A. (MESCO) is pleased to present this *Semi-Annual Water Quality Report* for the winter 2014 event performed at the Iredell County Closed Unlined Landfill. NCDENR Solid Waste Rules 15A NCAC 13B.0601 requires that Iredell County provide this report to the SWS on a semi-annual basis. This report documents the quality of the ground and surface waters during the monitoring event performed July 24-25, 2014. Laboratory analytical results indicate the surficial aquifer monitored by monitoring wells MW-1, MW-3, MW-6, MW-6R, and MW-7S contained between one and five volatile organic compound(s) [VOC(s)] in concentrations above their respective North Carolina Groundwater Standard (2L).

Background

The Iredell County Closed Unlined MSWLF, permit #49-01, is located at 243 Twin Oaks Road, Statesville, North Carolina. The site location topographic map is depicted in the attached **Figure 1**.

Water quality monitoring was initiated in 1989 and the facility has been continuously monitored on at least a semi-annual basis since 1995. Current data was compared to all historical data compiled since 1995.

As specified within 15A NCAC 13B.1632(j) and the SWS Environmental Monitoring Report Form this report contains sampling procedures, field and laboratory results, groundwater and surface water characterization. Detections compared to Standards tables, a field observations table, a field parameter data results table, potentiometric map and laboratory analytical data results are also enclosed.

Sampling Procedure

MESCO personnel collected water samples utilizing portable monitoring methodology from locations indicated in the site-specific Sampling and Analysis Plan (SAP) contained in the previously approved *Transition Plan*. Additional, water samples were collected from MW-3R, MW-6R, MW-7S, and MW-7D which have been installed since initiation of the SAP. Water quality monitoring locations consist of six downgradient groundwater monitoring wells (MW-2, MW-3, MW-3R, MW-4, MW-6, MW-6R), three hydraulically upgradient wells (MW-1, MW-7S, MW-7D), and two surface water locations upstream (SW-1) and downstream (SW-2) of the facility. The water supply wells designated in the SAP, which previously served the ANIMAL SHELTER and MENTAL HEALTH CENTER, were inspected during this event and remain disconnected; therefore, neither supply well was sampled. Monitoring locations are shown on the enclosed aerial photograph (**Figure 2**).

PO Box 97, Garner, North Carolina 27529 (919) 772-5393 PO Box 349, Boone, NC 28607 (828) 262-1767

The function and integrity of all monitoring locations were visually evaluated and no deficiencies observed as documented on **Table 3.** A groundwater monitoring well construction table is presented as **Table 4**. The depth to water in each well was electronically gaged prior to purging to quantify the static water level elevation. Low-flow pumping methodology or bailing was utilized to adequately purge the wells to a minimum of three times the volume of standing water in the well or until dry. Surface water samples were collected from Fourth Creek tributary discharge feature at previously designated locations. During well purging and surface water sample collection the required field parameters were recorded. The samples were then placed into laboratory-prepared, pre-preserved containers via a new disposable polyethylene bailer. Samples were kept on ice and transported to a NC-certified laboratory under proper C-O-C protocols within the specified hold times for each analysis.

Field Parameter Data

Stabilized field parameters recorded included pH, specific conductance, temperature, total dissolved solids (TDS), and turbidity. A summary of the field parameter data is presented in **Table 5** and the field sampling data sheet is enclosed in **Appendix B**. The field parameter data appears to be generally consistent relative to each other and congruent with data historically reported.

Laboratory Results

Pace Analytical Laboratories of Huntersville and Asheville, NC, performed lab analysis targeting the parameters listed in 40 CFR Subpart 258 Appendix I using EPA 8260B for volatile organic compounds (VOCs) and EPA 6000/7000 for total metals. A summary of the locations, target parameters and analytical methods are shown in **Table 1**.

Water samples were analyzed to laboratory-established Method Detection Limits (MDL) set at or below current Solid Waste Section Limits (SWSL). **Table 2** summarizes constituents detected in water samples in concentrations equal to or exceeding the current SWSL, Groundwater Protection Standards (GWP), North Carolina Groundwater Standards (2L), the North Carolina Surface Water Standards (2B) for Class C water bodies and "Primary Drinking Water Standards" aka maximum contaminant level (MCL). Laboratory results and COCs are presented in **Appendix A**.

Quality Control Samples

Constituents were not detected in any of the blanks (EB, FB and TB). Since detections were not observed in any of the blanks the data set's validity was likely not affected by artifact contamination.

Groundwater Samples Above Standards

Total metals were not detected in concentrations above their respective regulatory standard.

VOCs were reported in quantifiable concentrations above their respective 2L Standard in samples collected from downgradient wells MW-3 (1,1-DCA, PCE), MW-6 (1,2-DCP, 1,2-DCA, VCM, benzene) and MW-6R (PCE, TCE). VOCs were also detected at quantifiable levels in exceedance of their respective 2L Standard in wells MW-1 (PCE, TCE, 1,1-DCA, VCM, benzene) and MW-7S (PCE) which are likely located hydraulically upgradient from the landfill.

Surface Water Samples Above Standards

Total cadmium was detected in similar concentrations above 2B Standards in samples collected from upstream (SW-1) and downstream (SW-2) of the landfill.

Groundwater and Surface Water Characterization

Groundwater in the surficial aquifer flows from a hydrological high at MW-7S, upgradient of the MSWLF, in a general northeast direction towards the Fourth Creek discharge feature. Fourth Creek tributary was visually observed to have moderate flow and gage height with low turbidity.

Findings

The surficial aquifer monitored by down/cross gradient monitoring wells MW-3, MW-6, MW-6R, and hydraulically upgradient wells MW-1 and MW-7S contained VOCs with some concentrations above their respective 2L Standards and fewer above EPA Drinking Water Standards. All total cumulative VOC concentrations remain within their own respective historically identified range (**Figure 3**).

Closing

The Iredell County Closed Unlined Landfill will continue post-closure semi-annual water quality monitoring and sampling was performed again on February 6, 2015. If you have any questions or comments regarding this report, please contact us at (919) 772-5393 or by email at jpfohl@mesco.com or sgandy@mesco.com.

Sincerely,
MUNICIPAL ENGINEERING SERVICES CO., P.A.

Jonathan Pfohl
Environmental Specialist

Steven R. Gandy, Ph.D, P.E.
Senior Project Manger

Enclosures

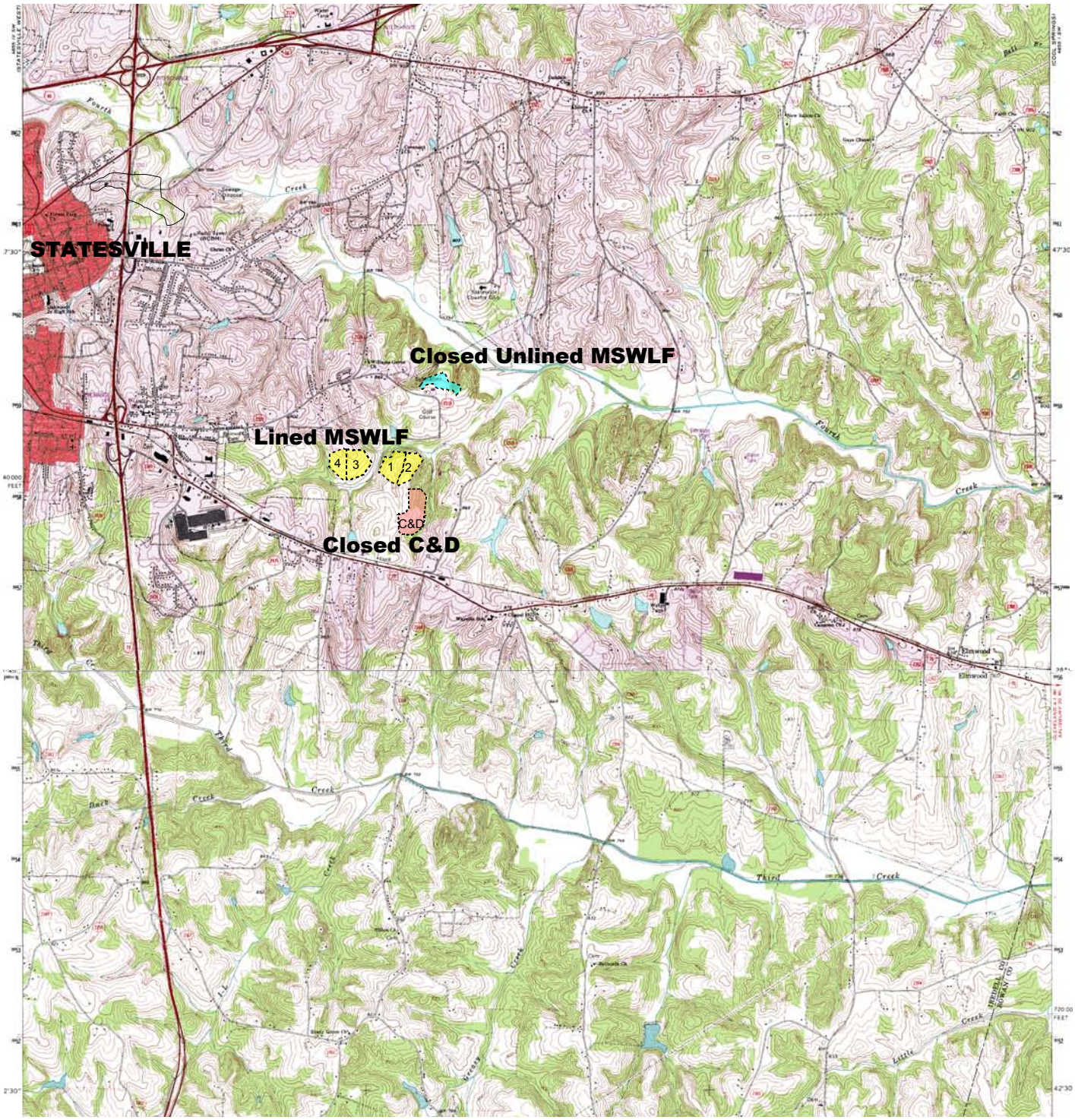
cc: Mr. David Lambert
Iredell County

Figures

Topographic Map with Site Location

Iredell County Landfill

N



354 Twin Oaks Rd
Statesville, NC 28625
Lat:35-46-17.8012
Long:-80-49-22.2973
Northing:740719.35
Easting:1459306.76

STATESVILLE EAST QUADRANGLE

ROAD CLASSIFICATION

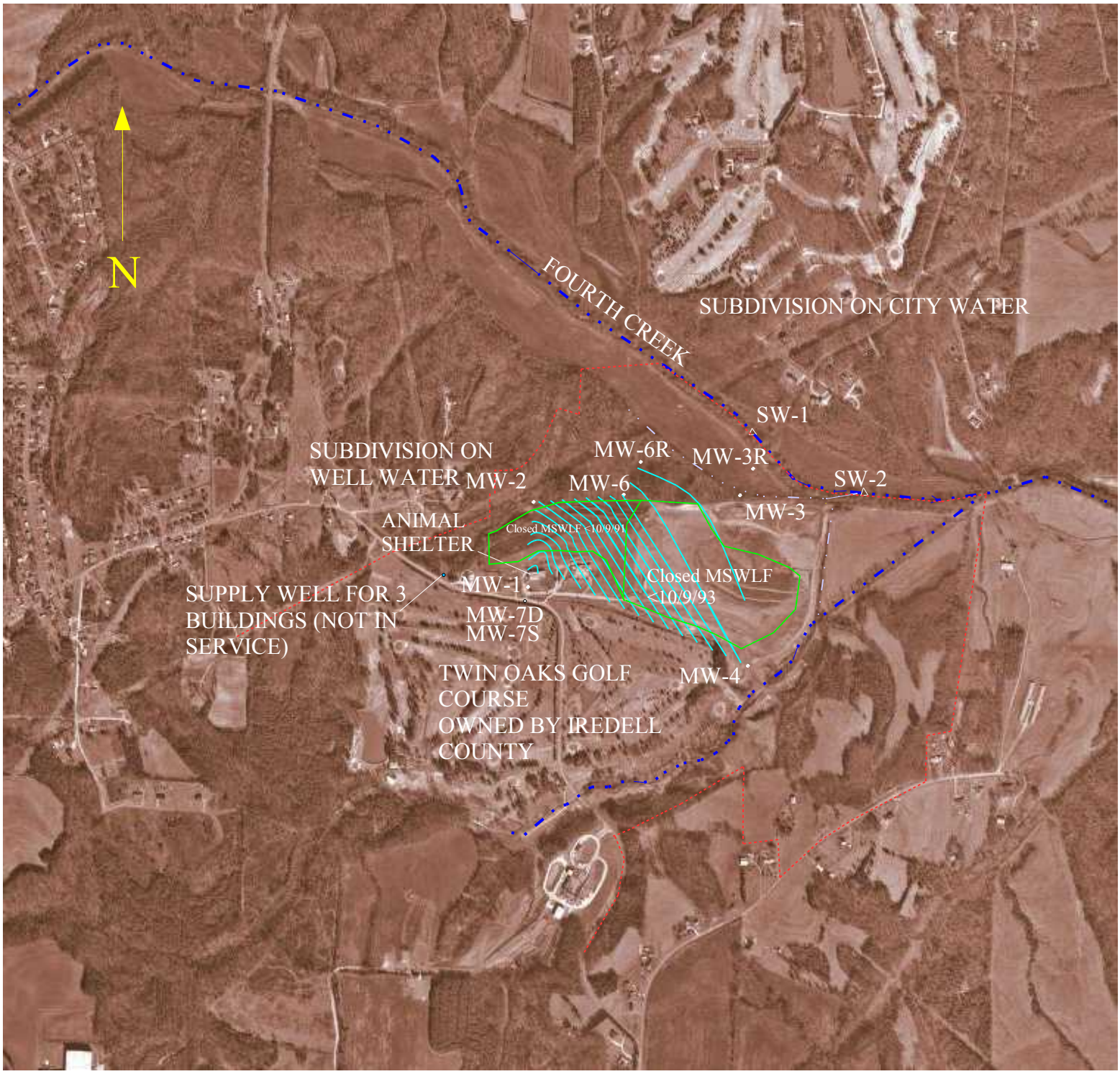
Primary highway, hard surface
Light-duty road, hard or improved surface
Secondary highway, hard surface
Unimproved road
Interstate Route
U. S. Route
State Route

2.5 0 2.5 MILES

Figure 1

Figure 2. Superimposed Aerial Photograph

Iredell County Closed Unlined MSWLF

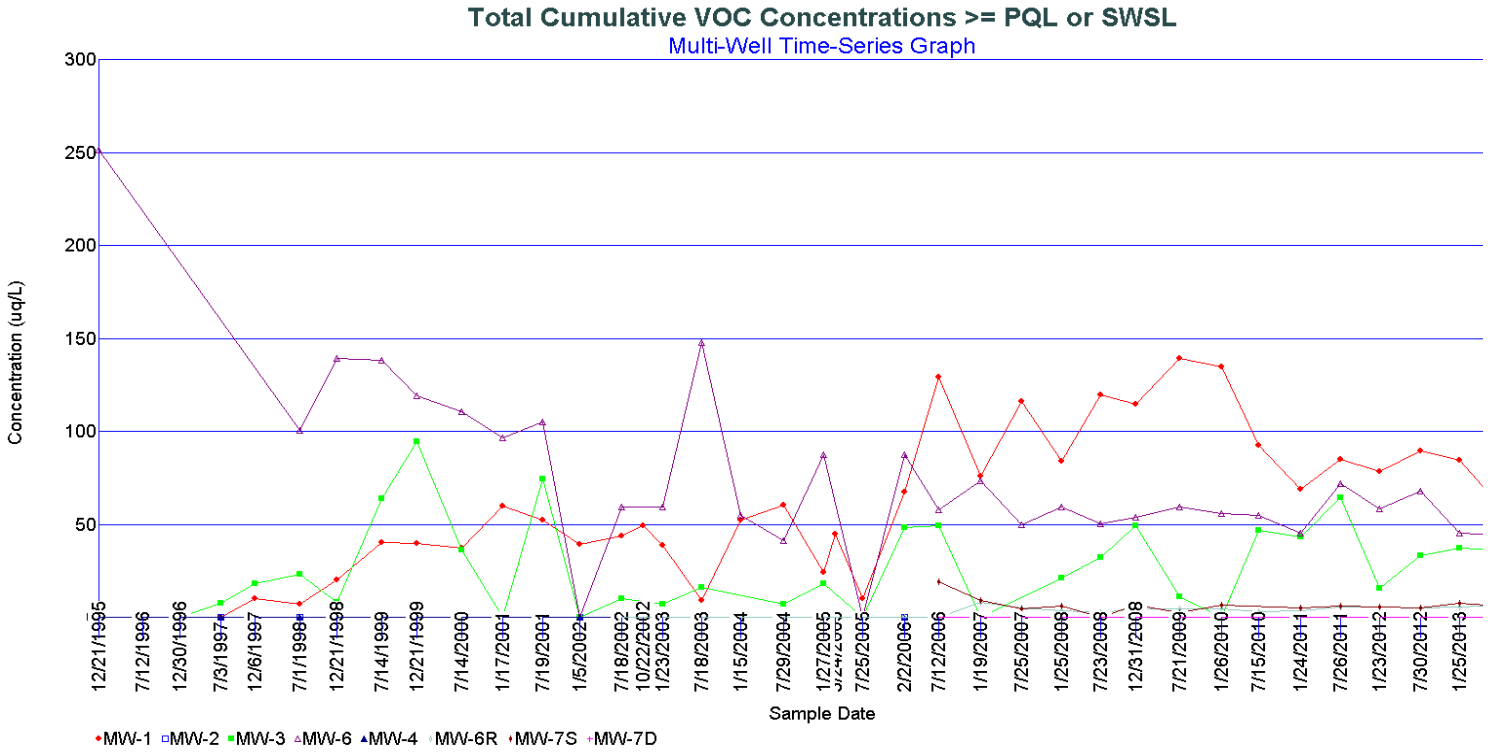


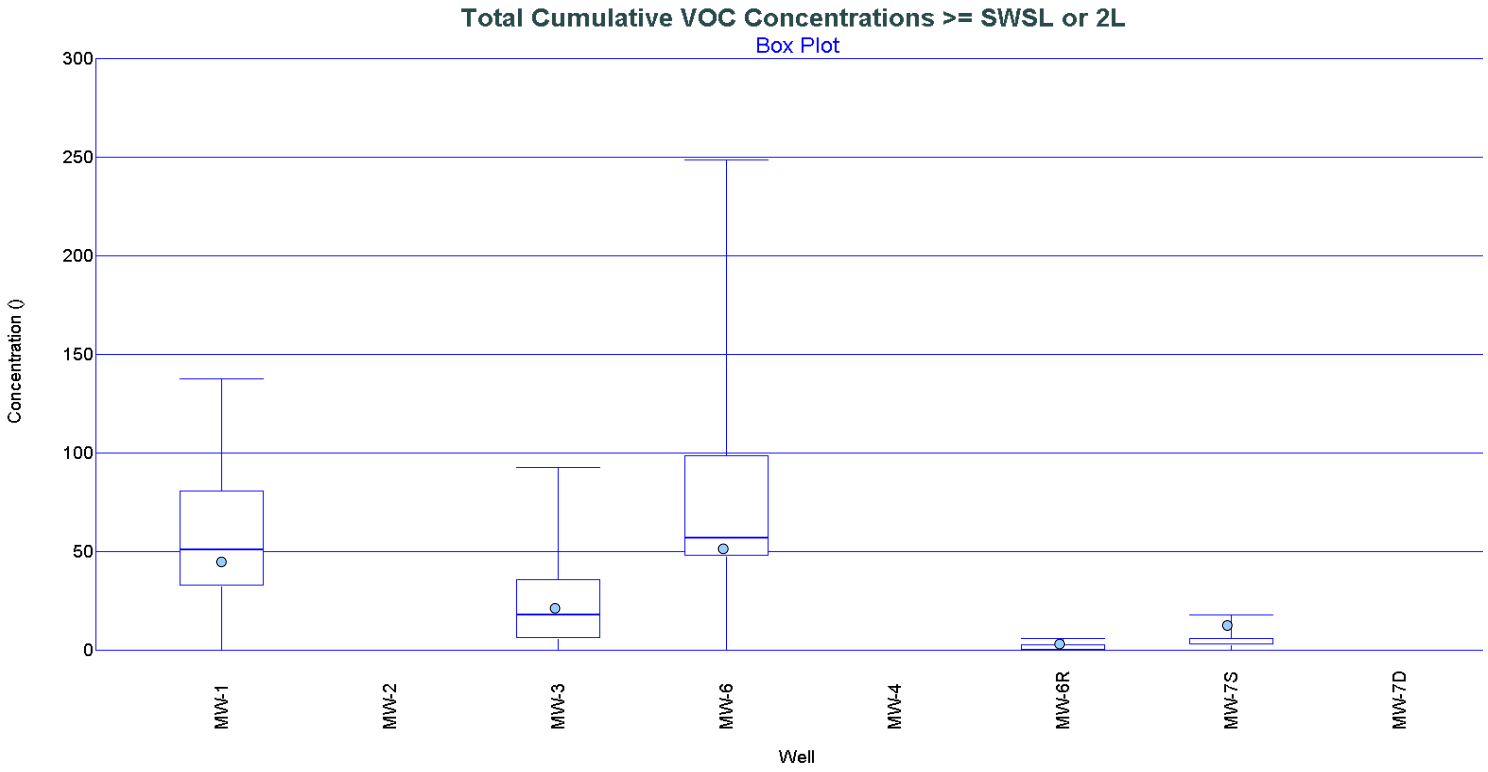
Property Line
General Groundwater Contours
Ephemeral Ditch
Perennial Stream
Waste Limit

Monitoring Locations Not Surveyed

Municipal Services Engineering Company
Garner, NC Boone, NC

Figure 3
Histograms of Total VOC Concentrations
December 21, 1995 – July 25, 2014





○ = July 25, 2014

Tables

Table 1
Sampling and Analysis Summary
July 24-25, 2014

		App. I		Field Parameter				
	Reason Not Sampled	VOCs	Total Metals	Temperature	Conductivity	Total Dissolved Solids (TDS)	pH	Turbidity
		Lab EPA 8260B	Lab EPA 6000/7000	Field Meter	Field Meter	Field Meter	Field Meter	Field Visual
MW-1		x	x	x	x	x	x	x
MW-2		x	x	x	x	x	x	x
MW-3		x	x	x	x	x	x	x
MW-3R		x	x	x	x	x	x	x
MW-4		x	x	x	x	x	x	x
MW-6		x	x	x	x	x	x	x
MW-6R		x	x	x	x	x	x	x
MW-7S		x	x	x	x	x	x	x
MW-7D		x	x	x	x	x	x	x
SW-1		x	x	x	x	x	x	x
SW-2		x	x	x	x	x	x	x
EB		x	x					
FB		x	x					
TB		x						

All locations listed in the water quality monitoring plan are shown

Appendix I List taken from current 40 CFR 258

Table 2
Detections that Attain or are Above SWSL, GWP, 2L or 2B
July 24-25, 2014

Sample ID	Parameter Name [1]	Sample Date	Result	Unit	MDL [2]	SWSL [3]	2L [4]	2B [5]	GWP [6]	MCL [7]	Preliminary Cause [8]
MW-1	Vinyl chloride	7/25/14	2.1	ug/L	0.62	1	**0.03**			5	L &/or LFG
MW-1	Tetrachloroethene	7/25/14	4.9	ug/L	0.46	1	**0.7**			5	L &/or LFG
MW-1	Trichloroethene	7/25/14	8	ug/L	0.47	1	**3**			**5**	L &/or LFG
MW-1	Benzene	7/25/14	1.1	ug/L	0.25	1	**1**			5	L &/or LFG
MW-1	1,1-Dichloroethane	7/25/14	15.8	ug/L	0.32	5	**6**			**7**	L &/or LFG
MW-1	cis-1,2-Dichloroethene	7/25/14	10.2	ug/L	0.19	5	70			70	
MW-1	Methylene Chloride	7/25/14	2.3	ug/L	0.97	1	4.6			5	
MW-1	1,4-Dichlorobenzene	7/25/14	1.4	ug/L	0.33	1	6			75	
MW-1	Zinc, total	7/25/14	25.4	ug/L	10	10	1050			5000	
MW-2	Zinc, total	7/25/14	12.1	ug/L	10	10	1050			5000	
MW-2	Barium, total	7/25/14	595	ug/L	5	100	700			2000	
MW-3	Tetrachloroethene	7/24/14	2.2	ug/L	0.46	1	**0.7**			5	L &/or LFG
MW-3	1,1-Dichloroethane	7/24/14	14.8	ug/L	0.32	5	**6**			**7**	L &/or LFG
MW-3	Trichloroethene	7/24/14	2.8	ug/L	0.47	1	3			5	
MW-6	1,2-Dichloroethane	7/25/14	3.1	ug/L	0.12	1	**0.38**			5	L &/or LFG
MW-6	Vinyl chloride	7/25/14	3.7	ug/L	0.62	1	**0.03**			5	L &/or LFG
MW-6	1,2-Dichloropropane	7/25/14	1.5	ug/L	0.27	1	**0.6**			5	L &/or LFG
MW-6	Cadmium, total	7/25/14	1.4	ug/L	1	1	1.75			5	
MW-6	1,4-Dichlorobenzene	7/25/14	1.9	ug/L	0.33	1	6			75	
MW-6	Benzene	7/25/14	4.9	ug/L	0.25	1	**1**			5	
MW-6	1,1-Dichloroethane	7/25/14	5	ug/L	0.32	5	6			7	
MW-6	Cobalt, total	7/25/14	37.6	ug/L	5	10			70	NE	
MW-6	Barium, total	7/25/14	511	ug/L	5	100	700			2000	
MW-6	cis-1,2-Dichloroethene	7/25/14	29.8	ug/L	0.19	5	70			70	
MW-6R	Tetrachloroethene	7/25/14	2.6	ug/L	0.46	1	**0.7**			5	L &/or LFG
MW-6R	Trichloroethene	7/25/14	4.1	ug/L	0.47	1	**3**			5	L &/or LFG
MW-6R	Zinc, total	7/25/14	11.8	ug/L	10	10	1050			5000	

Sample ID	Parameter Name [1]	Sample Date	Result	Unit	MDL [2]	SWSL [3]	2L [4]	2B [5]	GWP [6]	MCL [7]	Preliminary Cause [8]
MW-7D	Vanadium, total	7/25/14	19,j	ug/L	5	25			**3.5**		
MW-7S	Tetrachloroethene	7/25/14	6.2	ug/L	0.46	1	**0.7**			**5**	LFG
MW-7S	Barium, total	7/25/14	132	ug/L	5	100	700			2000	
MW-7S	Zinc, total	7/25/14	22.5	ug/L	10	10	1050			5000	
MW-7S	Trichloroethene	7/25/14	1.8	ug/L	0.47	1	3			5	
MW-7S	Vanadium, total	7/25/14	7.9,j	ug/L	5	25			**3.5**	NE	

[1] Table contains constituents detected at or above SWSL, GWP, 2L, or 2B

[2] MDL = Method Detection Limit

[3] SWSL = Solid Waste Section Reporting Limit

[4] 2L = North Carolina 15A NCAC 2L Groundwater Quality Standard

[5] 2B = North Carolina 15 NCAC 2B Surface Water Quality Standard for this Specific Stream Classification

[6] GWP = Groundwater Protection Standard

7 MCL = Primary Drinking Water Standard (not currently applicable for regulatory comparisons)

[8] Preliminary Cause = Refers to a preliminary analysis of the cause and/or source of a detection over the respective 2L/2B Standard. A definitive source of the detection was not determined as part of this report.

j =The reported value is between the laboratory method detection limit (MDL) and the laboratory method reporting limit (MRL), adjusted for actual sample preparation data and moisture content, where applicable

B = Background as detected upgradient/upstream of facility

N = Natural from erosion of natural deposits

L = Leachate

LFG = Landfill Gas

NE = Not Established

BOLD = Concentration > 2L, 2B, GWP or MCL Standard

Table 3
Field Observations of Monitoring Locations
July 24-25, 2014

Sample Location	Viable Monitoring Location	Lack of Any Evidence of Tampering	Locked	Hinge/Hasp Operational	Tagged or Labeled	Concrete Surface Pad Appears Effective	Comments
MW-1	Yes	Yes	Yes	Yes	Yes	Yes	
MW-2	Yes	Yes	Yes	Yes	Yes	Yes	
MW-3	Yes	Yes	Yes	Yes	Yes	Yes	
MW-3R	Yes	Yes	Yes	Yes	Yes	Yes	
MW-4	Yes	Yes	Yes	Yes	Yes	Yes	
MW-6	Yes	Yes	Yes	Yes	Yes	Yes	
MW-6R	Yes	Yes	Yes	Yes	Yes	Yes	
MW-7S	Yes	Yes	Yes	Yes	Yes	Yes	
MW-7D	Yes	Yes	Yes	Yes	Yes	Yes	
SW-1	Yes	Yes	Yes	Yes	Yes	Yes	Moderate Volume & Flow
SW-2	Yes	Yes	Yes	Yes	Yes	Yes	Moderate Volume & Flow
Mental Health Center	No	Yes	na	na	na	na	Not in Use
Animal Shelter	No	Yes	na	na	na	na	Not in Use Wiring Disconnected

Any unusual field conditions, observations, or events:

Animal Shelter permanently closed on July 6, 2011. MW-1 is located inside animal shelter's fence.

All steel protective well cases painted yellow by County since July 2011.

Field in which MW-3R is located was dry and firm which is atypical.

Table 4
Groundwater Monitoring Well Construction Table
July 24-25, 2014

Monitoring Well	Date Installed	Well Diameter (inches)	Total Well Depth (ft bgs)	Top of Screen Depth (ft bgs)	Screen Interval (ft bgs)	Geology of Screened Interval	Top of Casing Elevation (ft amsl)	Ground Elevation (ft amsl)	Groundwater Elevation (ft amsl)	Depth to Water (ft btoc)	Latitude	Longitude
MW-1	06/19/89	2	60	50	10	Sandy Clay	843.83	841.92	802.78	41.05	35º46'31.5087"	80º49'31.0952"
MW-2	06/19/89	2	49	39	10	Sandy Clay	797.44	795.33	778.79	18.65	35º46'46.0504"	80º49'30.3965"
MW-3R	06/21/02	2	23	13	10	Sandy Clay	752.69	753.93	745.76	6.93	35º46'46.7602"	80º49'8.4510"
MW-3	06/19/89	2	20	5	15	Sandy Silt	756.09	749.46	746.21	9.88	35º46'49.1493"	80º49'7.0950"
MW-4	06/19/89	2	30	20	10	Sandy Clay	764.87	762.67	752.91	11.96	35º46'31.5087"	80º49'7.4321"
MW-6	01/21/92	2	33	18	15	Sandy Silt	782.49	781.49	756.24	26.25	35º46'46.7528"	80º49'20.8301"
MW-6R	06/21/02	2	20.5	5.5	15	Sandy Silt	753.13	750.24	749.48	3.65	35º46'49.6883"	80º49'19.0478"
MW-7S	07/01/06	2	54.37	39.37	15	Sandy Clay	846.77	843.77	803.92	42.85	35º46'37.9363"	80º49'31.2640"
MW-7D	07/01/06	2	132.1	122.1	10	Rock	846.60	843.60	803.67	42.93	35º46'37.9281"	80º49'31.2202"

NOTE:
bgs = below ground surface
amsl= above mean sea level
btoc = below top of PVC well casing

Table 5
Field Parameter Data Summary
July 24-25, 2014

Sample ID	Water Depth	Water Elevation	TOC Elevation	Temp.	ORP	DO	pH	Specific Conductance	TDS	Turbidity of Metal Sample
Units	**ft (btoc)**	**ft (amsl)**	**ft (amsl)**	**C**	**mV**	**mg/L**	**SU**	**µs/cm**	**ppt**	**Visual**
MW-1	41.05	802.78	843.83	18.2	NR	NR	4.83	10	0	Clear
MW-2	18.65	778.79	797.44	18.1	NR	NR	6.42	280	130	Clear
MW-3R	6.93	745.76	752.69	15.9	NR	NR	6.21	80	30	Slight
MW-3	9.88	746.21	756.09	15.1	NR	NR	7.21	270	130	Slight
MW-4	11.96	752.91	764.87	15.9	NR	NR	6.28	450	220	Clear
MW-6	26.25	756.24	782.49	18.1	NR	NR	6.21	1200	600	Clear
MW-6R	3.65	749.48	753.13	15.8	NR	NR	6.21	120	50	Clear
MW-7S	42.85	803.92	846.77	18.9	NR	NR	5.12	10	0	Clear
MW-7D	42.93	803.67	846.60	21.4	NR	NR	6.91	60	30	Clear
Minimum	3.65	745.76	752.69	15.1	NR	NR	4.83	10	0	Clear
Average	22.68	771.08	793.77	17.5	NR	NR	6.16	276	132	Clear
Maximum	42.93	803.92	846.77	21.4	NR	NR	7.21	1200	600	Slight
SW-1	-	-	-	24.3	NR	NR	7.07	100	50	Clear
SW-2	-	-	-	24.7	NR	NR	6.99	90	40	Clear
Minimum	-	-	-	24.3	NR	NR	6.99	90	40	Clear
Average	-	-	-	24.5	NR	NR	7.03	95	45	Clear
Maximum	-	-	-	24.7	NR	NR	7.07	100	50	Clear

NR = No reading attempted and not required

Appendix A
Laboratory Analysis Reports
Chains of Custody

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

August 01, 2014

Mr. Jonathan Pfohl
Municipal Engineering Services
PO Box 97
Garner, NC 27529

RE: Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Dear Mr. Pfohl:
Enclosed are the analytical results for sample(s) received by the laboratory on July 25, 2014. 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,

Kevin Godwin
kevin.godwin@pacelabs.com
Project Manager

Enclosures

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

CERTIFICATIONS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

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
Florida/NELAP Certification #: E87627
Kentucky UST Certification #: 84
West Virginia Certification #: 357
Virginia/VELAP Certification #: 460221

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
West Virginia Certification #: 356
Virginia/VELAP Certification #: 460222

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

SAMPLE SUMMARY

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Lab ID	Sample ID	Matrix	Date Collected	Date Received
92210772001	**MW-1**	Water	07/25/14 09:00	07/25/14 14:00
92210772002	**MW-2**	Water	07/25/14 09:40	07/25/14 14:00
92210772003	**MW-3**	Water	07/24/14 16:10	07/25/14 14:00
92210772004	**MW-3R**	Water	07/24/14 11:50	07/25/14 14:00
92210772005	**MW-4**	Water	07/24/14 17:30	07/25/14 14:00
92210772006	**MW-6**	Water	07/25/14 11:00	07/25/14 14:00
92210772007	**MW-6R**	Water	07/25/14 10:15	07/25/14 14:00
92210772008	**MW-7S**	Water	07/25/14 08:30	07/25/14 14:00
92210772009	**MW-7D**	Water	07/25/14 08:00	07/25/14 14:00
92210772010	**SW-1**	Water	07/24/14 16:30	07/25/14 14:00
92210772011	**SW-2**	Water	07/24/14 16:45	07/25/14 14:00

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

SAMPLE ANALYTE COUNT

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Lab ID	Sample ID	Method	Analysts	Analytes Reported	Laboratory
92210772001	**MW-1**	EPA 6010	JMW	15	PASI-A
		EPA 8260	MCK	51	PASI-C
92210772002	**MW-2**	EPA 6010	JMW	15	PASI-A
		EPA 8260	MCK	51	PASI-C
92210772003	**MW-3**	EPA 6010	JMW	15	PASI-A
		EPA 8260	MCK	51	PASI-C
92210772004	**MW-3R**	EPA 6010	JMW	15	PASI-A
		EPA 8260	MCK	51	PASI-C
92210772005	**MW-4**	EPA 6010	JMW	15	PASI-A
		EPA 8260	MCK	51	PASI-C
92210772006	**MW-6**	EPA 6010	JMW	15	PASI-A
		EPA 8260	MCK	51	PASI-C
92210772007	**MW-6R**	EPA 6010	JMW	15	PASI-A
		EPA 8260	MCK	51	PASI-C
92210772008	**MW-7S**	EPA 6010	JMW	15	PASI-A
		EPA 8260	MCK	51	PASI-C
92210772009	**MW-7D**	EPA 6010	JMW	15	PASI-A
		EPA 8260	MCK	51	PASI-C
92210772010	**SW-1**	EPA 6010	JMW	15	PASI-A
		EPA 8260	MCK	51	PASI-C
92210772011	**SW-2**	EPA 6010	JMW	15	PASI-A
		EPA 8260	MCK	51	PASI-C

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-1 **Lab ID: 92210772001** Collected: 07/25/14 09:00 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	6.0	5.0	1	07/28/14 16:30	07/30/14 18:19	7440-36-0	
Arsenic	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:19	7440-38-2	
Barium	**88.7J**	ug/L	100	5.0	1	07/28/14 16:30	07/30/14 18:19	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:19	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:19	7440-43-9	
Chromium	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:19	7440-47-3	
Cobalt	**9.3J**	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:19	7440-48-4	
Copper	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:19	7440-50-8	
Lead	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:19	7439-92-1	
Nickel	**7.2J**	ug/L	50.0	5.0	1	07/28/14 16:30	07/30/14 18:19	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:19	7782-49-2	
Silver	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:19	7440-22-4	
Thallium	ND	ug/L	5.5	5.4	1	07/28/14 16:30	07/30/14 18:19	7440-28-0	
Vanadium	ND	ug/L	25.0	5.0	1	07/28/14 16:30	07/30/14 18:19	7440-62-2	
Zinc	**25.4**	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:19	7440-66-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 20:27	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 20:27	107-13-1	
Benzene	**1.1**	ug/L	1.0	0.25	1		07/29/14 20:27	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 20:27	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 20:27	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 20:27	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 20:27	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 20:27	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 20:27	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 20:27	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 20:27	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 20:27	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 20:27	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 20:27	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 20:27	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 20:27	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 20:27	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 20:27	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 20:27	95-50-1	
1,4-Dichlorobenzene	**1.4**	ug/L	1.0	0.33	1		07/29/14 20:27	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 20:27	110-57-6	
1,1-Dichloroethane	**15.8**	ug/L	5.0	0.32	1		07/29/14 20:27	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 20:27	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 20:27	75-35-4	
cis-1,2-Dichloroethene	**10.2**	ug/L	5.0	0.19	1		07/29/14 20:27	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 20:27	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 20:27	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 20:27	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 20:27	10061-01-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-1 **Lab ID: 92210772001** Collected: 07/25/14 09:00 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 20:27	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 20:27	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 20:27	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 20:27	74-88-4	
Methylene Chloride	**2.3**	ug/L	1.0	0.97	1		07/29/14 20:27	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 20:27	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 20:27	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 20:27	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 20:27	79-34-5	
Tetrachloroethene	**4.9**	ug/L	1.0	0.46	1		07/29/14 20:27	127-18-4	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 20:27	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 20:27	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 20:27	79-00-5	
Trichloroethene	**8.0**	ug/L	1.0	0.47	1		07/29/14 20:27	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 20:27	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 20:27	96-18-4	
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 20:27	108-05-4	
Vinyl chloride	**2.1**	ug/L	1.0	0.62	1		07/29/14 20:27	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 20:27	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	99	%	70-130		1		07/29/14 20:27	460-00-4	
1,2-Dichloroethane-d4 (S)	114	%	70-130		1		07/29/14 20:27	17060-07-0	
Toluene-d8 (S)	101	%	70-130		1		07/29/14 20:27	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-2 **Lab ID: 92210772002** Collected: 07/25/14 09:40 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	6.0	5.0	1	07/28/14 16:30	07/30/14 18:22	7440-36-0	
Arsenic	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:22	7440-38-2	
Barium	**595**	ug/L	100	5.0	1	07/28/14 16:30	07/30/14 18:22	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:22	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:22	7440-43-9	
Chromium	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:22	7440-47-3	
Cobalt	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:22	7440-48-4	
Copper	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:22	7440-50-8	
Lead	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:22	7439-92-1	
Nickel	ND	ug/L	50.0	5.0	1	07/28/14 16:30	07/30/14 18:22	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:22	7782-49-2	
Silver	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:22	7440-22-4	
Thallium	ND	ug/L	5.5	5.4	1	07/28/14 16:30	07/30/14 18:22	7440-28-0	
Vanadium	ND	ug/L	25.0	5.0	1	07/28/14 16:30	07/30/14 18:22	7440-62-2	
Zinc	**12.1**	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:22	7440-66-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 20:43	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 20:43	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		07/29/14 20:43	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 20:43	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 20:43	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 20:43	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 20:43	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 20:43	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 20:43	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 20:43	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 20:43	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 20:43	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 20:43	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 20:43	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 20:43	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 20:43	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 20:43	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 20:43	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 20:43	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		07/29/14 20:43	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 20:43	110-57-6	
1,1-Dichloroethane	ND	ug/L	5.0	0.32	1		07/29/14 20:43	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 20:43	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 20:43	75-35-4	
cis-1,2-Dichloroethene	ND	ug/L	5.0	0.19	1		07/29/14 20:43	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 20:43	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 20:43	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 20:43	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 20:43	10061-01-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-2 **Lab ID: 92210772002** Collected: 07/25/14 09:40 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 20:43	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 20:43	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 20:43	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 20:43	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 20:43	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 20:43	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 20:43	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 20:43	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 20:43	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		07/29/14 20:43	127-18-4	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 20:43	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 20:43	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 20:43	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		07/29/14 20:43	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 20:43	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 20:43	96-18-4	
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 20:43	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		07/29/14 20:43	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 20:43	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	104	%	70-130		1		07/29/14 20:43	460-00-4	
1,2-Dichloroethane-d4 (S)	114	%	70-130		1		07/29/14 20:43	17060-07-0	
Toluene-d8 (S)	101	%	70-130		1		07/29/14 20:43	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-3 **Lab ID: 92210772003** Collected: 07/24/14 16:10 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	6.0	5.0	1	07/28/14 16:30	07/30/14 18:26	7440-36-0	
Arsenic	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:26	7440-38-2	
Barium	**93.6J**	ug/L	100	5.0	1	07/28/14 16:30	07/30/14 18:26	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:26	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:26	7440-43-9	
Chromium	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:26	7440-47-3	
Cobalt	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:26	7440-48-4	
Copper	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:26	7440-50-8	
Lead	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:26	7439-92-1	
Nickel	ND	ug/L	50.0	5.0	1	07/28/14 16:30	07/30/14 18:26	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:26	7782-49-2	
Silver	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:26	7440-22-4	
Thallium	ND	ug/L	5.5	5.4	1	07/28/14 16:30	07/30/14 18:26	7440-28-0	
Vanadium	ND	ug/L	25.0	5.0	1	07/28/14 16:30	07/30/14 18:26	7440-62-2	
Zinc	ND	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:26	7440-66-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 20:59	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 20:59	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		07/29/14 20:59	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 20:59	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 20:59	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 20:59	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 20:59	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 20:59	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 20:59	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 20:59	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 20:59	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 20:59	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 20:59	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 20:59	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 20:59	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 20:59	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 20:59	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 20:59	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 20:59	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		07/29/14 20:59	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 20:59	110-57-6	
1,1-Dichloroethane	**14.8**	ug/L	5.0	0.32	1		07/29/14 20:59	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 20:59	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 20:59	75-35-4	
cis-1,2-Dichloroethene	**3.1J**	ug/L	5.0	0.19	1		07/29/14 20:59	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 20:59	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 20:59	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 20:59	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 20:59	10061-01-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-3 **Lab ID: 92210772003** Collected: 07/24/14 16:10 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 20:59	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 20:59	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 20:59	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 20:59	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 20:59	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 20:59	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 20:59	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 20:59	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 20:59	79-34-5	
Tetrachloroethene	**2.2**	ug/L	1.0	0.46	1		07/29/14 20:59	127-18-4	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 20:59	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 20:59	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 20:59	79-00-5	
Trichloroethene	**2.8**	ug/L	1.0	0.47	1		07/29/14 20:59	79-01-6	
Trichlorofluoromethane	**0.58J**	ug/L	1.0	0.20	1		07/29/14 20:59	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 20:59	96-18-4	
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 20:59	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		07/29/14 20:59	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 20:59	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	103	%	70-130		1		07/29/14 20:59	460-00-4	
1,2-Dichloroethane-d4 (S)	114	%	70-130		1		07/29/14 20:59	17060-07-0	
Toluene-d8 (S)	100	%	70-130		1		07/29/14 20:59	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-3R **Lab ID: 92210772004** Collected: 07/24/14 11:50 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	6.0	5.0	1	07/28/14 16:30	07/30/14 18:38	7440-36-0	
Arsenic	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:38	7440-38-2	
Barium	**84.6J**	ug/L	100	5.0	1	07/28/14 16:30	07/30/14 18:38	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:38	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:38	7440-43-9	
Chromium	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:38	7440-47-3	
Cobalt	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:38	7440-48-4	
Copper	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:38	7440-50-8	
Lead	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:38	7439-92-1	
Nickel	ND	ug/L	50.0	5.0	1	07/28/14 16:30	07/30/14 18:38	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:38	7782-49-2	
Silver	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:38	7440-22-4	
Thallium	ND	ug/L	5.5	5.4	1	07/28/14 16:30	07/30/14 18:38	7440-28-0	
Vanadium	ND	ug/L	25.0	5.0	1	07/28/14 16:30	07/30/14 18:38	7440-62-2	
Zinc	ND	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:38	7440-66-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 21:15	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 21:15	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		07/29/14 21:15	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 21:15	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 21:15	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 21:15	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 21:15	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 21:15	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 21:15	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 21:15	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 21:15	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 21:15	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 21:15	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 21:15	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 21:15	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 21:15	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 21:15	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 21:15	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 21:15	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		07/29/14 21:15	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 21:15	110-57-6	
1,1-Dichloroethane	**1.4J**	ug/L	5.0	0.32	1		07/29/14 21:15	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 21:15	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 21:15	75-35-4	
cis-1,2-Dichloroethene	ND	ug/L	5.0	0.19	1		07/29/14 21:15	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 21:15	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 21:15	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 21:15	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 21:15	10061-01-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-3R **Lab ID: 92210772004** Collected: 07/24/14 11:50 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 21:15	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 21:15	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 21:15	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 21:15	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 21:15	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 21:15	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 21:15	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 21:15	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 21:15	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		07/29/14 21:15	127-18-4	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 21:15	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 21:15	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 21:15	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		07/29/14 21:15	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 21:15	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 21:15	96-18-4	
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 21:15	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		07/29/14 21:15	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 21:15	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	104	%	70-130		1		07/29/14 21:15	460-00-4	
1,2-Dichloroethane-d4 (S)	115	%	70-130		1		07/29/14 21:15	17060-07-0	
Toluene-d8 (S)	100	%	70-130		1		07/29/14 21:15	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-4 **Lab ID: 92210772005** Collected: 07/24/14 17:30 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	6.0	5.0	1	07/28/14 16:30	07/30/14 18:47	7440-36-0	
Arsenic	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:47	7440-38-2	
Barium	**20.7J**	ug/L	100	5.0	1	07/28/14 16:30	07/30/14 18:47	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:47	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:47	7440-43-9	
Chromium	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:47	7440-47-3	
Cobalt	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:47	7440-48-4	
Copper	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:47	7440-50-8	
Lead	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:47	7439-92-1	
Nickel	ND	ug/L	50.0	5.0	1	07/28/14 16:30	07/30/14 18:47	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	07/28/14 16:30	07/31/14 15:07	7782-49-2	
Silver	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:47	7440-22-4	
Thallium	ND	ug/L	5.5	5.4	1	07/28/14 16:30	07/30/14 18:47	7440-28-0	
Vanadium	ND	ug/L	25.0	5.0	1	07/28/14 16:30	07/30/14 18:47	7440-62-2	
Zinc	ND	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:47	7440-66-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 21:31	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 21:31	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		07/29/14 21:31	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 21:31	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 21:31	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 21:31	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 21:31	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 21:31	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 21:31	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 21:31	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 21:31	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 21:31	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 21:31	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 21:31	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 21:31	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 21:31	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 21:31	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 21:31	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 21:31	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		07/29/14 21:31	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 21:31	110-57-6	
1,1-Dichloroethane	ND	ug/L	5.0	0.32	1		07/29/14 21:31	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 21:31	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 21:31	75-35-4	
cis-1,2-Dichloroethene	ND	ug/L	5.0	0.19	1		07/29/14 21:31	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 21:31	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 21:31	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 21:31	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 21:31	10061-01-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-4 **Lab ID: 92210772005** Collected: 07/24/14 17:30 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 21:31	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 21:31	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 21:31	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 21:31	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 21:31	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 21:31	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 21:31	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 21:31	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 21:31	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		07/29/14 21:31	127-18-4	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 21:31	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 21:31	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 21:31	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		07/29/14 21:31	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 21:31	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 21:31	96-18-4	
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 21:31	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		07/29/14 21:31	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 21:31	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	103	%	70-130		1		07/29/14 21:31	460-00-4	
1,2-Dichloroethane-d4 (S)	114	%	70-130		1		07/29/14 21:31	17060-07-0	
Toluene-d8 (S)	100	%	70-130		1		07/29/14 21:31	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-6 **Lab ID: 92210772006** Collected: 07/25/14 11:00 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	6.0	5.0	1	07/28/14 16:30	07/30/14 18:50	7440-36-0	
Arsenic	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:50	7440-38-2	
Barium	**511**	ug/L	100	5.0	1	07/28/14 16:30	07/30/14 18:50	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:50	7440-41-7	
Cadmium	**1.4**	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:50	7440-43-9	
Chromium	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:50	7440-47-3	
Cobalt	**37.6**	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:50	7440-48-4	
Copper	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:50	7440-50-8	
Lead	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:50	7439-92-1	
Nickel	ND	ug/L	50.0	5.0	1	07/28/14 16:30	07/30/14 18:50	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:50	7782-49-2	
Silver	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:50	7440-22-4	
Thallium	ND	ug/L	5.5	5.4	1	07/28/14 16:30	07/30/14 18:50	7440-28-0	
Vanadium	ND	ug/L	25.0	5.0	1	07/28/14 16:30	07/30/14 18:50	7440-62-2	
Zinc	ND	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:50	7440-66-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 21:47	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 21:47	107-13-1	
Benzene	**4.9**	ug/L	1.0	0.25	1		07/29/14 21:47	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 21:47	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 21:47	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 21:47	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 21:47	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 21:47	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 21:47	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 21:47	56-23-5	
Chlorobenzene	**1.3J**	ug/L	3.0	0.23	1		07/29/14 21:47	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 21:47	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 21:47	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 21:47	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 21:47	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 21:47	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 21:47	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 21:47	74-95-3	
1,2-Dichlorobenzene	**0.59J**	ug/L	5.0	0.30	1		07/29/14 21:47	95-50-1	
1,4-Dichlorobenzene	**1.9**	ug/L	1.0	0.33	1		07/29/14 21:47	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 21:47	110-57-6	
1,1-Dichloroethane	**5.0**	ug/L	5.0	0.32	1		07/29/14 21:47	75-34-3	
1,2-Dichloroethane	**3.1**	ug/L	1.0	0.12	1		07/29/14 21:47	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 21:47	75-35-4	
cis-1,2-Dichloroethene	**29.8**	ug/L	5.0	0.19	1		07/29/14 21:47	156-59-2	
trans-1,2-Dichloroethene	**0.52J**	ug/L	5.0	0.49	1		07/29/14 21:47	156-60-5	
1,2-Dichloropropane	**1.5**	ug/L	1.0	0.27	1		07/29/14 21:47	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 21:47	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 21:47	10061-01-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-6 **Lab ID: 92210772006** Collected: 07/25/14 11:00 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 21:47	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 21:47	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 21:47	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 21:47	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 21:47	75-09-2	
4-Methyl-2-pentanone (MIBK)	**0.87J**	ug/L	100	0.33	1		07/29/14 21:47	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 21:47	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 21:47	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 21:47	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		07/29/14 21:47	127-18-4	
Toluene	**0.32J**	ug/L	1.0	0.26	1		07/29/14 21:47	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 21:47	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 21:47	79-00-5	
Trichloroethene	**0.65J**	ug/L	1.0	0.47	1		07/29/14 21:47	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 21:47	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 21:47	96-18-4	
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 21:47	108-05-4	
Vinyl chloride	**3.7**	ug/L	1.0	0.62	1		07/29/14 21:47	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 21:47	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	104	%	70-130		1		07/29/14 21:47	460-00-4	
1,2-Dichloroethane-d4 (S)	114	%	70-130		1		07/29/14 21:47	17060-07-0	
Toluene-d8 (S)	100	%	70-130		1		07/29/14 21:47	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-6R **Lab ID: 92210772007** Collected: 07/25/14 10:15 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	6.0	5.0	1	07/28/14 16:30	07/30/14 18:54	7440-36-0	
Arsenic	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:54	7440-38-2	
Barium	**58.5J**	ug/L	100	5.0	1	07/28/14 16:30	07/30/14 18:54	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:54	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	07/28/14 16:30	07/30/14 18:54	7440-43-9	
Chromium	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:54	7440-47-3	
Cobalt	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:54	7440-48-4	
Copper	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:54	7440-50-8	
Lead	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:54	7439-92-1	
Nickel	ND	ug/L	50.0	5.0	1	07/28/14 16:30	07/30/14 18:54	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:54	7782-49-2	
Silver	ND	ug/L	10.0	5.0	1	07/28/14 16:30	07/30/14 18:54	7440-22-4	
Thallium	ND	ug/L	5.5	5.4	1	07/28/14 16:30	07/30/14 18:54	7440-28-0	
Vanadium	ND	ug/L	25.0	5.0	1	07/28/14 16:30	07/30/14 18:54	7440-62-2	
Zinc	**11.8**	ug/L	10.0	10.0	1	07/28/14 16:30	07/30/14 18:54	7440-66-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 22:03	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 22:03	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		07/29/14 22:03	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 22:03	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 22:03	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 22:03	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 22:03	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 22:03	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 22:03	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 22:03	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 22:03	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 22:03	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 22:03	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 22:03	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 22:03	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 22:03	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 22:03	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 22:03	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 22:03	95-50-1	
1,4-Dichlorobenzene	**0.71J**	ug/L	1.0	0.33	1		07/29/14 22:03	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 22:03	110-57-6	
1,1-Dichloroethane	**2.1J**	ug/L	5.0	0.32	1		07/29/14 22:03	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 22:03	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 22:03	75-35-4	
cis-1,2-Dichloroethene	**3.5J**	ug/L	5.0	0.19	1		07/29/14 22:03	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 22:03	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 22:03	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 22:03	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 22:03	10061-01-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-6R **Lab ID: 92210772007** Collected: 07/25/14 10:15 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 22:03	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 22:03	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 22:03	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 22:03	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 22:03	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 22:03	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 22:03	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 22:03	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 22:03	79-34-5	
Tetrachloroethene	**2.6**	ug/L	1.0	0.46	1		07/29/14 22:03	127-18-4	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 22:03	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 22:03	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 22:03	79-00-5	
Trichloroethene	**4.1**	ug/L	1.0	0.47	1		07/29/14 22:03	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 22:03	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 22:03	96-18-4	
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 22:03	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		07/29/14 22:03	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 22:03	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	105	%	70-130		1		07/29/14 22:03	460-00-4	
1,2-Dichloroethane-d4 (S)	116	%	70-130		1		07/29/14 22:03	17060-07-0	
Toluene-d8 (S)	99	%	70-130		1		07/29/14 22:03	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-7S **Lab ID: 92210772008** Collected: 07/25/14 08:30 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	6.0	5.0	1	07/30/14 15:25	07/31/14 22:23	7440-36-0	
Arsenic	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:23	7440-38-2	
Barium	**132**	ug/L	100	5.0	1	07/30/14 15:25	07/31/14 22:23	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	07/30/14 15:25	07/31/14 22:23	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	07/30/14 15:25	07/31/14 22:23	7440-43-9	
Chromium	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:23	7440-47-3	
Cobalt	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:23	7440-48-4	
Copper	**7.8J**	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:23	7440-50-8	
Lead	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:23	7439-92-1	
Nickel	**6.3J**	ug/L	50.0	5.0	1	07/30/14 15:25	07/31/14 22:23	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	07/30/14 15:25	07/31/14 22:23	7782-49-2	
Silver	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:23	7440-22-4	
Thallium	ND	ug/L	5.5	5.4	1	07/30/14 15:25	07/31/14 22:23	7440-28-0	
Vanadium	**7.9J**	ug/L	25.0	5.0	1	07/30/14 15:25	07/31/14 22:23	7440-62-2	
Zinc	**22.5**	ug/L	10.0	10.0	1	07/30/14 15:25	07/31/14 22:23	7440-66-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 22:19	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 22:19	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		07/29/14 22:19	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 22:19	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 22:19	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 22:19	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 22:19	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 22:19	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 22:19	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 22:19	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 22:19	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 22:19	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 22:19	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 22:19	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 22:19	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 22:19	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 22:19	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 22:19	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 22:19	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		07/29/14 22:19	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 22:19	110-57-6	
1,1-Dichloroethane	**2.1J**	ug/L	5.0	0.32	1		07/29/14 22:19	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 22:19	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 22:19	75-35-4	
cis-1,2-Dichloroethene	**0.21J**	ug/L	5.0	0.19	1		07/29/14 22:19	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 22:19	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 22:19	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 22:19	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 22:19	10061-01-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-7S **Lab ID: 92210772008** Collected: 07/25/14 08:30 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 22:19	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 22:19	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 22:19	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 22:19	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 22:19	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 22:19	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 22:19	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 22:19	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 22:19	79-34-5	
Tetrachloroethene	**6.2**	ug/L	1.0	0.46	1		07/29/14 22:19	127-18-4	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 22:19	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 22:19	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 22:19	79-00-5	
Trichloroethene	**1.8**	ug/L	1.0	0.47	1		07/29/14 22:19	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 22:19	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 22:19	96-18-4	
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 22:19	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		07/29/14 22:19	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 22:19	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	103	%	70-130		1		07/29/14 22:19	460-00-4	
1,2-Dichloroethane-d4 (S)	114	%	70-130		1		07/29/14 22:19	17060-07-0	
Toluene-d8 (S)	102	%	70-130		1		07/29/14 22:19	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-7D **Lab ID: 92210772009** Collected: 07/25/14 08:00 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	6.0	5.0	1	07/30/14 15:25	07/31/14 22:32	7440-36-0	
Arsenic	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:32	7440-38-2	
Barium	**18.7J**	ug/L	100	5.0	1	07/30/14 15:25	07/31/14 22:32	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	07/30/14 15:25	07/31/14 22:32	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	07/30/14 15:25	07/31/14 22:32	7440-43-9	
Chromium	**9.0J**	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:32	7440-47-3	
Cobalt	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:32	7440-48-4	
Copper	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:32	7440-50-8	
Lead	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:32	7439-92-1	
Nickel	ND	ug/L	50.0	5.0	1	07/30/14 15:25	07/31/14 22:32	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	07/30/14 15:25	07/31/14 22:32	7782-49-2	
Silver	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:32	7440-22-4	
Thallium	ND	ug/L	5.5	5.4	1	07/30/14 15:25	07/31/14 22:32	7440-28-0	
Vanadium	**19.0J**	ug/L	25.0	5.0	1	07/30/14 15:25	07/31/14 22:32	7440-62-2	
Zinc	ND	ug/L	10.0	10.0	1	07/30/14 15:25	07/31/14 22:32	7440-66-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 22:35	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 22:35	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		07/29/14 22:35	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 22:35	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 22:35	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 22:35	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 22:35	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 22:35	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 22:35	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 22:35	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 22:35	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 22:35	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 22:35	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 22:35	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 22:35	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 22:35	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 22:35	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 22:35	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 22:35	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		07/29/14 22:35	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 22:35	110-57-6	
1,1-Dichloroethane	ND	ug/L	5.0	0.32	1		07/29/14 22:35	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 22:35	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 22:35	75-35-4	
cis-1,2-Dichloroethene	ND	ug/L	5.0	0.19	1		07/29/14 22:35	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 22:35	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 22:35	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 22:35	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 22:35	10061-01-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: MW-7D **Lab ID: 92210772009** Collected: 07/25/14 08:00 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 22:35	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 22:35	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 22:35	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 22:35	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 22:35	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 22:35	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 22:35	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 22:35	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 22:35	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		07/29/14 22:35	127-18-4	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 22:35	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 22:35	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 22:35	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		07/29/14 22:35	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 22:35	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 22:35	96-18-4	
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 22:35	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		07/29/14 22:35	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 22:35	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	103	%	70-130		1		07/29/14 22:35	460-00-4	
1,2-Dichloroethane-d4 (S)	118	%	70-130		1		07/29/14 22:35	17060-07-0	
Toluene-d8 (S)	100	%	70-130		1		07/29/14 22:35	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: SW-1 **Lab ID: 92210772010** Collected: 07/24/14 16:30 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	6.0	5.0	1	07/30/14 15:25	07/31/14 22:35	7440-36-0	
Arsenic	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:35	7440-38-2	
Barium	**45.0J**	ug/L	100	5.0	1	07/30/14 15:25	07/31/14 22:35	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	07/30/14 15:25	07/31/14 22:35	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	07/30/14 15:25	07/31/14 22:35	7440-43-9	
Chromium	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:35	7440-47-3	
Cobalt	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:35	7440-48-4	
Copper	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:35	7440-50-8	
Lead	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:35	7439-92-1	
Nickel	ND	ug/L	50.0	5.0	1	07/30/14 15:25	07/31/14 22:35	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	07/30/14 15:25	07/31/14 22:35	7782-49-2	
Silver	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:35	7440-22-4	
Thallium	ND	ug/L	5.5	5.4	1	07/30/14 15:25	07/31/14 22:35	7440-28-0	
Vanadium	ND	ug/L	25.0	5.0	1	07/30/14 15:25	07/31/14 22:35	7440-62-2	
Zinc	ND	ug/L	10.0	10.0	1	07/30/14 15:25	07/31/14 22:35	7440-66-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 22:51	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 22:51	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		07/29/14 22:51	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 22:51	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 22:51	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 22:51	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 22:51	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 22:51	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 22:51	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 22:51	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 22:51	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 22:51	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 22:51	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 22:51	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 22:51	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 22:51	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 22:51	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 22:51	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 22:51	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		07/29/14 22:51	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 22:51	110-57-6	
1,1-Dichloroethane	ND	ug/L	5.0	0.32	1		07/29/14 22:51	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 22:51	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 22:51	75-35-4	
cis-1,2-Dichloroethene	ND	ug/L	5.0	0.19	1		07/29/14 22:51	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 22:51	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 22:51	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 22:51	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 22:51	10061-01-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: SW-1 **Lab ID: 92210772010** Collected: 07/24/14 16:30 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 22:51	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 22:51	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 22:51	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 22:51	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 22:51	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 22:51	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 22:51	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 22:51	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 22:51	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		07/29/14 22:51	127-18-4	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 22:51	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 22:51	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 22:51	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		07/29/14 22:51	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 22:51	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 22:51	96-18-4	
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 22:51	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		07/29/14 22:51	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 22:51	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	104	%	70-130		1		07/29/14 22:51	460-00-4	
1,2-Dichloroethane-d4 (S)	117	%	70-130		1		07/29/14 22:51	17060-07-0	
Toluene-d8 (S)	101	%	70-130		1		07/29/14 22:51	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: SW-2 **Lab ID: 92210772011** Collected: 07/24/14 16:45 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	6.0	5.0	1	07/30/14 15:25	07/31/14 22:47	7440-36-0	
Arsenic	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:47	7440-38-2	
Barium	**44.1J**	ug/L	100	5.0	1	07/30/14 15:25	07/31/14 22:47	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	07/30/14 15:25	07/31/14 22:47	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	07/30/14 15:25	07/31/14 22:47	7440-43-9	
Chromium	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:47	7440-47-3	
Cobalt	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:47	7440-48-4	
Copper	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:47	7440-50-8	
Lead	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:47	7439-92-1	
Nickel	ND	ug/L	50.0	5.0	1	07/30/14 15:25	07/31/14 22:47	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	07/30/14 15:25	07/31/14 22:47	7782-49-2	
Silver	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:47	7440-22-4	
Thallium	ND	ug/L	5.5	5.4	1	07/30/14 15:25	07/31/14 22:47	7440-28-0	
Vanadium	ND	ug/L	25.0	5.0	1	07/30/14 15:25	07/31/14 22:47	7440-62-2	
Zinc	ND	ug/L	10.0	10.0	1	07/30/14 15:25	07/31/14 22:47	7440-66-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 23:07	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 23:07	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		07/29/14 23:07	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 23:07	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 23:07	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 23:07	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 23:07	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 23:07	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 23:07	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 23:07	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 23:07	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 23:07	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 23:07	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 23:07	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 23:07	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 23:07	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 23:07	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 23:07	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 23:07	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		07/29/14 23:07	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 23:07	110-57-6	
1,1-Dichloroethane	ND	ug/L	5.0	0.32	1		07/29/14 23:07	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 23:07	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 23:07	75-35-4	
cis-1,2-Dichloroethene	ND	ug/L	5.0	0.19	1		07/29/14 23:07	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 23:07	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 23:07	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 23:07	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 23:07	10061-01-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Sample: SW-2 **Lab ID: 92210772011** Collected: 07/24/14 16:45 Received: 07/25/14 14:00 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 23:07	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 23:07	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 23:07	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 23:07	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 23:07	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 23:07	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 23:07	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 23:07	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 23:07	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		07/29/14 23:07	127-18-4	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 23:07	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 23:07	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 23:07	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		07/29/14 23:07	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 23:07	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 23:07	96-18-4	
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 23:07	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		07/29/14 23:07	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 23:07	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	101	%	70-130		1		07/29/14 23:07	460-00-4	
1,2-Dichloroethane-d4 (S)	117	%	70-130		1		07/29/14 23:07	17060-07-0	
Toluene-d8 (S)	102	%	70-130		1		07/29/14 23:07	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

QC Batch: MPRP/16541 Analysis Method: EPA 6010
QC Batch Method: EPA 3010 Analysis Description: 6010 MET NC Groundwater
Associated Lab Samples: 92210772001, 92210772002, 92210772003, 92210772004, 92210772005, 92210772006, 92210772007

METHOD BLANK: 1251119 Matrix: Water
Associated Lab Samples: 92210772001, 92210772002, 92210772003, 92210772004, 92210772005, 92210772006, 92210772007

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Antimony	ug/L	ND	6.0	07/30/14 08:14	
Arsenic	ug/L	ND	10.0	07/30/14 08:14	
Barium	ug/L	ND	100	07/30/14 08:14	
Beryllium	ug/L	ND	1.0	07/30/14 08:14	
Cadmium	ug/L	ND	1.0	07/30/14 08:14	
Chromium	ug/L	ND	10.0	07/30/14 08:14	
Cobalt	ug/L	ND	10.0	07/30/14 08:14	
Copper	ug/L	ND	10.0	07/30/14 17:12	
Lead	ug/L	ND	10.0	07/30/14 08:14	
Nickel	ug/L	ND	50.0	07/30/14 08:14	
Selenium	ug/L	ND	10.0	07/30/14 08:14	
Silver	ug/L	ND	10.0	07/30/14 08:14	
Thallium	ug/L	ND	5.5	07/30/14 08:14	
Vanadium	ug/L	ND	25.0	07/30/14 08:14	
Zinc	ug/L	ND	10.0	07/30/14 08:14	

LABORATORY CONTROL SAMPLE: 1251120

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Antimony	ug/L	500	490	98	80-120	
Arsenic	ug/L	500	477	95	80-120	
Barium	ug/L	500	447	89	80-120	
Beryllium	ug/L	500	488	98	80-120	
Cadmium	ug/L	500	492	98	80-120	
Chromium	ug/L	500	471	94	80-120	
Cobalt	ug/L	500	474	95	80-120	
Copper	ug/L	500	495	99	80-120	
Lead	ug/L	500	476	95	80-120	
Nickel	ug/L	500	488	98	80-120	
Selenium	ug/L	500	482	96	80-120	
Silver	ug/L	250	242	97	80-120	
Thallium	ug/L	500	483	97	80-120	
Vanadium	ug/L	500	487	97	80-120	
Zinc	ug/L	500	471	94	80-120	

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 1251121 1251122

Parameter	Units	92210568002 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Antimony	ug/L	ND	500	500	478	473	96	95	75-125	1	25	
Arsenic	ug/L	ND	500	500	470	466	94	93	75-125	1	25	
Barium	ug/L	21.0J	500	500	461	456	88	87	75-125	1	25	
Beryllium	ug/L	ND	500	500	482	474	96	95	75-125	2	25	
Cadmium	ug/L	ND	500	500	483	478	97	95	75-125	1	25	
Chromium	ug/L	ND	500	500	467	463	93	92	75-125	1	25	
Cobalt	ug/L	ND	500	500	464	455	93	91	75-125	2	25	
Copper	ug/L	ND	500	500	490	480	98	96	75-125	2	25	
Lead	ug/L	ND	500	500	463	457	93	91	75-125	1	25	
Nickel	ug/L	ND	500	500	476	473	95	94	75-125	1	25	
Selenium	ug/L	ND	500	500	470	468	94	94	75-125	0	25	
Silver	ug/L	ND	250	250	239	237	95	95	75-125	1	25	
Thallium	ug/L	ND	500	500	471	463	94	92	75-125	2	25	
Vanadium	ug/L	ND	500	500	481	478	96	95	75-125	1	25	
Zinc	ug/L	ND	500	500	464	459	92	91	75-125	1	25	

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

QC Batch: MPRP/16565 Analysis Method: EPA 6010
QC Batch Method: EPA 3010 Analysis Description: 6010 MET NC Groundwater
Associated Lab Samples: 92210772008, 92210772009, 92210772010, 92210772011

METHOD BLANK: 1252869 Matrix: Water
Associated Lab Samples: 92210772008, 92210772009, 92210772010, 92210772011

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Antimony	ug/L	ND	6.0	07/31/14 22:17	
Arsenic	ug/L	ND	10.0	07/31/14 22:17	
Barium	ug/L	ND	100	07/31/14 22:17	
Beryllium	ug/L	ND	1.0	07/31/14 22:17	
Cadmium	ug/L	ND	1.0	07/31/14 22:17	
Chromium	ug/L	ND	10.0	07/31/14 22:17	
Cobalt	ug/L	ND	10.0	07/31/14 22:17	
Copper	ug/L	ND	10.0	07/31/14 22:17	
Lead	ug/L	ND	10.0	07/31/14 22:17	
Nickel	ug/L	ND	50.0	07/31/14 22:17	
Selenium	ug/L	ND	10.0	07/31/14 22:17	
Silver	ug/L	ND	10.0	07/31/14 22:17	
Thallium	ug/L	ND	5.5	07/31/14 22:17	
Vanadium	ug/L	ND	25.0	07/31/14 22:17	
Zinc	ug/L	ND	10.0	07/31/14 22:17	

LABORATORY CONTROL SAMPLE: 1252870

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Antimony	ug/L	500	488	98	80-120	
Arsenic	ug/L	500	474	95	80-120	
Barium	ug/L	500	478	96	80-120	
Beryllium	ug/L	500	486	97	80-120	
Cadmium	ug/L	500	482	96	80-120	
Chromium	ug/L	500	478	96	80-120	
Cobalt	ug/L	500	477	95	80-120	
Copper	ug/L	500	497	99	80-120	
Lead	ug/L	500	480	96	80-120	
Nickel	ug/L	500	482	96	80-120	
Selenium	ug/L	500	480	96	80-120	
Silver	ug/L	250	242	97	80-120	
Thallium	ug/L	500	473	95	80-120	
Vanadium	ug/L	500	486	97	80-120	
Zinc	ug/L	500	472	94	80-120	

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 1252871 1252872

Parameter	Units	92210772008 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Antimony	ug/L	ND	500	500	468	470	94	94	75-125	0	25	
Arsenic	ug/L	ND	500	500	477	480	95	96	75-125	1	25	
Barium	ug/L	132	500	500	617	626	97	99	75-125	1	25	
Beryllium	ug/L	ND	500	500	490	495	98	99	75-125	1	25	
Cadmium	ug/L	ND	500	500	484	487	97	97	75-125	1	25	
Chromium	ug/L	ND	500	500	482	483	96	96	75-125	0	25	
Cobalt	ug/L	ND	500	500	483	488	96	97	75-125	1	25	
Copper	ug/L	7.8J	500	500	511	517	101	102	75-125	1	25	
Lead	ug/L	ND	500	500	476	484	95	97	75-125	2	25	
Nickel	ug/L	6.3J	500	500	487	491	96	97	75-125	1	25	
Selenium	ug/L	ND	500	500	478	485	96	97	75-125	1	25	
Silver	ug/L	ND	250	250	240	243	96	97	75-125	1	25	
Thallium	ug/L	ND	500	500	472	474	94	95	75-125	0	25	
Vanadium	ug/L	7.9J	500	500	493	497	97	98	75-125	1	25	
Zinc	ug/L	22.5	500	500	491	497	94	95	75-125	1	25	

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

QC Batch: MSV/27757 Analysis Method: EPA 8260
QC Batch Method: EPA 8260 Analysis Description: 8260 MSV Low Level Landfill
Associated Lab Samples: 92210772001, 92210772002, 92210772003, 92210772004, 92210772005, 92210772006, 92210772007, 92210772008, 92210772009, 92210772010, 92210772011

METHOD BLANK: 1251833 Matrix: Water
Associated Lab Samples: 92210772001, 92210772002, 92210772003, 92210772004, 92210772005, 92210772006, 92210772007, 92210772008, 92210772009, 92210772010, 92210772011

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
1,1,1,2-Tetrachloroethane	ug/L	ND	5.0	07/29/14 17:15	
1,1,1-Trichloroethane	ug/L	ND	1.0	07/29/14 17:15	
1,1,2,2-Tetrachloroethane	ug/L	ND	3.0	07/29/14 17:15	
1,1,2-Trichloroethane	ug/L	ND	1.0	07/29/14 17:15	
1,1-Dichloroethane	ug/L	ND	5.0	07/29/14 17:15	
1,1-Dichloroethene	ug/L	ND	5.0	07/29/14 17:15	
1,2,3-Trichloropropane	ug/L	ND	1.0	07/29/14 17:15	
1,2-Dibromo-3-chloropropane	ug/L	ND	13.0	07/29/14 17:15	
1,2-Dibromoethane (EDB)	ug/L	ND	1.0	07/29/14 17:15	
1,2-Dichlorobenzene	ug/L	ND	5.0	07/29/14 17:15	
1,2-Dichloroethane	ug/L	ND	1.0	07/29/14 17:15	
1,2-Dichloropropane	ug/L	ND	1.0	07/29/14 17:15	
1,3-Dichloropropane	ug/L	ND	1.0	07/29/14 17:15	
1,4-Dichlorobenzene	ug/L	ND	1.0	07/29/14 17:15	
2-Butanone (MEK)	ug/L	ND	100	07/29/14 17:15	
2-Hexanone	ug/L	ND	50.0	07/29/14 17:15	
4-Methyl-2-pentanone (MIBK)	ug/L	ND	100	07/29/14 17:15	
Acetone	ug/L	ND	100	07/29/14 17:15	
Acrylonitrile	ug/L	ND	200	07/29/14 17:15	
Benzene	ug/L	ND	1.0	07/29/14 17:15	
Bromochloromethane	ug/L	ND	3.0	07/29/14 17:15	
Bromodichloromethane	ug/L	ND	1.0	07/29/14 17:15	
Bromoform	ug/L	ND	3.0	07/29/14 17:15	
Bromomethane	ug/L	ND	10.0	07/29/14 17:15	
Carbon disulfide	ug/L	ND	100	07/29/14 17:15	
Carbon tetrachloride	ug/L	ND	1.0	07/29/14 17:15	
Chlorobenzene	ug/L	ND	3.0	07/29/14 17:15	
Chloroethane	ug/L	ND	10.0	07/29/14 17:15	
Chloroform	ug/L	ND	5.0	07/29/14 17:15	
Chloromethane	ug/L	ND	1.0	07/29/14 17:15	
cis-1,2-Dichloroethene	ug/L	ND	5.0	07/29/14 17:15	
cis-1,3-Dichloropropene	ug/L	ND	1.0	07/29/14 17:15	
Dibromochloromethane	ug/L	ND	3.0	07/29/14 17:15	
Dibromomethane	ug/L	ND	10.0	07/29/14 17:15	
Ethylbenzene	ug/L	ND	1.0	07/29/14 17:15	
Iodomethane	ug/L	ND	10.0	07/29/14 17:15	
Methylene Chloride	ug/L	ND	1.0	07/29/14 17:15	
Styrene	ug/L	ND	1.0	07/29/14 17:15	
Tetrachloroethene	ug/L	ND	1.0	07/29/14 17:15	
Toluene	ug/L	1.0	1.0	07/29/14 17:15	

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

METHOD BLANK: 1251833 Matrix: Water

Associated Lab Samples: 92210772001, 92210772002, 92210772003, 92210772004, 92210772005, 92210772006, 92210772007, 92210772008, 92210772009, 92210772010, 92210772011

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
trans-1,2-Dichloroethene	ug/L	ND	5.0	07/29/14 17:15	
trans-1,3-Dichloropropene	ug/L	ND	1.0	07/29/14 17:15	
trans-1,4-Dichloro-2-butene	ug/L	ND	100	07/29/14 17:15	
Trichloroethene	ug/L	ND	1.0	07/29/14 17:15	
Trichlorofluoromethane	ug/L	ND	1.0	07/29/14 17:15	
Vinyl acetate	ug/L	ND	50.0	07/29/14 17:15	
Vinyl chloride	ug/L	ND	1.0	07/29/14 17:15	
Xylene (Total)	ug/L	ND	5.0	07/29/14 17:15	
1,2-Dichloroethane-d4 (S)	%	113	70-130	07/29/14 17:15	
4-Bromofluorobenzene (S)	%	104	70-130	07/29/14 17:15	
Toluene-d8 (S)	%	103	70-130	07/29/14 17:15	

LABORATORY CONTROL SAMPLE: 1251834

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
1,1,1,2-Tetrachloroethane	ug/L	50	55.9	112	80-125	
1,1,1-Trichloroethane	ug/L	50	55.8	112	71-129	
1,1,2,2-Tetrachloroethane	ug/L	50	54.5	109	79-124	
1,1,2-Trichloroethane	ug/L	50	55.5	111	85-125	
1,1-Dichloroethane	ug/L	50	49.8	100	73-126	
1,1-Dichloroethene	ug/L	50	58.3	117	66-135	
1,2,3-Trichloropropane	ug/L	50	57.3	115	75-130	
1,2-Dibromo-3-chloropropane	ug/L	50	58.4	117	71-133	
1,2-Dibromoethane (EDB)	ug/L	50	57.1	114	83-124	
1,2-Dichlorobenzene	ug/L	50	56.2	112	80-133	
1,2-Dichloroethane	ug/L	50	54.8	110	67-128	
1,2-Dichloropropane	ug/L	50	54.1	108	75-132	
1,3-Dichloropropane	ug/L	50	54.7	109	76-131	
1,4-Dichlorobenzene	ug/L	50	55.4	111	78-130	
2-Butanone (MEK)	ug/L	100	115	115	61-144	
2-Hexanone	ug/L	100	116	116	68-143	
4-Methyl-2-pentanone (MIBK)	ug/L	100	111	111	72-135	
Acetone	ug/L	100	116	116	48-146	
Acrylonitrile	ug/L	250	273	109	40-160	
Benzene	ug/L	50	56.1	112	80-125	
Bromochloromethane	ug/L	50	53.3	107	71-125	
Bromodichloromethane	ug/L	50	63.9	128	78-124	L3
Bromoform	ug/L	50	63.0	126	71-128	
Bromomethane	ug/L	50	41.1	82	40-160	
Carbon disulfide	ug/L	50	51.6J	103	50-160	
Carbon tetrachloride	ug/L	50	60.9	122	69-131	
Chlorobenzene	ug/L	50	55.5	111	81-122	
Chloroethane	ug/L	50	45.2	90	39-148	

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

LABORATORY CONTROL SAMPLE: 1251834

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Chloroform	ug/L	50	63.4	127	73-127	
Chloromethane	ug/L	50	46.5	93	44-146	
cis-1,2-Dichloroethene	ug/L	50	58.7	117	74-124	
cis-1,3-Dichloropropene	ug/L	50	58.5	117	72-132	
Dibromochloromethane	ug/L	50	66.0	132	78-125	L3
Dibromomethane	ug/L	50	61.8	124	82-120	L3
Ethylbenzene	ug/L	50	56.8	114	79-121	
Iodomethane	ug/L	100	85.3	85	39-154	
Methylene Chloride	ug/L	50	52.4	105	64-133	
Styrene	ug/L	50	57.8	116	84-126	
Tetrachloroethene	ug/L	50	56.6	113	78-122	
Toluene	ug/L	50	57.3	115	80-121	
trans-1,2-Dichloroethene	ug/L	50	58.5	117	71-127	
trans-1,3-Dichloropropene	ug/L	50	59.1	118	69-141	
trans-1,4-Dichloro-2-butene	ug/L	50	60.0J	120	40-160	
Trichloroethene	ug/L	50	56.7	113	78-122	
Trichlorofluoromethane	ug/L	50	57.1	114	53-137	
Vinyl acetate	ug/L	100	118	118	40-160	
Vinyl chloride	ug/L	50	51.6	103	58-137	
Xylene (Total)	ug/L	150	169	112	81-126	
1,2-Dichloroethane-d4 (S)	%			93	70-130	
4-Bromofluorobenzene (S)	%			104	70-130	
Toluene-d8 (S)	%			101	70-130	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 1251835 1251836

Parameter	Units	92210772010 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	52.4	54.3	105	109	70-166	4	30	
Benzene	ug/L	ND	50	50	51.1	53.1	102	106	70-148	4	30	
Chlorobenzene	ug/L	ND	50	50	50.3	52.0	101	104	70-146	3	30	
Toluene	ug/L	ND	50	50	48.2	49.2	96	98	70-155	2	30	
Trichloroethene	ug/L	ND	50	50	55.1	56.5	110	113	69-151	2	30	
1,2-Dichloroethane-d4 (S)	%						95	96	70-130			
4-Bromofluorobenzene (S)	%						96	95	70-130			
Toluene-d8 (S)	%						97	97	70-130			

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

REPORT OF LABORATORY ANALYSIS

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALIFIERS

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

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.

PQL - Practical Quantitation Limit.

RL - Reporting 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

ANALYTE QUALIFIERS

L3	Analyte recovery in the laboratory control sample (LCS) exceeded QC limits. Analyte presence below reporting limits in associated samples. Results unaffected by high bias.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA CROSS REFERENCE TABLE

Project: Iredell Closed MSWLF
Pace Project No.: 92210772

Lab ID	Sample ID	QC Batch Method	QC Batch	Analytical Method	Analytical Batch
92210772001	**MW-1**	EPA 3010	MPRP/16541	EPA 6010	ICP/14938
92210772002	**MW-2**	EPA 3010	MPRP/16541	EPA 6010	ICP/14938
92210772003	**MW-3**	EPA 3010	MPRP/16541	EPA 6010	ICP/14938
92210772004	**MW-3R**	EPA 3010	MPRP/16541	EPA 6010	ICP/14938
92210772005	**MW-4**	EPA 3010	MPRP/16541	EPA 6010	ICP/14938
92210772006	**MW-6**	EPA 3010	MPRP/16541	EPA 6010	ICP/14938
92210772007	**MW-6R**	EPA 3010	MPRP/16541	EPA 6010	ICP/14938
92210772008	**MW-7S**	EPA 3010	MPRP/16565	EPA 6010	ICP/14957
92210772009	**MW-7D**	EPA 3010	MPRP/16565	EPA 6010	ICP/14957
92210772010	**SW-1**	EPA 3010	MPRP/16565	EPA 6010	ICP/14957
92210772011	**SW-2**	EPA 3010	MPRP/16565	EPA 6010	ICP/14957
92210772001	**MW-1**	EPA 8260	MSV/27757		
92210772002	**MW-2**	EPA 8260	MSV/27757		
92210772003	**MW-3**	EPA 8260	MSV/27757		
92210772004	**MW-3R**	EPA 8260	MSV/27757		
92210772005	**MW-4**	EPA 8260	MSV/27757		
92210772006	**MW-6**	EPA 8260	MSV/27757		
92210772007	**MW-6R**	EPA 8260	MSV/27757		
92210772008	**MW-7S**	EPA 8260	MSV/27757		
92210772009	**MW-7D**	EPA 8260	MSV/27757		
92210772010	**SW-1**	EPA 8260	MSV/27757		
92210772011	**SW-2**	EPA 8260	MSV/27757		

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

Pace Analytical	Document Name: **Sample Condition Upon Receipt (SCUR)**	Document Revised: April 07. 2014 Page 1 of 2
	Document Number: **F-CHR-CS-003-rev.14**	Issuing Authority: Pace Huntersville Quality Office

Client Name: Municipal Engineering Services

Courier: ☐ Fed Ex ☐ UPS ☐ USPS ☐ Client ☑ Commercial ☐ Pace Other_____

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

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

Thermometer Used: IR Gun T1102 T1401 **Type of Ice:** (Wet) Blue None ☑ Samples on ice, cooling process has begun

Temp Correction Factor **T1102**: No Correction **T1301**: No Correction

Corrected Cooler Temp.: 1.8 °C **Biological Tissue is Frozen:** Yes No (N/A)

Temp should be above freezing to 6°C

Optional
Proj. Due Date:
Proj. Name:

Date and Initials of person examining contents: CE 7-25-14

		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.
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: -Includes date/time/ID/Analysis Matrix:_____	☐Yes ☑No ☐N/A	12. No dates & times on bottles
All containers needing preservation have been checked.	☑Yes ☐No ☐N/A	13. All Metals samples do not fit EPA rec.
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	
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: Jonathan Pfohl Date/Time: 7/25/14

Comments/ Resolution: Client informed MW-3 was collected on 7/24/14 instead of 7/25/14. KG

SCURF Review:	JH	Date:	7/25/14
SRF Review:	LC	Date:	7-28-14

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)

WO#: 92210772

92210772

Pace Analytical

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

Section A Required Client Information:		Section B Required Project Information:		Section C Invoice Information:	
Company:	Municipal Engineering Services	Report To:	Jonathan Pfohl	Attention:	Municipal Engineering Services
Address:	P.O. Box 97	Copy To:		Company Name:	
Garner, NC 27529				Address:	
Email To:	jpfohl@mesco.com	Purchase Order No.		Pace Quote Reference:	
Phone:	919-772-5393 Fax:	Client Project ID:	Iredell Closed MSWLF	Pace Project Manager:	Kevin Godwin
Requested Due Date/TAT:	10 Day (Default)	Container Order Number:		Pace Profile #:	

Regulatory Agency	
State / Location	
	North Carolina

Requested Analysis Filtered (Y/N)

ITEM#	SAMPLE ID (One Character per box. (A-Z, 0-9 / , -) Sample Ids must be unique)	MATRIX CODE (see valid codes to left)	SAMPLE TYPE (G=GRAB C=COMP)	COLLECTED START DATE	COLLECTED START TIME	COLLECTED END DATE	COLLECTED END TIME	SAMPLE TEMP AT COLLECTION	# OF CONTAINERS	Unpreserved	H2SO4	HNO3	HCl	NaOH	Na2S2O3	Methanol	Other	Analyses Test Y/N	VOCs- App 1	Metals-App 1										92210772
																			N	N	N	N	N	N	N	N	N	N	N	
1	MW-1	WT	G			7/25	9:00		4			1	3						x	x										001
2	MW-2	WT	G			7/25/14	9:40		4			1	3						x	x										002
3	MW-3	WT	G	per Jonathan 7/24/14		~~7/25/14~~	4:10		4			1	3						x	x										003
4	MW-3R	WT	G	KC 7/25/14		7/24/14	11:50		4			1	3						x	x										004
5	MW-4	WT	G			7/24/14	5:30		4			1	3						x	x										005
6	MW-6	WT	G			7/25/14	11:00		4			1	3						x	x										006
7	MW-6R	WT	G				10:15		4			1	3						x	x										007
8	MW-7S	WT	G				8:30		4			1	3						x	x										008
9	MW-7D	WT	G				8:00		4			1	3						x	x										009
10	SW-1	WT	G			7/24/14	4:30		4			1	3						x	x										010
11	SW-2	WT	G			7/24/14	4:45		4			1	3						x	x										011
12																														

ADDITIONAL COMMENTS	RELINQUISHED BY / AFFILIATION	DATE	TIME	ACCEPTED BY / AFFILIATION	DATE	TIME	SAMPLE CONDITIONS			
	/MESCO	7/25/14	2:00		7/25/14	14:00	1.8	Y	N	Y

SAMPLER NAME AND SIGNATURE			TEMP in C	Received on Ice (Y/N)	Custody Sealed Cooler (Y/N)	Samples Intact (Y/N)
PRINT Name of SAMPLER:	Jonathan Pfohl					
SIGNATURE of SAMPLER:		DATE Signed: 7/25/14				

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

August 06, 2014

Mr. Jonathan Pfohl
Municipal Engineering Services
PO Box 97
Garner, NC 27529

RE: Project: Iredell Blanks
Pace Project No.: 92210774

Dear Mr. Pfohl:
Enclosed are the analytical results for sample(s) received by the laboratory on July 25, 2014. 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,

Kevin Godwin
kevin.godwin@pacelabs.com
Project Manager

Enclosures

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

CERTIFICATIONS

Project: Iredell Blanks
Pace Project No.: 92210774

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
Florida/NELAP Certification #: E87627
Kentucky UST Certification #: 84
West Virginia Certification #: 357
Virginia/VELAP Certification #: 460221

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
West Virginia Certification #: 356
Virginia/VELAP Certification #: 460222

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

SAMPLE SUMMARY

Project: Iredell Blanks
Pace Project No.: 92210774

Lab ID	Sample ID	Matrix	Date Collected	Date Received
92210774001	**EB**	Water	07/25/14 14:00	07/25/14 14:06
92210774002	**FB**	Water	07/25/14 14:05	07/25/14 14:06
92210774003	**TB**	Water	07/25/14 14:00	07/25/14 14:06

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

SAMPLE ANALYTE COUNT

Project: Iredell Blanks
Pace Project No.: 92210774

Lab ID	Sample ID	Method	Analysts	Analytes Reported	Laboratory
92210774001	**EB**	EPA 6010	JMW	15	PASI-A
		EPA 8260	MCK	52	PASI-C
92210774002	**FB**	EPA 8260	MCK	52	PASI-C
92210774003	**TB**	EPA 8260	MCK	52	PASI-C

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Blanks
Pace Project No.: 92210774

Sample: EB **Lab ID: 92210774001** Collected: 07/25/14 14:00 Received: 07/25/14 14:06 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
6010 ICP Groundwater	Analytical Method: EPA 6010 Preparation Method: EPA 3010								
Antimony	ND	ug/L	6.0	5.0	1	07/30/14 15:25	07/31/14 22:50	7440-36-0	
Arsenic	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:50	7440-38-2	
Barium	ND	ug/L	100	5.0	1	07/30/14 15:25	07/31/14 22:50	7440-39-3	
Beryllium	ND	ug/L	1.0	1.0	1	07/30/14 15:25	07/31/14 22:50	7440-41-7	
Cadmium	ND	ug/L	1.0	1.0	1	07/30/14 15:25	07/31/14 22:50	7440-43-9	
Chromium	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:50	7440-47-3	
Cobalt	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:50	7440-48-4	
Copper	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:50	7440-50-8	
Lead	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:50	7439-92-1	
Nickel	ND	ug/L	50.0	5.0	1	07/30/14 15:25	07/31/14 22:50	7440-02-0	
Selenium	ND	ug/L	10.0	10.0	1	07/30/14 15:25	07/31/14 22:50	7782-49-2	
Silver	ND	ug/L	10.0	5.0	1	07/30/14 15:25	07/31/14 22:50	7440-22-4	
Thallium	ND	ug/L	5.5	5.4	1	07/30/14 15:25	07/31/14 22:50	7440-28-0	
Vanadium	ND	ug/L	25.0	5.0	1	07/30/14 15:25	07/31/14 22:50	7440-62-2	
Zinc	ND	ug/L	10.0	10.0	1	07/30/14 15:25	07/31/14 22:50	7440-66-6	
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 23:23	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 23:23	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		07/29/14 23:23	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 23:23	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 23:23	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 23:23	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 23:23	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 23:23	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 23:23	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 23:23	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 23:23	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 23:23	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 23:23	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 23:23	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 23:23	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 23:23	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 23:23	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 23:23	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 23:23	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		07/29/14 23:23	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 23:23	110-57-6	
1,1-Dichloroethane	ND	ug/L	5.0	0.32	1		07/29/14 23:23	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 23:23	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 23:23	75-35-4	
cis-1,2-Dichloroethene	ND	ug/L	5.0	0.19	1		07/29/14 23:23	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 23:23	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 23:23	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 23:23	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 23:23	10061-01-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Blanks
Pace Project No.: 92210774

Sample: EB **Lab ID: 92210774001** Collected: 07/25/14 14:00 Received: 07/25/14 14:06 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 23:23	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 23:23	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 23:23	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 23:23	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 23:23	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 23:23	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 23:23	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 23:23	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 23:23	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		07/29/14 23:23	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		07/29/14 23:23	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 23:23	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 23:23	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 23:23	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		07/29/14 23:23	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 23:23	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 23:23	96-18-4	
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 23:23	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		07/29/14 23:23	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 23:23	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	102	%	70-130		1		07/29/14 23:23	460-00-4	
1,2-Dichloroethane-d4 (S)	118	%	70-130		1		07/29/14 23:23	17060-07-0	
Toluene-d8 (S)	101	%	70-130		1		07/29/14 23:23	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Blanks
Pace Project No.: 92210774

Sample: FB **Lab ID: 92210774002** Collected: 07/25/14 14:05 Received: 07/25/14 14:06 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 23:39	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 23:39	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		07/29/14 23:39	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 23:39	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 23:39	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 23:39	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 23:39	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 23:39	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 23:39	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 23:39	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 23:39	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 23:39	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 23:39	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 23:39	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 23:39	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 23:39	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 23:39	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 23:39	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 23:39	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		07/29/14 23:39	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 23:39	110-57-6	
1,1-Dichloroethane	ND	ug/L	5.0	0.32	1		07/29/14 23:39	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 23:39	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 23:39	75-35-4	
cis-1,2-Dichloroethene	ND	ug/L	5.0	0.19	1		07/29/14 23:39	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 23:39	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 23:39	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 23:39	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 23:39	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 23:39	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 23:39	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 23:39	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 23:39	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 23:39	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 23:39	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 23:39	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 23:39	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 23:39	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		07/29/14 23:39	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		07/29/14 23:39	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 23:39	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 23:39	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 23:39	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		07/29/14 23:39	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 23:39	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 23:39	96-18-4	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Blanks
Pace Project No.: 92210774

Sample: FB **Lab ID: 92210774002** Collected: 07/25/14 14:05 Received: 07/25/14 14:06 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 23:39	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		07/29/14 23:39	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 23:39	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	104	%	70-130		1		07/29/14 23:39	460-00-4	
1,2-Dichloroethane-d4 (S)	117	%	70-130		1		07/29/14 23:39	17060-07-0	
Toluene-d8 (S)	100	%	70-130		1		07/29/14 23:39	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Blanks
Pace Project No.: 92210774

Sample: TB **Lab ID: 92210774003** Collected: 07/25/14 14:00 Received: 07/25/14 14:06 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Acetone	ND	ug/L	100	10.0	1		07/29/14 23:55	67-64-1	
Acrylonitrile	ND	ug/L	200	1.9	1		07/29/14 23:55	107-13-1	
Benzene	ND	ug/L	1.0	0.25	1		07/29/14 23:55	71-43-2	
Bromochloromethane	ND	ug/L	3.0	0.17	1		07/29/14 23:55	74-97-5	
Bromodichloromethane	ND	ug/L	1.0	0.18	1		07/29/14 23:55	75-27-4	
Bromoform	ND	ug/L	3.0	0.26	1		07/29/14 23:55	75-25-2	
Bromomethane	ND	ug/L	10.0	0.29	1		07/29/14 23:55	74-83-9	
2-Butanone (MEK)	ND	ug/L	100	0.96	1		07/29/14 23:55	78-93-3	
Carbon disulfide	ND	ug/L	100	1.2	1		07/29/14 23:55	75-15-0	
Carbon tetrachloride	ND	ug/L	1.0	0.25	1		07/29/14 23:55	56-23-5	
Chlorobenzene	ND	ug/L	3.0	0.23	1		07/29/14 23:55	108-90-7	
Chloroethane	ND	ug/L	10.0	0.54	1		07/29/14 23:55	75-00-3	
Chloroform	ND	ug/L	5.0	0.14	1		07/29/14 23:55	67-66-3	
Chloromethane	ND	ug/L	1.0	0.11	1		07/29/14 23:55	74-87-3	
1,2-Dibromo-3-chloropropane	ND	ug/L	13.0	2.0	1		07/29/14 23:55	96-12-8	
Dibromochloromethane	ND	ug/L	3.0	0.21	1		07/29/14 23:55	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/L	1.0	0.27	1		07/29/14 23:55	106-93-4	
Dibromomethane	ND	ug/L	10.0	0.21	1		07/29/14 23:55	74-95-3	
1,2-Dichlorobenzene	ND	ug/L	5.0	0.30	1		07/29/14 23:55	95-50-1	
1,4-Dichlorobenzene	ND	ug/L	1.0	0.33	1		07/29/14 23:55	106-46-7	
trans-1,4-Dichloro-2-butene	ND	ug/L	100	1.0	1		07/29/14 23:55	110-57-6	
1,1-Dichloroethane	ND	ug/L	5.0	0.32	1		07/29/14 23:55	75-34-3	
1,2-Dichloroethane	ND	ug/L	1.0	0.12	1		07/29/14 23:55	107-06-2	
1,1-Dichloroethene	ND	ug/L	5.0	0.56	1		07/29/14 23:55	75-35-4	
cis-1,2-Dichloroethene	ND	ug/L	5.0	0.19	1		07/29/14 23:55	156-59-2	
trans-1,2-Dichloroethene	ND	ug/L	5.0	0.49	1		07/29/14 23:55	156-60-5	
1,2-Dichloropropane	ND	ug/L	1.0	0.27	1		07/29/14 23:55	78-87-5	
1,3-Dichloropropane	ND	ug/L	1.0	0.28	1		07/29/14 23:55	142-28-9	
cis-1,3-Dichloropropene	ND	ug/L	1.0	0.13	1		07/29/14 23:55	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/L	1.0	0.26	1		07/29/14 23:55	10061-02-6	
Ethylbenzene	ND	ug/L	1.0	0.30	1		07/29/14 23:55	100-41-4	
2-Hexanone	ND	ug/L	50.0	0.46	1		07/29/14 23:55	591-78-6	
Iodomethane	ND	ug/L	10.0	0.32	1		07/29/14 23:55	74-88-4	
Methylene Chloride	ND	ug/L	1.0	0.97	1		07/29/14 23:55	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/L	100	0.33	1		07/29/14 23:55	108-10-1	
Styrene	ND	ug/L	1.0	0.26	1		07/29/14 23:55	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/L	5.0	0.33	1		07/29/14 23:55	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/L	3.0	0.40	1		07/29/14 23:55	79-34-5	
Tetrachloroethene	ND	ug/L	1.0	0.46	1		07/29/14 23:55	127-18-4	
Tetrahydrofuran	ND	ug/L	10.0	3.1	1		07/29/14 23:55	109-99-9	
Toluene	ND	ug/L	1.0	0.26	1		07/29/14 23:55	108-88-3	
1,1,1-Trichloroethane	ND	ug/L	1.0	0.48	1		07/29/14 23:55	71-55-6	
1,1,2-Trichloroethane	ND	ug/L	1.0	0.29	1		07/29/14 23:55	79-00-5	
Trichloroethene	ND	ug/L	1.0	0.47	1		07/29/14 23:55	79-01-6	
Trichlorofluoromethane	ND	ug/L	1.0	0.20	1		07/29/14 23:55	75-69-4	
1,2,3-Trichloropropane	ND	ug/L	1.0	0.41	1		07/29/14 23:55	96-18-4	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

ANALYTICAL RESULTS

Project: Iredell Blanks
Pace Project No.: 92210774

Sample: TB **Lab ID: 92210774003** Collected: 07/25/14 14:00 Received: 07/25/14 14:06 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV Low Level Landfill	Analytical Method: EPA 8260								
Vinyl acetate	ND	ug/L	50.0	0.35	1		07/29/14 23:55	108-05-4	
Vinyl chloride	ND	ug/L	1.0	0.62	1		07/29/14 23:55	75-01-4	
Xylene (Total)	ND	ug/L	5.0	0.66	1		07/29/14 23:55	1330-20-7	
Surrogates									
4-Bromofluorobenzene (S)	108	%	70-130		1		07/29/14 23:55	460-00-4	
1,2-Dichloroethane-d4 (S)	114	%	70-130		1		07/29/14 23:55	17060-07-0	
Toluene-d8 (S)	100	%	70-130		1		07/29/14 23:55	2037-26-5	

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA

Project: Iredell Blanks
Pace Project No.: 92210774

QC Batch: MPRP/16565
QC Batch Method: EPA 3010
Analysis Method: EPA 6010
Analysis Description: 6010 MET NC Groundwater
Associated Lab Samples: 92210774001

METHOD BLANK: 1252869
Matrix: Water
Associated Lab Samples: 92210774001

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Antimony	ug/L	ND	6.0	07/31/14 22:17	
Arsenic	ug/L	ND	10.0	07/31/14 22:17	
Barium	ug/L	ND	100	07/31/14 22:17	
Beryllium	ug/L	ND	1.0	07/31/14 22:17	
Cadmium	ug/L	ND	1.0	07/31/14 22:17	
Chromium	ug/L	ND	10.0	07/31/14 22:17	
Cobalt	ug/L	ND	10.0	07/31/14 22:17	
Copper	ug/L	ND	10.0	07/31/14 22:17	
Lead	ug/L	ND	10.0	07/31/14 22:17	
Nickel	ug/L	ND	50.0	07/31/14 22:17	
Selenium	ug/L	ND	10.0	07/31/14 22:17	
Silver	ug/L	ND	10.0	07/31/14 22:17	
Thallium	ug/L	ND	5.5	07/31/14 22:17	
Vanadium	ug/L	ND	25.0	07/31/14 22:17	
Zinc	ug/L	ND	10.0	07/31/14 22:17	

LABORATORY CONTROL SAMPLE: 1252870

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Antimony	ug/L	500	488	98	80-120	
Arsenic	ug/L	500	474	95	80-120	
Barium	ug/L	500	478	96	80-120	
Beryllium	ug/L	500	486	97	80-120	
Cadmium	ug/L	500	482	96	80-120	
Chromium	ug/L	500	478	96	80-120	
Cobalt	ug/L	500	477	95	80-120	
Copper	ug/L	500	497	99	80-120	
Lead	ug/L	500	480	96	80-120	
Nickel	ug/L	500	482	96	80-120	
Selenium	ug/L	500	480	96	80-120	
Silver	ug/L	250	242	97	80-120	
Thallium	ug/L	500	473	95	80-120	
Vanadium	ug/L	500	486	97	80-120	
Zinc	ug/L	500	472	94	80-120	

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA

Project: Iredell Blanks
Pace Project No.: 92210774

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 1252871 1252872

Parameter	Units	92210772008 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Antimony	ug/L	ND	500	500	468	470	94	94	75-125	0	25	
Arsenic	ug/L	ND	500	500	477	480	95	96	75-125	1	25	
Barium	ug/L	132	500	500	617	626	97	99	75-125	1	25	
Beryllium	ug/L	ND	500	500	490	495	98	99	75-125	1	25	
Cadmium	ug/L	ND	500	500	484	487	97	97	75-125	1	25	
Chromium	ug/L	ND	500	500	482	483	96	96	75-125	0	25	
Cobalt	ug/L	ND	500	500	483	488	96	97	75-125	1	25	
Copper	ug/L	7.8J	500	500	511	517	101	102	75-125	1	25	
Lead	ug/L	ND	500	500	476	484	95	97	75-125	2	25	
Nickel	ug/L	6.3J	500	500	487	491	96	97	75-125	1	25	
Selenium	ug/L	ND	500	500	478	485	96	97	75-125	1	25	
Silver	ug/L	ND	250	250	240	243	96	97	75-125	1	25	
Thallium	ug/L	ND	500	500	472	474	94	95	75-125	0	25	
Vanadium	ug/L	7.9J	500	500	493	497	97	98	75-125	1	25	
Zinc	ug/L	22.5	500	500	491	497	94	95	75-125	1	25	

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA

Project: Iredell Blanks
Pace Project No.: 92210774

QC Batch: MSV/27757 Analysis Method: EPA 8260
QC Batch Method: EPA 8260 Analysis Description: 8260 MSV Low Level Landfill
Associated Lab Samples: 92210774001, 92210774002, 92210774003

METHOD BLANK: 1251833 Matrix: Water
Associated Lab Samples: 92210774001, 92210774002, 92210774003

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
1,1,1,2-Tetrachloroethane	ug/L	ND	5.0	07/29/14 17:15	
1,1,1-Trichloroethane	ug/L	ND	1.0	07/29/14 17:15	
1,1,2,2-Tetrachloroethane	ug/L	ND	3.0	07/29/14 17:15	
1,1,2-Trichloroethane	ug/L	ND	1.0	07/29/14 17:15	
1,1-Dichloroethane	ug/L	ND	5.0	07/29/14 17:15	
1,1-Dichloroethene	ug/L	ND	5.0	07/29/14 17:15	
1,2,3-Trichloropropane	ug/L	ND	1.0	07/29/14 17:15	
1,2-Dibromo-3-chloropropane	ug/L	ND	13.0	07/29/14 17:15	
1,2-Dibromoethane (EDB)	ug/L	ND	1.0	07/29/14 17:15	
1,2-Dichlorobenzene	ug/L	ND	5.0	07/29/14 17:15	
1,2-Dichloroethane	ug/L	ND	1.0	07/29/14 17:15	
1,2-Dichloropropane	ug/L	ND	1.0	07/29/14 17:15	
1,3-Dichloropropane	ug/L	ND	1.0	07/29/14 17:15	
1,4-Dichlorobenzene	ug/L	ND	1.0	07/29/14 17:15	
2-Butanone (MEK)	ug/L	ND	100	07/29/14 17:15	
2-Hexanone	ug/L	ND	50.0	07/29/14 17:15	
4-Methyl-2-pentanone (MIBK)	ug/L	ND	100	07/29/14 17:15	
Acetone	ug/L	ND	100	07/29/14 17:15	
Acrylonitrile	ug/L	ND	200	07/29/14 17:15	
Benzene	ug/L	ND	1.0	07/29/14 17:15	
Bromochloromethane	ug/L	ND	3.0	07/29/14 17:15	
Bromodichloromethane	ug/L	ND	1.0	07/29/14 17:15	
Bromoform	ug/L	ND	3.0	07/29/14 17:15	
Bromomethane	ug/L	ND	10.0	07/29/14 17:15	
Carbon disulfide	ug/L	ND	100	07/29/14 17:15	
Carbon tetrachloride	ug/L	ND	1.0	07/29/14 17:15	
Chlorobenzene	ug/L	ND	3.0	07/29/14 17:15	
Chloroethane	ug/L	ND	10.0	07/29/14 17:15	
Chloroform	ug/L	ND	5.0	07/29/14 17:15	
Chloromethane	ug/L	ND	1.0	07/29/14 17:15	
cis-1,2-Dichloroethene	ug/L	ND	5.0	07/29/14 17:15	
cis-1,3-Dichloropropene	ug/L	ND	1.0	07/29/14 17:15	
Dibromochloromethane	ug/L	ND	3.0	07/29/14 17:15	
Dibromomethane	ug/L	ND	10.0	07/29/14 17:15	
Ethylbenzene	ug/L	ND	1.0	07/29/14 17:15	
Iodomethane	ug/L	ND	10.0	07/29/14 17:15	
Methylene Chloride	ug/L	ND	1.0	07/29/14 17:15	
Styrene	ug/L	ND	1.0	07/29/14 17:15	
Tetrachloroethene	ug/L	ND	1.0	07/29/14 17:15	
Tetrahydrofuran	ug/L	ND	10.0	07/29/14 17:15	
Toluene	ug/L	1.0	1.0	07/29/14 17:15	

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA

Project: Iredell Blanks
Pace Project No.: 92210774

METHOD BLANK: 1251833 Matrix: Water
Associated Lab Samples: 92210774001, 92210774002, 92210774003

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
trans-1,2-Dichloroethene	ug/L	ND	5.0	07/29/14 17:15	
trans-1,3-Dichloropropene	ug/L	ND	1.0	07/29/14 17:15	
trans-1,4-Dichloro-2-butene	ug/L	ND	100	07/29/14 17:15	
Trichloroethene	ug/L	ND	1.0	07/29/14 17:15	
Trichlorofluoromethane	ug/L	ND	1.0	07/29/14 17:15	
Vinyl acetate	ug/L	ND	50.0	07/29/14 17:15	
Vinyl chloride	ug/L	ND	1.0	07/29/14 17:15	
Xylene (Total)	ug/L	ND	5.0	07/29/14 17:15	
1,2-Dichloroethane-d4 (S)	%	113	70-130	07/29/14 17:15	
4-Bromofluorobenzene (S)	%	104	70-130	07/29/14 17:15	
Toluene-d8 (S)	%	103	70-130	07/29/14 17:15	

LABORATORY CONTROL SAMPLE: 1251834

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
1,1,1,2-Tetrachloroethane	ug/L	50	55.9	112	80-125	
1,1,1-Trichloroethane	ug/L	50	55.8	112	71-129	
1,1,2,2-Tetrachloroethane	ug/L	50	54.5	109	79-124	
1,1,2-Trichloroethane	ug/L	50	55.5	111	85-125	
1,1-Dichloroethane	ug/L	50	49.8	100	73-126	
1,1-Dichloroethene	ug/L	50	58.3	117	66-135	
1,2,3-Trichloropropane	ug/L	50	57.3	115	75-130	
1,2-Dibromo-3-chloropropane	ug/L	50	58.4	117	71-133	
1,2-Dibromoethane (EDB)	ug/L	50	57.1	114	83-124	
1,2-Dichlorobenzene	ug/L	50	56.2	112	80-133	
1,2-Dichloroethane	ug/L	50	54.8	110	67-128	
1,2-Dichloropropane	ug/L	50	54.1	108	75-132	
1,3-Dichloropropane	ug/L	50	54.7	109	76-131	
1,4-Dichlorobenzene	ug/L	50	55.4	111	78-130	
2-Butanone (MEK)	ug/L	100	115	115	61-144	
2-Hexanone	ug/L	100	116	116	68-143	
4-Methyl-2-pentanone (MIBK)	ug/L	100	111	111	72-135	
Acetone	ug/L	100	116	116	48-146	
Acrylonitrile	ug/L	250	273	109	40-160	
Benzene	ug/L	50	56.1	112	80-125	
Bromochloromethane	ug/L	50	53.3	107	71-125	
Bromodichloromethane	ug/L	50	63.9	128	78-124	L3
Bromoform	ug/L	50	63.0	126	71-128	
Bromomethane	ug/L	50	41.1	82	40-160	
Carbon disulfide	ug/L	50	51.6J	103	50-160	
Carbon tetrachloride	ug/L	50	60.9	122	69-131	
Chlorobenzene	ug/L	50	55.5	111	81-122	
Chloroethane	ug/L	50	45.2	90	39-148	
Chloroform	ug/L	50	63.4	127	73-127	

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA

Project: Iredell Blanks
Pace Project No.: 92210774

LABORATORY CONTROL SAMPLE: 1251834

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Chloromethane	ug/L	50	46.5	93	44-146	
cis-1,2-Dichloroethene	ug/L	50	58.7	117	74-124	
cis-1,3-Dichloropropene	ug/L	50	58.5	117	72-132	
Dibromochloromethane	ug/L	50	66.0	132	78-125	L3
Dibromomethane	ug/L	50	61.8	124	82-120	L3
Ethylbenzene	ug/L	50	56.8	114	79-121	
Iodomethane	ug/L	100	85.3	85	39-154	
Methylene Chloride	ug/L	50	52.4	105	64-133	
Styrene	ug/L	50	57.8	116	84-126	
Tetrachloroethene	ug/L	50	56.6	113	78-122	
Tetrahydrofuran	ug/L	500	550	110	69-148	
Toluene	ug/L	50	57.3	115	80-121	
trans-1,2-Dichloroethene	ug/L	50	58.5	117	71-127	
trans-1,3-Dichloropropene	ug/L	50	59.1	118	69-141	
trans-1,4-Dichloro-2-butene	ug/L	50	60.0J	120	40-160	
Trichloroethene	ug/L	50	56.7	113	78-122	
Trichlorofluoromethane	ug/L	50	57.1	114	53-137	
Vinyl acetate	ug/L	100	118	118	40-160	
Vinyl chloride	ug/L	50	51.6	103	58-137	
Xylene (Total)	ug/L	150	169	112	81-126	
1,2-Dichloroethane-d4 (S)	%			93	70-130	
4-Bromofluorobenzene (S)	%			104	70-130	
Toluene-d8 (S)	%			101	70-130	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 1251835 1251836

Parameter	Units	92210772010 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	52.4	54.3	105	109	70-166	4	30	
Benzene	ug/L	ND	50	50	51.1	53.1	102	106	70-148	4	30	
Chlorobenzene	ug/L	ND	50	50	50.3	52.0	101	104	70-146	3	30	
Toluene	ug/L	ND	50	50	48.2	49.2	96	98	70-155	2	30	
Trichloroethene	ug/L	ND	50	50	55.1	56.5	110	113	69-151	2	30	
1,2-Dichloroethane-d4 (S)	%						95	96	70-130			
4-Bromofluorobenzene (S)	%						96	95	70-130			
Toluene-d8 (S)	%						97	97	70-130			

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALIFIERS

Project: Iredell Blanks
Pace Project No.: 92210774

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.

PQL - Practical Quantitation Limit.

RL - Reporting 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

ANALYTE QUALIFIERS

L3	Analyte recovery in the laboratory control sample (LCS) exceeded QC limits. Analyte presence below reporting limits in associated samples. Results unaffected by high bias.

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

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

QUALITY CONTROL DATA CROSS REFERENCE TABLE

Project: Iredell Blanks
Pace Project No.: 92210774

Lab ID	Sample ID	QC Batch Method	QC Batch	Analytical Method	Analytical Batch
92210774001	**EB**	EPA 3010	MPRP/16565	EPA 6010	ICP/14957
92210774001	**EB**	EPA 8260	MSV/27757		
92210774002	**FB**	EPA 8260	MSV/27757		
92210774003	**TB**	EPA 8260	MSV/27757		

This report shall not be reproduced, except in full,
without the written consent of Pace Analytical Services, Inc..

Pace Analytical	Document Name: **Sample Condition Upon Receipt (SCUR)**	Document Revised: April 07. 2014 Page 1 of 2
	Document Number: **F-CHR-CS-003-rev.14**	Issuing Authority: Pace Huntersville Quality Office

Client Name: Municipal Engineering Services

Courier: ☐ Fed Ex ☐ UPS ☐ USPS ☑ Client ☐ Commercial ☐ Pace Other_____

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

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

Thermometer Used: IR Gun T1102 (T1401) **Type of Ice:** (Wet) Blue None ☑ Samples on ice, cooling process has begun

Temp Correction Factor **T1102**: No Correction **T1301**: No Correction

Corrected Cooler Temp.: 1.8 °C **Biological Tissue is Frozen:** Yes No (N/A)

Temp should be above freezing to 6°C

Optional
Proj. Due Date:
Proj. Name:

Date and Initials of person examining contents: CE 7-25-14

		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.
Rush Turn Around Time Requested:	☐Yes ☑No ☐N/A	7.
Sufficient Volume:	☐Yes ☑No ☐N/A	8. # 2 Metals bottle is missing
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: -Includes date/time/ID/Analysis Matrix:_____	☐Yes ☑No ☐N/A	12. Times are not on bottles + dates
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	
Samples checked for dechlorination:	CE 7-25-14 ☐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: Jonathan Pfohl Date/Time: 7/28/14

Comments/ Resolution: Jonathan informed the EB was collected @ 14:00.

SCURF Review:	JY	Date:	7/25/14
SRF Review:	JDB	Date:	7/25/14

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)

WO#: 92210774

92210774

Pace Analytical

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

Section A Required Client Information:		Section B Required Project Information:		Section C Invoice Information:	
Company:	Municipal Engineering Services	Report To:	Jonathan Pfohl	Attention:	Municipal Engineering Services
Address:	P.O. Box 97	Copy To:		Company Name:	
Garner, NC 27529				Address:	
Email To:	jpfohl@mesco.com	Purchase Order No.		Pace Quote Reference:	
Phone: 919-772-5393	Fax:	Client Project ID:	Iredell Blanks	Pace Project Manager:	Kevin Godwin
Requested Due Date/TAT:	10 Day (Default)	Container Order Number:		Pace Profile #:	

Regulatory Agency	
State / Location	
North Carolina	

Requested Analysis Filtered (Y/N)

ITEM#	SAMPLE ID (One Character per box. (A-Z, 0-9 / , -) Sample Ids must be unique)	MATRIX CODE (see valid codes to left)	SAMPLE TYPE (G=GRAB C=COMP)	COLLECTED START DATE	COLLECTED START TIME	COLLECTED END DATE	COLLECTED END TIME	SAMPLE TEMP AT COLLECTION	# OF CONTAINERS	Preservatives: Unpreserved	H2SO4	HNO3	HCl	NaOH	Na2S2O3	Methanol	Other	Analyses Test Y/N	VOCs- App I	Metals-App I	Tetrahydrofuran										PLEASE PROVIDE Liter of DI water from same source as TB
																			N	N	N	N	N	N	N	N	N	N	N	N	92210774
1	EB	WT	G			7/25/14	~~2:10~~ 2:06		4			1	3						X	X	X										001
2	FB	WT	G				2:05		4			1	3						X	X	X										002
3	TB	WT	G				2:00		2				2						X		X										003
4																															
5																															
6																															
7																															
8																															
9																															
10																															
11																															
12																															

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

ADDITIONAL COMMENTS	RELINQUISHED BY / AFFILIATION	DATE	TIME	ACCEPTED BY / AFFILIATION	DATE	TIME	SAMPLE CONDITIONS			
TB was filled on 7/25/14 in my presence	/ MESCO	7/25/14	2:06	CE 7-25-14	7/25/14	14:06	1.8	Y	N	Y

SAMPLER NAME AND SIGNATURE			
PRINT Name of SAMPLER:	Jonathan Pfohl		
SIGNATURE of SAMPLER:		DATE Signed:	7/25/14

TEMP in C	Received on Ice (Y/N)	Custody Sealed Cooler (Y/N)	Samples Intact (Y/N)

Appendix B
Field Sampling Parameter Data Sheet(s)

Sampling Data Sheet

Municipal Services Engineering Company
Garner, NC Boone, NC

Project: Iredell Co. Closed Unlined MSWLF

Samplers: J. Pfohl Page 1 of 1

Monitoring Point	Sample Date	Sample Time	Sampling Parameters: Depth to Water (BTOP) 7/ /13	Depth to Water (BTOP) Static Sample Time	Lab Parameters to be analyzed for	Volume Purged (Gal)	Sample Type	Goes Dry During Purge	Comments	Total Depth Expected	Water Quality Parameters: Locked & Tagged	~~DO (mg/L)~~	~~ORP~~	pH	Temp. ©	Specific Cond. (us/cm	TDS (mg/L)	Turbidity	CH4 Gas Vapors (ppm)
MW-1	7/25/14	9:00	41.05		App I	16	P&DB	N		60	Y			4.83	18.2	10	0	C	NR
MW-2	7/25/14	9:40	13.65		App I	17	P&DB	N		49	Y			6.42	18.1	280	130	C	NR
MW-3R	7/24/14	4:10	6.93		App I	8	DB	N	Field Dry	20	Y			6.21	15.9	80	30	ST	NR
MW-3	7/25/14	11:50	9.88		App I	6	DB	Y		23	Y			7.21	15.1	270	130	ST	NR
MW-4	7/24/14	5:30	11.96		App I	12	DB	N		30	Y			6.28	15.9	450	220	C	NR
MW-6	7/25/14	11:00	26.25		App I	3	DB	Y		33	Y			6.21	18.1	1,200	600	C	NR
MW-6R	7/25/14	10:15	3.05		App I	10	DB	N		20.5	Y			6.21	15.8	120	50	C	NR
MW-7S	7/25/14	8:30	42.85		App I	8	P&DB	Y		54.37	Y			5.12	18.9	10	0	C	NR
MW-7D	7/25/14	8:00	42.93		App I	44	P&DB	N	Fast recharge	132.1	Y			6.91	21.4	60	30	C	NR
SW-1	7/24/14	4:30	-	-	App I	-	Dip	-	-	-	No Flow			7.07	24.3	100	50	C	-
SW-2	7/24/14	4:45	-	-	App I	-	Dip	-	-	-	No Flow			6.99	24.7	90	40	C	-

Comments

SS B=Stainless Steel Baler, D B=Disposable Baler, P=Low flow Pump, PD=Purged Dry

VT=Very Turbid, MT=Moderately Turbid, ST=Slightly Turbid, C=Clear

NR=No Reading Attempted, NS=No Sample Obtained