APPENDIX H

RI LABORATORY DATA

PART 5

L1146028-L1151401

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 15, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1146028
Samples Received:	10/03/2019
Project Number:	1413.001.05.601
Description:	American Linen

Report To: Brian O'Neal/Bill Haldeman
1215 Fourth Ave., Suite 1350
Seattle, WA 98161

Entire Report Reviewed By:

Brian Ford
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

Cp: Cover Page 1
Tc: Table of Contents 2
Ss: Sample Summary 3
Cn: Case Narrative 6
Sr: Sample Results 7
MW-302-5 L1146028-01 7
MW-302-10 L1146028-02 9
MW-302-15 L1146028-03 11
MW-302-20 L1146028-04 13
MW-302-25 L1146028-05 15
MW-302-30 L1146028-06 17
MW-302-35 L1146028-07 19
MW-302-40 L1146028-08 21
MW-302-45 L1146028-09 23
MW-302-50 L1146028-10 25
MW-302-55 L1146028-11 27
MW-302-60 L1146028-12 29
MW-302-65 L1146028-13 31
MW-2014-65 L1146028-14 33
TB-100119 L1146028-15 35
Qc: Quality Control Summary 37
Total Solids by Method 2540 G-2011 37
Volatile Organic Compounds (GC/MS) by Method 8260C 39
Gl: Glossary of Terms 53
Al: Accreditations & Locations 54
Sc: Sample Chain of Custody 55

MW-302-5 L1146028-01 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 10:05 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360397	1	10/10/19 14:44	10/10/19 14:55	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1	10/01/19 10:05	10/12/19 07:50	DWR	Mt. Juliet, TN

MW-302-10 L1146028-02 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 10:10 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360397	1	10/10/19 14:44	10/10/19 14:55	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1	10/01/19 10:10	10/12/19 08:10	DWR	Mt. Juliet, TN

MW-302-15 L1146028-03 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 10:15 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360397	1	10/10/19 14:44	10/10/19 14:55	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1.16	10/01/19 10:15	10/12/19 08:33	DWR	Mt. Juliet, TN

MW-302-20 L1146028-04 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 10:20 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360397	1	10/10/19 14:44	10/10/19 14:55	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1	10/01/19 10:20	10/12/19 08:53	DWR	Mt. Juliet, TN

MW-302-25 L1146028-05 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 10:25 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360397	1	10/10/19 14:44	10/10/19 14:55	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1	10/01/19 10:25	10/12/19 09:14	DWR	Mt. Juliet, TN

MW-302-30 L1146028-06 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 10:30 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360397	1	10/10/19 14:44	10/10/19 14:55	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1	10/01/19 10:30	10/12/19 09:34	DWR	Mt. Juliet, TN

MW-302-35 L1146028-07 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 10:50 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360397	1	10/10/19 14:44	10/10/19 14:55	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1	10/01/19 10:50	10/12/19 09:55	DWR	Mt. Juliet, TN

MW-302-40 L1146028-08 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 10:55 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360397	1	10/10/19 14:44	10/10/19 14:55	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1	10/01/19 10:55	10/12/19 10:15	DWR	Mt. Juliet, TN

MW-302-45 L1146028-09 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 11:15 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360397	1	10/10/19 14:44	10/10/19 14:55	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1	10/01/19 11:15	10/12/19 10:36	DWR	Mt. Juliet, TN

MW-302-50 L1146028-10 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 11:20 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360397	1	10/10/19 14:44	10/10/19 14:55	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1	10/01/19 11:20	10/12/19 11:01	DWR	Mt. Juliet, TN

MW-302-55 L1146028-11 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 11:40 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360399	1	10/10/19 14:31	10/10/19 14:41	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1	10/01/19 11:40	10/12/19 11:21	DWR	Mt. Juliet, TN

MW-302-60 L1146028-12 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 11:45 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360399	1	10/10/19 14:31	10/10/19 14:41	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1.2	10/01/19 11:45	10/12/19 11:42	DWR	Mt. Juliet, TN

MW-302-65 L1146028-13 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 12:10 | Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360399	1	10/10/19 14:31	10/10/19 14:41	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361768	1	10/01/19 12:10	10/12/19 12:02	DWR	Mt. Juliet, TN

MW-2014-65 L1146028-14 Solid

Collected by: Chris Deboer | Collected date/time: 10/01/19 12:20 | Received date/time: 10/03/19 08:45

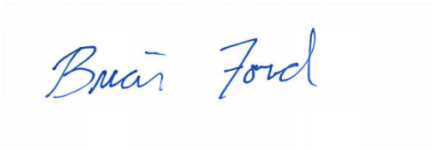
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1360399	1	10/10/19 14:31	10/10/19 14:41	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361775	1	10/01/19 12:20	10/12/19 17:48	ACG	Mt. Juliet, TN

TB-100119 L1146028-15 GW

Collected by: Chris Deboer
Collected date/time: 10/01/19 00:00
Received date/time: 10/03/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1360613	1	10/10/19 12:25	10/10/19 12:25	JHH	Mt. Juliet, TN

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Project Narrative

L1146028-02 (MW-302-10), V8260C: Field prepped methanol vial does not contain any soil. Sample will be lab prepped from bulk soil.

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	85.4		1	10/10/2019 14:55	WG1360397

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0289	J	0.0160	0.0293	1	10/12/2019 07:50	WG1361768
Acrylonitrile	U		0.00222	0.0146	1	10/12/2019 07:50	WG1361768
Benzene	U		0.000468	0.00117	1	10/12/2019 07:50	WG1361768
Bromobenzene	U		0.00123	0.0146	1	10/12/2019 07:50	WG1361768
Bromodichloromethane	U		0.000923	0.00293	1	10/12/2019 07:50	WG1361768
Bromochloromethane	U		0.00132	0.00585	1	10/12/2019 07:50	WG1361768
Bromoform	U		0.00700	0.0293	1	10/12/2019 07:50	WG1361768
Bromomethane	U		0.00433	0.0146	1	10/12/2019 07:50	WG1361768
n-Butylbenzene	U		0.00450	0.0146	1	10/12/2019 07:50	WG1361768
sec-Butylbenzene	U		0.00296	0.0146	1	10/12/2019 07:50	WG1361768
tert-Butylbenzene	U		0.00182	0.00585	1	10/12/2019 07:50	WG1361768
Carbon disulfide	U		0.00475	0.0146	1	10/12/2019 07:50	WG1361768
Carbon tetrachloride	U		0.00126	0.00585	1	10/12/2019 07:50	WG1361768
Chlorobenzene	U		0.000671	0.00293	1	10/12/2019 07:50	WG1361768
Chlorodibromomethane	U		0.000527	0.00293	1	10/12/2019 07:50	WG1361768
Chloroethane	U		0.00126	0.00585	1	10/12/2019 07:50	WG1361768
Chloroform	0.000913	J	0.000486	0.00293	1	10/12/2019 07:50	WG1361768
Chloromethane	U		0.00163	0.0146	1	10/12/2019 07:50	WG1361768
2-Chlorotoluene	U		0.00108	0.00293	1	10/12/2019 07:50	WG1361768
4-Chlorotoluene	U		0.00132	0.00585	1	10/12/2019 07:50	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00597	0.0293	1	10/12/2019 07:50	WG1361768
1,2-Dibromoethane	U		0.000615	0.00293	1	10/12/2019 07:50	WG1361768
Dibromomethane	U		0.00117	0.00585	1	10/12/2019 07:50	WG1361768
1,2-Dichlorobenzene	U		0.00170	0.00585	1	10/12/2019 07:50	WG1361768
1,3-Dichlorobenzene	U		0.00199	0.00585	1	10/12/2019 07:50	WG1361768
1,4-Dichlorobenzene	U		0.00231	0.00585	1	10/12/2019 07:50	WG1361768
Dichlorodifluoromethane	U		0.000958	0.00293	1	10/12/2019 07:50	WG1361768
1,1-Dichloroethane	U		0.000673	0.00293	1	10/12/2019 07:50	WG1361768
1,2-Dichloroethane	U		0.000556	0.00293	1	10/12/2019 07:50	WG1361768
1,1-Dichloroethene	U		0.000585	0.00293	1	10/12/2019 07:50	WG1361768
cis-1,2-Dichloroethene	U		0.000808	0.00293	1	10/12/2019 07:50	WG1361768
trans-1,2-Dichloroethene	U		0.00167	0.00585	1	10/12/2019 07:50	WG1361768
1,2-Dichloropropane	U		0.00149	0.00585	1	10/12/2019 07:50	WG1361768
1,1-Dichloropropene	U		0.000820	0.00293	1	10/12/2019 07:50	WG1361768
1,3-Dichloropropane	U		0.00205	0.00585	1	10/12/2019 07:50	WG1361768
cis-1,3-Dichloropropene	U		0.000794	0.00293	1	10/12/2019 07:50	WG1361768
trans-1,3-Dichloropropene	U		0.00179	0.00585	1	10/12/2019 07:50	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00164	0.00585	1	10/12/2019 07:50	WG1361768
2,2-Dichloropropane	U		0.000929	0.00293	1	10/12/2019 07:50	WG1361768
Di-isopropyl ether	U		0.000410	0.00117	1	10/12/2019 07:50	WG1361768
Ethylbenzene	0.00110	J	0.000621	0.00293	1	10/12/2019 07:50	WG1361768
Hexachloro-1,3-butadiene	U		0.0149	0.0293	1	10/12/2019 07:50	WG1361768
2-Hexanone	U		0.0117	0.0293	1	10/12/2019 07:50	WG1361768
n-Hexane	0.00507	J J0	0.00124	0.00585	1	10/12/2019 07:50	WG1361768
Iodomethane	U		0.00708	0.0146	1	10/12/2019 07:50	WG1361768
Isopropylbenzene	U		0.00101	0.00293	1	10/12/2019 07:50	WG1361768
p-Isopropyltoluene	U		0.00273	0.00585	1	10/12/2019 07:50	WG1361768
2-Butanone (MEK)	U		0.0146	0.0293	1	10/12/2019 07:50	WG1361768
Methylene Chloride	U		0.00778	0.0293	1	10/12/2019 07:50	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0117	0.0293	1	10/12/2019 07:50	WG1361768

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000345	0.00117	1	10/12/2019 07:50	WG1361768
Naphthalene	U		0.00365	0.0146	1	10/12/2019 07:50	WG1361768
n-Propylbenzene	U		0.00138	0.00585	1	10/12/2019 07:50	WG1361768
Styrene	U		0.00320	0.0146	1	10/12/2019 07:50	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000585	0.00293	1	10/12/2019 07:50	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000457	0.00293	1	10/12/2019 07:50	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000790	0.00293	1	10/12/2019 07:50	WG1361768
Tetrachloroethene	0.0461		0.000820	0.00293	1	10/12/2019 07:50	WG1361768
Toluene	0.00938		0.00146	0.00585	1	10/12/2019 07:50	WG1361768
1,2,3-Trichlorobenzene	U		0.000732	0.00293	1	10/12/2019 07:50	WG1361768
1,2,4-Trichlorobenzene	U		0.00564	0.0146	1	10/12/2019 07:50	WG1361768
1,1,1-Trichloroethane	U		0.000322	0.00293	1	10/12/2019 07:50	WG1361768
1,1,2-Trichloroethane	U		0.00103	0.00293	1	10/12/2019 07:50	WG1361768
Trichloroethene	U		0.000468	0.00117	1	10/12/2019 07:50	WG1361768
Trichlorofluoromethane	U		0.000585	0.00293	1	10/12/2019 07:50	WG1361768
1,2,3-Trichloropropane	U		0.00597	0.0146	1	10/12/2019 07:50	WG1361768
1,2,4-Trimethylbenzene	0.00427	J	0.00136	0.00585	1	10/12/2019 07:50	WG1361768
1,2,3-Trimethylbenzene	0.00296	J	0.00135	0.00585	1	10/12/2019 07:50	WG1361768
1,3,5-Trimethylbenzene	U		0.00126	0.00585	1	10/12/2019 07:50	WG1361768
Vinyl acetate	U	J0	0.00412	0.0146	1	10/12/2019 07:50	WG1361768
Vinyl chloride	U		0.000800	0.00293	1	10/12/2019 07:50	WG1361768
Xylenes, Total	0.00584	J	0.00560	0.00761	1	10/12/2019 07:50	WG1361768
(S) Toluene-d8	*112*			*75.0-131*		*10/12/2019 07:50*	WG1361768
(S) 4-Bromofluorobenzene	*94.8*			*67.0-138*		*10/12/2019 07:50*	WG1361768
(S) 1,2-Dichloroethane-d4	*109*			*70.0-130*		*10/12/2019 07:50*	WG1361768

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	80.4		1	10/10/2019 14:55	WG1360397

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0170	0.0311	1	10/12/2019 08:10	WG1361768
Acrylonitrile	U		0.00236	0.0156	1	10/12/2019 08:10	WG1361768
Benzene	U		0.000498	0.00124	1	10/12/2019 08:10	WG1361768
Bromobenzene	U		0.00131	0.0156	1	10/12/2019 08:10	WG1361768
Bromodichloromethane	U		0.000980	0.00311	1	10/12/2019 08:10	WG1361768
Bromochloromethane	U		0.00141	0.00622	1	10/12/2019 08:10	WG1361768
Bromoform	U		0.00744	0.0311	1	10/12/2019 08:10	WG1361768
Bromomethane	U		0.00460	0.0156	1	10/12/2019 08:10	WG1361768
n-Butylbenzene	U		0.00478	0.0156	1	10/12/2019 08:10	WG1361768
sec-Butylbenzene	U		0.00315	0.0156	1	10/12/2019 08:10	WG1361768
tert-Butylbenzene	U		0.00193	0.00622	1	10/12/2019 08:10	WG1361768
Carbon disulfide	U		0.00505	0.0156	1	10/12/2019 08:10	WG1361768
Carbon tetrachloride	U		0.00134	0.00622	1	10/12/2019 08:10	WG1361768
Chlorobenzene	U		0.000713	0.00311	1	10/12/2019 08:10	WG1361768
Chlorodibromomethane	U		0.000560	0.00311	1	10/12/2019 08:10	WG1361768
Chloroethane	U		0.00134	0.00622	1	10/12/2019 08:10	WG1361768
Chloroform	U		0.000516	0.00311	1	10/12/2019 08:10	WG1361768
Chloromethane	U		0.00173	0.0156	1	10/12/2019 08:10	WG1361768
2-Chlorotoluene	U		0.00114	0.00311	1	10/12/2019 08:10	WG1361768
4-Chlorotoluene	U		0.00141	0.00622	1	10/12/2019 08:10	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00635	0.0311	1	10/12/2019 08:10	WG1361768
1,2-Dibromoethane	U		0.000653	0.00311	1	10/12/2019 08:10	WG1361768
Dibromomethane	U		0.00124	0.00622	1	10/12/2019 08:10	WG1361768
1,2-Dichlorobenzene	U		0.00180	0.00622	1	10/12/2019 08:10	WG1361768
1,3-Dichlorobenzene	U		0.00212	0.00622	1	10/12/2019 08:10	WG1361768
1,4-Dichlorobenzene	U		0.00245	0.00622	1	10/12/2019 08:10	WG1361768
Dichlorodifluoromethane	U		0.00102	0.00311	1	10/12/2019 08:10	WG1361768
1,1-Dichloroethane	U		0.000715	0.00311	1	10/12/2019 08:10	WG1361768
1,2-Dichloroethane	U		0.000591	0.00311	1	10/12/2019 08:10	WG1361768
1,1-Dichloroethene	U		0.000622	0.00311	1	10/12/2019 08:10	WG1361768
cis-1,2-Dichloroethene	U		0.000859	0.00311	1	10/12/2019 08:10	WG1361768
trans-1,2-Dichloroethene	U		0.00178	0.00622	1	10/12/2019 08:10	WG1361768
1,2-Dichloropropane	U		0.00158	0.00622	1	10/12/2019 08:10	WG1361768
1,1-Dichloropropene	U		0.000871	0.00311	1	10/12/2019 08:10	WG1361768
1,3-Dichloropropane	U		0.00218	0.00622	1	10/12/2019 08:10	WG1361768
cis-1,3-Dichloropropene	U		0.000844	0.00311	1	10/12/2019 08:10	WG1361768
trans-1,3-Dichloropropene	U		0.00190	0.00622	1	10/12/2019 08:10	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00174	0.00622	1	10/12/2019 08:10	WG1361768
2,2-Dichloropropane	U		0.000987	0.00311	1	10/12/2019 08:10	WG1361768
Di-isopropyl ether	U		0.000435	0.00124	1	10/12/2019 08:10	WG1361768
Ethylbenzene	U		0.000659	0.00311	1	10/12/2019 08:10	WG1361768
Hexachloro-1,3-butadiene	U		0.0158	0.0311	1	10/12/2019 08:10	WG1361768
2-Hexanone	U		0.0124	0.0311	1	10/12/2019 08:10	WG1361768
n-Hexane	U	J0	0.00132	0.00622	1	10/12/2019 08:10	WG1361768
Iodomethane	U		0.00753	0.0156	1	10/12/2019 08:10	WG1361768
Isopropylbenzene	U		0.00107	0.00311	1	10/12/2019 08:10	WG1361768
p-Isopropyltoluene	U		0.00290	0.00622	1	10/12/2019 08:10	WG1361768
2-Butanone (MEK)	U		0.0156	0.0311	1	10/12/2019 08:10	WG1361768
Methylene Chloride	U		0.00826	0.0311	1	10/12/2019 08:10	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0124	0.0311	1	10/12/2019 08:10	WG1361768

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000367	0.00124	1	10/12/2019 08:10	WG1361768
Naphthalene	U		0.00388	0.0156	1	10/12/2019 08:10	WG1361768
n-Propylbenzene	U		0.00147	0.00622	1	10/12/2019 08:10	WG1361768
Styrene	U		0.00340	0.0156	1	10/12/2019 08:10	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000622	0.00311	1	10/12/2019 08:10	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000485	0.00311	1	10/12/2019 08:10	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000840	0.00311	1	10/12/2019 08:10	WG1361768
Tetrachloroethene	U		0.000871	0.00311	1	10/12/2019 08:10	WG1361768
Toluene	U		0.00156	0.00622	1	10/12/2019 08:10	WG1361768
1,2,3-Trichlorobenzene	U		0.000778	0.00311	1	10/12/2019 08:10	WG1361768
1,2,4-Trichlorobenzene	U		0.00600	0.0156	1	10/12/2019 08:10	WG1361768
1,1,1-Trichloroethane	U		0.000342	0.00311	1	10/12/2019 08:10	WG1361768
1,1,2-Trichloroethane	U		0.00110	0.00311	1	10/12/2019 08:10	WG1361768
Trichloroethene	U		0.000498	0.00124	1	10/12/2019 08:10	WG1361768
Trichlorofluoromethane	U		0.000622	0.00311	1	10/12/2019 08:10	WG1361768
1,2,3-Trichloropropane	U		0.00635	0.0156	1	10/12/2019 08:10	WG1361768
1,2,4-Trimethylbenzene	U		0.00144	0.00622	1	10/12/2019 08:10	WG1361768
1,2,3-Trimethylbenzene	U		0.00143	0.00622	1	10/12/2019 08:10	WG1361768
1,3,5-Trimethylbenzene	U		0.00134	0.00622	1	10/12/2019 08:10	WG1361768
Vinyl acetate	U	J0	0.00438	0.0156	1	10/12/2019 08:10	WG1361768
Vinyl chloride	U		0.000850	0.00311	1	10/12/2019 08:10	WG1361768
Xylenes, Total	U		0.00595	0.00809	1	10/12/2019 08:10	WG1361768
(S) Toluene-d8	*110*			*75.0-131*		*10/12/2019 08:10*	WG1361768
(S) 4-Bromofluorobenzene	*95.3*			*67.0-138*		*10/12/2019 08:10*	WG1361768
(S) 1,2-Dichloroethane-d4	*106*			*70.0-130*		*10/12/2019 08:10*	WG1361768

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	85.1		1	10/10/2019 14:55	WG1360397

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0476		0.0187	0.0341	1.16	10/12/2019 08:33	WG1361768
Acrylonitrile	U		0.00259	0.0170	1.16	10/12/2019 08:33	WG1361768
Benzene	U		0.000545	0.00136	1.16	10/12/2019 08:33	WG1361768
Bromobenzene	U		0.00143	0.0170	1.16	10/12/2019 08:33	WG1361768
Bromodichloromethane	U		0.00107	0.00341	1.16	10/12/2019 08:33	WG1361768
Bromochloromethane	U		0.00154	0.00682	1.16	10/12/2019 08:33	WG1361768
Bromoform	U		0.00816	0.0341	1.16	10/12/2019 08:33	WG1361768
Bromomethane	U		0.00504	0.0170	1.16	10/12/2019 08:33	WG1361768
n-Butylbenzene	U		0.00523	0.0170	1.16	10/12/2019 08:33	WG1361768
sec-Butylbenzene	U		0.00344	0.0170	1.16	10/12/2019 08:33	WG1361768
tert-Butylbenzene	U		0.00212	0.00682	1.16	10/12/2019 08:33	WG1361768
Carbon disulfide	U		0.00554	0.0170	1.16	10/12/2019 08:33	WG1361768
Carbon tetrachloride	U		0.00147	0.00682	1.16	10/12/2019 08:33	WG1361768
Chlorobenzene	U		0.000782	0.00341	1.16	10/12/2019 08:33	WG1361768
Chlorodibromomethane	U		0.000614	0.00341	1.16	10/12/2019 08:33	WG1361768
Chloroethane	U		0.00147	0.00682	1.16	10/12/2019 08:33	WG1361768
Chloroform	U		0.000565	0.00341	1.16	10/12/2019 08:33	WG1361768
Chloromethane	U		0.00189	0.0170	1.16	10/12/2019 08:33	WG1361768
2-Chlorotoluene	U		0.00126	0.00341	1.16	10/12/2019 08:33	WG1361768
4-Chlorotoluene	U		0.00154	0.00682	1.16	10/12/2019 08:33	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00696	0.0341	1.16	10/12/2019 08:33	WG1361768
1,2-Dibromoethane	U		0.000716	0.00341	1.16	10/12/2019 08:33	WG1361768
Dibromomethane	U		0.00136	0.00682	1.16	10/12/2019 08:33	WG1361768
1,2-Dichlorobenzene	U		0.00198	0.00682	1.16	10/12/2019 08:33	WG1361768
1,3-Dichlorobenzene	U		0.00232	0.00682	1.16	10/12/2019 08:33	WG1361768
1,4-Dichlorobenzene	U		0.00269	0.00682	1.16	10/12/2019 08:33	WG1361768
Dichlorodifluoromethane	U		0.00112	0.00341	1.16	10/12/2019 08:33	WG1361768
1,1-Dichloroethane	U		0.000784	0.00341	1.16	10/12/2019 08:33	WG1361768
1,2-Dichloroethane	U		0.000648	0.00341	1.16	10/12/2019 08:33	WG1361768
1,1-Dichloroethene	U		0.000682	0.00341	1.16	10/12/2019 08:33	WG1361768
cis-1,2-Dichloroethene	U		0.000940	0.00341	1.16	10/12/2019 08:33	WG1361768
trans-1,2-Dichloroethene	U		0.00195	0.00682	1.16	10/12/2019 08:33	WG1361768
1,2-Dichloropropane	U		0.00173	0.00682	1.16	10/12/2019 08:33	WG1361768
1,1-Dichloropropene	U		0.000955	0.00341	1.16	10/12/2019 08:33	WG1361768
1,3-Dichloropropane	U		0.00239	0.00682	1.16	10/12/2019 08:33	WG1361768
cis-1,3-Dichloropropene	U		0.000924	0.00341	1.16	10/12/2019 08:33	WG1361768
trans-1,3-Dichloropropene	U		0.00208	0.00682	1.16	10/12/2019 08:33	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00190	0.00682	1.16	10/12/2019 08:33	WG1361768
2,2-Dichloropropane	U		0.00108	0.00341	1.16	10/12/2019 08:33	WG1361768
Di-isopropyl ether	U		0.000477	0.00136	1.16	10/12/2019 08:33	WG1361768
Ethylbenzene	U		0.000723	0.00341	1.16	10/12/2019 08:33	WG1361768
Hexachloro-1,3-butadiene	U		0.0173	0.0341	1.16	10/12/2019 08:33	WG1361768
2-Hexanone	U		0.0136	0.0341	1.16	10/12/2019 08:33	WG1361768
n-Hexane	U	J0	0.00145	0.00682	1.16	10/12/2019 08:33	WG1361768
Iodomethane	U		0.00825	0.0170	1.16	10/12/2019 08:33	WG1361768
Isopropylbenzene	U		0.00118	0.00341	1.16	10/12/2019 08:33	WG1361768
p-Isopropyltoluene	U		0.00317	0.00682	1.16	10/12/2019 08:33	WG1361768
2-Butanone (MEK)	U		0.0170	0.0341	1.16	10/12/2019 08:33	WG1361768
Methylene Chloride	U		0.00905	0.0341	1.16	10/12/2019 08:33	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0136	0.0341	1.16	10/12/2019 08:33	WG1361768

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000402	0.00136	1.16	10/12/2019 08:33	WG1361768
Naphthalene	U		0.00426	0.0170	1.16	10/12/2019 08:33	WG1361768
n-Propylbenzene	U		0.00161	0.00682	1.16	10/12/2019 08:33	WG1361768
Styrene	U		0.00373	0.0170	1.16	10/12/2019 08:33	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000682	0.00341	1.16	10/12/2019 08:33	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000531	0.00341	1.16	10/12/2019 08:33	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000921	0.00341	1.16	10/12/2019 08:33	WG1361768
Tetrachloroethene	0.00215	J	0.000955	0.00341	1.16	10/12/2019 08:33	WG1361768
Toluene	0.0142		0.00170	0.00682	1.16	10/12/2019 08:33	WG1361768
1,2,3-Trichlorobenzene	U		0.000852	0.00341	1.16	10/12/2019 08:33	WG1361768
1,2,4-Trichlorobenzene	U		0.00657	0.0170	1.16	10/12/2019 08:33	WG1361768
1,1,1-Trichloroethane	U		0.000375	0.00341	1.16	10/12/2019 08:33	WG1361768
1,1,2-Trichloroethane	U		0.00120	0.00341	1.16	10/12/2019 08:33	WG1361768
Trichloroethene	U		0.000545	0.00136	1.16	10/12/2019 08:33	WG1361768
Trichlorofluoromethane	U		0.000682	0.00341	1.16	10/12/2019 08:33	WG1361768
1,2,3-Trichloropropane	U		0.00696	0.0170	1.16	10/12/2019 08:33	WG1361768
1,2,4-Trimethylbenzene	U		0.00159	0.00682	1.16	10/12/2019 08:33	WG1361768
1,2,3-Trimethylbenzene	U		0.00156	0.00682	1.16	10/12/2019 08:33	WG1361768
1,3,5-Trimethylbenzene	U		0.00147	0.00682	1.16	10/12/2019 08:33	WG1361768
Vinyl acetate	U	J0	0.00480	0.0170	1.16	10/12/2019 08:33	WG1361768
Vinyl chloride	U		0.000931	0.00341	1.16	10/12/2019 08:33	WG1361768
Xylenes, Total	U		0.00651	0.00886	1.16	10/12/2019 08:33	WG1361768
(S) Toluene-d8	*107*			*75.0-131*		*10/12/2019 08:33*	WG1361768
(S) 4-Bromofluorobenzene	*100*			*67.0-138*		*10/12/2019 08:33*	WG1361768
(S) 1,2-Dichloroethane-d4	*113*			*70.0-130*		*10/12/2019 08:33*	WG1361768

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	83.8		1	10/10/2019 14:55	WG1360397

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0267	J	0.0163	0.0298	1	10/12/2019 08:53	WG1361768
Acrylonitrile	U		0.00227	0.0149	1	10/12/2019 08:53	WG1361768
Benzene	U		0.000477	0.00119	1	10/12/2019 08:53	WG1361768
Bromobenzene	U		0.00125	0.0149	1	10/12/2019 08:53	WG1361768
Bromodichloromethane	U		0.000940	0.00298	1	10/12/2019 08:53	WG1361768
Bromochloromethane	U		0.00135	0.00597	1	10/12/2019 08:53	WG1361768
Bromoform	U		0.00714	0.0298	1	10/12/2019 08:53	WG1361768
Bromomethane	U		0.00442	0.0149	1	10/12/2019 08:53	WG1361768
n-Butylbenzene	U		0.00458	0.0149	1	10/12/2019 08:53	WG1361768
sec-Butylbenzene	U		0.00302	0.0149	1	10/12/2019 08:53	WG1361768
tert-Butylbenzene	U		0.00185	0.00597	1	10/12/2019 08:53	WG1361768
Carbon disulfide	U		0.00485	0.0149	1	10/12/2019 08:53	WG1361768
Carbon tetrachloride	U		0.00129	0.00597	1	10/12/2019 08:53	WG1361768
Chlorobenzene	U		0.000684	0.00298	1	10/12/2019 08:53	WG1361768
Chlorodibromomethane	U		0.000537	0.00298	1	10/12/2019 08:53	WG1361768
Chloroethane	U		0.00129	0.00597	1	10/12/2019 08:53	WG1361768
Chloroform	U		0.000495	0.00298	1	10/12/2019 08:53	WG1361768
Chloromethane	U		0.00166	0.0149	1	10/12/2019 08:53	WG1361768
2-Chlorotoluene	U		0.00110	0.00298	1	10/12/2019 08:53	WG1361768
4-Chlorotoluene	U		0.00135	0.00597	1	10/12/2019 08:53	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00609	0.0298	1	10/12/2019 08:53	WG1361768
1,2-Dibromoethane	U		0.000627	0.00298	1	10/12/2019 08:53	WG1361768
Dibromomethane	U		0.00119	0.00597	1	10/12/2019 08:53	WG1361768
1,2-Dichlorobenzene	U		0.00173	0.00597	1	10/12/2019 08:53	WG1361768
1,3-Dichlorobenzene	U		0.00203	0.00597	1	10/12/2019 08:53	WG1361768
1,4-Dichlorobenzene	U		0.00235	0.00597	1	10/12/2019 08:53	WG1361768
Dichlorodifluoromethane	U		0.000976	0.00298	1	10/12/2019 08:53	WG1361768
1,1-Dichloroethane	U		0.000686	0.00298	1	10/12/2019 08:53	WG1361768
1,2-Dichloroethane	U		0.000567	0.00298	1	10/12/2019 08:53	WG1361768
1,1-Dichloroethene	U		0.000597	0.00298	1	10/12/2019 08:53	WG1361768
cis-1,2-Dichloroethene	U		0.000823	0.00298	1	10/12/2019 08:53	WG1361768
trans-1,2-Dichloroethene	U		0.00171	0.00597	1	10/12/2019 08:53	WG1361768
1,2-Dichloropropane	U		0.00152	0.00597	1	10/12/2019 08:53	WG1361768
1,1-Dichloropropene	U		0.000835	0.00298	1	10/12/2019 08:53	WG1361768
1,3-Dichloropropane	U		0.00209	0.00597	1	10/12/2019 08:53	WG1361768
cis-1,3-Dichloropropene	U		0.000809	0.00298	1	10/12/2019 08:53	WG1361768
trans-1,3-Dichloropropene	U		0.00183	0.00597	1	10/12/2019 08:53	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00167	0.00597	1	10/12/2019 08:53	WG1361768
2,2-Dichloropropane	U		0.000946	0.00298	1	10/12/2019 08:53	WG1361768
Di-isopropyl ether	U		0.000418	0.00119	1	10/12/2019 08:53	WG1361768
Ethylbenzene	U		0.000632	0.00298	1	10/12/2019 08:53	WG1361768
Hexachloro-1,3-butadiene	U		0.0152	0.0298	1	10/12/2019 08:53	WG1361768
2-Hexanone	U		0.0119	0.0298	1	10/12/2019 08:53	WG1361768
n-Hexane	U	J0	0.00126	0.00597	1	10/12/2019 08:53	WG1361768
Iodomethane	U		0.00722	0.0149	1	10/12/2019 08:53	WG1361768
Isopropylbenzene	U		0.00103	0.00298	1	10/12/2019 08:53	WG1361768
p-Isopropyltoluene	U		0.00278	0.00597	1	10/12/2019 08:53	WG1361768
2-Butanone (MEK)	U		0.0149	0.0298	1	10/12/2019 08:53	WG1361768
Methylene Chloride	U		0.00792	0.0298	1	10/12/2019 08:53	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0119	0.0298	1	10/12/2019 08:53	WG1361768

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000352	0.00119	1	10/12/2019 08:53	WG1361768
Naphthalene	U		0.00372	0.0149	1	10/12/2019 08:53	WG1361768
n-Propylbenzene	U		0.00141	0.00597	1	10/12/2019 08:53	WG1361768
Styrene	U		0.00326	0.0149	1	10/12/2019 08:53	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000597	0.00298	1	10/12/2019 08:53	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000465	0.00298	1	10/12/2019 08:53	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000806	0.00298	1	10/12/2019 08:53	WG1361768
Tetrachloroethene	0.00541		0.000835	0.00298	1	10/12/2019 08:53	WG1361768
Toluene	0.00524	J	0.00149	0.00597	1	10/12/2019 08:53	WG1361768
1,2,3-Trichlorobenzene	U		0.000746	0.00298	1	10/12/2019 08:53	WG1361768
1,2,4-Trichlorobenzene	U		0.00575	0.0149	1	10/12/2019 08:53	WG1361768
1,1,1-Trichloroethane	U		0.000328	0.00298	1	10/12/2019 08:53	WG1361768
1,1,2-Trichloroethane	U		0.00105	0.00298	1	10/12/2019 08:53	WG1361768
Trichloroethene	U		0.000477	0.00119	1	10/12/2019 08:53	WG1361768
Trichlorofluoromethane	U		0.000597	0.00298	1	10/12/2019 08:53	WG1361768
1,2,3-Trichloropropane	U		0.00609	0.0149	1	10/12/2019 08:53	WG1361768
1,2,4-Trimethylbenzene	U		0.00138	0.00597	1	10/12/2019 08:53	WG1361768
1,2,3-Trimethylbenzene	U		0.00137	0.00597	1	10/12/2019 08:53	WG1361768
1,3,5-Trimethylbenzene	U		0.00129	0.00597	1	10/12/2019 08:53	WG1361768
Vinyl acetate	U	J0	0.00420	0.0149	1	10/12/2019 08:53	WG1361768
Vinyl chloride	U		0.000815	0.00298	1	10/12/2019 08:53	WG1361768
Xylenes, Total	U		0.00570	0.00776	1	10/12/2019 08:53	WG1361768
(S) Toluene-d8	*107*			*75.0-131*		*10/12/2019 08:53*	WG1361768
(S) 4-Bromofluorobenzene	*97.5*			*67.0-138*		*10/12/2019 08:53*	WG1361768
(S) 1,2-Dichloroethane-d4	*114*			*70.0-130*		*10/12/2019 08:53*	WG1361768

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	89.2		1	10/10/2019 14:55	WG1360397

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0168	J	0.0154	0.0280	1	10/12/2019 09:14	WG1361768
Acrylonitrile	U		0.00213	0.0140	1	10/12/2019 09:14	WG1361768
Benzene	U		0.000448	0.00112	1	10/12/2019 09:14	WG1361768
Bromobenzene	U		0.00118	0.0140	1	10/12/2019 09:14	WG1361768
Bromodichloromethane	U		0.000883	0.00280	1	10/12/2019 09:14	WG1361768
Bromochloromethane	U		0.00127	0.00560	1	10/12/2019 09:14	WG1361768
Bromoform	U		0.00670	0.0280	1	10/12/2019 09:14	WG1361768
Bromomethane	U		0.00415	0.0140	1	10/12/2019 09:14	WG1361768
n-Butylbenzene	U		0.00430	0.0140	1	10/12/2019 09:14	WG1361768
sec-Butylbenzene	U		0.00284	0.0140	1	10/12/2019 09:14	WG1361768
tert-Butylbenzene	U		0.00174	0.00560	1	10/12/2019 09:14	WG1361768
Carbon disulfide	U		0.00455	0.0140	1	10/12/2019 09:14	WG1361768
Carbon tetrachloride	U		0.00121	0.00560	1	10/12/2019 09:14	WG1361768
Chlorobenzene	U		0.000642	0.00280	1	10/12/2019 09:14	WG1361768
Chlorodibromomethane	U		0.000504	0.00280	1	10/12/2019 09:14	WG1361768
Chloroethane	U		0.00121	0.00560	1	10/12/2019 09:14	WG1361768
Chloroform	U		0.000465	0.00280	1	10/12/2019 09:14	WG1361768
Chloromethane	U		0.00156	0.0140	1	10/12/2019 09:14	WG1361768
2-Chlorotoluene	U		0.00103	0.00280	1	10/12/2019 09:14	WG1361768
4-Chlorotoluene	U		0.00127	0.00560	1	10/12/2019 09:14	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00572	0.0280	1	10/12/2019 09:14	WG1361768
1,2-Dibromoethane	U		0.000588	0.00280	1	10/12/2019 09:14	WG1361768
Dibromomethane	U		0.00112	0.00560	1	10/12/2019 09:14	WG1361768
1,2-Dichlorobenzene	U		0.00163	0.00560	1	10/12/2019 09:14	WG1361768
1,3-Dichlorobenzene	U		0.00191	0.00560	1	10/12/2019 09:14	WG1361768
1,4-Dichlorobenzene	U		0.00221	0.00560	1	10/12/2019 09:14	WG1361768
Dichlorodifluoromethane	U		0.000917	0.00280	1	10/12/2019 09:14	WG1361768
1,1-Dichloroethane	U		0.000644	0.00280	1	10/12/2019 09:14	WG1361768
1,2-Dichloroethane	U		0.000532	0.00280	1	10/12/2019 09:14	WG1361768
1,1-Dichloroethene	U		0.000560	0.00280	1	10/12/2019 09:14	WG1361768
cis-1,2-Dichloroethene	U		0.000773	0.00280	1	10/12/2019 09:14	WG1361768
trans-1,2-Dichloroethene	U		0.00160	0.00560	1	10/12/2019 09:14	WG1361768
1,2-Dichloropropane	U		0.00142	0.00560	1	10/12/2019 09:14	WG1361768
1,1-Dichloropropene	U		0.000784	0.00280	1	10/12/2019 09:14	WG1361768
1,3-Dichloropropane	U		0.00196	0.00560	1	10/12/2019 09:14	WG1361768
cis-1,3-Dichloropropene	U		0.000760	0.00280	1	10/12/2019 09:14	WG1361768
trans-1,3-Dichloropropene	U		0.00171	0.00560	1	10/12/2019 09:14	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00157	0.00560	1	10/12/2019 09:14	WG1361768
2,2-Dichloropropane	U		0.000889	0.00280	1	10/12/2019 09:14	WG1361768
Di-isopropyl ether	U		0.000392	0.00112	1	10/12/2019 09:14	WG1361768
Ethylbenzene	U		0.000594	0.00280	1	10/12/2019 09:14	WG1361768
Hexachloro-1,3-butadiene	U		0.0142	0.0280	1	10/12/2019 09:14	WG1361768
2-Hexanone	U		0.0112	0.0280	1	10/12/2019 09:14	WG1361768
n-Hexane	U	J0	0.00119	0.00560	1	10/12/2019 09:14	WG1361768
Iodomethane	U		0.00678	0.0140	1	10/12/2019 09:14	WG1361768
Isopropylbenzene	U		0.000967	0.00280	1	10/12/2019 09:14	WG1361768
p-Isopropyltoluene	U		0.00261	0.00560	1	10/12/2019 09:14	WG1361768
2-Butanone (MEK)	U		0.0140	0.0280	1	10/12/2019 09:14	WG1361768
Methylene Chloride	U		0.00744	0.0280	1	10/12/2019 09:14	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0112	0.0280	1	10/12/2019 09:14	WG1361768

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000331	0.00112	1	10/12/2019 09:14	WG1361768
Naphthalene	U		0.00350	0.0140	1	10/12/2019 09:14	WG1361768
n-Propylbenzene	U		0.00132	0.00560	1	10/12/2019 09:14	WG1361768
Styrene	U		0.00306	0.0140	1	10/12/2019 09:14	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000560	0.00280	1	10/12/2019 09:14	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000437	0.00280	1	10/12/2019 09:14	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000756	0.00280	1	10/12/2019 09:14	WG1361768
Tetrachloroethene	U		0.000784	0.00280	1	10/12/2019 09:14	WG1361768
Toluene	0.00443	J	0.00140	0.00560	1	10/12/2019 09:14	WG1361768
1,2,3-Trichlorobenzene	U		0.000700	0.00280	1	10/12/2019 09:14	WG1361768
1,2,4-Trichlorobenzene	U		0.00540	0.0140	1	10/12/2019 09:14	WG1361768
1,1,1-Trichloroethane	U		0.000308	0.00280	1	10/12/2019 09:14	WG1361768
1,1,2-Trichloroethane	U		0.000990	0.00280	1	10/12/2019 09:14	WG1361768
Trichloroethene	U		0.000448	0.00112	1	10/12/2019 09:14	WG1361768
Trichlorofluoromethane	U		0.000560	0.00280	1	10/12/2019 09:14	WG1361768
1,2,3-Trichloropropane	U		0.00572	0.0140	1	10/12/2019 09:14	WG1361768
1,2,4-Trimethylbenzene	U		0.00130	0.00560	1	10/12/2019 09:14	WG1361768
1,2,3-Trimethylbenzene	U		0.00129	0.00560	1	10/12/2019 09:14	WG1361768
1,3,5-Trimethylbenzene	U		0.00121	0.00560	1	10/12/2019 09:14	WG1361768
Vinyl acetate	U	J0	0.00394	0.0140	1	10/12/2019 09:14	WG1361768
Vinyl chloride	U		0.000765	0.00280	1	10/12/2019 09:14	WG1361768
Xylenes, Total	U		0.00536	0.00728	1	10/12/2019 09:14	WG1361768
(S) Toluene-d8	*109*			*75.0-131*		*10/12/2019 09:14*	WG1361768
(S) 4-Bromofluorobenzene	*99.9*			*67.0-138*		*10/12/2019 09:14*	WG1361768
(S) 1,2-Dichloroethane-d4	*110*			*70.0-130*		*10/12/2019 09:14*	WG1361768

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	91.4		1	10/10/2019 14:55	WG1360397

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0150	0.0273	1	10/12/2019 09:34	WG1361768
Acrylonitrile	U		0.00208	0.0137	1	10/12/2019 09:34	WG1361768
Benzene	U		0.000438	0.00109	1	10/12/2019 09:34	WG1361768
Bromobenzene	U		0.00115	0.0137	1	10/12/2019 09:34	WG1361768
Bromodichloromethane	U		0.000862	0.00273	1	10/12/2019 09:34	WG1361768
Bromochloromethane	U		0.00124	0.00547	1	10/12/2019 09:34	WG1361768
Bromoform	U		0.00654	0.0273	1	10/12/2019 09:34	WG1361768
Bromomethane	U		0.00405	0.0137	1	10/12/2019 09:34	WG1361768
n-Butylbenzene	U		0.00420	0.0137	1	10/12/2019 09:34	WG1361768
sec-Butylbenzene	U		0.00277	0.0137	1	10/12/2019 09:34	WG1361768
tert-Butylbenzene	U		0.00170	0.00547	1	10/12/2019 09:34	WG1361768
Carbon disulfide	U		0.00444	0.0137	1	10/12/2019 09:34	WG1361768
Carbon tetrachloride	U		0.00118	0.00547	1	10/12/2019 09:34	WG1361768
Chlorobenzene	U		0.000627	0.00273	1	10/12/2019 09:34	WG1361768
Chlorodibromomethane	U		0.000492	0.00273	1	10/12/2019 09:34	WG1361768
Chloroethane	U		0.00118	0.00547	1	10/12/2019 09:34	WG1361768
Chloroform	U		0.000454	0.00273	1	10/12/2019 09:34	WG1361768
Chloromethane	U		0.00152	0.0137	1	10/12/2019 09:34	WG1361768
2-Chlorotoluene	U		0.00101	0.00273	1	10/12/2019 09:34	WG1361768
4-Chlorotoluene	U		0.00124	0.00547	1	10/12/2019 09:34	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00558	0.0273	1	10/12/2019 09:34	WG1361768
1,2-Dibromoethane	U		0.000574	0.00273	1	10/12/2019 09:34	WG1361768
Dibromomethane	U		0.00109	0.00547	1	10/12/2019 09:34	WG1361768
1,2-Dichlorobenzene	U		0.00159	0.00547	1	10/12/2019 09:34	WG1361768
1,3-Dichlorobenzene	U		0.00186	0.00547	1	10/12/2019 09:34	WG1361768
1,4-Dichlorobenzene	U		0.00215	0.00547	1	10/12/2019 09:34	WG1361768
Dichlorodifluoromethane	U		0.000895	0.00273	1	10/12/2019 09:34	WG1361768
1,1-Dichloroethane	U		0.000629	0.00273	1	10/12/2019 09:34	WG1361768
1,2-Dichloroethane	U		0.000520	0.00273	1	10/12/2019 09:34	WG1361768
1,1-Dichloroethene	U		0.000547	0.00273	1	10/12/2019 09:34	WG1361768
cis-1,2-Dichloroethene	U		0.000755	0.00273	1	10/12/2019 09:34	WG1361768
trans-1,2-Dichloroethene	U		0.00156	0.00547	1	10/12/2019 09:34	WG1361768
1,2-Dichloropropane	U		0.00139	0.00547	1	10/12/2019 09:34	WG1361768
1,1-Dichloropropene	U		0.000766	0.00273	1	10/12/2019 09:34	WG1361768
1,3-Dichloropropane	U		0.00191	0.00547	1	10/12/2019 09:34	WG1361768
cis-1,3-Dichloropropene	U		0.000742	0.00273	1	10/12/2019 09:34	WG1361768
trans-1,3-Dichloropropene	U		0.00167	0.00547	1	10/12/2019 09:34	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00153	0.00547	1	10/12/2019 09:34	WG1361768
2,2-Dichloropropane	U		0.000867	0.00273	1	10/12/2019 09:34	WG1361768
Di-isopropyl ether	U		0.000383	0.00109	1	10/12/2019 09:34	WG1361768
Ethylbenzene	U		0.000580	0.00273	1	10/12/2019 09:34	WG1361768
Hexachloro-1,3-butadiene	U		0.0139	0.0273	1	10/12/2019 09:34	WG1361768
2-Hexanone	U		0.0109	0.0273	1	10/12/2019 09:34	WG1361768
n-Hexane	U	J0	0.00116	0.00547	1	10/12/2019 09:34	WG1361768
Iodomethane	U		0.00662	0.0137	1	10/12/2019 09:34	WG1361768
Isopropylbenzene	U		0.000944	0.00273	1	10/12/2019 09:34	WG1361768
p-Isopropyltoluene	U		0.00255	0.00547	1	10/12/2019 09:34	WG1361768
2-Butanone (MEK)	U		0.0137	0.0273	1	10/12/2019 09:34	WG1361768
Methylene Chloride	U		0.00726	0.0273	1	10/12/2019 09:34	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0109	0.0273	1	10/12/2019 09:34	WG1361768

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000323	0.00109	1	10/12/2019 09:34	WG1361768
Naphthalene	U		0.00341	0.0137	1	10/12/2019 09:34	WG1361768
n-Propylbenzene	U		0.00129	0.00547	1	10/12/2019 09:34	WG1361768
Styrene	U		0.00299	0.0137	1	10/12/2019 09:34	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000547	0.00273	1	10/12/2019 09:34	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000427	0.00273	1	10/12/2019 09:34	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000738	0.00273	1	10/12/2019 09:34	WG1361768
Tetrachloroethene	U		0.000766	0.00273	1	10/12/2019 09:34	WG1361768
Toluene	0.00287	J	0.00137	0.00547	1	10/12/2019 09:34	WG1361768
1,2,3-Trichlorobenzene	U		0.000684	0.00273	1	10/12/2019 09:34	WG1361768
1,2,4-Trichlorobenzene	U		0.00527	0.0137	1	10/12/2019 09:34	WG1361768
1,1,1-Trichloroethane	U		0.000301	0.00273	1	10/12/2019 09:34	WG1361768
1,1,2-Trichloroethane	U		0.000966	0.00273	1	10/12/2019 09:34	WG1361768
Trichloroethene	U		0.000438	0.00109	1	10/12/2019 09:34	WG1361768
Trichlorofluoromethane	U		0.000547	0.00273	1	10/12/2019 09:34	WG1361768
1,2,3-Trichloropropane	U		0.00558	0.0137	1	10/12/2019 09:34	WG1361768
1,2,4-Trimethylbenzene	U		0.00127	0.00547	1	10/12/2019 09:34	WG1361768
1,2,3-Trimethylbenzene	U		0.00126	0.00547	1	10/12/2019 09:34	WG1361768
1,3,5-Trimethylbenzene	U		0.00118	0.00547	1	10/12/2019 09:34	WG1361768
Vinyl acetate	U	J0	0.00385	0.0137	1	10/12/2019 09:34	WG1361768
Vinyl chloride	U		0.000747	0.00273	1	10/12/2019 09:34	WG1361768
Xylenes, Total	U		0.00523	0.00711	1	10/12/2019 09:34	WG1361768
(S) Toluene-d8	*109*			*75.0-131*		*10/12/2019 09:34*	WG1361768
(S) 4-Bromofluorobenzene	*97.9*			*67.0-138*		*10/12/2019 09:34*	WG1361768
(S) 1,2-Dichloroethane-d4	*108*			*70.0-130*		*10/12/2019 09:34*	WG1361768

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	93.0		1	10/10/2019 14:55	WG1360397

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0299		0.0147	0.0269	1	10/12/2019 09:55	WG1361768
Acrylonitrile	U		0.00204	0.0134	1	10/12/2019 09:55	WG1361768
Benzene	U		0.000430	0.00107	1	10/12/2019 09:55	WG1361768
Bromobenzene	U		0.00113	0.0134	1	10/12/2019 09:55	WG1361768
Bromodichloromethane	U		0.000847	0.00269	1	10/12/2019 09:55	WG1361768
Bromochloromethane	U		0.00121	0.00537	1	10/12/2019 09:55	WG1361768
Bromoform	U		0.00643	0.0269	1	10/12/2019 09:55	WG1361768
Bromomethane	U		0.00398	0.0134	1	10/12/2019 09:55	WG1361768
n-Butylbenzene	U		0.00413	0.0134	1	10/12/2019 09:55	WG1361768
sec-Butylbenzene	U		0.00272	0.0134	1	10/12/2019 09:55	WG1361768
tert-Butylbenzene	U		0.00167	0.00537	1	10/12/2019 09:55	WG1361768
Carbon disulfide	U		0.00436	0.0134	1	10/12/2019 09:55	WG1361768
Carbon tetrachloride	U		0.00116	0.00537	1	10/12/2019 09:55	WG1361768
Chlorobenzene	U		0.000616	0.00269	1	10/12/2019 09:55	WG1361768
Chlorodibromomethane	U		0.000484	0.00269	1	10/12/2019 09:55	WG1361768
Chloroethane	U		0.00116	0.00537	1	10/12/2019 09:55	WG1361768
Chloroform	U		0.000446	0.00269	1	10/12/2019 09:55	WG1361768
Chloromethane	U		0.00149	0.0134	1	10/12/2019 09:55	WG1361768
2-Chlorotoluene	U		0.000989	0.00269	1	10/12/2019 09:55	WG1361768
4-Chlorotoluene	U		0.00121	0.00537	1	10/12/2019 09:55	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00548	0.0269	1	10/12/2019 09:55	WG1361768
1,2-Dibromoethane	U		0.000564	0.00269	1	10/12/2019 09:55	WG1361768
Dibromomethane	U		0.00107	0.00537	1	10/12/2019 09:55	WG1361768
1,2-Dichlorobenzene	U		0.00156	0.00537	1	10/12/2019 09:55	WG1361768
1,3-Dichlorobenzene	U		0.00183	0.00537	1	10/12/2019 09:55	WG1361768
1,4-Dichlorobenzene	U		0.00212	0.00537	1	10/12/2019 09:55	WG1361768
Dichlorodifluoromethane	U		0.000879	0.00269	1	10/12/2019 09:55	WG1361768
1,1-Dichloroethane	U		0.000618	0.00269	1	10/12/2019 09:55	WG1361768
1,2-Dichloroethane	U		0.000511	0.00269	1	10/12/2019 09:55	WG1361768
1,1-Dichloroethene	U		0.000537	0.00269	1	10/12/2019 09:55	WG1361768
cis-1,2-Dichloroethene	U		0.000742	0.00269	1	10/12/2019 09:55	WG1361768
trans-1,2-Dichloroethene	U		0.00154	0.00537	1	10/12/2019 09:55	WG1361768
1,2-Dichloropropane	U		0.00136	0.00537	1	10/12/2019 09:55	WG1361768
1,1-Dichloropropene	U		0.000752	0.00269	1	10/12/2019 09:55	WG1361768
1,3-Dichloropropane	U		0.00188	0.00537	1	10/12/2019 09:55	WG1361768
cis-1,3-Dichloropropene	U		0.000729	0.00269	1	10/12/2019 09:55	WG1361768
trans-1,3-Dichloropropene	U		0.00164	0.00537	1	10/12/2019 09:55	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00150	0.00537	1	10/12/2019 09:55	WG1361768
2,2-Dichloropropane	U		0.000852	0.00269	1	10/12/2019 09:55	WG1361768
Di-isopropyl ether	U		0.000376	0.00107	1	10/12/2019 09:55	WG1361768
Ethylbenzene	U		0.000570	0.00269	1	10/12/2019 09:55	WG1361768
Hexachloro-1,3-butadiene	U		0.0136	0.0269	1	10/12/2019 09:55	WG1361768
2-Hexanone	U		0.0107	0.0269	1	10/12/2019 09:55	WG1361768
n-Hexane	U	J0	0.00114	0.00537	1	10/12/2019 09:55	WG1361768
Iodomethane	U		0.00650	0.0134	1	10/12/2019 09:55	WG1361768
Isopropylbenzene	U		0.000928	0.00269	1	10/12/2019 09:55	WG1361768
p-Isopropyltoluene	U		0.00250	0.00537	1	10/12/2019 09:55	WG1361768
2-Butanone (MEK)	U		0.0134	0.0269	1	10/12/2019 09:55	WG1361768
Methylene Chloride	U		0.00714	0.0269	1	10/12/2019 09:55	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0269	1	10/12/2019 09:55	WG1361768

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000317	0.00107	1	10/12/2019 09:55	WG1361768
Naphthalene	U		0.00335	0.0134	1	10/12/2019 09:55	WG1361768
n-Propylbenzene	U		0.00127	0.00537	1	10/12/2019 09:55	WG1361768
Styrene	U		0.00293	0.0134	1	10/12/2019 09:55	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000537	0.00269	1	10/12/2019 09:55	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000419	0.00269	1	10/12/2019 09:55	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000725	0.00269	1	10/12/2019 09:55	WG1361768
Tetrachloroethene	U		0.000752	0.00269	1	10/12/2019 09:55	WG1361768
Toluene	0.00440	J	0.00134	0.00537	1	10/12/2019 09:55	WG1361768
1,2,3-Trichlorobenzene	U		0.000672	0.00269	1	10/12/2019 09:55	WG1361768
1,2,4-Trichlorobenzene	U		0.00518	0.0134	1	10/12/2019 09:55	WG1361768
1,1,1-Trichloroethane	U		0.000296	0.00269	1	10/12/2019 09:55	WG1361768
1,1,2-Trichloroethane	U		0.000949	0.00269	1	10/12/2019 09:55	WG1361768
Trichloroethene	U		0.000430	0.00107	1	10/12/2019 09:55	WG1361768
Trichlorofluoromethane	U		0.000537	0.00269	1	10/12/2019 09:55	WG1361768
1,2,3-Trichloropropane	U		0.00548	0.0134	1	10/12/2019 09:55	WG1361768
1,2,4-Trimethylbenzene	U		0.00125	0.00537	1	10/12/2019 09:55	WG1361768
1,2,3-Trimethylbenzene	U		0.00124	0.00537	1	10/12/2019 09:55	WG1361768
1,3,5-Trimethylbenzene	U		0.00116	0.00537	1	10/12/2019 09:55	WG1361768
Vinyl acetate	U	J0	0.00378	0.0134	1	10/12/2019 09:55	WG1361768
Vinyl chloride	U		0.000734	0.00269	1	10/12/2019 09:55	WG1361768
Xylenes, Total	U		0.00514	0.00699	1	10/12/2019 09:55	WG1361768
(S) Toluene-d8	*109*			*75.0-131*		*10/12/2019 09:55*	WG1361768
(S) 4-Bromofluorobenzene	*101*			*67.0-138*		*10/12/2019 09:55*	WG1361768
(S) 1,2-Dichloroethane-d4	*111*			*70.0-130*		*10/12/2019 09:55*	WG1361768

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	94.0		1	10/10/2019 14:55	WG1360397

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0200	J	0.0146	0.0266	1	10/12/2019 10:15	WG1361768
Acrylonitrile	U		0.00202	0.0133	1	10/12/2019 10:15	WG1361768
Benzene	U		0.000425	0.00106	1	10/12/2019 10:15	WG1361768
Bromobenzene	U		0.00112	0.0133	1	10/12/2019 10:15	WG1361768
Bromodichloromethane	U		0.000838	0.00266	1	10/12/2019 10:15	WG1361768
Bromochloromethane	U		0.00120	0.00532	1	10/12/2019 10:15	WG1361768
Bromoform	U		0.00636	0.0266	1	10/12/2019 10:15	WG1361768
Bromomethane	U		0.00394	0.0133	1	10/12/2019 10:15	WG1361768
n-Butylbenzene	U		0.00408	0.0133	1	10/12/2019 10:15	WG1361768
sec-Butylbenzene	U		0.00269	0.0133	1	10/12/2019 10:15	WG1361768
tert-Butylbenzene	U		0.00165	0.00532	1	10/12/2019 10:15	WG1361768
Carbon disulfide	U		0.00432	0.0133	1	10/12/2019 10:15	WG1361768
Carbon tetrachloride	U		0.00115	0.00532	1	10/12/2019 10:15	WG1361768
Chlorobenzene	U		0.000610	0.00266	1	10/12/2019 10:15	WG1361768
Chlorodibromomethane	U		0.000479	0.00266	1	10/12/2019 10:15	WG1361768
Chloroethane	U		0.00115	0.00532	1	10/12/2019 10:15	WG1361768
Chloroform	U		0.000441	0.00266	1	10/12/2019 10:15	WG1361768
Chloromethane	U		0.00148	0.0133	1	10/12/2019 10:15	WG1361768
2-Chlorotoluene	U		0.000979	0.00266	1	10/12/2019 10:15	WG1361768
4-Chlorotoluene	U		0.00120	0.00532	1	10/12/2019 10:15	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00542	0.0266	1	10/12/2019 10:15	WG1361768
1,2-Dibromoethane	U		0.000558	0.00266	1	10/12/2019 10:15	WG1361768
Dibromomethane	U		0.00106	0.00532	1	10/12/2019 10:15	WG1361768
1,2-Dichlorobenzene	U		0.00154	0.00532	1	10/12/2019 10:15	WG1361768
1,3-Dichlorobenzene	U		0.00181	0.00532	1	10/12/2019 10:15	WG1361768
1,4-Dichlorobenzene	U		0.00210	0.00532	1	10/12/2019 10:15	WG1361768
Dichlorodifluoromethane	U		0.000870	0.00266	1	10/12/2019 10:15	WG1361768
1,1-Dichloroethane	U		0.000612	0.00266	1	10/12/2019 10:15	WG1361768
1,2-Dichloroethane	U		0.000505	0.00266	1	10/12/2019 10:15	WG1361768
1,1-Dichloroethene	U		0.000532	0.00266	1	10/12/2019 10:15	WG1361768
cis-1,2-Dichloroethene	U		0.000734	0.00266	1	10/12/2019 10:15	WG1361768
trans-1,2-Dichloroethene	U		0.00152	0.00532	1	10/12/2019 10:15	WG1361768
1,2-Dichloropropane	U		0.00135	0.00532	1	10/12/2019 10:15	WG1361768
1,1-Dichloropropene	U		0.000745	0.00266	1	10/12/2019 10:15	WG1361768
1,3-Dichloropropane	U		0.00186	0.00532	1	10/12/2019 10:15	WG1361768
cis-1,3-Dichloropropene	U		0.000721	0.00266	1	10/12/2019 10:15	WG1361768
trans-1,3-Dichloropropene	U		0.00163	0.00532	1	10/12/2019 10:15	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00149	0.00532	1	10/12/2019 10:15	WG1361768
2,2-Dichloropropane	U		0.000844	0.00266	1	10/12/2019 10:15	WG1361768
Di-isopropyl ether	U		0.000372	0.00106	1	10/12/2019 10:15	WG1361768
Ethylbenzene	U		0.000564	0.00266	1	10/12/2019 10:15	WG1361768
Hexachloro-1,3-butadiene	U		0.0135	0.0266	1	10/12/2019 10:15	WG1361768
2-Hexanone	U		0.0106	0.0266	1	10/12/2019 10:15	WG1361768
n-Hexane	U	J0	0.00113	0.00532	1	10/12/2019 10:15	WG1361768
Iodomethane	U		0.00644	0.0133	1	10/12/2019 10:15	WG1361768
Isopropylbenzene	U		0.000918	0.00266	1	10/12/2019 10:15	WG1361768
p-Isopropyltoluene	U		0.00248	0.00532	1	10/12/2019 10:15	WG1361768
2-Butanone (MEK)	U		0.0133	0.0266	1	10/12/2019 10:15	WG1361768
Methylene Chloride	U		0.00706	0.0266	1	10/12/2019 10:15	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0106	0.0266	1	10/12/2019 10:15	WG1361768

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000314	0.00106	1	10/12/2019 10:15	WG1361768
Naphthalene	U		0.00332	0.0133	1	10/12/2019 10:15	WG1361768
n-Propylbenzene	U		0.00126	0.00532	1	10/12/2019 10:15	WG1361768
Styrene	U		0.00290	0.0133	1	10/12/2019 10:15	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000532	0.00266	1	10/12/2019 10:15	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000415	0.00266	1	10/12/2019 10:15	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000718	0.00266	1	10/12/2019 10:15	WG1361768
Tetrachloroethene	U		0.000745	0.00266	1	10/12/2019 10:15	WG1361768
Toluene	0.00484	J	0.00133	0.00532	1	10/12/2019 10:15	WG1361768
1,2,3-Trichlorobenzene	U		0.000665	0.00266	1	10/12/2019 10:15	WG1361768
1,2,4-Trichlorobenzene	U		0.00513	0.0133	1	10/12/2019 10:15	WG1361768
1,1,1-Trichloroethane	U		0.000293	0.00266	1	10/12/2019 10:15	WG1361768
1,1,2-Trichloroethane	U		0.000939	0.00266	1	10/12/2019 10:15	WG1361768
Trichloroethene	U		0.000425	0.00106	1	10/12/2019 10:15	WG1361768
Trichlorofluoromethane	U		0.000532	0.00266	1	10/12/2019 10:15	WG1361768
1,2,3-Trichloropropane	U		0.00542	0.0133	1	10/12/2019 10:15	WG1361768
1,2,4-Trimethylbenzene	U		0.00123	0.00532	1	10/12/2019 10:15	WG1361768
1,2,3-Trimethylbenzene	U		0.00122	0.00532	1	10/12/2019 10:15	WG1361768
1,3,5-Trimethylbenzene	U		0.00115	0.00532	1	10/12/2019 10:15	WG1361768
Vinyl acetate	U	J0	0.00374	0.0133	1	10/12/2019 10:15	WG1361768
Vinyl chloride	U		0.000727	0.00266	1	10/12/2019 10:15	WG1361768
Xylenes, Total	U		0.00508	0.00691	1	10/12/2019 10:15	WG1361768
(S) Toluene-d8	*108*			*75.0-131*		*10/12/2019 10:15*	WG1361768
(S) 4-Bromofluorobenzene	*95.4*			*67.0-138*		*10/12/2019 10:15*	WG1361768
(S) 1,2-Dichloroethane-d4	*105*			*70.0-130*		*10/12/2019 10:15*	WG1361768

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	83.9		1	10/10/2019 14:55	WG1360397

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0581		0.0163	0.0298	1	10/12/2019 10:36	WG1361768
Acrylonitrile	U		0.00226	0.0149	1	10/12/2019 10:36	WG1361768
Benzene	U		0.000477	0.00119	1	10/12/2019 10:36	WG1361768
Bromobenzene	U		0.00125	0.0149	1	10/12/2019 10:36	WG1361768
Bromodichloromethane	U		0.000939	0.00298	1	10/12/2019 10:36	WG1361768
Bromochloromethane	U		0.00135	0.00596	1	10/12/2019 10:36	WG1361768
Bromoform	U		0.00712	0.0298	1	10/12/2019 10:36	WG1361768
Bromomethane	U		0.00441	0.0149	1	10/12/2019 10:36	WG1361768
n-Butylbenzene	U		0.00458	0.0149	1	10/12/2019 10:36	WG1361768
sec-Butylbenzene	U		0.00301	0.0149	1	10/12/2019 10:36	WG1361768
tert-Butylbenzene	U		0.00185	0.00596	1	10/12/2019 10:36	WG1361768
Carbon disulfide	U		0.00484	0.0149	1	10/12/2019 10:36	WG1361768
Carbon tetrachloride	U		0.00129	0.00596	1	10/12/2019 10:36	WG1361768
Chlorobenzene	U		0.000683	0.00298	1	10/12/2019 10:36	WG1361768
Chlorodibromomethane	U		0.000536	0.00298	1	10/12/2019 10:36	WG1361768
Chloroethane	U		0.00129	0.00596	1	10/12/2019 10:36	WG1361768
Chloroform	U		0.000494	0.00298	1	10/12/2019 10:36	WG1361768
Chloromethane	U		0.00166	0.0149	1	10/12/2019 10:36	WG1361768
2-Chlorotoluene	U		0.00110	0.00298	1	10/12/2019 10:36	WG1361768
4-Chlorotoluene	U		0.00135	0.00596	1	10/12/2019 10:36	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00608	0.0298	1	10/12/2019 10:36	WG1361768
1,2-Dibromoethane	U		0.000626	0.00298	1	10/12/2019 10:36	WG1361768
Dibromomethane	U		0.00119	0.00596	1	10/12/2019 10:36	WG1361768
1,2-Dichlorobenzene	U		0.00173	0.00596	1	10/12/2019 10:36	WG1361768
1,3-Dichlorobenzene	U		0.00203	0.00596	1	10/12/2019 10:36	WG1361768
1,4-Dichlorobenzene	U		0.00235	0.00596	1	10/12/2019 10:36	WG1361768
Dichlorodifluoromethane	U		0.000975	0.00298	1	10/12/2019 10:36	WG1361768
1,1-Dichloroethane	U		0.000685	0.00298	1	10/12/2019 10:36	WG1361768
1,2-Dichloroethane	U		0.000566	0.00298	1	10/12/2019 10:36	WG1361768
1,1-Dichloroethene	U		0.000596	0.00298	1	10/12/2019 10:36	WG1361768
cis-1,2-Dichloroethene	U		0.000822	0.00298	1	10/12/2019 10:36	WG1361768
trans-1,2-Dichloroethene	U		0.00170	0.00596	1	10/12/2019 10:36	WG1361768
1,2-Dichloropropane	U		0.00151	0.00596	1	10/12/2019 10:36	WG1361768
1,1-Dichloropropene	U		0.000834	0.00298	1	10/12/2019 10:36	WG1361768
1,3-Dichloropropane	U		0.00209	0.00596	1	10/12/2019 10:36	WG1361768
cis-1,3-Dichloropropene	U		0.000808	0.00298	1	10/12/2019 10:36	WG1361768
trans-1,3-Dichloropropene	U		0.00182	0.00596	1	10/12/2019 10:36	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00167	0.00596	1	10/12/2019 10:36	WG1361768
2,2-Dichloropropane	U		0.000945	0.00298	1	10/12/2019 10:36	WG1361768
Di-isopropyl ether	U		0.000417	0.00119	1	10/12/2019 10:36	WG1361768
Ethylbenzene	U		0.000631	0.00298	1	10/12/2019 10:36	WG1361768
Hexachloro-1,3-butadiene	U		0.0151	0.0298	1	10/12/2019 10:36	WG1361768
2-Hexanone	U		0.0119	0.0298	1	10/12/2019 10:36	WG1361768
n-Hexane	U	J0	0.00126	0.00596	1	10/12/2019 10:36	WG1361768
Iodomethane	U		0.00721	0.0149	1	10/12/2019 10:36	WG1361768
Isopropylbenzene	U		0.00103	0.00298	1	10/12/2019 10:36	WG1361768
p-Isopropyltoluene	U		0.00278	0.00596	1	10/12/2019 10:36	WG1361768
2-Butanone (MEK)	U		0.0149	0.0298	1	10/12/2019 10:36	WG1361768
Methylene Chloride	U		0.00791	0.0298	1	10/12/2019 10:36	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0119	0.0298	1	10/12/2019 10:36	WG1361768

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000351	0.00119	1	10/12/2019 10:36	WG1361768
Naphthalene	U		0.00372	0.0149	1	10/12/2019 10:36	WG1361768
n-Propylbenzene	U		0.00141	0.00596	1	10/12/2019 10:36	WG1361768
Styrene	U		0.00325	0.0149	1	10/12/2019 10:36	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000596	0.00298	1	10/12/2019 10:36	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000465	0.00298	1	10/12/2019 10:36	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000804	0.00298	1	10/12/2019 10:36	WG1361768
Tetrachloroethene	U		0.000834	0.00298	1	10/12/2019 10:36	WG1361768
Toluene	0.0222		0.00149	0.00596	1	10/12/2019 10:36	WG1361768
1,2,3-Trichlorobenzene	U		0.000745	0.00298	1	10/12/2019 10:36	WG1361768
1,2,4-Trichlorobenzene	U		0.00574	0.0149	1	10/12/2019 10:36	WG1361768
1,1,1-Trichloroethane	U		0.000328	0.00298	1	10/12/2019 10:36	WG1361768
1,1,2-Trichloroethane	U		0.00105	0.00298	1	10/12/2019 10:36	WG1361768
Trichloroethene	U		0.000477	0.00119	1	10/12/2019 10:36	WG1361768
Trichlorofluoromethane	U		0.000596	0.00298	1	10/12/2019 10:36	WG1361768
1,2,3-Trichloropropane	U		0.00608	0.0149	1	10/12/2019 10:36	WG1361768
1,2,4-Trimethylbenzene	U		0.00138	0.00596	1	10/12/2019 10:36	WG1361768
1,2,3-Trimethylbenzene	U		0.00137	0.00596	1	10/12/2019 10:36	WG1361768
1,3,5-Trimethylbenzene	U		0.00129	0.00596	1	10/12/2019 10:36	WG1361768
Vinyl acetate	U	J0	0.00419	0.0149	1	10/12/2019 10:36	WG1361768
Vinyl chloride	U		0.000814	0.00298	1	10/12/2019 10:36	WG1361768
Xylenes, Total	U		0.00570	0.00774	1	10/12/2019 10:36	WG1361768
(S) Toluene-d8	*111*			*75.0-131*		*10/12/2019 10:36*	WG1361768
(S) 4-Bromofluorobenzene	*102*			*67.0-138*		*10/12/2019 10:36*	WG1361768
(S) 1,2-Dichloroethane-d4	*114*			*70.0-130*		*10/12/2019 10:36*	WG1361768

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	83.7		1	10/10/2019 14:55	WG1360397

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0540		0.0164	0.0299	1	10/12/2019 11:01	WG1361768
Acrylonitrile	U		0.00227	0.0149	1	10/12/2019 11:01	WG1361768
Benzene	U		0.000478	0.00119	1	10/12/2019 11:01	WG1361768
Bromobenzene	U		0.00125	0.0149	1	10/12/2019 11:01	WG1361768
Bromodichloromethane	U		0.000941	0.00299	1	10/12/2019 11:01	WG1361768
Bromochloromethane	U		0.00135	0.00597	1	10/12/2019 11:01	WG1361768
Bromoform	U		0.00714	0.0299	1	10/12/2019 11:01	WG1361768
Bromomethane	U		0.00442	0.0149	1	10/12/2019 11:01	WG1361768
n-Butylbenzene	U		0.00459	0.0149	1	10/12/2019 11:01	WG1361768
sec-Butylbenzene	U		0.00302	0.0149	1	10/12/2019 11:01	WG1361768
tert-Butylbenzene	U		0.00185	0.00597	1	10/12/2019 11:01	WG1361768
Carbon disulfide	U		0.00485	0.0149	1	10/12/2019 11:01	WG1361768
Carbon tetrachloride	U		0.00129	0.00597	1	10/12/2019 11:01	WG1361768
Chlorobenzene	U		0.000684	0.00299	1	10/12/2019 11:01	WG1361768
Chlorodibromomethane	U		0.000537	0.00299	1	10/12/2019 11:01	WG1361768
Chloroethane	U		0.00129	0.00597	1	10/12/2019 11:01	WG1361768
Chloroform	U		0.000496	0.00299	1	10/12/2019 11:01	WG1361768
Chloromethane	U		0.00166	0.0149	1	10/12/2019 11:01	WG1361768
2-Chlorotoluene	U		0.00110	0.00299	1	10/12/2019 11:01	WG1361768
4-Chlorotoluene	U		0.00135	0.00597	1	10/12/2019 11:01	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00609	0.0299	1	10/12/2019 11:01	WG1361768
1,2-Dibromoethane	U		0.000627	0.00299	1	10/12/2019 11:01	WG1361768
Dibromomethane	U		0.00119	0.00597	1	10/12/2019 11:01	WG1361768
1,2-Dichlorobenzene	U		0.00173	0.00597	1	10/12/2019 11:01	WG1361768
1,3-Dichlorobenzene	U		0.00203	0.00597	1	10/12/2019 11:01	WG1361768
1,4-Dichlorobenzene	U		0.00235	0.00597	1	10/12/2019 11:01	WG1361768
Dichlorodifluoromethane	U		0.000977	0.00299	1	10/12/2019 11:01	WG1361768
1,1-Dichloroethane	U		0.000687	0.00299	1	10/12/2019 11:01	WG1361768
1,2-Dichloroethane	U		0.000567	0.00299	1	10/12/2019 11:01	WG1361768
1,1-Dichloroethene	U		0.000597	0.00299	1	10/12/2019 11:01	WG1361768
cis-1,2-Dichloroethene	U		0.000824	0.00299	1	10/12/2019 11:01	WG1361768
trans-1,2-Dichloroethene	U		0.00171	0.00597	1	10/12/2019 11:01	WG1361768
1,2-Dichloropropane	U		0.00152	0.00597	1	10/12/2019 11:01	WG1361768
1,1-Dichloropropene	U		0.000836	0.00299	1	10/12/2019 11:01	WG1361768
1,3-Dichloropropane	U		0.00209	0.00597	1	10/12/2019 11:01	WG1361768
cis-1,3-Dichloropropene	U		0.000810	0.00299	1	10/12/2019 11:01	WG1361768
trans-1,3-Dichloropropene	U		0.00183	0.00597	1	10/12/2019 11:01	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00167	0.00597	1	10/12/2019 11:01	WG1361768
2,2-Dichloropropane	U		0.000947	0.00299	1	10/12/2019 11:01	WG1361768
Di-isopropyl ether	U		0.000418	0.00119	1	10/12/2019 11:01	WG1361768
Ethylbenzene	U		0.000633	0.00299	1	10/12/2019 11:01	WG1361768
Hexachloro-1,3-butadiene	U		0.0152	0.0299	1	10/12/2019 11:01	WG1361768
2-Hexanone	U		0.0119	0.0299	1	10/12/2019 11:01	WG1361768
n-Hexane	0.0105	J0	0.00127	0.00597	1	10/12/2019 11:01	WG1361768
Iodomethane	U		0.00722	0.0149	1	10/12/2019 11:01	WG1361768
Isopropylbenzene	U		0.00103	0.00299	1	10/12/2019 11:01	WG1361768
p-Isopropyltoluene	U		0.00278	0.00597	1	10/12/2019 11:01	WG1361768
2-Butanone (MEK)	U		0.0149	0.0299	1	10/12/2019 11:01	WG1361768
Methylene Chloride	U		0.00793	0.0299	1	10/12/2019 11:01	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0119	0.0299	1	10/12/2019 11:01	WG1361768

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000352	0.00119	1	10/12/2019 11:01	WG1361768
Naphthalene	U		0.00373	0.0149	1	10/12/2019 11:01	WG1361768
n-Propylbenzene	U		0.00141	0.00597	1	10/12/2019 11:01	WG1361768
Styrene	U		0.00326	0.0149	1	10/12/2019 11:01	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000597	0.00299	1	10/12/2019 11:01	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000466	0.00299	1	10/12/2019 11:01	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000806	0.00299	1	10/12/2019 11:01	WG1361768
Tetrachloroethene	U		0.000836	0.00299	1	10/12/2019 11:01	WG1361768
Toluene	0.0158		0.00149	0.00597	1	10/12/2019 11:01	WG1361768
1,2,3-Trichlorobenzene	U		0.000746	0.00299	1	10/12/2019 11:01	WG1361768
1,2,4-Trichlorobenzene	U		0.00576	0.0149	1	10/12/2019 11:01	WG1361768
1,1,1-Trichloroethane	U		0.000328	0.00299	1	10/12/2019 11:01	WG1361768
1,1,2-Trichloroethane	U		0.00105	0.00299	1	10/12/2019 11:01	WG1361768
Trichloroethene	U		0.000478	0.00119	1	10/12/2019 11:01	WG1361768
Trichlorofluoromethane	U		0.000597	0.00299	1	10/12/2019 11:01	WG1361768
1,2,3-Trichloropropane	U		0.00609	0.0149	1	10/12/2019 11:01	WG1361768
1,2,4-Trimethylbenzene	U		0.00139	0.00597	1	10/12/2019 11:01	WG1361768
1,2,3-Trimethylbenzene	U		0.00137	0.00597	1	10/12/2019 11:01	WG1361768
1,3,5-Trimethylbenzene	U		0.00129	0.00597	1	10/12/2019 11:01	WG1361768
Vinyl acetate	U	J0	0.00420	0.0149	1	10/12/2019 11:01	WG1361768
Vinyl chloride	U		0.000816	0.00299	1	10/12/2019 11:01	WG1361768
Xylenes, Total	U		0.00571	0.00776	1	10/12/2019 11:01	WG1361768
(S) Toluene-d8	*109*			*75.0-131*		*10/12/2019 11:01*	WG1361768
(S) 4-Bromofluorobenzene	*98.6*			*67.0-138*		*10/12/2019 11:01*	WG1361768
(S) 1,2-Dichloroethane-d4	*114*			*70.0-130*		*10/12/2019 11:01*	WG1361768

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	88.0		1	10/10/2019 14:41	WG1360399

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0182	J	0.0156	0.0284	1	10/12/2019 11:21	WG1361768
Acrylonitrile	U		0.00216	0.0142	1	10/12/2019 11:21	WG1361768
Benzene	U		0.000455	0.00114	1	10/12/2019 11:21	WG1361768
Bromobenzene	U		0.00119	0.0142	1	10/12/2019 11:21	WG1361768
Bromodichloromethane	U		0.000895	0.00284	1	10/12/2019 11:21	WG1361768
Bromochloromethane	U		0.00128	0.00568	1	10/12/2019 11:21	WG1361768
Bromoform	U		0.00680	0.0284	1	10/12/2019 11:21	WG1361768
Bromomethane	U		0.00420	0.0142	1	10/12/2019 11:21	WG1361768
n-Butylbenzene	U		0.00436	0.0142	1	10/12/2019 11:21	WG1361768
sec-Butylbenzene	U		0.00287	0.0142	1	10/12/2019 11:21	WG1361768
tert-Butylbenzene	U		0.00176	0.00568	1	10/12/2019 11:21	WG1361768
Carbon disulfide	0.00497	J	0.00461	0.0142	1	10/12/2019 11:21	WG1361768
Carbon tetrachloride	U		0.00123	0.00568	1	10/12/2019 11:21	WG1361768
Chlorobenzene	U		0.000651	0.00284	1	10/12/2019 11:21	WG1361768
Chlorodibromomethane	U		0.000511	0.00284	1	10/12/2019 11:21	WG1361768
Chloroethane	U		0.00123	0.00568	1	10/12/2019 11:21	WG1361768
Chloroform	U		0.000472	0.00284	1	10/12/2019 11:21	WG1361768
Chloromethane	U		0.00158	0.0142	1	10/12/2019 11:21	WG1361768
2-Chlorotoluene	U		0.00105	0.00284	1	10/12/2019 11:21	WG1361768
4-Chlorotoluene	U		0.00128	0.00568	1	10/12/2019 11:21	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00580	0.0284	1	10/12/2019 11:21	WG1361768
1,2-Dibromoethane	U		0.000597	0.00284	1	10/12/2019 11:21	WG1361768
Dibromomethane	U		0.00114	0.00568	1	10/12/2019 11:21	WG1361768
1,2-Dichlorobenzene	U		0.00165	0.00568	1	10/12/2019 11:21	WG1361768
1,3-Dichlorobenzene	U		0.00193	0.00568	1	10/12/2019 11:21	WG1361768
1,4-Dichlorobenzene	U		0.00224	0.00568	1	10/12/2019 11:21	WG1361768
Dichlorodifluoromethane	U		0.000930	0.00284	1	10/12/2019 11:21	WG1361768
1,1-Dichloroethane	U		0.000653	0.00284	1	10/12/2019 11:21	WG1361768
1,2-Dichloroethane	U		0.000540	0.00284	1	10/12/2019 11:21	WG1361768
1,1-Dichloroethene	U		0.000568	0.00284	1	10/12/2019 11:21	WG1361768
cis-1,2-Dichloroethene	U		0.000784	0.00284	1	10/12/2019 11:21	WG1361768
trans-1,2-Dichloroethene	U		0.00162	0.00568	1	10/12/2019 11:21	WG1361768
1,2-Dichloropropane	U		0.00144	0.00568	1	10/12/2019 11:21	WG1361768
1,1-Dichloropropene	U		0.000795	0.00284	1	10/12/2019 11:21	WG1361768
1,3-Dichloropropane	U		0.00199	0.00568	1	10/12/2019 11:21	WG1361768
cis-1,3-Dichloropropene	U		0.000770	0.00284	1	10/12/2019 11:21	WG1361768
trans-1,3-Dichloropropene	U		0.00174	0.00568	1	10/12/2019 11:21	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00159	0.00568	1	10/12/2019 11:21	WG1361768
2,2-Dichloropropane	U		0.000901	0.00284	1	10/12/2019 11:21	WG1361768
Di-isopropyl ether	U		0.000398	0.00114	1	10/12/2019 11:21	WG1361768
Ethylbenzene	U		0.000602	0.00284	1	10/12/2019 11:21	WG1361768
Hexachloro-1,3-butadiene	U		0.0144	0.0284	1	10/12/2019 11:21	WG1361768
2-Hexanone	U		0.0114	0.0284	1	10/12/2019 11:21	WG1361768
n-Hexane	U	J0	0.00120	0.00568	1	10/12/2019 11:21	WG1361768
Iodomethane	U		0.00687	0.0142	1	10/12/2019 11:21	WG1361768
Isopropylbenzene	U		0.000981	0.00284	1	10/12/2019 11:21	WG1361768
p-Isopropyltoluene	U		0.00265	0.00568	1	10/12/2019 11:21	WG1361768
2-Butanone (MEK)	U		0.0142	0.0284	1	10/12/2019 11:21	WG1361768
Methylene Chloride	U		0.00755	0.0284	1	10/12/2019 11:21	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0114	0.0284	1	10/12/2019 11:21	WG1361768

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000335	0.00114	1	10/12/2019 11:21	WG1361768
Naphthalene	U		0.00355	0.0142	1	10/12/2019 11:21	WG1361768
n-Propylbenzene	U		0.00134	0.00568	1	10/12/2019 11:21	WG1361768
Styrene	U		0.00310	0.0142	1	10/12/2019 11:21	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000568	0.00284	1	10/12/2019 11:21	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000443	0.00284	1	10/12/2019 11:21	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000767	0.00284	1	10/12/2019 11:21	WG1361768
Tetrachloroethene	U		0.000795	0.00284	1	10/12/2019 11:21	WG1361768
Toluene	0.00449	J	0.00142	0.00568	1	10/12/2019 11:21	WG1361768
1,2,3-Trichlorobenzene	U		0.000710	0.00284	1	10/12/2019 11:21	WG1361768
1,2,4-Trichlorobenzene	U		0.00548	0.0142	1	10/12/2019 11:21	WG1361768
1,1,1-Trichloroethane	U		0.000312	0.00284	1	10/12/2019 11:21	WG1361768
1,1,2-Trichloroethane	U		0.00100	0.00284	1	10/12/2019 11:21	WG1361768
Trichloroethene	U		0.000455	0.00114	1	10/12/2019 11:21	WG1361768
Trichlorofluoromethane	U		0.000568	0.00284	1	10/12/2019 11:21	WG1361768
1,2,3-Trichloropropane	U		0.00580	0.0142	1	10/12/2019 11:21	WG1361768
1,2,4-Trimethylbenzene	U		0.00132	0.00568	1	10/12/2019 11:21	WG1361768
1,2,3-Trimethylbenzene	U		0.00131	0.00568	1	10/12/2019 11:21	WG1361768
1,3,5-Trimethylbenzene	U		0.00123	0.00568	1	10/12/2019 11:21	WG1361768
Vinyl acetate	U	J0	0.00400	0.0142	1	10/12/2019 11:21	WG1361768
Vinyl chloride	U		0.000776	0.00284	1	10/12/2019 11:21	WG1361768
Xylenes, Total	U		0.00543	0.00739	1	10/12/2019 11:21	WG1361768
(S) Toluene-d8	*110*			*75.0-131*		*10/12/2019 11:21*	WG1361768
(S) 4-Bromofluorobenzene	*95.7*			*67.0-138*		*10/12/2019 11:21*	WG1361768
(S) 1,2-Dichloroethane-d4	*99.6*			*70.0-130*		*10/12/2019 11:21*	WG1361768

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	84.4		1	10/10/2019 14:41	WG1360399

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0342	J	0.0194	0.0355	1.2	10/12/2019 11:42	WG1361768
Acrylonitrile	U		0.00270	0.0178	1.2	10/12/2019 11:42	WG1361768
Benzene	U		0.000569	0.00142	1.2	10/12/2019 11:42	WG1361768
Bromobenzene	U		0.00149	0.0178	1.2	10/12/2019 11:42	WG1361768
Bromodichloromethane	U		0.00112	0.00355	1.2	10/12/2019 11:42	WG1361768
Bromochloromethane	U		0.00161	0.00711	1.2	10/12/2019 11:42	WG1361768
Bromoform	U		0.00850	0.0355	1.2	10/12/2019 11:42	WG1361768
Bromomethane	U		0.00526	0.0178	1.2	10/12/2019 11:42	WG1361768
n-Butylbenzene	U		0.00546	0.0178	1.2	10/12/2019 11:42	WG1361768
sec-Butylbenzene	U		0.00360	0.0178	1.2	10/12/2019 11:42	WG1361768
tert-Butylbenzene	U		0.00220	0.00711	1.2	10/12/2019 11:42	WG1361768
Carbon disulfide	0.00643	J	0.00577	0.0178	1.2	10/12/2019 11:42	WG1361768
Carbon tetrachloride	U		0.00154	0.00711	1.2	10/12/2019 11:42	WG1361768
Chlorobenzene	U		0.000815	0.00355	1.2	10/12/2019 11:42	WG1361768
Chlorodibromomethane	U		0.000640	0.00355	1.2	10/12/2019 11:42	WG1361768
Chloroethane	U		0.00154	0.00711	1.2	10/12/2019 11:42	WG1361768
Chloroform	U		0.000590	0.00355	1.2	10/12/2019 11:42	WG1361768
Chloromethane	U		0.00198	0.0178	1.2	10/12/2019 11:42	WG1361768
2-Chlorotoluene	U		0.00130	0.00355	1.2	10/12/2019 11:42	WG1361768
4-Chlorotoluene	U		0.00161	0.00711	1.2	10/12/2019 11:42	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00725	0.0355	1.2	10/12/2019 11:42	WG1361768
1,2-Dibromoethane	U		0.000746	0.00355	1.2	10/12/2019 11:42	WG1361768
Dibromomethane	U		0.00142	0.00711	1.2	10/12/2019 11:42	WG1361768
1,2-Dichlorobenzene	U		0.00206	0.00711	1.2	10/12/2019 11:42	WG1361768
1,3-Dichlorobenzene	U		0.00242	0.00711	1.2	10/12/2019 11:42	WG1361768
1,4-Dichlorobenzene	U		0.00280	0.00711	1.2	10/12/2019 11:42	WG1361768
Dichlorodifluoromethane	U		0.00116	0.00355	1.2	10/12/2019 11:42	WG1361768
1,1-Dichloroethane	U		0.000817	0.00355	1.2	10/12/2019 11:42	WG1361768
1,2-Dichloroethane	U		0.000675	0.00355	1.2	10/12/2019 11:42	WG1361768
1,1-Dichloroethene	U		0.000711	0.00355	1.2	10/12/2019 11:42	WG1361768
cis-1,2-Dichloroethene	U		0.000981	0.00355	1.2	10/12/2019 11:42	WG1361768
trans-1,2-Dichloroethene	U		0.00204	0.00711	1.2	10/12/2019 11:42	WG1361768
1,2-Dichloropropane	U		0.00180	0.00711	1.2	10/12/2019 11:42	WG1361768
1,1-Dichloropropene	U		0.000995	0.00355	1.2	10/12/2019 11:42	WG1361768
1,3-Dichloropropane	U		0.00249	0.00711	1.2	10/12/2019 11:42	WG1361768
cis-1,3-Dichloropropene	U		0.000964	0.00355	1.2	10/12/2019 11:42	WG1361768
trans-1,3-Dichloropropene	U		0.00218	0.00711	1.2	10/12/2019 11:42	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00199	0.00711	1.2	10/12/2019 11:42	WG1361768
2,2-Dichloropropane	U		0.00113	0.00355	1.2	10/12/2019 11:42	WG1361768
Di-isopropyl ether	U		0.000497	0.00142	1.2	10/12/2019 11:42	WG1361768
Ethylbenzene	0.00117	J	0.000753	0.00355	1.2	10/12/2019 11:42	WG1361768
Hexachloro-1,3-butadiene	U		0.0180	0.0355	1.2	10/12/2019 11:42	WG1361768
2-Hexanone	U		0.0142	0.0355	1.2	10/12/2019 11:42	WG1361768
n-Hexane	U	J0	0.00150	0.00711	1.2	10/12/2019 11:42	WG1361768
Iodomethane	U		0.00860	0.0178	1.2	10/12/2019 11:42	WG1361768
Isopropylbenzene	U		0.00123	0.00355	1.2	10/12/2019 11:42	WG1361768
p-Isopropyltoluene	U		0.00332	0.00711	1.2	10/12/2019 11:42	WG1361768
2-Butanone (MEK)	U		0.0178	0.0355	1.2	10/12/2019 11:42	WG1361768
Methylene Chloride	U		0.00944	0.0355	1.2	10/12/2019 11:42	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0142	0.0355	1.2	10/12/2019 11:42	WG1361768

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000419	0.00142	1.2	10/12/2019 11:42	WG1361768
Naphthalene	U		0.00443	0.0178	1.2	10/12/2019 11:42	WG1361768
n-Propylbenzene	U		0.00168	0.00711	1.2	10/12/2019 11:42	WG1361768
Styrene	U		0.00389	0.0178	1.2	10/12/2019 11:42	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000711	0.00355	1.2	10/12/2019 11:42	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000554	0.00355	1.2	10/12/2019 11:42	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000959	0.00355	1.2	10/12/2019 11:42	WG1361768
Tetrachloroethene	U		0.000995	0.00355	1.2	10/12/2019 11:42	WG1361768
Toluene	0.0216		0.00178	0.00711	1.2	10/12/2019 11:42	WG1361768
1,2,3-Trichlorobenzene	U		0.000888	0.00355	1.2	10/12/2019 11:42	WG1361768
1,2,4-Trichlorobenzene	U		0.00685	0.0178	1.2	10/12/2019 11:42	WG1361768
1,1,1-Trichloroethane	U		0.000391	0.00355	1.2	10/12/2019 11:42	WG1361768
1,1,2-Trichloroethane	U		0.00126	0.00355	1.2	10/12/2019 11:42	WG1361768
Trichloroethene	U		0.000569	0.00142	1.2	10/12/2019 11:42	WG1361768
Trichlorofluoromethane	U		0.000711	0.00355	1.2	10/12/2019 11:42	WG1361768
1,2,3-Trichloropropane	U		0.00725	0.0178	1.2	10/12/2019 11:42	WG1361768
1,2,4-Trimethylbenzene	0.00188	J	0.00165	0.00711	1.2	10/12/2019 11:42	WG1361768
1,2,3-Trimethylbenzene	U		0.00163	0.00711	1.2	10/12/2019 11:42	WG1361768
1,3,5-Trimethylbenzene	0.00156	J	0.00154	0.00711	1.2	10/12/2019 11:42	WG1361768
Vinyl acetate	U	J0	0.00500	0.0178	1.2	10/12/2019 11:42	WG1361768
Vinyl chloride	U		0.000971	0.00355	1.2	10/12/2019 11:42	WG1361768
Xylenes, Total	U		0.00680	0.00924	1.2	10/12/2019 11:42	WG1361768
(S) Toluene-d8	*112*			*75.0-131*		*10/12/2019 11:42*	WG1361768
(S) 4-Bromofluorobenzene	*97.2*			*67.0-138*		*10/12/2019 11:42*	WG1361768
(S) 1,2-Dichloroethane-d4	*105*			*70.0-130*		*10/12/2019 11:42*	WG1361768

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	85.4		1	10/10/2019 14:41	WG1360399

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0529		0.0160	0.0293	1	10/12/2019 12:02	WG1361768
Acrylonitrile	U		0.00223	0.0146	1	10/12/2019 12:02	WG1361768
Benzene	U		0.000468	0.00117	1	10/12/2019 12:02	WG1361768
Bromobenzene	U		0.00123	0.0146	1	10/12/2019 12:02	WG1361768
Bromodichloromethane	U		0.000923	0.00293	1	10/12/2019 12:02	WG1361768
Bromochloromethane	U		0.00132	0.00586	1	10/12/2019 12:02	WG1361768
Bromoform	U		0.00700	0.0293	1	10/12/2019 12:02	WG1361768
Bromomethane	U		0.00433	0.0146	1	10/12/2019 12:02	WG1361768
n-Butylbenzene	U		0.00450	0.0146	1	10/12/2019 12:02	WG1361768
sec-Butylbenzene	U		0.00296	0.0146	1	10/12/2019 12:02	WG1361768
tert-Butylbenzene	U		0.00182	0.00586	1	10/12/2019 12:02	WG1361768
Carbon disulfide	U		0.00475	0.0146	1	10/12/2019 12:02	WG1361768
Carbon tetrachloride	U		0.00126	0.00586	1	10/12/2019 12:02	WG1361768
Chlorobenzene	U		0.000671	0.00293	1	10/12/2019 12:02	WG1361768
Chlorodibromomethane	U		0.000527	0.00293	1	10/12/2019 12:02	WG1361768
Chloroethane	U		0.00126	0.00586	1	10/12/2019 12:02	WG1361768
Chloroform	U		0.000486	0.00293	1	10/12/2019 12:02	WG1361768
Chloromethane	U		0.00163	0.0146	1	10/12/2019 12:02	WG1361768
2-Chlorotoluene	U		0.00108	0.00293	1	10/12/2019 12:02	WG1361768
4-Chlorotoluene	U		0.00132	0.00586	1	10/12/2019 12:02	WG1361768
1,2-Dibromo-3-Chloropropane	U		0.00597	0.0293	1	10/12/2019 12:02	WG1361768
1,2-Dibromoethane	U		0.000615	0.00293	1	10/12/2019 12:02	WG1361768
Dibromomethane	U		0.00117	0.00586	1	10/12/2019 12:02	WG1361768
1,2-Dichlorobenzene	U		0.00170	0.00586	1	10/12/2019 12:02	WG1361768
1,3-Dichlorobenzene	U		0.00199	0.00586	1	10/12/2019 12:02	WG1361768
1,4-Dichlorobenzene	U		0.00231	0.00586	1	10/12/2019 12:02	WG1361768
Dichlorodifluoromethane	U		0.000958	0.00293	1	10/12/2019 12:02	WG1361768
1,1-Dichloroethane	U		0.000673	0.00293	1	10/12/2019 12:02	WG1361768
1,2-Dichloroethane	U		0.000556	0.00293	1	10/12/2019 12:02	WG1361768
1,1-Dichloroethene	U		0.000586	0.00293	1	10/12/2019 12:02	WG1361768
cis-1,2-Dichloroethene	U		0.000808	0.00293	1	10/12/2019 12:02	WG1361768
trans-1,2-Dichloroethene	U		0.00167	0.00586	1	10/12/2019 12:02	WG1361768
1,2-Dichloropropane	U		0.00149	0.00586	1	10/12/2019 12:02	WG1361768
1,1-Dichloropropene	U		0.000820	0.00293	1	10/12/2019 12:02	WG1361768
1,3-Dichloropropane	U		0.00205	0.00586	1	10/12/2019 12:02	WG1361768
cis-1,3-Dichloropropene	U		0.000794	0.00293	1	10/12/2019 12:02	WG1361768
trans-1,3-Dichloropropene	U		0.00179	0.00586	1	10/12/2019 12:02	WG1361768
trans-1,4-Dichloro-2-butene	U		0.00164	0.00586	1	10/12/2019 12:02	WG1361768
2,2-Dichloropropane	U		0.000929	0.00293	1	10/12/2019 12:02	WG1361768
Di-isopropyl ether	U		0.000410	0.00117	1	10/12/2019 12:02	WG1361768
Ethylbenzene	U		0.000621	0.00293	1	10/12/2019 12:02	WG1361768
Hexachloro-1,3-butadiene	U		0.0149	0.0293	1	10/12/2019 12:02	WG1361768
2-Hexanone	U		0.0117	0.0293	1	10/12/2019 12:02	WG1361768
n-Hexane	U	J0	0.00124	0.00586	1	10/12/2019 12:02	WG1361768
Iodomethane	U		0.00709	0.0146	1	10/12/2019 12:02	WG1361768
Isopropylbenzene	U		0.00101	0.00293	1	10/12/2019 12:02	WG1361768
p-Isopropyltoluene	U		0.00273	0.00586	1	10/12/2019 12:02	WG1361768
2-Butanone (MEK)	U		0.0146	0.0293	1	10/12/2019 12:02	WG1361768
Methylene Chloride	U		0.00778	0.0293	1	10/12/2019 12:02	WG1361768
4-Methyl-2-pentanone (MIBK)	U		0.0117	0.0293	1	10/12/2019 12:02	WG1361768

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000345	0.00117	1	10/12/2019 12:02	WG1361768
Naphthalene	U		0.00365	0.0146	1	10/12/2019 12:02	WG1361768
n-Propylbenzene	U		0.00138	0.00586	1	10/12/2019 12:02	WG1361768
Styrene	U		0.00320	0.0146	1	10/12/2019 12:02	WG1361768
1,1,1,2-Tetrachloroethane	U		0.000586	0.00293	1	10/12/2019 12:02	WG1361768
1,1,2,2-Tetrachloroethane	U		0.000457	0.00293	1	10/12/2019 12:02	WG1361768
1,1,2-Trichlorotrifluoroethane	U		0.000791	0.00293	1	10/12/2019 12:02	WG1361768
Tetrachloroethene	U		0.000820	0.00293	1	10/12/2019 12:02	WG1361768
Toluene	0.00508	J	0.00146	0.00586	1	10/12/2019 12:02	WG1361768
1,2,3-Trichlorobenzene	U		0.000732	0.00293	1	10/12/2019 12:02	WG1361768
1,2,4-Trichlorobenzene	U		0.00564	0.0146	1	10/12/2019 12:02	WG1361768
1,1,1-Trichloroethane	U		0.000322	0.00293	1	10/12/2019 12:02	WG1361768
1,1,2-Trichloroethane	U		0.00103	0.00293	1	10/12/2019 12:02	WG1361768
Trichloroethene	U		0.000468	0.00117	1	10/12/2019 12:02	WG1361768
Trichlorofluoromethane	U		0.000586	0.00293	1	10/12/2019 12:02	WG1361768
1,2,3-Trichloropropane	U		0.00597	0.0146	1	10/12/2019 12:02	WG1361768
1,2,4-Trimethylbenzene	U		0.00136	0.00586	1	10/12/2019 12:02	WG1361768
1,2,3-Trimethylbenzene	U		0.00135	0.00586	1	10/12/2019 12:02	WG1361768
1,3,5-Trimethylbenzene	U		0.00126	0.00586	1	10/12/2019 12:02	WG1361768
Vinyl acetate	U	J0	0.00412	0.0146	1	10/12/2019 12:02	WG1361768
Vinyl chloride	U		0.000800	0.00293	1	10/12/2019 12:02	WG1361768
Xylenes, Total	U		0.00560	0.00761	1	10/12/2019 12:02	WG1361768
(S) Toluene-d8	*107*			*75.0-131*		*10/12/2019 12:02*	WG1361768
(S) 4-Bromofluorobenzene	*99.7*			*67.0-138*		*10/12/2019 12:02*	WG1361768
(S) 1,2-Dichloroethane-d4	*115*			*70.0-130*		*10/12/2019 12:02*	WG1361768

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	82.5		1	10/10/2019 14:41	WG1360399

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0515		0.0166	0.0303	1	10/12/2019 17:48	WG1361775
Acrylonitrile	U		0.00230	0.0152	1	10/12/2019 17:48	WG1361775
Benzene	U		0.000485	0.00121	1	10/12/2019 17:48	WG1361775
Bromobenzene	U		0.00127	0.0152	1	10/12/2019 17:48	WG1361775
Bromodichloromethane	U		0.000955	0.00303	1	10/12/2019 17:48	WG1361775
Bromochloromethane	U		0.00137	0.00606	1	10/12/2019 17:48	WG1361775
Bromoform	U		0.00725	0.0303	1	10/12/2019 17:48	WG1361775
Bromomethane	U		0.00449	0.0152	1	10/12/2019 17:48	WG1361775
n-Butylbenzene	U		0.00466	0.0152	1	10/12/2019 17:48	WG1361775
sec-Butylbenzene	U		0.00307	0.0152	1	10/12/2019 17:48	WG1361775
tert-Butylbenzene	U		0.00188	0.00606	1	10/12/2019 17:48	WG1361775
Carbon disulfide	U		0.00492	0.0152	1	10/12/2019 17:48	WG1361775
Carbon tetrachloride	U		0.00131	0.00606	1	10/12/2019 17:48	WG1361775
Chlorobenzene	U		0.000695	0.00303	1	10/12/2019 17:48	WG1361775
Chlorodibromomethane	U		0.000546	0.00303	1	10/12/2019 17:48	WG1361775
Chloroethane	U		0.00131	0.00606	1	10/12/2019 17:48	WG1361775
Chloroform	U		0.000503	0.00303	1	10/12/2019 17:48	WG1361775
Chloromethane	U		0.00169	0.0152	1	10/12/2019 17:48	WG1361775
2-Chlorotoluene	U		0.00112	0.00303	1	10/12/2019 17:48	WG1361775
4-Chlorotoluene	U		0.00137	0.00606	1	10/12/2019 17:48	WG1361775
1,2-Dibromo-3-Chloropropane	U		0.00618	0.0303	1	10/12/2019 17:48	WG1361775
1,2-Dibromoethane	U		0.000636	0.00303	1	10/12/2019 17:48	WG1361775
Dibromomethane	U		0.00121	0.00606	1	10/12/2019 17:48	WG1361775
1,2-Dichlorobenzene	U		0.00176	0.00606	1	10/12/2019 17:48	WG1361775
1,3-Dichlorobenzene	U		0.00206	0.00606	1	10/12/2019 17:48	WG1361775
1,4-Dichlorobenzene	U		0.00239	0.00606	1	10/12/2019 17:48	WG1361775
Dichlorodifluoromethane	U		0.000992	0.00303	1	10/12/2019 17:48	WG1361775
1,1-Dichloroethane	U		0.000697	0.00303	1	10/12/2019 17:48	WG1361775
1,2-Dichloroethane	U		0.000576	0.00303	1	10/12/2019 17:48	WG1361775
1,1-Dichloroethene	U		0.000606	0.00303	1	10/12/2019 17:48	WG1361775
cis-1,2-Dichloroethene	U		0.000836	0.00303	1	10/12/2019 17:48	WG1361775
trans-1,2-Dichloroethene	U		0.00173	0.00606	1	10/12/2019 17:48	WG1361775
1,2-Dichloropropane	U		0.00154	0.00606	1	10/12/2019 17:48	WG1361775
1,1-Dichloropropene	U		0.000849	0.00303	1	10/12/2019 17:48	WG1361775
1,3-Dichloropropane	U		0.00212	0.00606	1	10/12/2019 17:48	WG1361775
cis-1,3-Dichloropropene	U		0.000822	0.00303	1	10/12/2019 17:48	WG1361775
trans-1,3-Dichloropropene	U		0.00185	0.00606	1	10/12/2019 17:48	WG1361775
trans-1,4-Dichloro-2-butene	U		0.00170	0.00606	1	10/12/2019 17:48	WG1361775
2,2-Dichloropropane	U		0.000961	0.00303	1	10/12/2019 17:48	WG1361775
Di-isopropyl ether	U		0.000424	0.00121	1	10/12/2019 17:48	WG1361775
Ethylbenzene	U		0.000643	0.00303	1	10/12/2019 17:48	WG1361775
Hexachloro-1,3-butadiene	U		0.0154	0.0303	1	10/12/2019 17:48	WG1361775
2-Hexanone	U		0.0121	0.0303	1	10/12/2019 17:48	WG1361775
n-Hexane	U		0.00129	0.00606	1	10/12/2019 17:48	WG1361775
Iodomethane	U		0.00733	0.0152	1	10/12/2019 17:48	WG1361775
Isopropylbenzene	U		0.00105	0.00303	1	10/12/2019 17:48	WG1361775
p-Isopropyltoluene	U		0.00282	0.00606	1	10/12/2019 17:48	WG1361775
2-Butanone (MEK)	0.0252	J	0.0152	0.0303	1	10/12/2019 17:48	WG1361775
Methylene Chloride	U		0.00805	0.0303	1	10/12/2019 17:48	WG1361775
4-Methyl-2-pentanone (MIBK)	U		0.0121	0.0303	1	10/12/2019 17:48	WG1361775

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000358	0.00121	1	10/12/2019 17:48	WG1361775
Naphthalene	U		0.00378	0.0152	1	10/12/2019 17:48	WG1361775
n-Propylbenzene	U		0.00143	0.00606	1	10/12/2019 17:48	WG1361775
Styrene	U		0.00331	0.0152	1	10/12/2019 17:48	WG1361775
1,1,1,2-Tetrachloroethane	U		0.000606	0.00303	1	10/12/2019 17:48	WG1361775
1,1,2,2-Tetrachloroethane	U		0.000473	0.00303	1	10/12/2019 17:48	WG1361775
1,1,2-Trichlorotrifluoroethane	U		0.000818	0.00303	1	10/12/2019 17:48	WG1361775
Tetrachloroethene	U		0.000849	0.00303	1	10/12/2019 17:48	WG1361775
Toluene	0.0138		0.00152	0.00606	1	10/12/2019 17:48	WG1361775
1,2,3-Trichlorobenzene	U		0.000758	0.00303	1	10/12/2019 17:48	WG1361775
1,2,4-Trichlorobenzene	U	J4	0.00584	0.0152	1	10/12/2019 17:48	WG1361775
1,1,1-Trichloroethane	U		0.000333	0.00303	1	10/12/2019 17:48	WG1361775
1,1,2-Trichloroethane	U		0.00107	0.00303	1	10/12/2019 17:48	WG1361775
Trichloroethene	U		0.000485	0.00121	1	10/12/2019 17:48	WG1361775
Trichlorofluoromethane	U		0.000606	0.00303	1	10/12/2019 17:48	WG1361775
1,2,3-Trichloropropane	U		0.00618	0.0152	1	10/12/2019 17:48	WG1361775
1,2,4-Trimethylbenzene	U		0.00141	0.00606	1	10/12/2019 17:48	WG1361775
1,2,3-Trimethylbenzene	U		0.00139	0.00606	1	10/12/2019 17:48	WG1361775
1,3,5-Trimethylbenzene	U		0.00131	0.00606	1	10/12/2019 17:48	WG1361775
Vinyl acetate	U	J0	0.00427	0.0152	1	10/12/2019 17:48	WG1361775
Vinyl chloride	U	J4	0.000828	0.00303	1	10/12/2019 17:48	WG1361775
Xylenes, Total	U		0.00579	0.00788	1	10/12/2019 17:48	WG1361775
(S) Toluene-d8	*107*			*75.0-131*		*10/12/2019 17:48*	WG1361775
(S) 4-Bromofluorobenzene	*102*			*67.0-138*		*10/12/2019 17:48*	WG1361775
(S) 1,2-Dichloroethane-d4	*114*			*70.0-130*		*10/12/2019 17:48*	WG1361775

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U		1.05	25.0	1	10/10/2019 12:25	WG1360613
Acrylonitrile	U		0.873	5.00	1	10/10/2019 12:25	WG1360613
Benzene	U		0.0896	0.500	1	10/10/2019 12:25	WG1360613
Bromobenzene	U		0.133	0.500	1	10/10/2019 12:25	WG1360613
Bromodichloromethane	U		0.0800	0.500	1	10/10/2019 12:25	WG1360613
Bromochloromethane	U		0.145	0.500	1	10/10/2019 12:25	WG1360613
Bromoform	U		0.186	0.500	1	10/10/2019 12:25	WG1360613
Bromomethane	U		0.157	2.50	1	10/10/2019 12:25	WG1360613
n-Butylbenzene	U		0.143	0.500	1	10/10/2019 12:25	WG1360613
sec-Butylbenzene	U		0.134	0.500	1	10/10/2019 12:25	WG1360613
tert-Butylbenzene	U		0.183	0.500	1	10/10/2019 12:25	WG1360613
Carbon disulfide	U		0.101	0.500	1	10/10/2019 12:25	WG1360613
Carbon tetrachloride	U		0.159	0.500	1	10/10/2019 12:25	WG1360613
Chlorobenzene	U		0.140	0.500	1	10/10/2019 12:25	WG1360613
Chlorodibromomethane	U		0.128	0.500	1	10/10/2019 12:25	WG1360613
Chloroethane	U		0.141	2.50	1	10/10/2019 12:25	WG1360613
Chloroform	U		0.0860	0.500	1	10/10/2019 12:25	WG1360613
Chloromethane	U		0.153	1.25	1	10/10/2019 12:25	WG1360613
2-Chlorotoluene	U		0.111	0.500	1	10/10/2019 12:25	WG1360613
4-Chlorotoluene	U		0.0972	0.500	1	10/10/2019 12:25	WG1360613
1,2-Dibromo-3-Chloropropane	U	J0	0.325	2.50	1	10/10/2019 12:25	WG1360613
1,2-Dibromoethane	U		0.193	0.500	1	10/10/2019 12:25	WG1360613
Dibromomethane	U		0.117	0.500	1	10/10/2019 12:25	WG1360613
1,2-Dichlorobenzene	U		0.101	0.500	1	10/10/2019 12:25	WG1360613
1,3-Dichlorobenzene	U		0.130	0.500	1	10/10/2019 12:25	WG1360613
1,4-Dichlorobenzene	U		0.121	0.500	1	10/10/2019 12:25	WG1360613
Dichlorodifluoromethane	U		0.127	2.50	1	10/10/2019 12:25	WG1360613
1,1-Dichloroethane	U		0.114	0.500	1	10/10/2019 12:25	WG1360613
1,2-Dichloroethane	U		0.108	0.500	1	10/10/2019 12:25	WG1360613
1,1-Dichloroethene	U		0.188	0.500	1	10/10/2019 12:25	WG1360613
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/10/2019 12:25	WG1360613
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/10/2019 12:25	WG1360613
1,2-Dichloropropane	U		0.190	0.500	1	10/10/2019 12:25	WG1360613
1,1-Dichloropropene	U		0.128	0.500	1	10/10/2019 12:25	WG1360613
1,3-Dichloropropane	U	J0 J4	0.147	1.00	1	10/10/2019 12:25	WG1360613
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/10/2019 12:25	WG1360613
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/10/2019 12:25	WG1360613
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/10/2019 12:25	WG1360613
2,2-Dichloropropane	U		0.0929	0.500	1	10/10/2019 12:25	WG1360613
Di-isopropyl ether	U		0.0924	0.500	1	10/10/2019 12:25	WG1360613
Ethylbenzene	U		0.158	0.500	1	10/10/2019 12:25	WG1360613
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/10/2019 12:25	WG1360613
2-Hexanone	U		0.757	5.00	1	10/10/2019 12:25	WG1360613
n-Hexane	U		0.305	5.00	1	10/10/2019 12:25	WG1360613
Iodomethane	U		0.377	10.0	1	10/10/2019 12:25	WG1360613
Isopropylbenzene	U		0.126	0.500	1	10/10/2019 12:25	WG1360613
p-Isopropyltoluene	U		0.138	0.500	1	10/10/2019 12:25	WG1360613
2-Butanone (MEK)	U		1.28	5.00	1	10/10/2019 12:25	WG1360613
Methylene Chloride	U		1.07	2.50	1	10/10/2019 12:25	WG1360613
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/10/2019 12:25	WG1360613
Methyl tert-butyl ether	U		0.102	0.500	1	10/10/2019 12:25	WG1360613
Naphthalene	U		0.174	2.50	1	10/10/2019 12:25	WG1360613
n-Propylbenzene	U		0.162	0.500	1	10/10/2019 12:25	WG1360613
Styrene	U		0.117	0.500	1	10/10/2019 12:25	WG1360613
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/10/2019 12:25	WG1360613
1,1,2,2-Tetrachloroethane	U	J0	0.130	0.500	1	10/10/2019 12:25	WG1360613

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/10/2019 12:25	WG1360613
Tetrachloroethene	U		0.199	0.500	1	10/10/2019 12:25	WG1360613
Toluene	U		0.412	0.500	1	10/10/2019 12:25	WG1360613
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/10/2019 12:25	WG1360613
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/10/2019 12:25	WG1360613
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/10/2019 12:25	WG1360613
1,1,2-Trichloroethane	U	J0 J4	0.186	0.500	1	10/10/2019 12:25	WG1360613
Trichloroethene	U		0.153	0.500	1	10/10/2019 12:25	WG1360613
Trichlorofluoromethane	U		0.130	2.50	1	10/10/2019 12:25	WG1360613
1,2,3-Trichloropropane	U		0.247	2.50	1	10/10/2019 12:25	WG1360613
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/10/2019 12:25	WG1360613
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/10/2019 12:25	WG1360613
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/10/2019 12:25	WG1360613
Vinyl acetate	U		0.645	5.00	1	10/10/2019 12:25	WG1360613
Vinyl chloride	U		0.118	0.500	1	10/10/2019 12:25	WG1360613
Xylenes, Total	U		0.316	1.50	1	10/10/2019 12:25	WG1360613
(S) Toluene-d8	*96.6*			*80.0-120*		*10/10/2019 12:25*	WG1360613
(S) 4-Bromofluorobenzene	*109*			*77.0-126*		*10/10/2019 12:25*	WG1360613
(S) 1,2-Dichloroethane-d4	*105*			*70.0-130*		*10/10/2019 12:25*	WG1360613

Method Blank (MB)

(MB) R3460153-1 10/10/19 14:55

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	%		%	%
Total Solids	0.000			

L1146028-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1146028-05 10/10/19 14:55 • (DUP) R3460153-3 10/10/19 14:55

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	%	%		%		%
Total Solids	89.2	89.3	1	0.0762		10

Laboratory Control Sample (LCS)

(LCS) R3460153-2 10/10/19 14:55

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
	%	%	%	%	
Total Solids	50.0	50.0	100	85.0-115	

Method Blank (MB)

(MB) R3460151-1 10/10/19 14:41

Analyte	MB Result %	MB Qualifier	MB MDL %	MB RDL %
Total Solids	0.00100			

L1146029-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1146029-02 10/10/19 14:41 • (DUP) R3460151-3 10/10/19 14:41

Analyte	Original Result %	DUP Result %	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Total Solids	78.8	78.6	1	0.189		10

Laboratory Control Sample (LCS)

(LCS) R3460151-2 10/10/19 14:41

Analyte	Spike Amount %	LCS Result %	LCS Rec. %	Rec. Limits %	LCS Qualifier
Total Solids	50.0	50.0	99.9	85.0-115	

Method Blank (MB)

(MB) R3459793-3 10/10/19 10:44

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3459793-3 10/10/19 10:44

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*96.7*			*80.0-120*
(S) 4-Bromofluorobenzene	*108*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*105*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3459793-1 10/10/19 09:43 • (LCSD) R3459793-2 10/10/19 10:04

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	125	139	142	111	114	19.0-160			2.14	27
Acrylonitrile	125	135	134	108	107	55.0-149			0.743	20
Benzene	25.0	23.6	23.8	94.4	95.2	70.0-123			0.844	20
Bromobenzene	25.0	25.0	25.2	100	101	73.0-121			0.797	20
Bromodichloromethane	25.0	23.8	24.6	95.2	98.4	75.0-120			3.31	20
Bromochloromethane	25.0	25.5	25.7	102	103	76.0-122			0.781	20
Bromoform	25.0	20.5	20.3	82.0	81.2	68.0-132			0.980	20
Bromomethane	25.0	23.4	23.2	93.6	92.8	10.0-160			0.858	25
n-Butylbenzene	25.0	21.4	21.9	85.6	87.6	73.0-125			2.31	20
sec-Butylbenzene	25.0	26.6	26.6	106	106	75.0-125			0.000	20
tert-Butylbenzene	25.0	28.9	29.1	116	116	76.0-124			0.690	20
Carbon disulfide	25.0	23.7	24.0	94.8	96.0	61.0-128			1.26	20
Carbon tetrachloride	25.0	27.4	27.5	110	110	68.0-126			0.364	20
Chlorobenzene	25.0	24.9	24.8	99.6	99.2	80.0-121			0.402	20
Chlorodibromomethane	25.0	22.0	21.5	88.0	86.0	77.0-125			2.30	20
Chloroethane	25.0	24.6	24.5	98.4	98.0	47.0-150			0.407	20
Chloroform	25.0	24.1	24.3	96.4	97.2	73.0-120			0.826	20
Chloromethane	25.0	30.5	30.3	122	121	41.0-142			0.658	20
2-Chlorotoluene	25.0	27.6	28.7	110	115	76.0-123			3.91	20
4-Chlorotoluene	25.0	28.8	29.3	115	117	75.0-122			1.72	20
1,2-Dibromo-3-Chloropropane	25.0	17.9	18.8	71.6	75.2	58.0-134			4.90	20
1,2-Dibromoethane	25.0	20.7	20.0	82.8	80.0	80.0-122			3.44	20
Dibromomethane	25.0	22.8	22.8	91.2	91.2	80.0-120			0.000	20
1,2-Dichlorobenzene	25.0	20.9	20.9	83.6	83.6	79.0-121			0.000	20
1,3-Dichlorobenzene	25.0	24.6	24.9	98.4	99.6	79.0-120			1.21	20
1,4-Dichlorobenzene	25.0	22.9	23.2	91.6	92.8	79.0-120			1.30	20
Dichlorodifluoromethane	25.0	25.1	24.7	100	98.8	51.0-149			1.61	20
1,1-Dichloroethane	25.0	25.7	26.2	103	105	70.0-126			1.93	20
1,2-Dichloroethane	25.0	24.2	24.4	96.8	97.6	70.0-128			0.823	20
1,1-Dichloroethene	25.0	24.4	24.5	97.6	98.0	71.0-124			0.409	20
cis-1,2-Dichloroethene	25.0	23.8	24.7	95.2	98.8	73.0-120			3.71	20
trans-1,2-Dichloroethene	25.0	23.8	24.2	95.2	96.8	73.0-120			1.67	20
1,2-Dichloropropane	25.0	25.5	26.1	102	104	77.0-125			2.33	20
1,1-Dichloropropene	25.0	25.5	26.2	102	105	74.0-126			2.71	20
1,3-Dichloropropane	25.0	19.3	19.4	77.2	77.6	80.0-120	J4	J4	0.517	20
cis-1,3-Dichloropropene	25.0	23.8	24.6	95.2	98.4	80.0-123			3.31	20
trans-1,3-Dichloropropene	25.0	20.8	20.6	83.2	82.4	78.0-124			0.966	20
trans-1,4-Dichloro-2-butene	25.0	22.4	24.2	89.6	96.8	33.0-144			7.73	20
2,2-Dichloropropane	25.0	27.0	26.6	108	106	58.0-130			1.49	20
Di-isopropyl ether	25.0	26.2	26.6	105	106	58.0-138			1.52	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3459793-1 10/10/19 09:43 • (LCSD) R3459793-2 10/10/19 10:04

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	25.0	23.6	23.3	94.4	93.2	79.0-123			1.28	20
Hexachloro-1,3-butadiene	25.0	22.0	22.4	88.0	89.6	54.0-138			1.80	20
2-Hexanone	125	111	108	88.8	86.4	67.0-149			2.74	20
n-Hexane	25.0	30.1	31.5	120	126	57.0-133			4.55	20
Iodomethane	125	115	116	92.0	92.8	33.0-147			0.866	26
Isopropylbenzene	25.0	25.1	24.7	100	98.8	76.0-127			1.61	20
p-Isopropyltoluene	25.0	26.2	26.1	105	104	76.0-125			0.382	20
2-Butanone (MEK)	125	124	127	99.2	102	44.0-160			2.39	20
Methylene Chloride	25.0	23.8	24.7	95.2	98.8	67.0-120			3.71	20
4-Methyl-2-pentanone (MIBK)	125	92.9	92.0	74.3	73.6	68.0-142			0.973	20
Methyl tert-butyl ether	25.0	23.9	24.5	95.6	98.0	68.0-125			2.48	20
Naphthalene	25.0	23.2	23.7	92.8	94.8	54.0-135			2.13	20
n-Propylbenzene	25.0	26.9	27.3	108	109	77.0-124			1.48	20
Styrene	25.0	25.5	25.1	102	100	73.0-130			1.58	20
1,1,1,2-Tetrachloroethane	25.0	22.6	21.9	90.4	87.6	75.0-125			3.15	20
1,1,2,2-Tetrachloroethane	25.0	19.6	20.1	78.4	80.4	65.0-130			2.52	20
1,1,2-Trichlorotrifluoroethane	25.0	25.1	24.9	100	99.6	69.0-132			0.800	20
Tetrachloroethene	25.0	23.4	23.1	93.6	92.4	72.0-132			1.29	20
Toluene	25.0	22.5	22.4	90.0	89.6	79.0-120			0.445	20
1,2,3-Trichlorobenzene	25.0	22.6	23.1	90.4	92.4	50.0-138			2.19	20
1,2,4-Trichlorobenzene	25.0	24.4	24.4	97.6	97.6	57.0-137			0.000	20
1,1,1-Trichloroethane	25.0	26.9	27.5	108	110	73.0-124			2.21	20
1,1,2-Trichloroethane	25.0	19.9	19.8	79.6	79.2	80.0-120	J4	J4	0.504	20
Trichloroethene	25.0	27.7	28.0	111	112	78.0-124			1.08	20
Trichlorofluoromethane	25.0	26.8	27.3	107	109	59.0-147			1.85	20
1,2,3-Trichloropropane	25.0	25.3	25.9	101	104	73.0-130			2.34	20
1,2,4-Trimethylbenzene	25.0	28.9	29.7	116	119	76.0-121			2.73	20
1,2,3-Trimethylbenzene	25.0	23.8	23.5	95.2	94.0	77.0-120			1.27	20
1,3,5-Trimethylbenzene	25.0	28.6	28.9	114	116	76.0-122			1.04	20
Vinyl acetate	125	109	112	87.2	89.6	11.0-160			2.71	20
Vinyl chloride	25.0	25.0	25.0	100	100	67.0-131			0.000	20
Xylenes, Total	75.0	73.4	73.0	97.9	97.3	79.0-123			0.546	20
(S) Toluene-d8				*96.4*	*94.4*	*80.0-120*				
(S) 4-Bromofluorobenzene				*111*	*109*	*77.0-126*				
(S) 1,2-Dichloroethane-d4				*102*	*102*	*70.0-130*				

Method Blank (MB)

(MB) R3460486-2 10/12/19 06:41

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Acetone	U		0.0137	0.0250
Acrylonitrile	U		0.00190	0.0125
Benzene	U		0.000400	0.00100
Bromobenzene	U		0.00105	0.0125
Bromodichloromethane	U		0.000788	0.00250
Bromochloromethane	U		0.00113	0.00500
Bromoform	U		0.00598	0.0250
Bromomethane	U		0.00370	0.0125
n-Butylbenzene	U		0.00384	0.0125
sec-Butylbenzene	U		0.00253	0.0125
tert-Butylbenzene	U		0.00155	0.00500
Carbon disulfide	U		0.00406	0.0125
Carbon tetrachloride	U		0.00108	0.00500
Chlorobenzene	U		0.000573	0.00250
Chlorodibromomethane	U		0.000450	0.00250
Chloroethane	U		0.00108	0.00500
Chloroform	U		0.000415	0.00250
Chloromethane	U		0.00139	0.0125
2-Chlorotoluene	U		0.000920	0.00250
4-Chlorotoluene	U		0.00113	0.00500
1,2-Dibromo-3-Chloropropane	U		0.00510	0.0250
1,2-Dibromoethane	U		0.000525	0.00250
Dibromomethane	U		0.00100	0.00500
1,2-Dichlorobenzene	U		0.00145	0.00500
1,3-Dichlorobenzene	U		0.00170	0.00500
1,4-Dichlorobenzene	U		0.00197	0.00500
trans-1,4-Dichloro-2-butene	U		0.00140	0.00500
Dichlorodifluoromethane	U		0.000818	0.00250
1,1-Dichloroethane	U		0.000575	0.00250
1,2-Dichloroethane	U		0.000475	0.00250
1,1-Dichloroethene	U		0.000500	0.00250
cis-1,2-Dichloroethene	U		0.000690	0.00250
trans-1,2-Dichloroethene	U		0.00143	0.00500
1,2-Dichloropropane	U		0.00127	0.00500
1,1-Dichloropropene	U		0.000700	0.00250
1,3-Dichloropropane	U		0.00175	0.00500
cis-1,3-Dichloropropene	U		0.000678	0.00250
trans-1,3-Dichloropropene	U		0.00153	0.00500
2,2-Dichloropropane	U		0.000793	0.00250
Di-isopropyl ether	U		0.000350	0.00100

Method Blank (MB)

(MB) R3460486-2 10/12/19 06:41

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Ethylbenzene	U		0.000530	0.00250
Hexachloro-1,3-butadiene	U		0.0127	0.0250
n-Hexane	U		0.00106	0.00500
2-Hexanone	U		0.0100	0.0250
Iodomethane	U		0.00605	0.0125
Isopropylbenzene	U		0.000863	0.00250
p-Isopropyltoluene	U		0.00233	0.00500
2-Butanone (MEK)	U		0.0125	0.0250
Methylene Chloride	0.00970	J	0.00664	0.0250
4-Methyl-2-pentanone (MIBK)	U		0.0100	0.0250
Methyl tert-butyl ether	U		0.000295	0.00100
Naphthalene	U		0.00312	0.0125
n-Propylbenzene	U		0.00118	0.00500
Styrene	U		0.00273	0.0125
1,1,1,2-Tetrachloroethane	U		0.000500	0.00250
1,1,2,2-Tetrachloroethane	U		0.000390	0.00250
Tetrachloroethene	U		0.000700	0.00250
Toluene	U		0.00125	0.00500
1,1,2-Trichlorotrifluoroethane	U		0.000675	0.00250
1,2,3-Trichlorobenzene	U		0.000625	0.00250
1,2,4-Trichlorobenzene	U		0.00482	0.0125
1,1,1-Trichloroethane	U		0.000275	0.00250
1,1,2-Trichloroethane	U		0.000883	0.00250
Trichloroethene	U		0.000400	0.00100
Trichlorofluoromethane	U		0.000500	0.00250
1,2,3-Trichloropropane	U		0.00510	0.0125
1,2,3-Trimethylbenzene	U		0.00115	0.00500
1,2,4-Trimethylbenzene	U		0.00116	0.00500
1,3,5-Trimethylbenzene	U		0.00108	0.00500
Vinyl acetate	U		0.00352	0.0125
Vinyl chloride	U		0.000683	0.00250
Xylenes, Total	U		0.00478	0.00650
(S) Toluene-d8	*108*			*75.0-131*
(S) 4-Bromofluorobenzene	*99.7*			*67.0-138*
(S) 1,2-Dichloroethane-d4	*113*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3460486-1 10/12/19 05:39

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.625	0.475	76.0	10.0-160	
Acrylonitrile	0.625	0.528	84.5	45.0-153	
Benzene	0.125	0.120	96.0	70.0-123	
Bromobenzene	0.125	0.128	102	73.0-121	
Bromodichloromethane	0.125	0.134	107	73.0-121	
Bromochloromethane	0.125	0.128	102	77.0-128	
Bromoform	0.125	0.140	112	64.0-132	
Bromomethane	0.125	0.133	106	56.0-147	
n-Butylbenzene	0.125	0.136	109	68.0-135	
sec-Butylbenzene	0.125	0.148	118	74.0-130	
tert-Butylbenzene	0.125	0.138	110	75.0-127	
Carbon disulfide	0.125	0.120	96.0	56.0-133	
Carbon tetrachloride	0.125	0.152	122	66.0-128	
Chlorobenzene	0.125	0.111	88.8	76.0-128	
Chlorodibromomethane	0.125	0.138	110	74.0-127	
Chloroethane	0.125	0.128	102	61.0-134	
Chloroform	0.125	0.108	86.4	72.0-123	
Chloromethane	0.125	0.150	120	51.0-138	
2-Chlorotoluene	0.125	0.123	98.4	75.0-124	
4-Chlorotoluene	0.125	0.141	113	75.0-124	
1,2-Dibromo-3-Chloropropane	0.125	0.147	118	59.0-130	
1,2-Dibromoethane	0.125	0.127	102	74.0-128	
Dibromomethane	0.125	0.108	86.4	75.0-122	
1,2-Dichlorobenzene	0.125	0.135	108	76.0-124	
1,3-Dichlorobenzene	0.125	0.136	109	76.0-125	
1,4-Dichlorobenzene	0.125	0.128	102	77.0-121	
trans-1,4-Dichloro-2-butene	0.125	0.142	114	45.0-143	
Dichlorodifluoromethane	0.125	0.171	137	43.0-156	
1,1-Dichloroethane	0.125	0.141	113	70.0-127	
1,2-Dichloroethane	0.125	0.134	107	65.0-131	
1,1-Dichloroethene	0.125	0.140	112	65.0-131	
cis-1,2-Dichloroethene	0.125	0.113	90.4	73.0-125	
trans-1,2-Dichloroethene	0.125	0.126	101	71.0-125	
1,2-Dichloropropane	0.125	0.125	100	74.0-125	
1,1-Dichloropropene	0.125	0.134	107	73.0-125	
1,3-Dichloropropane	0.125	0.123	98.4	80.0-125	
cis-1,3-Dichloropropene	0.125	0.112	89.6	76.0-127	
trans-1,3-Dichloropropene	0.125	0.131	105	73.0-127	
2,2-Dichloropropane	0.125	0.134	107	59.0-135	
Di-isopropyl ether	0.125	0.114	91.2	60.0-136	

Laboratory Control Sample (LCS)

(LCS) R3460486-1 10/12/19 05:39

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	0.125	0.121	96.8	74.0-126	
Hexachloro-1,3-butadiene	0.125	0.165	132	57.0-150	
2-Hexanone	0.625	0.573	91.7	54.0-147	
n-Hexane	0.125	0.102	81.6	55.0-137	
Iodomethane	0.625	0.655	105	74.0-134	
Isopropylbenzene	0.125	0.117	93.6	72.0-127	
p-Isopropyltoluene	0.125	0.139	111	72.0-133	
2-Butanone (MEK)	0.625	0.529	84.6	30.0-160	
Methylene Chloride	0.125	0.118	94.4	68.0-123	
4-Methyl-2-pentanone (MIBK)	0.625	0.552	88.3	56.0-143	
Methyl tert-butyl ether	0.125	0.147	118	66.0-132	
Naphthalene	0.125	0.142	114	59.0-130	
n-Propylbenzene	0.125	0.125	100	74.0-126	
Styrene	0.125	0.126	101	72.0-127	
1,1,1,2-Tetrachloroethane	0.125	0.135	108	74.0-129	
1,1,2,2-Tetrachloroethane	0.125	0.0982	78.6	68.0-128	
Tetrachloroethene	0.125	0.140	112	70.0-136	
Toluene	0.125	0.117	93.6	75.0-121	
1,1,2-Trichlorotrifluoroethane	0.125	0.105	84.0	61.0-139	
1,2,3-Trichlorobenzene	0.125	0.146	117	59.0-139	
1,2,4-Trichlorobenzene	0.125	0.169	135	62.0-137	
1,1,1-Trichloroethane	0.125	0.149	119	69.0-126	
1,1,2-Trichloroethane	0.125	0.131	105	78.0-123	
Trichloroethene	0.125	0.125	100	76.0-126	
Trichlorofluoromethane	0.125	0.127	102	61.0-142	
1,2,3-Trichloropropane	0.125	0.126	101	67.0-129	
1,2,3-Trimethylbenzene	0.125	0.138	110	74.0-124	
1,2,4-Trimethylbenzene	0.125	0.137	110	70.0-126	
1,3,5-Trimethylbenzene	0.125	0.136	109	73.0-127	
Vinyl acetate	0.625	0.358	57.3	43.0-159	
Vinyl chloride	0.125	0.165	132	63.0-134	
Xylenes, Total	0.375	0.354	94.4	72.0-127	
(S) Toluene-d8			*108*	*75.0-131*	
(S) 4-Bromofluorobenzene			*101*	*67.0-138*	
(S) 1,2-Dichloroethane-d4			*115*	*70.0-130*	

Method Blank (MB)

(MB) R3460514-3 10/12/19 17:28

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Acetone	U		0.0137	0.0250
Acrylonitrile	U		0.00190	0.0125
Benzene	U		0.000400	0.00100
Bromobenzene	U		0.00105	0.0125
Bromodichloromethane	U		0.000788	0.00250
Bromochloromethane	U		0.00113	0.00500
Bromoform	U		0.00598	0.0250
Bromomethane	U		0.00370	0.0125
n-Butylbenzene	U		0.00384	0.0125
sec-Butylbenzene	U		0.00253	0.0125
tert-Butylbenzene	U		0.00155	0.00500
Carbon disulfide	U		0.00406	0.0125
Carbon tetrachloride	U		0.00108	0.00500
Chlorobenzene	U		0.000573	0.00250
Chlorodibromomethane	U		0.000450	0.00250
Chloroethane	U		0.00108	0.00500
Chloroform	0.00103	J	0.000415	0.00250
Chloromethane	U		0.00139	0.0125
2-Chlorotoluene	U		0.000920	0.00250
4-Chlorotoluene	U		0.00113	0.00500
1,2-Dibromo-3-Chloropropane	U		0.00510	0.0250
1,2-Dibromoethane	U		0.000525	0.00250
Dibromomethane	U		0.00100	0.00500
1,2-Dichlorobenzene	U		0.00145	0.00500
1,3-Dichlorobenzene	U		0.00170	0.00500
1,4-Dichlorobenzene	U		0.00197	0.00500
trans-1,4-Dichloro-2-butene	U		0.00140	0.00500
Dichlorodifluoromethane	U		0.000818	0.00250
1,1-Dichloroethane	U		0.000575	0.00250
1,2-Dichloroethane	U		0.000475	0.00250
1,1-Dichloroethene	U		0.000500	0.00250
cis-1,2-Dichloroethene	U		0.000690	0.00250
trans-1,2-Dichloroethene	0.00155	J	0.00143	0.00500
1,2-Dichloropropane	U		0.00127	0.00500
1,1-Dichloropropene	U		0.000700	0.00250
1,3-Dichloropropane	U		0.00175	0.00500
cis-1,3-Dichloropropene	U		0.000678	0.00250
trans-1,3-Dichloropropene	U		0.00153	0.00500
2,2-Dichloropropane	U		0.000793	0.00250
Di-isopropyl ether	U		0.000350	0.00100

Method Blank (MB)

(MB) R3460514-3 10/12/19 17:28

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Ethylbenzene	U		0.000530	0.00250
Hexachloro-1,3-butadiene	U		0.0127	0.0250
n-Hexane	U		0.00106	0.00500
2-Hexanone	U		0.0100	0.0250
Iodomethane	U		0.00605	0.0125
Isopropylbenzene	U		0.000863	0.00250
p-Isopropyltoluene	U		0.00233	0.00500
2-Butanone (MEK)	U		0.0125	0.0250
Methylene Chloride	0.00810	J	0.00664	0.0250
4-Methyl-2-pentanone (MIBK)	U		0.0100	0.0250
Methyl tert-butyl ether	U		0.000295	0.00100
Naphthalene	U		0.00312	0.0125
n-Propylbenzene	U		0.00118	0.00500
Styrene	U		0.00273	0.0125
1,1,1,2-Tetrachloroethane	U		0.000500	0.00250
1,1,2,2-Tetrachloroethane	U		0.000390	0.00250
Tetrachloroethene	U		0.000700	0.00250
Toluene	U		0.00125	0.00500
1,1,2-Trichlorotrifluoroethane	U		0.000675	0.00250
1,2,3-Trichlorobenzene	U		0.000625	0.00250
1,2,4-Trichlorobenzene	U		0.00482	0.0125
1,1,1-Trichloroethane	U		0.000275	0.00250
1,1,2-Trichloroethane	U		0.000883	0.00250
Trichloroethene	U		0.000400	0.00100
Trichlorofluoromethane	U		0.000500	0.00250
1,2,3-Trichloropropane	U		0.00510	0.0125
1,2,3-Trimethylbenzene	U		0.00115	0.00500
1,2,4-Trimethylbenzene	U		0.00116	0.00500
1,3,5-Trimethylbenzene	U		0.00108	0.00500
Vinyl acetate	U		0.00352	0.0125
Vinyl chloride	U		0.000683	0.00250
Xylenes, Total	U		0.00478	0.00650
(S) Toluene-d8	*106*			*75.0-131*
(S) 4-Bromofluorobenzene	*99.6*			*67.0-138*
(S) 1,2-Dichloroethane-d4	*115*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3460514-1 10/12/19 15:25 • (LCSD) R3460514-2 10/12/19 15:46

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCSD Result mg/kg	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.625	0.514	0.461	82.2	73.8	10.0-160			10.9	31
Acrylonitrile	0.625	0.544	0.543	87.0	86.9	45.0-153			0.184	22
Benzene	0.125	0.116	0.119	92.8	95.2	70.0-123			2.55	20
Bromobenzene	0.125	0.128	0.141	102	113	73.0-121			9.67	20
Bromodichloromethane	0.125	0.132	0.131	106	105	73.0-121			0.760	20
Bromochloromethane	0.125	0.124	0.134	99.2	107	77.0-128			7.75	20
Bromoform	0.125	0.138	0.136	110	109	64.0-132			1.46	20
Bromomethane	0.125	0.134	0.135	107	108	56.0-147			0.743	20
n-Butylbenzene	0.125	0.130	0.146	104	117	68.0-135			11.6	20
sec-Butylbenzene	0.125	0.144	0.159	115	127	74.0-130			9.90	20
tert-Butylbenzene	0.125	0.135	0.149	108	119	75.0-127			9.86	20
Carbon disulfide	0.125	0.110	0.121	88.0	96.8	56.0-133			9.52	20
Carbon tetrachloride	0.125	0.141	0.150	113	120	66.0-128			6.19	20
Chlorobenzene	0.125	0.103	0.109	82.4	87.2	76.0-128			5.66	20
Chlorodibromomethane	0.125	0.135	0.141	108	113	74.0-127			4.35	20
Chloroethane	0.125	0.130	0.132	104	106	61.0-134			1.53	20
Chloroform	0.125	0.111	0.110	88.8	88.0	72.0-123			0.905	20
Chloromethane	0.125	0.146	0.156	117	125	51.0-138			6.62	20
2-Chlorotoluene	0.125	0.112	0.126	89.6	101	75.0-124			11.8	20
4-Chlorotoluene	0.125	0.135	0.150	108	120	75.0-124			10.5	20
1,2-Dibromo-3-Chloropropane	0.125	0.135	0.155	108	124	59.0-130			13.8	20
1,2-Dibromoethane	0.125	0.122	0.127	97.6	102	74.0-128			4.02	20
Dibromomethane	0.125	0.109	0.112	87.2	89.6	75.0-122			2.71	20
1,2-Dichlorobenzene	0.125	0.134	0.149	107	119	76.0-124			10.6	20
1,3-Dichlorobenzene	0.125	0.139	0.152	111	122	76.0-125			8.93	20
1,4-Dichlorobenzene	0.125	0.125	0.137	100	110	77.0-121			9.16	20
trans-1,4-Dichloro-2-butene	0.125	0.158	0.171	126	137	45.0-143			7.90	20
Dichlorodifluoromethane	0.125	0.161	0.160	129	128	43.0-156			0.623	20
1,1-Dichloroethane	0.125	0.137	0.142	110	114	70.0-127			3.58	20
1,2-Dichloroethane	0.125	0.142	0.134	114	107	65.0-131			5.80	20
1,1-Dichloroethene	0.125	0.145	0.142	116	114	65.0-131			2.09	20
cis-1,2-Dichloroethene	0.125	0.111	0.115	88.8	92.0	73.0-125			3.54	20
trans-1,2-Dichloroethene	0.125	0.120	0.129	96.0	103	71.0-125			7.23	20
1,2-Dichloropropane	0.125	0.125	0.126	100	101	74.0-125			0.797	20
1,1-Dichloropropene	0.125	0.139	0.140	111	112	73.0-125			0.717	20
1,3-Dichloropropane	0.125	0.118	0.121	94.4	96.8	80.0-125			2.51	20
cis-1,3-Dichloropropene	0.125	0.114	0.116	91.2	92.8	76.0-127			1.74	20
trans-1,3-Dichloropropene	0.125	0.132	0.138	106	110	73.0-127			4.44	20
2,2-Dichloropropane	0.125	0.142	0.150	114	120	59.0-135			5.48	20
Di-isopropyl ether	0.125	0.111	0.116	88.8	92.8	60.0-136			4.41	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3460514-1 10/12/19 15:25 • (LCSD) R3460514-2 10/12/19 15:46

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCSD Result mg/kg	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.125	0.124	0.123	99.2	98.4	74.0-126			0.810	20
Hexachloro-1,3-butadiene	0.125	0.166	0.188	133	150	57.0-150			12.4	20
2-Hexanone	0.625	0.565	0.574	90.4	91.8	54.0-147			1.58	20
n-Hexane	0.125	0.105	0.106	84.0	84.8	55.0-137			0.948	20
Iodomethane	0.625	0.662	0.683	106	109	74.0-134			3.12	20
Isopropylbenzene	0.125	0.110	0.115	88.0	92.0	72.0-127			4.44	20
p-Isopropyltoluene	0.125	0.128	0.146	102	117	72.0-133			13.1	20
2-Butanone (MEK)	0.625	0.543	0.571	86.9	91.4	30.0-160			5.03	24
Methylene Chloride	0.125	0.113	0.111	90.4	88.8	68.0-123			1.79	20
4-Methyl-2-pentanone (MIBK)	0.625	0.550	0.548	88.0	87.7	56.0-143			0.364	20
Methyl tert-butyl ether	0.125	0.143	0.149	114	119	66.0-132			4.11	20
Naphthalene	0.125	0.133	0.150	106	120	59.0-130			12.0	20
n-Propylbenzene	0.125	0.125	0.136	100	109	74.0-126			8.43	20
Styrene	0.125	0.120	0.122	96.0	97.6	72.0-127			1.65	20
1,1,1,2-Tetrachloroethane	0.125	0.135	0.135	108	108	74.0-129			0.000	20
1,1,2,2-Tetrachloroethane	0.125	0.0974	0.102	77.9	81.6	68.0-128			4.61	20
Tetrachloroethene	0.125	0.133	0.142	106	114	70.0-136			6.55	20
Toluene	0.125	0.115	0.114	92.0	91.2	75.0-121			0.873	20
1,1,2-Trichlorotrifluoroethane	0.125	0.105	0.121	84.0	96.8	61.0-139			14.2	20
1,2,3-Trichlorobenzene	0.125	0.143	0.154	114	123	59.0-139			7.41	20
1,2,4-Trichlorobenzene	0.125	0.159	0.184	127	147	62.0-137		J4	14.6	20
1,1,1-Trichloroethane	0.125	0.149	0.153	119	122	69.0-126			2.65	20
1,1,2-Trichloroethane	0.125	0.125	0.129	100	103	78.0-123			3.15	20
Trichloroethene	0.125	0.125	0.128	100	102	76.0-126			2.37	20
Trichlorofluoromethane	0.125	0.124	0.125	99.2	100	61.0-142			0.803	20
1,2,3-Trichloropropane	0.125	0.113	0.137	90.4	110	67.0-129			19.2	20
1,2,3-Trimethylbenzene	0.125	0.137	0.152	110	122	74.0-124			10.4	20
1,2,4-Trimethylbenzene	0.125	0.135	0.149	108	119	70.0-126			9.86	20
1,3,5-Trimethylbenzene	0.125	0.135	0.145	108	116	73.0-127			7.14	20
Vinyl acetate	0.625	0.519	0.465	83.0	74.4	43.0-159			11.0	20
Vinyl chloride	0.125	0.170	0.168	136	134	63.0-134	J4		1.18	20
Xylenes, Total	0.375	0.352	0.358	93.9	95.5	72.0-127			1.69	20
(S) Toluene-d8				*105*	*107*	*75.0-131*				
(S) 4-Bromofluorobenzene				*99.2*	*94.4*	*67.0-138*				
(S) 1,2-Dichloroethane-d4				*116*	*116*	*70.0-130*				

L1146570-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1146570-01 10/12/19 23:58 • (MS) R3460514-4 10/13/19 00:19 • (MSD) R3460514-5 10/13/19 00:39

Analyte	Spike Amount (dry) mg/kg	Original Result (dry) mg/kg	MS Result (dry) mg/kg	MSD Result (dry) mg/kg	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Acetone	265	ND	989	961	0.000	0.000	400	10.0-160	V	V	2.93	40
Acrylonitrile	265	ND	234	253	77.3	84.5	400	10.0-160			7.83	40
Benzene	53.0	62.0	136	133	139	135	400	10.0-149			1.57	37
Bromobenzene	53.0	ND	55.3	42.7	104	80.6	400	10.0-156			25.7	38
Bromodichloromethane	53.0	ND	56.2	45.5	105	85.0	400	10.0-143			21.0	37
Bromochloromethane	53.0	ND	55.0	43.1	104	81.4	400	10.0-155			24.2	33
Bromoform	53.0	ND	58.8	58.4	111	110	400	10.0-146			0.723	36
Bromomethane	53.0	ND	49.1	30.3	92.8	57.2	400	10.0-149		J3	47.5	38
n-Butylbenzene	53.0	ND	49.9	31.6	88.8	54.2	400	10.0-160		J3	45.0	40
sec-Butylbenzene	53.0	ND	55.6	34.2	100	60.0	400	10.0-159		J3	47.6	39
tert-Butylbenzene	53.0	ND	53.2	32.6	100	61.6	400	10.0-156		J3	47.9	39
Carbon disulfide	53.0	ND	30.6	14.6	57.8	27.6	400	10.0-145		J3	70.7	39
Carbon tetrachloride	53.0	ND	52.8	22.5	99.8	42.4	400	10.0-145		J3	80.7	37
Chlorobenzene	53.0	ND	42.3	30.3	79.8	57.2	400	10.0-152			33.0	39
Chlorodibromomethane	53.0	ND	57.7	52.8	109	99.8	400	10.0-146			8.81	37
Chloroethane	53.0	ND	44.7	25.2	84.4	47.6	400	10.0-146		J3	55.8	40
Chloroform	53.0	ND	45.5	29.8	84.9	55.1	400	10.0-146		J3	41.9	37
Chloromethane	53.0	ND	49.6	25.4	91.2	45.6	400	10.0-159		J3	64.4	37
2-Chlorotoluene	53.0	ND	47.7	32.5	90.0	61.4	400	10.0-159			37.8	38
4-Chlorotoluene	53.0	ND	56.1	39.0	96.8	64.4	400	10.0-155			36.1	39
1,2-Dibromo-3-Chloropropane	53.0	ND	67.0	63.3	127	120	400	10.0-151			5.69	39
1,2-Dibromoethane	53.0	ND	51.5	50.1	97.2	94.6	400	10.0-148			2.71	34
Dibromomethane	53.0	ND	44.6	41.9	84.2	79.2	400	10.0-147			6.12	35
1,2-Dichlorobenzene	53.0	ND	55.2	45.0	104	85.0	400	10.0-155			20.3	37
1,3-Dichlorobenzene	53.0	ND	54.4	40.6	103	76.6	400	10.0-153			29.2	38
1,4-Dichlorobenzene	53.0	ND	49.2	39.1	93.0	73.8	400	10.0-151			23.0	38
trans-1,4-Dichloro-2-butene	53.0	ND	66.8	66.7	120	120	400	10.0-152			0.159	36
Dichlorodifluoromethane	53.0	ND	41.5	16.2	78.4	30.6	400	10.0-160		J3	87.7	35
1,1-Dichloroethane	53.0	ND	53.8	33.6	100	61.9	400	10.0-147		J3	46.3	37
1,2-Dichloroethane	53.0	ND	56.1	48.9	106	92.4	400	10.0-148			13.7	35
1,1-Dichloroethene	53.0	ND	51.9	22.3	95.1	39.3	400	10.0-155		J3	79.6	37
cis-1,2-Dichloroethene	53.0	ND	42.9	29.4	81.0	55.6	400	10.0-149		J3	37.2	37
trans-1,2-Dichloroethene	53.0	ND	46.0	24.8	86.8	46.8	400	10.0-150		J3	59.9	37
1,2-Dichloropropane	53.0	ND	51.7	37.3	97.6	70.4	400	10.0-148			32.4	37
1,1-Dichloropropene	53.0	ND	49.6	24.0	93.6	45.4	400	10.0-153		J3	69.4	35
1,3-Dichloropropane	53.0	ND	53.7	48.6	95.4	85.8	400	10.0-154			9.94	35
cis-1,3-Dichloropropene	53.0	ND	46.3	38.7	87.4	73.0	400	10.0-151			18.0	37
trans-1,3-Dichloropropene	53.0	ND	53.5	48.2	101	91.0	400	10.0-148			10.4	37
2,2-Dichloropropane	53.0	ND	47.9	25.6	90.4	48.4	400	10.0-138		J3	60.5	36

L1146570-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1146570-01 10/12/19 23:58 • (MS) R3460514-4 10/13/19 00:19 • (MSD) R3460514-5 10/13/19 00:39

Analyte	Spike Amount (dry) mg/kg	Original Result (dry) mg/kg	MS Result (dry) mg/kg	MSD Result (dry) mg/kg	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Di-isopropyl ether	53.0	ND	46.4	37.0	87.6	69.8	400	10.0-147			22.6	36
Ethylbenzene	53.0	ND	82.9	67.5	71.6	42.4	400	10.0-160			20.6	38
Hexachloro-1,3-butadiene	53.0	ND	61.2	45.6	116	86.2	400	10.0-160			29.1	40
2-Hexanone	265	ND	246	262	92.8	98.8	400	10.0-160			6.26	36
n-Hexane	53.0	ND	117	93.2	0.000	0.000	400	10.0-157	V	V	22.2	37
Iodomethane	265	ND	239	148	90.4	56.0	400	10.0-160		J3	47.0	38
Isopropylbenzene	53.0	ND	48.9	29.4	83.0	46.2	400	10.0-155		J3	49.7	38
p-Isopropyltoluene	53.0	ND	56.5	33.3	103	59.6	400	10.0-160		J3	51.7	40
2-Butanone (MEK)	265	ND	280	275	5.60	4.00	400	10.0-160	J6	J6	1.53	40
Methylene Chloride	53.0	ND	45.5	32.0	86.0	60.4	400	10.0-141			35.0	37
4-Methyl-2-pentanone (MIBK)	265	ND	235	248	86.6	91.4	400	10.0-160			5.26	35
Methyl tert-butyl ether	53.0	ND	60.7	60.4	115	114	400	11.0-147			0.525	35
Naphthalene	53.0	ND	54.3	55.3	103	104	400	10.0-160			1.74	36
n-Propylbenzene	53.0	ND	51.2	30.4	80.5	41.3	400	10.0-158		J3	50.9	38
Styrene	53.0	ND	51.4	37.3	97.0	70.4	400	10.0-160			31.8	40
1,1,1,2-Tetrachloroethane	53.0	ND	53.3	42.5	101	80.2	400	10.0-149			22.6	39
1,1,2,2-Tetrachloroethane	53.0	ND	44.1	42.3	81.2	77.8	400	10.0-160			4.17	35
Tetrachloroethene	53.0	ND	55.5	29.0	105	54.8	400	10.0-156		J3	62.7	39
Toluene	53.0	ND	306	329	44.0	88.0	400	10.0-156			7.33	38
1,1,2-Trichlorotrifluoroethane	53.0	ND	41.3	16.8	78.0	31.8	400	10.0-160		J3	84.2	36
1,2,3-Trichlorobenzene	53.0	ND	54.5	52.2	103	98.6	400	10.0-160			4.37	40
1,2,4-Trichlorobenzene	53.0	ND	62.5	55.2	118	104	400	10.0-160			12.4	40
1,1,1-Trichloroethane	53.0	ND	57.1	25.1	108	47.4	400	10.0-144		J3	77.8	35
1,1,2-Trichloroethane	53.0	ND	56.3	51.9	100	91.9	400	10.0-160			8.22	35
Trichloroethene	53.0	ND	48.1	29.5	90.8	55.8	400	10.0-156		J3	47.7	38
Trichlorofluoromethane	53.0	ND	45.1	18.2	85.2	34.4	400	10.0-160		J3	84.9	40
1,2,3-Trichloropropane	53.0	ND	53.5	51.9	101	98.0	400	10.0-156			3.02	35
1,2,3-Trimethylbenzene	53.0	ND	57.9	44.5	98.3	72.9	400	10.0-160			26.3	36
1,2,4-Trimethylbenzene	53.0	ND	61.9	44.6	78.0	45.4	400	10.0-160			32.4	36
1,3,5-Trimethylbenzene	53.0	ND	57.5	36.6	88.8	49.4	400	10.0-160		J3	44.3	38
Vinyl acetate	265	ND	199	201	54.4	55.2	400	10.0-128			1.06	40
Vinyl chloride	53.0	ND	52.7	23.2	99.6	43.8	400	10.0-160		J3	77.8	37
Xylenes, Total	159	ND	233	192	147	121	400	10.0-160			19.5	38
(S) Toluene-d8					*107*	*107*		*75.0-131*				
(S) 4-Bromofluorobenzene					*101*	*100*		*67.0-138*				
(S) 1,2-Dichloroethane-d4					*116*	*117*		*70.0-130*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

(dry)	Results are reported based on the dry weight of the sample. [this will only be present on a dry report basis for soils].
MDL	Method Detection Limit.
MDL (dry)	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
RDL (dry)	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
J	The identification of the analyte is acceptable; the reported value is an estimate.
J0	J0: The identification of the analyte is acceptable, but the reported concentration is an estimate. The calibration met method criteria.
J3	The associated batch QC was outside the established quality control range for precision.
J4	The associated batch QC was outside the established quality control range for accuracy.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
V	The sample concentration is too high to evaluate accurate spike recoveries.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

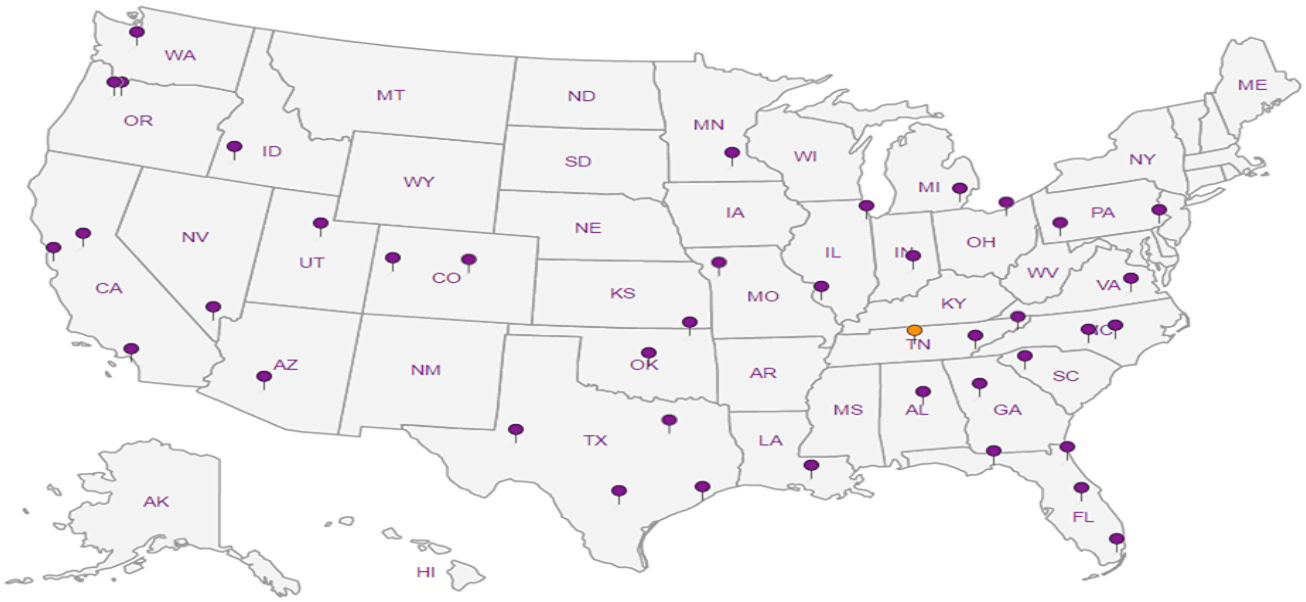
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



PES Environmental, Inc.- WA

1215 Fourth Ave., Suite 1350
Seattle, WA 98161

Billing Information:
Attn: Accounts Payable
1215 Fourth Ave., Ste. 1350
Seattle, WA 98161

Pres Chk

Analysis / Container / Preservative

Chain of Custody Page 1 of 2

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: Brian O'Neal/Bill Haldeman

Email To: boneal@pesenv.com; bhaldeman@pesenv.com;

Project Description: American Linen

City/State Collected: Seattle WA

Please Circle: PT MT CT ET

Phone: 206-529-3980
Fax: 206-529-3985

Client Project # 1413.001.05.601

Lab Project # PESENVSWA-ALP

SDG # L1146028

D188

Collected by (print): Chris Deker

Site/Facility ID #

P.O. #

Collected by (signature): Chris Deker

Immediately Packed on Ice N ___ Y X

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Date Results Needed

Quote #

Acctnum: PESENVSWA
Template: T134174
Prelogin: P731162
PM: 110 - Brian Ford
PB: 9.23.19Gm

Shipped Via: FedEX Ground

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	V8260C VOCs 40ml/NaHS04/Syr/MeOH	dry wt,voc screen 2ozClr-NoPres	Remarks	Sample # (lab only)
MW-302-5	Grab	SS	5 @	10/1/19	1005	2	X	X		-01
MW-302-10		SS	10		1010		X	X		02
MW-302-15		SS	15		1015		X	X		03
MW-302-20		SS	20		1020		X	X		04
MW-302-25		SS	25		1025		X	X		05
MW-302-30		SS	30		1030		X	X		06
MW-302-35		SS	35		1050		X	X		07
MW-302-40		SS	40		1055		X	X		08
MW-302-45		SS	45		1115		X	X		09
MW-302-50		SS	50		1120		X	X		10

Cn

* Matrix:
SS - Soil **AIR** - Air **F** - Filter
GW - Groundwater **B** - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____

Flow _____ Other _____

Samples returned via:
__ UPS ✓ FedEx __ Courier _____

Tracking # 1145 2227 2604

Sample Receipt Checklist
COC Seal Present/Intact: NP __Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: __Y __N
Preservation Correct/Checked: __Y __N
RAD Screen <0.5 mR/hr: __Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Chris Deker	10/2/19	1200	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)
			Cn

Trip Blank Received: Yes / No
HCl / MeOH
TBR

Temp: 0.3 °C Bottles Received: 28

2-2-1221

If preservation required by Login: Date/Time

Date: 10/3/19 Time: 8:45

Hold:

Condition: NCF / OK

PES Environmental, Inc.- WA

1215 Fourth Ave., Suite 1350
Seattle, WA 98161

Billing Information:
Attn: Accounts Payable
1215 Fourth Ave., Ste. 1350
Seattle, WA 98161

Pres Chk

Report to: Brian O'Neal/Bill Haldeman

Email To: boneal@pesenv.com; bhaldeman@pesenv.com;

Project Description: American Linen

City/State Collected: Seattle, WA

Please Circle: PT MT CT ET

Phone: 206-529-3980
Fax: 206-529-3985

Client Project # 1413.001.05.601

Lab Project # PESENVSWA-ALP

Collected by (print): Chris DeBoer

Site/Facility ID #

P.O. #

Collected by (signature): Chris DeBo

Immediately Packed on Ice N ___ Y X

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	V8260C VOCs 40ml/NaHS04/Syr/MeOH	dry wt,voc screen 2ozClr-NoPres	Remarks	Sample # (lab only)
MW-302-55	Grab	SS	55	10/1/19	1140	2	X	X		11
MW-302-60		SS	60		1145	2	X	X		12
MW-302-65		SS	65		1210	2	X	X		13
MW-2014-65		SS	65		1220	2	X	X		14
TB-100119	—	SS	—	—	—	1	X	X		15
		SS				6				
		SS								
		SS								
		SS								
		SS								

Chris DeBo 10/1/19

Chain of Custody Page 2 of 2

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

SDG # L1146028

Table #

Acctnum: PESENVSWA

Template: T134174

Prelogin: P731162

PM: 110 - Brian Ford

PB: 9-23-19 Em

Shipped Via: FedEX Ground

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____

Flow _____ Other _____

Samples returned via:
__ UPS V FedEx __ Courier _____

Tracking # Same

Sample Receipt Checklist
COC Seal Present/Intact: __NP V Y __N
COC Signed/Accurate: V Y __N
Bottles arrive intact: V Y __N
Correct bottles used: V Y __N
Sufficient volume sent: __Y __N
If Applicable
VOA Zero Headspace: __Y __N
Preservation Correct/Checked: __Y __N
RAD Screen <0.5 mR/hr: V Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR	
Chris DeBoer	10/2/19	1200			
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 2.2 °C	Bottles Received: 20
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/3/19	Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / OK

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 21, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1146788
Samples Received:	10/05/2019
Project Number:	1413.001.02.501E
Description:	American Linen
Site:	AMERICAN LINEN
Report To:	Brian O'Neal/Bill Haldeman
	1215 Fourth Ave., Suite 1350
	Seattle, WA 98161

Entire Report Reviewed By:

Brian Ford

Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

Cp: Cover Page 1
Tc: Table of Contents 2
Ss: Sample Summary 3
Cn: Case Narrative 6
Sr: Sample Results 7
MW-316-100219 L1146788-01 7
MW-324-100219 L1146788-02 9
MW-328-100219 L1146788-03 12
MW-327-100219 L1146788-04 15
MW-316-100319 L1146788-05 18
MW-315-100319 L1146788-06 19
MW-915-100319 L1146788-07 22
MW-325-100319 L1146788-08 24
MW-326-100319 L1146788-09 26
MW-329-100319 L1146788-10 28
TRIP BLANK L1146788-11 30
Qc: Quality Control Summary 32
Wet Chemistry by Method 2320 B-2011 32
Wet Chemistry by Method 9056A 33
Wet Chemistry by Method 9060A 35
Metals (ICPMS) by Method 6020B 36
Volatile Organic Compounds (GC) by Method RSK175 37
Volatile Organic Compounds (GC/MS) by Method 8260C 39
Gl: Glossary of Terms 46
Al: Accreditations & Locations 47
Sc: Sample Chain of Custody 48

MW-316-100219 L1146788-01 GW

Collected by: Ben Hecht | Collected date/time: 10/02/19 09:50 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362246	1	10/13/19 15:01	10/13/19 15:01	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1357983	1	10/05/19 16:50	10/05/19 16:50	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1361291	1	10/11/19 13:15	10/11/19 13:15	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1358528	5	10/08/19 09:49	10/09/19 10:59	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1360431	1	10/10/19 14:27	10/10/19 14:27	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 02:55	10/15/19 02:55	JHH	Mt. Juliet, TN

MW-324-100219 L1146788-02 GW

Collected by: Ben Hecht | Collected date/time: 10/02/19 12:15 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362246	1	10/13/19 15:08	10/13/19 15:08	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1357983	1	10/05/19 18:29	10/05/19 18:29	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1361291	1	10/11/19 13:39	10/11/19 13:39	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1358528	5	10/08/19 09:49	10/09/19 11:02	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1360431	1	10/10/19 14:31	10/10/19 14:31	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 03:16	10/15/19 03:16	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1363245	50	10/15/19 16:28	10/15/19 16:28	ACG	Mt. Juliet, TN

MW-328-100219 L1146788-03 GW

Collected by: Ben Hecht | Collected date/time: 10/02/19 14:15 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362246	1	10/13/19 15:16	10/13/19 15:16	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1357983	1	10/05/19 18:45	10/05/19 18:45	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1361291	1	10/11/19 14:02	10/11/19 14:02	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1358528	10	10/08/19 09:49	10/09/19 11:06	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1360431	1	10/10/19 14:33	10/10/19 14:33	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1361193	10	10/11/19 09:50	10/11/19 09:50	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 03:36	10/15/19 03:36	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1363245	1	10/15/19 16:48	10/15/19 16:48	ACG	Mt. Juliet, TN

MW-327-100219 L1146788-04 GW

Collected by: Ben Hecht | Collected date/time: 10/02/19 16:10 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362246	1	10/13/19 15:24	10/13/19 15:24	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1357983	1	10/05/19 19:01	10/05/19 19:01	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1361291	1	10/11/19 14:25	10/11/19 14:25	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1358528	10	10/08/19 09:49	10/09/19 11:09	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1360431	1	10/10/19 14:37	10/10/19 14:37	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1361193	10	10/11/19 09:56	10/11/19 09:56	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 03:57	10/15/19 03:57	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1363245	1	10/15/19 17:07	10/15/19 17:07	JHH	Mt. Juliet, TN

MW-316-100319 L1146788-05 GW

Collected by: Ben Hecht | Collected date/time: 10/03/19 08:15 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG1357983	1	10/05/19 19:18	10/05/19 19:18	ELN	Mt. Juliet, TN

MW-315-100319 L1146788-06 GW

Collected by: Ben Hecht | Collected date/time: 10/03/19 09:20 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362246	1	10/13/19 15:30	10/13/19 15:30	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1357983	1	10/05/19 19:34	10/05/19 19:34	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1361291	1	10/11/19 15:14	10/11/19 15:14	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1358528	1	10/08/19 09:49	10/09/19 00:25	JPD	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1358528	5	10/08/19 09:49	10/09/19 11:13	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1360431	1	10/10/19 14:40	10/10/19 14:40	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 04:18	10/15/19 04:18	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1363245	1	10/15/19 17:27	10/15/19 17:27	JHH	Mt. Juliet, TN

MW-915-100319 L1146788-07 GW

Collected by: Ben Hecht | Collected date/time: 10/03/19 10:10 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362246	1	10/13/19 15:38	10/13/19 15:38	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1357983	1	10/05/19 19:51	10/05/19 19:51	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1361291	1	10/11/19 15:37	10/11/19 15:37	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1358528	20	10/08/19 09:49	10/09/19 11:17	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1360431	1	10/10/19 14:44	10/10/19 14:44	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 04:39	10/15/19 04:39	JHH	Mt. Juliet, TN

MW-325-100319 L1146788-08 GW

Collected by: Ben Hecht | Collected date/time: 10/03/19 11:15 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362246	1	10/13/19 15:53	10/13/19 15:53	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1357983	1	10/05/19 20:07	10/05/19 20:07	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1357983	5	10/07/19 10:06	10/07/19 10:06	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1361291	1	10/11/19 17:36	10/11/19 17:36	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1358528	1	10/08/19 09:49	10/09/19 00:43	JPD	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1358528	5	10/08/19 09:49	10/09/19 11:20	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1360431	1	10/10/19 14:46	10/10/19 14:46	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 04:59	10/15/19 04:59	JHH	Mt. Juliet, TN

MW-326-100319 L1146788-09 GW

Collected by: Ben Hecht | Collected date/time: 10/03/19 12:30 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362246	1	10/13/19 16:00	10/13/19 16:00	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1357983	1	10/05/19 20:56	10/05/19 20:56	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1361291	1	10/11/19 17:55	10/11/19 17:55	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1358528	5	10/08/19 09:49	10/09/19 11:24	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1360431	1	10/10/19 14:49	10/10/19 14:49	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 05:20	10/15/19 05:20	JHH	Mt. Juliet, TN

MW-329-100319 L1146788-10 GW

Collected by: Ben Hecht | Collected date/time: 10/03/19 14:35 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362246	1	10/13/19 16:07	10/13/19 16:07	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1357983	1	10/05/19 14:53	10/05/19 14:53	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1361291	1	10/11/19 18:16	10/11/19 18:16	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1358528	20	10/08/19 09:49	10/09/19 11:28	JPD	Mt. Juliet, TN

MW-329-100319 L1146788-10 GW

Collected by: Ben Hecht
Collected date/time: 10/03/19 14:35
Received date/time: 10/05/19 08:45

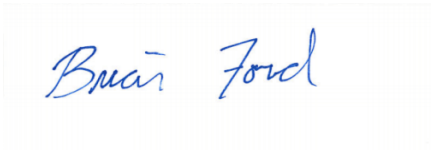
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC) by Method RSK175	WG1360431	1	10/10/19 14:51	10/10/19 14:51	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 05:41	10/15/19 05:41	JHH	Mt. Juliet, TN

TRIP BLANK L1146788-11 GW

Collected by: Ben Hecht
Collected date/time: 10/03/19 00:00
Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 01:32	10/15/19 01:32	JHH	Mt. Juliet, TN

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Sample Delivery Group (SDG) Narrative

VOC pH outside of method requirement.

Lab Sample ID	Project Sample ID	Method
L1146788-03	MW-328-100219	8260C

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	384000		2710	20000	1	10/13/2019 15:01	WG1362246

Sample Narrative:
L1146788-01 WG1362246: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	16900		51.9	1000	1	10/05/2019 16:50	WG1357983
Sulfate	41800		77.4	5000	1	10/05/2019 16:50	WG1357983

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	3780	B	102	1000	1	10/11/2019 13:15	WG1361291

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	2580		75.0	500	5	10/09/2019 10:59	WG1358528
Manganese	328		1.25	25.0	5	10/09/2019 10:59	WG1358528

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	143		0.287	0.678	1	10/10/2019 14:27	WG1360431
Ethane	U		0.296	1.29	1	10/10/2019 14:27	WG1360431
Ethene	U		0.422	1.27	1	10/10/2019 14:27	WG1360431

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	2.73	J J0	1.05	25.0	1	10/15/2019 02:55	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 02:55	WG1362918
Benzene	U		0.0896	0.500	1	10/15/2019 02:55	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 02:55	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 02:55	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 02:55	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 02:55	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 02:55	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 02:55	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 02:55	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 02:55	WG1362918
Carbon disulfide	0.485	J	0.101	0.500	1	10/15/2019 02:55	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 02:55	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 02:55	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 02:55	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 02:55	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 02:55	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 02:55	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 02:55	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 02:55	WG1362918
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 02:55	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 02:55	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 02:55	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 02:55	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 02:55	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 02:55	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 02:55	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 02:55	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 02:55	WG1362918
1,1-Dichloroethene	U		0.188	0.500	1	10/15/2019 02:55	WG1362918
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/15/2019 02:55	WG1362918
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/15/2019 02:55	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 02:55	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 02:55	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 02:55	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 02:55	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 02:55	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 02:55	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 02:55	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 02:55	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 02:55	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 02:55	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 02:55	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 02:55	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 02:55	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 02:55	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 02:55	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 02:55	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 02:55	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 02:55	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 02:55	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 02:55	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 02:55	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 02:55	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 02:55	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 02:55	WG1362918
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 02:55	WG1362918
Tetrachloroethene	U		0.199	0.500	1	10/15/2019 02:55	WG1362918
Toluene	0.570		0.412	0.500	1	10/15/2019 02:55	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 02:55	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 02:55	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 02:55	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 02:55	WG1362918
Trichloroethene	U		0.153	0.500	1	10/15/2019 02:55	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 02:55	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 02:55	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 02:55	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 02:55	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 02:55	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 02:55	WG1362918
Vinyl chloride	U		0.118	0.500	1	10/15/2019 02:55	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 02:55	WG1362918
(S) Toluene-d8	*102*			*80.0-120*		*10/15/2019 02:55*	WG1362918
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/15/2019 02:55*	WG1362918
(S) 1,2-Dichloroethane-d4	*109*			*70.0-130*		*10/15/2019 02:55*	WG1362918

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	587000		2710	20000	1	10/13/2019 15:08	WG1362246

Sample Narrative:
L1146788-02 WG1362246: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	20100		51.9	1000	1	10/05/2019 18:29	WG1357983
Nitrate	U	T8	22.7	100	1	10/05/2019 18:29	WG1357983
Sulfate	93100		77.4	5000	1	10/05/2019 18:29	WG1357983

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	13100		102	1000	1	10/11/2019 13:39	WG1361291

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	5740		75.0	500	5	10/09/2019 11:02	WG1358528
Manganese	374		1.25	25.0	5	10/09/2019 11:02	WG1358528

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	3340		0.287	0.678	1	10/10/2019 14:31	WG1360431
Ethane	13.4		0.296	1.29	1	10/10/2019 14:31	WG1360431
Ethene	22.4		0.422	1.27	1	10/10/2019 14:31	WG1360431

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	6.39	J J0	1.05	25.0	1	10/15/2019 03:16	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 03:16	WG1362918
Benzene	0.401	J	0.0896	0.500	1	10/15/2019 03:16	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 03:16	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 03:16	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 03:16	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 03:16	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 03:16	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 03:16	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 03:16	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 03:16	WG1362918
Carbon disulfide	5.63		0.101	0.500	1	10/15/2019 03:16	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 03:16	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 03:16	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 03:16	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 03:16	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 03:16	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 03:16	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 03:16	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 03:16	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 03:16	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 03:16	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 03:16	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 03:16	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 03:16	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 03:16	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 03:16	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 03:16	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 03:16	WG1362918
1,1-Dichloroethene	1.53		0.188	0.500	1	10/15/2019 03:16	WG1362918
cis-1,2-Dichloroethene	1550		4.67	25.0	50	10/15/2019 16:28	WG1363245
trans-1,2-Dichloroethene	3.21		0.152	0.500	1	10/15/2019 03:16	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 03:16	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 03:16	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 03:16	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 03:16	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 03:16	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 03:16	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 03:16	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 03:16	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 03:16	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 03:16	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 03:16	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 03:16	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 03:16	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 03:16	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 03:16	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 03:16	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 03:16	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 03:16	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 03:16	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 03:16	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 03:16	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 03:16	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 03:16	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 03:16	WG1362918
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 03:16	WG1362918
Tetrachloroethene	U		0.199	0.500	1	10/15/2019 03:16	WG1362918
Toluene	5.45		0.412	0.500	1	10/15/2019 03:16	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 03:16	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 03:16	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 03:16	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 03:16	WG1362918
Trichloroethene	0.642		0.153	0.500	1	10/15/2019 03:16	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 03:16	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 03:16	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 03:16	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 03:16	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 03:16	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 03:16	WG1362918
Vinyl chloride	61.9		0.118	0.500	1	10/15/2019 03:16	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 03:16	WG1362918
(S) Toluene-d8	*101*			*80.0-120*		*10/15/2019 03:16*	WG1362918
(S) Toluene-d8	*94.7*			*80.0-120*		*10/15/2019 16:28*	WG1363245
(S) 4-Bromofluorobenzene	*104*			*77.0-126*		*10/15/2019 03:16*	WG1362918
(S) 4-Bromofluorobenzene	*91.6*			*77.0-126*		*10/15/2019 16:28*	WG1363245

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*105*			*70.0-130*		*10/15/2019 03:16*	WG1362918
(S) 1,2-Dichloroethane-d4	*84.0*			*70.0-130*		*10/15/2019 16:28*	WG1363245

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	683000		2710	20000	1	10/13/2019 15:16	WG1362246

Sample Narrative:
L1146788-03 WG1362246: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	17700		51.9	1000	1	10/05/2019 18:45	WG1357983
Nitrate	U	T8	22.7	100	1	10/05/2019 18:45	WG1357983
Sulfate	787	J	77.4	5000	1	10/05/2019 18:45	WG1357983

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	8750		102	1000	1	10/11/2019 14:02	WG1361291

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	20300		150	1000	10	10/09/2019 11:06	WG1358528
Manganese	755		2.50	50.0	10	10/09/2019 11:06	WG1358528

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	23700		2.87	6.78	10	10/11/2019 09:50	WG1361193
Ethane	U		0.296	1.29	1	10/10/2019 14:33	WG1360431
Ethene	36.8		0.422	1.27	1	10/10/2019 14:33	WG1360431

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	2.16	J J0	1.05	25.0	1	10/15/2019 03:36	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 03:36	WG1362918
Benzene	17.0		0.0896	0.500	1	10/15/2019 03:36	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 03:36	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 03:36	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 03:36	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 03:36	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 03:36	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 03:36	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 03:36	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 03:36	WG1362918
Carbon disulfide	U		0.101	0.500	1	10/15/2019 03:36	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 03:36	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 03:36	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 03:36	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 03:36	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 03:36	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 03:36	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 03:36	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 03:36	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 03:36	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 03:36	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 03:36	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 03:36	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 03:36	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 03:36	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 03:36	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 03:36	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 03:36	WG1362918
1,1-Dichloroethene	U		0.188	0.500	1	10/15/2019 03:36	WG1362918
cis-1,2-Dichloroethene	1.26		0.0933	0.500	1	10/15/2019 16:48	WG1363245
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/15/2019 03:36	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 03:36	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 03:36	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 03:36	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 03:36	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 03:36	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 03:36	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 03:36	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 03:36	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 03:36	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 03:36	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 03:36	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 03:36	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 03:36	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 03:36	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 03:36	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 03:36	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 03:36	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 03:36	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 03:36	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 03:36	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 03:36	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 03:36	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 03:36	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 03:36	WG1362918
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 03:36	WG1362918
Tetrachloroethene	U		0.199	0.500	1	10/15/2019 03:36	WG1362918
Toluene	0.535		0.412	0.500	1	10/15/2019 03:36	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 03:36	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 03:36	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 03:36	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 03:36	WG1362918
Trichloroethene	U		0.153	0.500	1	10/15/2019 03:36	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 03:36	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 03:36	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 03:36	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 03:36	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 03:36	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 03:36	WG1362918
Vinyl chloride	23.3		0.118	0.500	1	10/15/2019 03:36	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 03:36	WG1362918
(S) Toluene-d8	*103*			*80.0-120*		*10/15/2019 03:36*	WG1362918
(S) Toluene-d8	*92.1*			*80.0-120*		*10/15/2019 16:48*	WG1363245
(S) 4-Bromofluorobenzene	*106*			*77.0-126*		*10/15/2019 03:36*	WG1362918
(S) 4-Bromofluorobenzene	*92.3*			*77.0-126*		*10/15/2019 16:48*	WG1363245

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*109*			*70.0-130*		*10/15/2019 03:36*	WG1362918
(S) 1,2-Dichloroethane-d4	*81.8*			*70.0-130*		*10/15/2019 16:48*	WG1363245

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	272000		2710	20000	1	10/13/2019 15:24	WG1362246

Sample Narrative:
L1146788-04 WG1362246: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	18400		51.9	1000	1	10/05/2019 19:01	WG1357983
Nitrate	U	T8	22.7	100	1	10/05/2019 19:01	WG1357983
Sulfate	U		77.4	5000	1	10/05/2019 19:01	WG1357983

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	4410	B	102	1000	1	10/11/2019 14:25	WG1361291

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	12400		150	1000	10	10/09/2019 11:09	WG1358528
Manganese	822		2.50	50.0	10	10/09/2019 11:09	WG1358528

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	18500		2.87	6.78	10	10/11/2019 09:56	WG1361193
Ethane	U		0.296	1.29	1	10/10/2019 14:37	WG1360431
Ethene	U		0.422	1.27	1	10/10/2019 14:37	WG1360431

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	2.99	J J0	1.05	25.0	1	10/15/2019 03:57	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 03:57	WG1362918
Benzene	U		0.0896	0.500	1	10/15/2019 03:57	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 03:57	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 03:57	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 03:57	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 03:57	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 03:57	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 03:57	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 03:57	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 03:57	WG1362918
Carbon disulfide	U		0.101	0.500	1	10/15/2019 03:57	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 03:57	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 03:57	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 03:57	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 03:57	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 03:57	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 03:57	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 03:57	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 03:57	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 03:57	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 03:57	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 03:57	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 03:57	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 03:57	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 03:57	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 03:57	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 03:57	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 03:57	WG1362918
1,1-Dichloroethene	U		0.188	0.500	1	10/15/2019 03:57	WG1362918
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/15/2019 17:07	WG1363245
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/15/2019 03:57	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 03:57	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 03:57	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 03:57	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 03:57	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 03:57	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 03:57	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 03:57	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 03:57	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 03:57	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 03:57	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 03:57	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 03:57	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 03:57	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 03:57	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 03:57	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 03:57	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 03:57	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 03:57	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 03:57	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 03:57	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 03:57	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 03:57	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 03:57	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 03:57	WG1362918
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 03:57	WG1362918
Tetrachloroethene	U		0.199	0.500	1	10/15/2019 03:57	WG1362918
Toluene	U		0.412	0.500	1	10/15/2019 03:57	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 03:57	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 03:57	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 03:57	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 03:57	WG1362918
Trichloroethene	U		0.153	0.500	1	10/15/2019 03:57	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 03:57	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 03:57	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 03:57	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 03:57	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 03:57	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 03:57	WG1362918
Vinyl chloride	U		0.118	0.500	1	10/15/2019 03:57	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 03:57	WG1362918
(S) Toluene-d8	*100*			*80.0-120*		*10/15/2019 03:57*	WG1362918
(S) Toluene-d8	*95.3*			*80.0-120*		*10/15/2019 17:07*	WG1363245
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/15/2019 03:57*	WG1362918
(S) 4-Bromofluorobenzene	*95.1*			*77.0-126*		*10/15/2019 17:07*	WG1363245

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*108*			*70.0-130*		*10/15/2019 03:57*	WG1362918
(S) 1,2-Dichloroethane-d4	*85.4*			*70.0-130*		*10/15/2019 17:07*	WG1363245

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Nitrate	U	T8	22.7	100	1	10/05/2019 19:18	WG1357983

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	325000		2710	20000	1	10/13/2019 15:30	WG1362246

Sample Narrative:
L1146788-06 WG1362246: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	11700		51.9	1000	1	10/05/2019 19:34	WG1357983
Nitrate	U	T8	22.7	100	1	10/05/2019 19:34	WG1357983
Sulfate	35000		77.4	5000	1	10/05/2019 19:34	WG1357983

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	3020	B	102	1000	1	10/11/2019 15:14	WG1361291

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	850		15.0	100	1	10/09/2019 00:25	WG1358528
Manganese	306		1.25	25.0	5	10/09/2019 11:13	WG1358528

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	124		0.287	0.678	1	10/10/2019 14:40	WG1360431
Ethane	U		0.296	1.29	1	10/10/2019 14:40	WG1360431
Ethene	U		0.422	1.27	1	10/10/2019 14:40	WG1360431

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	3.36	J J0	1.05	25.0	1	10/15/2019 04:18	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 04:18	WG1362918
Benzene	U		0.0896	0.500	1	10/15/2019 04:18	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 04:18	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 04:18	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 04:18	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 04:18	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 04:18	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 04:18	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 04:18	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 04:18	WG1362918
Carbon disulfide	U		0.101	0.500	1	10/15/2019 04:18	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 04:18	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 04:18	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 04:18	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 04:18	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 04:18	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 04:18	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 04:18	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 04:18	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 04:18	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 04:18	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 04:18	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 04:18	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 04:18	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 04:18	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 04:18	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 04:18	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 04:18	WG1362918
1,1-Dichloroethene	U		0.188	0.500	1	10/15/2019 04:18	WG1362918
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/15/2019 17:27	WG1363245
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/15/2019 04:18	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 04:18	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 04:18	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 04:18	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 04:18	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 04:18	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 04:18	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 04:18	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 04:18	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 04:18	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 04:18	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 04:18	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 04:18	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 04:18	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 04:18	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 04:18	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 04:18	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 04:18	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 04:18	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 04:18	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 04:18	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 04:18	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 04:18	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 04:18	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 04:18	WG1362918
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 04:18	WG1362918
Tetrachloroethene	U		0.199	0.500	1	10/15/2019 04:18	WG1362918
Toluene	U		0.412	0.500	1	10/15/2019 04:18	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 04:18	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 04:18	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 04:18	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 04:18	WG1362918
Trichloroethene	U		0.153	0.500	1	10/15/2019 04:18	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 04:18	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 04:18	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 04:18	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 04:18	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 04:18	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 04:18	WG1362918
Vinyl chloride	U		0.118	0.500	1	10/15/2019 04:18	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 04:18	WG1362918
(S) Toluene-d8	*101*			*80.0-120*		*10/15/2019 04:18*	WG1362918
(S) Toluene-d8	*95.9*			*80.0-120*		*10/15/2019 17:27*	WG1363245
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/15/2019 04:18*	WG1362918
(S) 4-Bromofluorobenzene	*94.3*			*77.0-126*		*10/15/2019 17:27*	WG1363245

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*109*			*70.0-130*		*10/15/2019 04:18*	WG1362918
(S) 1,2-Dichloroethane-d4	*83.9*			*70.0-130*		*10/15/2019 17:27*	WG1363245

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	589000		2710	20000	1	10/13/2019 15:38	WG1362246

Sample Narrative:
L1146788-07 WG1362246: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	56100		51.9	1000	1	10/05/2019 19:51	WG1357983
Nitrate	U	T8	22.7	100	1	10/05/2019 19:51	WG1357983
Sulfate	11400		77.4	5000	1	10/05/2019 19:51	WG1357983

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	5050	B	102	1000	1	10/11/2019 15:37	WG1361291

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	8060		300	2000	20	10/09/2019 11:17	WG1358528
Manganese	2260		5.00	100	20	10/09/2019 11:17	WG1358528

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	716		0.287	0.678	1	10/10/2019 14:44	WG1360431
Ethane	23.4		0.296	1.29	1	10/10/2019 14:44	WG1360431
Ethene	U		0.422	1.27	1	10/10/2019 14:44	WG1360431

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	3.08	J J0	1.05	25.0	1	10/15/2019 04:39	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 04:39	WG1362918
Benzene	0.215	J	0.0896	0.500	1	10/15/2019 04:39	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 04:39	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 04:39	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 04:39	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 04:39	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 04:39	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 04:39	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 04:39	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 04:39	WG1362918
Carbon disulfide	U		0.101	0.500	1	10/15/2019 04:39	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 04:39	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 04:39	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 04:39	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 04:39	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 04:39	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 04:39	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 04:39	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 04:39	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 04:39	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 04:39	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 04:39	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 04:39	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 04:39	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 04:39	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 04:39	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 04:39	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 04:39	WG1362918
1,1-Dichloroethene	U		0.188	0.500	1	10/15/2019 04:39	WG1362918
cis-1,2-Dichloroethene	9.26		0.0933	0.500	1	10/15/2019 04:39	WG1362918
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/15/2019 04:39	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 04:39	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 04:39	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 04:39	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 04:39	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 04:39	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 04:39	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 04:39	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 04:39	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 04:39	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 04:39	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 04:39	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 04:39	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 04:39	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 04:39	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 04:39	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 04:39	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 04:39	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 04:39	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 04:39	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 04:39	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 04:39	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 04:39	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 04:39	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 04:39	WG1362918
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 04:39	WG1362918
Tetrachloroethene	U		0.199	0.500	1	10/15/2019 04:39	WG1362918
Toluene	U		0.412	0.500	1	10/15/2019 04:39	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 04:39	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 04:39	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 04:39	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 04:39	WG1362918
Trichloroethene	U		0.153	0.500	1	10/15/2019 04:39	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 04:39	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 04:39	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 04:39	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 04:39	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 04:39	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 04:39	WG1362918
Vinyl chloride	29.2		0.118	0.500	1	10/15/2019 04:39	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 04:39	WG1362918
(S) Toluene-d8	*102*			*80.0-120*		*10/15/2019 04:39*	WG1362918
(S) 4-Bromofluorobenzene	*104*			*77.0-126*		*10/15/2019 04:39*	WG1362918
(S) 1,2-Dichloroethane-d4	*109*			*70.0-130*		*10/15/2019 04:39*	WG1362918

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	235000		2710	20000	1	10/13/2019 15:53	WG1362246

Sample Narrative:

L1146788-08 WG1362246: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	21500		51.9	1000	1	10/05/2019 20:07	WG1357983
Nitrate	788	T8	22.7	100	1	10/05/2019 20:07	WG1357983
Sulfate	112000		387	25000	5	10/07/2019 10:06	WG1357983

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	3280	B	102	1000	1	10/11/2019 17:36	WG1361291

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	701		15.0	100	1	10/09/2019 00:43	WG1358528
Manganese	865		1.25	25.0	5	10/09/2019 11:20	WG1358528

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	31.7		0.287	0.678	1	10/10/2019 14:46	WG1360431
Ethane	U		0.296	1.29	1	10/10/2019 14:46	WG1360431
Ethene	U		0.422	1.27	1	10/10/2019 14:46	WG1360431

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	1.57	J J0	1.05	25.0	1	10/15/2019 04:59	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 04:59	WG1362918
Benzene	U		0.0896	0.500	1	10/15/2019 04:59	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 04:59	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 04:59	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 04:59	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 04:59	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 04:59	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 04:59	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 04:59	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 04:59	WG1362918
Carbon disulfide	U		0.101	0.500	1	10/15/2019 04:59	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 04:59	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 04:59	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 04:59	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 04:59	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 04:59	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 04:59	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 04:59	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 04:59	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 04:59	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 04:59	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 04:59	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 04:59	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 04:59	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 04:59	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 04:59	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 04:59	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 04:59	WG1362918
1,1-Dichloroethene	U		0.188	0.500	1	10/15/2019 04:59	WG1362918
cis-1,2-Dichloroethene	0.607		0.0933	0.500	1	10/15/2019 04:59	WG1362918
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/15/2019 04:59	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 04:59	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 04:59	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 04:59	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 04:59	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 04:59	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 04:59	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 04:59	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 04:59	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 04:59	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 04:59	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 04:59	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 04:59	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 04:59	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 04:59	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 04:59	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 04:59	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 04:59	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 04:59	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 04:59	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 04:59	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 04:59	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 04:59	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 04:59	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 04:59	WG1362918
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 04:59	WG1362918
Tetrachloroethene	U		0.199	0.500	1	10/15/2019 04:59	WG1362918
Toluene	U		0.412	0.500	1	10/15/2019 04:59	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 04:59	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 04:59	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 04:59	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 04:59	WG1362918
Trichloroethene	U		0.153	0.500	1	10/15/2019 04:59	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 04:59	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 04:59	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 04:59	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 04:59	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 04:59	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 04:59	WG1362918
Vinyl chloride	U		0.118	0.500	1	10/15/2019 04:59	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 04:59	WG1362918
(S) Toluene-d8	*102*			*80.0-120*		*10/15/2019 04:59*	WG1362918
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/15/2019 04:59*	WG1362918
(S) 1,2-Dichloroethane-d4	*110*			*70.0-130*		*10/15/2019 04:59*	WG1362918

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	209000		2710	20000	1	10/13/2019 16:00	WG1362246

Sample Narrative:
L1146788-09 WG1362246: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	17100		51.9	1000	1	10/05/2019 20:56	WG1357983
Nitrate	U	T8	22.7	100	1	10/05/2019 20:56	WG1357983
Sulfate	89700		77.4	5000	1	10/05/2019 20:56	WG1357983

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	12900		102	1000	1	10/11/2019 17:55	WG1361291

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	2630		75.0	500	5	10/09/2019 11:24	WG1358528
Manganese	347		1.25	25.0	5	10/09/2019 11:24	WG1358528

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	99.4		0.287	0.678	1	10/10/2019 14:49	WG1360431
Ethane	25.0		0.296	1.29	1	10/10/2019 14:49	WG1360431
Ethene	8.23		0.422	1.27	1	10/10/2019 14:49	WG1360431

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	4.34	J J0	1.05	25.0	1	10/15/2019 05:20	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 05:20	WG1362918
Benzene	U		0.0896	0.500	1	10/15/2019 05:20	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 05:20	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 05:20	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 05:20	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 05:20	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 05:20	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 05:20	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 05:20	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 05:20	WG1362918
Carbon disulfide	4.09		0.101	0.500	1	10/15/2019 05:20	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 05:20	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 05:20	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 05:20	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 05:20	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 05:20	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 05:20	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 05:20	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 05:20	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 05:20	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 05:20	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 05:20	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 05:20	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 05:20	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 05:20	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 05:20	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 05:20	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 05:20	WG1362918
1,1-Dichloroethene	U		0.188	0.500	1	10/15/2019 05:20	WG1362918
cis-1,2-Dichloroethene	6.87		0.0933	0.500	1	10/15/2019 05:20	WG1362918
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/15/2019 05:20	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 05:20	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 05:20	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 05:20	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 05:20	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 05:20	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 05:20	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 05:20	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 05:20	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 05:20	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 05:20	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 05:20	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 05:20	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 05:20	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 05:20	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 05:20	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 05:20	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 05:20	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 05:20	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 05:20	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 05:20	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 05:20	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 05:20	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 05:20	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 05:20	WG1362918
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 05:20	WG1362918
Tetrachloroethene	0.769		0.199	0.500	1	10/15/2019 05:20	WG1362918
Toluene	1.31		0.412	0.500	1	10/15/2019 05:20	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 05:20	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 05:20	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 05:20	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 05:20	WG1362918
Trichloroethene	0.297	J	0.153	0.500	1	10/15/2019 05:20	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 05:20	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 05:20	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 05:20	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 05:20	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 05:20	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 05:20	WG1362918
Vinyl chloride	U		0.118	0.500	1	10/15/2019 05:20	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 05:20	WG1362918
(S) Toluene-d8	*103*			*80.0-120*		*10/15/2019 05:20*	WG1362918
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/15/2019 05:20*	WG1362918
(S) 1,2-Dichloroethane-d4	*109*			*70.0-130*		*10/15/2019 05:20*	WG1362918

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	581000		2710	20000	1	10/13/2019 16:07	WG1362246

Sample Narrative:
L1146788-10 WG1362246: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	56100		51.9	1000	1	10/05/2019 14:53	WG1357983
Nitrate	U	T8	22.7	100	1	10/05/2019 14:53	WG1357983
Sulfate	11400		77.4	5000	1	10/05/2019 14:53	WG1357983

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	4820	B	102	1000	1	10/11/2019 18:16	WG1361291

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	7710		300	2000	20	10/09/2019 11:28	WG1358528
Manganese	2210		5.00	100	20	10/09/2019 11:28	WG1358528

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	591		0.287	0.678	1	10/10/2019 14:51	WG1360431
Ethane	19.9		0.296	1.29	1	10/10/2019 14:51	WG1360431
Ethene	U		0.422	1.27	1	10/10/2019 14:51	WG1360431

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	3.15	J J0	1.05	25.0	1	10/15/2019 05:41	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 05:41	WG1362918
Benzene	0.206	J	0.0896	0.500	1	10/15/2019 05:41	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 05:41	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 05:41	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 05:41	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 05:41	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 05:41	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 05:41	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 05:41	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 05:41	WG1362918
Carbon disulfide	U		0.101	0.500	1	10/15/2019 05:41	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 05:41	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 05:41	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 05:41	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 05:41	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 05:41	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 05:41	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 05:41	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 05:41	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 05:41	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 05:41	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 05:41	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 05:41	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 05:41	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 05:41	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 05:41	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 05:41	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 05:41	WG1362918
1,1-Dichloroethene	U		0.188	0.500	1	10/15/2019 05:41	WG1362918
cis-1,2-Dichloroethene	9.25		0.0933	0.500	1	10/15/2019 05:41	WG1362918
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/15/2019 05:41	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 05:41	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 05:41	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 05:41	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 05:41	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 05:41	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 05:41	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 05:41	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 05:41	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 05:41	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 05:41	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 05:41	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 05:41	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 05:41	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 05:41	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 05:41	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 05:41	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 05:41	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 05:41	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 05:41	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 05:41	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 05:41	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 05:41	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 05:41	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 05:41	WG1362918
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 05:41	WG1362918
Tetrachloroethene	U		0.199	0.500	1	10/15/2019 05:41	WG1362918
Toluene	0.435	J	0.412	0.500	1	10/15/2019 05:41	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 05:41	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 05:41	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 05:41	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 05:41	WG1362918
Trichloroethene	U		0.153	0.500	1	10/15/2019 05:41	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 05:41	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 05:41	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 05:41	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 05:41	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 05:41	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 05:41	WG1362918
Vinyl chloride	28.8		0.118	0.500	1	10/15/2019 05:41	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 05:41	WG1362918
(S) Toluene-d8	*102*			*80.0-120*		*10/15/2019 05:41*	WG1362918
(S) 4-Bromofluorobenzene	*104*			*77.0-126*		*10/15/2019 05:41*	WG1362918
(S) 1,2-Dichloroethane-d4	*108*			*70.0-130*		*10/15/2019 05:41*	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.20	J J0	1.05	25.0	1	10/15/2019 01:32	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 01:32	WG1362918
Benzene	U		0.0896	0.500	1	10/15/2019 01:32	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 01:32	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 01:32	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 01:32	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 01:32	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 01:32	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 01:32	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 01:32	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 01:32	WG1362918
Carbon disulfide	U		0.101	0.500	1	10/15/2019 01:32	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 01:32	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 01:32	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 01:32	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 01:32	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 01:32	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 01:32	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 01:32	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 01:32	WG1362918
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 01:32	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 01:32	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 01:32	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 01:32	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 01:32	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 01:32	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 01:32	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 01:32	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 01:32	WG1362918
1,1-Dichloroethene	U		0.188	0.500	1	10/15/2019 01:32	WG1362918
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/15/2019 01:32	WG1362918
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/15/2019 01:32	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 01:32	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 01:32	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 01:32	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 01:32	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 01:32	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 01:32	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 01:32	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 01:32	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 01:32	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 01:32	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 01:32	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 01:32	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 01:32	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 01:32	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 01:32	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 01:32	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 01:32	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 01:32	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 01:32	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 01:32	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 01:32	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 01:32	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 01:32	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 01:32	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 01:32	WG1362918
Tetrachloroethene	U		0.199	0.500	1	10/15/2019 01:32	WG1362918
Toluene	U		0.412	0.500	1	10/15/2019 01:32	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 01:32	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 01:32	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 01:32	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 01:32	WG1362918
Trichloroethene	U		0.153	0.500	1	10/15/2019 01:32	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 01:32	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 01:32	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 01:32	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 01:32	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 01:32	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 01:32	WG1362918
Vinyl chloride	U		0.118	0.500	1	10/15/2019 01:32	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 01:32	WG1362918
(S) Toluene-d8	*103*			*80.0-120*		*10/15/2019 01:32*	WG1362918
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/15/2019 01:32*	WG1362918
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*		*10/15/2019 01:32*	WG1362918

Method Blank (MB)

(MB) R3460555-1 10/13/19 14:18

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Alkalinity	3920	J	2710	20000

Sample Narrative:

BLANK: Endpoint pH 4.5

L1148858-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1148858-01 10/13/19 14:37 • (DUP) R3460555-2 10/13/19 14:46

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	107000	102000	1	5.08		20

Sample Narrative:

OS: Endpoint pH 4.5 HEADSPACE

DUP: Endpoint pH 4.5

L1146788-10 Original Sample (OS) • Duplicate (DUP)

(OS) L1146788-10 10/13/19 16:07 • (DUP) R3460555-4 10/13/19 16:14

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	581000	583000	1	0.486		20

Sample Narrative:

OS: Endpoint pH 4.5

DUP: Endpoint pH 4.5

Laboratory Control Sample (LCS)

(LCS) R3460555-3 10/13/19 15:45

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Alkalinity	100000	114000	114	85.0-115	

Sample Narrative:

LCS: Endpoint pH 4.5

Method Blank (MB)

(MB) R3458346-1 10/05/19 10:33

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	52.6	J	51.9	1000
Nitrate	U		22.7	100
Sulfate	U		77.4	5000

L1146788-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1146788-01 10/05/19 16:50 • (DUP) R3458346-3 10/05/19 17:39

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	16900	16700	1	1.16		15
Nitrate	U	0.000	1	0.000		15
Sulfate	41800	41700	1	0.239		15

L1146810-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1146810-06 10/06/19 00:46 • (DUP) R3458346-6 10/06/19 01:03

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	3060	2940	1	4.00		15
Nitrate	42.4	53.0	1	22.2	J P1	15
Sulfate	36500	36400	1	0.159		15

Laboratory Control Sample (LCS)

(LCS) R3458346-2 10/05/19 10:49

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	39300	98.1	80.0-120	
Nitrate	8000	8010	100	80.0-120	
Sulfate	40000	40300	101	80.0-120	

L1146788-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1146788-01 10/05/19 16:50 • (MS) R3458346-4 10/05/19 17:56 • (MSD) R3458346-5 10/05/19 18:12

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	16900	66400	66500	99.1	99.2	1	80.0-120			0.0724	15
Nitrate	5000	U	5080	5060	102	101	1	80.0-120			0.418	15
Sulfate	50000	41800	90100	89900	96.5	96.2	1	80.0-120			0.193	15

L1146810-06 Original Sample (OS) • Matrix Spike (MS)

(OS) L1146810-06 10/06/19 00:46 • (MS) R3458346-7 10/06/19 01:19

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	3060	53200	100	1	80.0-120	
Nitrate	5000	42.4	5140	102	1	80.0-120	
Sulfate	50000	36500	84600	96.3	1	80.0-120	

Method Blank (MB)

(MB) R3460404-1 10/11/19 11:54

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
TOC (Total Organic Carbon)	726	J	102	1000

L1146788-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1146788-04 10/11/19 14:25 • (DUP) R3460404-3 10/11/19 14:49

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	4410	4470	1	1.31		20

L1146896-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1146896-01 10/11/19 20:21 • (DUP) R3460404-6 10/11/19 20:46

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	62700	62900	2	0.318		20

Laboratory Control Sample (LCS)

(LCS) R3460404-2 10/11/19 12:41

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TOC (Total Organic Carbon)	75000	76900	103	85.0-115	

L1146788-10 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1146788-10 10/11/19 18:16 • (MS) R3460404-4 10/11/19 18:40 • (MSD) R3460404-5 10/11/19 19:08

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	4820	54600	55200	99.6	101	1	80.0-120			1.09	20

L1146896-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1146896-07 10/12/19 10:18 • (MS) R3460404-7 10/12/19 10:41 • (MSD) R3460404-8 10/12/19 11:03

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	1340000	2280000	2270000	94.2	92.3	20	80.0-120	E	E	0.835	20

Method Blank (MB)

(MB) R3459091-1 10/08/19 22:49

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Iron	U		15.0	100
Manganese	1.51	J	0.250	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3459091-2 10/08/19 22:53 • (LCSD) R3459091-3 10/08/19 22:58

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Iron	5000	5030	5020	101	100	80.0-120			0.0752	20
Manganese	50.0	51.2	50.2	102	100	80.0-120			2.04	20

L1146802-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1146802-01 10/08/19 23:02 • (MS) R3459091-5 10/08/19 23:12 • (MSD) R3459091-6 10/08/19 23:16

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Iron	5000	758	6010	5870	105	102	1	75.0-125			2.38	20
Manganese	50.0	469	516	506	94.5	75.1	1	75.0-125			1.90	20

Method Blank (MB)

(MB) R3459838-1 10/10/19 14:23

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1146788-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1146788-01 10/10/19 14:27 • (DUP) R3459838-2 10/10/19 15:25

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Methane	143	146	1	1.82		20
Ethane	U	0.000	1	0.000		20
Ethene	U	0.000	1	0.000		20

L1146817-09 Original Sample (OS) • Duplicate (DUP)

(OS) L1146817-09 10/10/19 15:44 • (DUP) R3459838-3 10/10/19 16:10

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Methane	2700	2760	1	2.09		20
Ethane	105	111	1	5.19		20
Ethene	74.8	76.4	1	2.00		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3459838-4 10/10/19 16:16 • (LCSD) R3459838-5 10/10/19 16:20

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Methane	67.8	73.3	74.3	108	110	85.0-115			1.34	20
Ethane	129	131	129	102	100	85.0-115			1.59	20
Ethene	127	139	135	109	107	85.0-115			2.51	20

Method Blank (MB)

(MB) R3460084-1 10/11/19 09:46

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678

L1146788-03 Original Sample (OS) • Duplicate (DUP)

(OS) L1146788-03 10/11/19 09:50 • (DUP) R3460084-2 10/11/19 10:53

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	23700	24600	10	3.69		20

L1147284-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1147284-04 10/11/19 11:38 • (DUP) R3460084-3 10/11/19 11:40

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	ND	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3460084-4 10/11/19 11:43 • (LCSD) R3460084-5 10/11/19 11:47

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	72.9	71.7	107	106	85.0-115			1.58	20

Method Blank (MB)

(MB) R3461125-3 10/15/19 00:15

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3461125-3 10/15/19 00:15

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*102*			*80.0-120*
(S) 4-Bromofluorobenzene	*102*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*104*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461125-1 10/14/19 22:32 • (LCSD) R3461125-2 10/14/19 22:52

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	125	159	154	127	123	19.0-160			3.19	27
Acrylonitrile	125	139	138	111	110	55.0-149			0.722	20
Benzene	25.0	24.1	24.1	96.4	96.4	70.0-123			0.000	20
Bromobenzene	25.0	23.9	23.9	95.6	95.6	73.0-121			0.000	20
Bromodichloromethane	25.0	27.3	27.2	109	109	75.0-120			0.367	20
Bromochloromethane	25.0	26.0	26.0	104	104	76.0-122			0.000	20
Bromoform	25.0	25.7	25.7	103	103	68.0-132			0.000	20
Bromomethane	25.0	25.0	24.3	100	97.2	10.0-160			2.84	25
n-Butylbenzene	25.0	25.7	26.8	103	107	73.0-125			4.19	20
sec-Butylbenzene	25.0	25.0	25.2	100	101	75.0-125			0.797	20
tert-Butylbenzene	25.0	25.6	25.5	102	102	76.0-124			0.391	20
Carbon disulfide	25.0	21.6	21.4	86.4	85.6	61.0-128			0.930	20
Carbon tetrachloride	25.0	28.4	28.7	114	115	68.0-126			1.05	20
Chlorobenzene	25.0	24.2	24.1	96.8	96.4	80.0-121			0.414	20
Chlorodibromomethane	25.0	22.8	22.5	91.2	90.0	77.0-125			1.32	20
Chloroethane	25.0	25.1	25.3	100	101	47.0-150			0.794	20
Chloroform	25.0	25.7	25.5	103	102	73.0-120			0.781	20
Chloromethane	25.0	29.0	28.0	116	112	41.0-142			3.51	20
2-Chlorotoluene	25.0	24.6	24.3	98.4	97.2	76.0-123			1.23	20
4-Chlorotoluene	25.0	24.9	24.7	99.6	98.8	75.0-122			0.806	20
1,2-Dibromo-3-Chloropropane	25.0	24.0	24.7	96.0	98.8	58.0-134			2.87	20
1,2-Dibromoethane	25.0	24.7	24.1	98.8	96.4	80.0-122			2.46	20
Dibromomethane	25.0	27.8	27.4	111	110	80.0-120			1.45	20
1,2-Dichlorobenzene	25.0	25.6	25.4	102	102	79.0-121			0.784	20
1,3-Dichlorobenzene	25.0	25.0	24.8	100	99.2	79.0-120			0.803	20
1,4-Dichlorobenzene	25.0	25.0	24.7	100	98.8	79.0-120			1.21	20
Dichlorodifluoromethane	25.0	30.2	28.3	121	113	51.0-149			6.50	20
1,1-Dichloroethane	25.0	26.3	26.3	105	105	70.0-126			0.000	20
1,2-Dichloroethane	25.0	26.1	25.9	104	104	70.0-128			0.769	20
1,1-Dichloroethene	25.0	25.1	25.1	100	100	71.0-124			0.000	20
cis-1,2-Dichloroethene	25.0	24.9	25.2	99.6	101	73.0-120			1.20	20
trans-1,2-Dichloroethene	25.0	23.4	23.4	93.6	93.6	73.0-120			0.000	20
1,2-Dichloropropane	25.0	26.5	26.7	106	107	77.0-125			0.752	20
1,1-Dichloropropene	25.0	26.4	26.1	106	104	74.0-126			1.14	20
1,3-Dichloropropane	25.0	23.6	23.4	94.4	93.6	80.0-120			0.851	20
cis-1,3-Dichloropropene	25.0	27.3	27.1	109	108	80.0-123			0.735	20
trans-1,3-Dichloropropene	25.0	25.3	25.3	101	101	78.0-124			0.000	20
trans-1,4-Dichloro-2-butene	25.0	25.3	24.9	101	99.6	33.0-144			1.59	20
2,2-Dichloropropane	25.0	25.4	24.8	102	99.2	58.0-130			2.39	20
Di-isopropyl ether	25.0	27.7	27.5	111	110	58.0-138			0.725	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461125-1 10/14/19 22:32 • (LCSD) R3461125-2 10/14/19 22:52

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	25.0	23.8	23.6	95.2	94.4	79.0-123			0.844	20
Hexachloro-1,3-butadiene	25.0	24.2	27.4	96.8	110	54.0-138			12.4	20
2-Hexanone	125	133	130	106	104	67.0-149			2.28	20
n-Hexane	25.0	25.9	25.6	104	102	57.0-133			1.17	20
Iodomethane	125	125	124	100	99.2	33.0-147			0.803	26
Isopropylbenzene	25.0	25.2	24.7	101	98.8	76.0-127			2.00	20
p-Isopropyltoluene	25.0	26.0	26.3	104	105	76.0-125			1.15	20
2-Butanone (MEK)	125	153	151	122	121	44.0-160			1.32	20
Methylene Chloride	25.0	23.6	24.0	94.4	96.0	67.0-120			1.68	20
4-Methyl-2-pentanone (MIBK)	125	136	134	109	107	68.0-142			1.48	20
Methyl tert-butyl ether	25.0	26.0	25.6	104	102	68.0-125			1.55	20
Naphthalene	25.0	23.8	26.4	95.2	106	54.0-135			10.4	20
n-Propylbenzene	25.0	24.2	24.1	96.8	96.4	77.0-124			0.414	20
Styrene	25.0	26.2	25.7	105	103	73.0-130			1.93	20
1,1,1,2-Tetrachloroethane	25.0	25.3	25.1	101	100	75.0-125			0.794	20
1,1,2,2-Tetrachloroethane	25.0	23.4	23.1	93.6	92.4	65.0-130			1.29	20
1,1,2-Trichlorotrifluoroethane	25.0	25.2	24.7	101	98.8	69.0-132			2.00	20
Tetrachloroethene	25.0	24.7	24.5	98.8	98.0	72.0-132			0.813	20
Toluene	25.0	23.2	23.0	92.8	92.0	79.0-120			0.866	20
1,2,3-Trichlorobenzene	25.0	25.8	28.8	103	115	50.0-138			11.0	20
1,2,4-Trichlorobenzene	25.0	25.3	27.3	101	109	57.0-137			7.60	20
1,1,1-Trichloroethane	25.0	28.0	27.5	112	110	73.0-124			1.80	20
1,1,2-Trichloroethane	25.0	23.9	23.9	95.6	95.6	80.0-120			0.000	20
Trichloroethene	25.0	27.4	27.6	110	110	78.0-124			0.727	20
Trichlorofluoromethane	25.0	30.7	29.7	123	119	59.0-147			3.31	20
1,2,3-Trichloropropane	25.0	25.1	23.9	100	95.6	73.0-130			4.90	20
1,2,4-Trimethylbenzene	25.0	24.0	23.4	96.0	93.6	76.0-121			2.53	20
1,2,3-Trimethylbenzene	25.0	24.5	24.4	98.0	97.6	77.0-120			0.409	20
1,3,5-Trimethylbenzene	25.0	25.0	24.9	100	99.6	76.0-122			0.401	20
Vinyl acetate	125	124	118	99.2	94.4	11.0-160			4.96	20
Vinyl chloride	25.0	27.8	27.5	111	110	67.0-131			1.08	20
Xylenes, Total	75.0	72.2	71.3	96.3	95.1	79.0-123			1.25	20
(S) Toluene-d8				*96.2*	*96.7*	*80.0-120*				
(S) 4-Bromofluorobenzene				*101*	*101*	*77.0-126*				
(S) 1,2-Dichloroethane-d4				*112*	*113*	*70.0-130*				

L1148487-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148487-01 10/15/19 07:24 • (MS) R3461125-4 10/15/19 09:50 • (MSD) R3461125-5 10/15/19 10:11

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Acetone	125	7.11	156	159	119	122	1	10.0-160			1.90	35
Acrylonitrile	125	U	144	140	115	112	1	21.0-160			2.82	32
Benzene	25.0	U	24.7	22.9	98.8	91.6	1	17.0-158			7.56	27
Bromobenzene	25.0	U	23.1	22.5	92.4	90.0	1	30.0-149			2.63	28
Bromodichloromethane	25.0	U	28.2	26.5	113	106	1	31.0-150			6.22	27
Bromochloromethane	25.0	U	26.7	25.3	107	101	1	38.0-142			5.38	26
Bromoform	25.0	U	27.5	26.6	110	106	1	29.0-150			3.33	29
Bromomethane	25.0	U	25.0	22.4	100	89.6	1	10.0-160			11.0	38
n-Butylbenzene	25.0	U	26.3	26.3	105	105	1	31.0-150			0.000	30
sec-Butylbenzene	25.0	U	25.7	25.1	103	100	1	33.0-155			2.36	29
tert-Butylbenzene	25.0	U	26.1	25.2	104	101	1	34.0-153			3.51	28
Carbon disulfide	25.0	U	23.3	20.7	93.2	82.8	1	10.0-156			11.8	28
Carbon tetrachloride	25.0	U	31.0	28.0	124	112	1	23.0-159			10.2	28
Chlorobenzene	25.0	U	25.6	24.2	102	96.8	1	33.0-152			5.62	27
Chlorodibromomethane	25.0	U	24.3	23.3	97.2	93.2	1	37.0-149			4.20	27
Chloroethane	25.0	U	25.9	23.6	104	94.4	1	10.0-160			9.29	30
Chloroform	25.0	1.01	27.4	25.2	106	96.8	1	29.0-154			8.37	28
Chloromethane	25.0	U	27.1	24.2	108	96.8	1	10.0-160			11.3	29
2-Chlorotoluene	25.0	U	24.3	23.4	97.2	93.6	1	32.0-153			3.77	28
4-Chlorotoluene	25.0	U	24.3	23.5	97.2	94.0	1	32.0-150			3.35	28
1,2-Dibromo-3-Chloropropane	25.0	U	24.5	25.5	98.0	102	1	22.0-151			4.00	34
1,2-Dibromoethane	25.0	U	25.4	24.3	102	97.2	1	34.0-147			4.43	27
Dibromomethane	25.0	U	28.0	27.4	112	110	1	30.0-151			2.17	27
1,2-Dichlorobenzene	25.0	U	25.4	25.1	102	100	1	34.0-149			1.19	28
1,3-Dichlorobenzene	25.0	U	24.5	24.0	98.0	96.0	1	36.0-146			2.06	27
1,4-Dichlorobenzene	25.0	U	25.3	24.4	101	97.6	1	35.0-142			3.62	27
Dichlorodifluoromethane	25.0	U	32.0	26.6	128	106	1	10.0-160			18.4	29
1,1-Dichloroethane	25.0	U	27.6	25.3	110	101	1	25.0-158			8.70	27
1,2-Dichloroethane	25.0	U	27.0	25.4	108	102	1	29.0-151			6.11	27
1,1-Dichloroethene	25.0	U	27.0	24.0	108	96.0	1	11.0-160			11.8	29
cis-1,2-Dichloroethene	25.0	0.302	26.2	24.2	104	95.6	1	10.0-160			7.94	27
trans-1,2-Dichloroethene	25.0	U	24.6	22.2	98.4	88.8	1	17.0-153			10.3	27
1,2-Dichloropropane	25.0	0.512	27.4	25.7	108	101	1	30.0-156			6.40	27
1,1-Dichloropropene	25.0	U	28.3	25.6	113	102	1	25.0-158			10.0	27
1,3-Dichloropropane	25.0	U	24.2	24.2	96.8	96.8	1	38.0-147			0.000	27
cis-1,3-Dichloropropene	25.0	U	27.2	25.6	109	102	1	34.0-149			6.06	28
trans-1,3-Dichloropropene	25.0	U	26.7	25.5	107	102	1	32.0-149			4.60	28
trans-1,4-Dichloro-2-butene	25.0	U	23.6	23.9	94.4	95.6	1	10.0-157			1.26	37
2,2-Dichloropropane	25.0	U	26.0	23.0	104	92.0	1	24.0-152			12.2	29
Di-isopropyl ether	25.0	U	28.5	27.1	114	108	1	21.0-160			5.04	28

L1148487-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148487-01 10/15/19 07:24 • (MS) R3461125-4 10/15/19 09:50 • (MSD) R3461125-5 10/15/19 10:11

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	25.0	U	25.2	23.7	101	94.8	1	30.0-155			6.13	27
Hexachloro-1,3-butadiene	25.0	U	25.4	27.4	102	110	1	20.0-154			7.58	34
2-Hexanone	125	U	138	133	110	106	1	21.0-160			3.69	29
n-Hexane	25.0	U	27.8	25.9	111	104	1	10.0-153			7.08	28
Iodomethane	125	U	130	118	104	94.4	1	10.0-160			9.68	40
Isopropylbenzene	25.0	U	27.3	25.7	109	103	1	28.0-157			6.04	27
p-Isopropyltoluene	25.0	U	26.3	25.8	105	103	1	30.0-154			1.92	29
2-Butanone (MEK)	125	U	158	154	126	123	1	10.0-160			2.56	32
Methylene Chloride	25.0	U	24.3	22.5	97.2	90.0	1	23.0-144			7.69	28
4-Methyl-2-pentanone (MIBK)	125	U	141	138	113	110	1	29.0-160			2.15	29
Methyl tert-butyl ether	25.0	U	26.1	25.3	104	101	1	28.0-150			3.11	29
Naphthalene	25.0	U	24.5	26.7	98.0	107	1	12.0-156			8.59	35
n-Propylbenzene	25.0	U	24.2	23.1	96.8	92.4	1	31.0-154			4.65	28
Styrene	25.0	U	27.3	25.8	109	103	1	33.0-155			5.65	28
1,1,1,2-Tetrachloroethane	25.0	U	27.2	25.9	109	104	1	36.0-151			4.90	29
1,1,2,2-Tetrachloroethane	25.0	U	24.4	24.7	97.6	98.8	1	33.0-150			1.22	28
1,1,2-Trichlorotrifluoroethane	25.0	U	27.2	24.5	109	98.0	1	23.0-160			10.4	30
Tetrachloroethene	25.0	U	27.1	24.8	108	99.2	1	10.0-160			8.86	27
Toluene	25.0	U	24.7	22.9	98.8	91.6	1	26.0-154			7.56	28
1,2,3-Trichlorobenzene	25.0	U	26.4	28.6	106	114	1	17.0-150			8.00	36
1,2,4-Trichlorobenzene	25.0	U	25.5	26.6	102	106	1	24.0-150			4.22	33
1,1,1-Trichloroethane	25.0	0.232	30.3	27.2	120	108	1	23.0-160			10.8	28
1,1,2-Trichloroethane	25.0	U	25.2	24.1	101	96.4	1	35.0-147			4.46	27
Trichloroethene	25.0	2.14	29.6	27.2	110	100	1	10.0-160			8.45	25
Trichlorofluoromethane	25.0	U	33.7	30.2	135	121	1	17.0-160			11.0	31
1,2,3-Trichloropropane	25.0	U	24.0	23.5	96.0	94.0	1	34.0-151			2.11	29
1,2,4-Trimethylbenzene	25.0	U	23.8	23.1	95.2	92.4	1	26.0-154			2.99	27
1,2,3-Trimethylbenzene	25.0	U	24.7	23.9	98.8	95.6	1	32.0-149			3.29	28
1,3,5-Trimethylbenzene	25.0	U	24.7	24.1	98.8	96.4	1	28.0-153			2.46	27
Vinyl acetate	125	U	163	157	130	126	1	12.0-160			3.75	31
Vinyl chloride	25.0	0.139	28.8	25.4	115	101	1	10.0-160			12.5	27
Xylenes, Total	75.0	U	76.4	71.4	102	95.2	1	29.0-154			6.77	28
(S) Toluene-d8					*100*	*99.9*		*80.0-120*				
(S) 4-Bromofluorobenzene					*105*	*105*		*77.0-126*				
(S) 1,2-Dichloroethane-d4					*118*	*114*		*70.0-130*				

Method Blank (MB)

(MB) R3461296-3 10/15/19 10:02

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
cis-1,2-Dichloroethene	U		0.0933	0.500
(S) Toluene-d8	*94.7*			*80.0-120*
(S) 4-Bromofluorobenzene	*93.1*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*85.2*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461296-1 10/15/19 09:03 • (LCSD) R3461296-2 10/15/19 09:23

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
cis-1,2-Dichloroethene	25.0	25.8	26.4	103	106	73.0-120			2.30	20
(S) Toluene-d8				*93.5*	*93.1*	*80.0-120*				
(S) 4-Bromofluorobenzene				*95.6*	*94.6*	*77.0-126*				
(S) 1,2-Dichloroethane-d4				*85.9*	*81.0*	*70.0-130*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J0	J0: The identification of the analyte is acceptable, but the reported concentration is an estimate. The calibration met method criteria.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
T8	Sample(s) received past/too close to holding time expiration.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

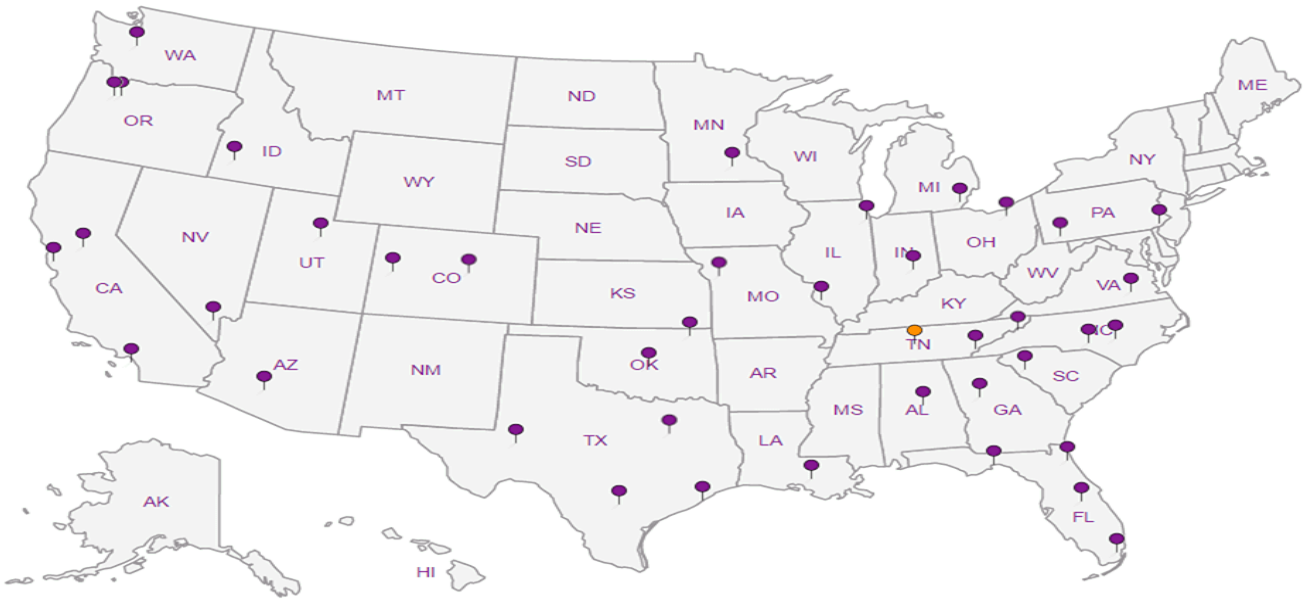
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



PES Environmental, Inc.- WA

1215 Fourth Ave., Suite 1350
Seattle, WA 98161

Billing Information:
Attn: Accounts Payable
1215 Fourth Ave., Ste. 1350
Seattle, WA 98161

Report to: Brian O'Neal/Bill Haldeman

Email To: boneal@pesenv.com; bhaldeman@pesenv.com; KVIK@PESENV.COM

Project Description: American Linen

City/State Collected: Seattle, WA

Please Circle: PT MT CT ET

Phone: 206-529-3980
Fax: 206-529-3985

Client Project # 1413.001.02.SOI E

Lab Project # PESENVSWA-ALP

Collected by (print): Ben Hecht

Site/Facility ID # American Linen

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y ___

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Pres Chk: <2

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	*NO3,SO4,Cl* 125mlHDPE-NoPres	Alkalinity 125mlHDPE-NoPres	EEM RSK175LL 40mlAmb-HCl	TOC 250mlAmb-HCl (BH)	Total Fe, Mn 6020 250mlHDPE-HNO3	VOCs 8260LLC 40mlAmb-HCl	Remarks	Sample # (lab only)
MW-316-100219	Grab	GW	64	10/2/19	0950	9	X	X	X	X	X	X	No TOC (BH)	NO3 -01
MW-324-100219		GW	71		1215	9	X	X	X		X	X	~~2 vials for NO3~~	-02
MW-328-100219		GW	70		1415	9	X	X	X		X	X	use (BH)	-03
MW-327-100219		GW	35		1610	9	X	X	X		X	X		-04
MW-316-100319	Grab	GW	64	10/3/19	0815	1	X						NO3	-05
MW-315-100319		GW	42		0920	9	X	X	X		X	X		-06
MW-915-100319		GW	105		1010	9	X	X	X		X	X		-07
MW-325-100319		GW	39		1115	9	X	X	X		X	X		-08
MW-326-100319		GW	94.5		1230	9	X	X	X		X	X		-09
MW-329-100319		GW	105		1435	9	X	X	X		X	X		-10

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks: TRIP BLANK to be analyzed for VOC 8260

pH _____ Temp _____

Flow _____ Other _____

Samples returned via: __ UPS __ FedEx __ Courier _____

Tracking # 1145 2227 3465

Relinquished by : (Signature) — Date: 10-3-19 — Time: 1610 — Received by: (Signature)

Trip Blank Received: (Yes) No (HCL) / MeoH TBR

Relinquished by : (Signature) — Date: — Time: — Received by: (Signature)

Temp: 0.9+.1=1.0 °C Bottles Received: 83

If preservation required by Login: Date/Time

Relinquished by : (Signature) — Date: — Time: — Received for lab by: (Signature) Deborah Pinkston — Date: 10/5/19 — Time: 8:45

Hold: — Condition: NCF / (OK)

Sample Receipt Checklist

COC Seal Present/Intact:	NP	Y N
COC Signed/Accurate:		(Y) N
Bottles arrive intact:		(Y) N
Correct bottles used:		(Y) N
Sufficient volume sent:		(Y) N
If Applicable		
VOA Zero Headspace:		(Y) N
Preservation Correct/Checked:		(Y) N
RAD Screen <0.5 mR/hr:		(Y) N

Chain of Custody Page ___ of ___

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

SDG # L1146788

J234

Acctnum: PESENVSWA

Template: T155685

Prelogin: P729671

PM: 110 - Brian Ford

PB: 9/12/19

Shipped Via: FedEX Ground

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 17, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1147020
Samples Received:	10/05/2019
Project Number:	1413.001.05.601
Description:	American Linen
Site:	SEATTLE WA 700 DEXTER AVE N.
Report To:	Brian O'Neal/Bill Haldeman 1215 Fourth Ave., Suite 1350 Seattle, WA 98161

Entire Report Reviewed By:

Brian Ford

Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

Cp: Cover Page 1
Tc: Table of Contents 2
Ss: Sample Summary 3
Cn: Case Narrative 7
Sr: Sample Results 8
MW-304-5 L1147020-01 8
MW-304-10 L1147020-02 10
MW-304-15 L1147020-03 12
MW-304-20 L1147020-04 14
MW-304-25 L1147020-05 16
MW-304-30 L1147020-06 18
MW-304-40 L1147020-07 20
MW-304-45 L1147020-08 22
MW-304-50 L1147020-09 24
MW-304-55 L1147020-10 26
MW-304-60 L1147020-11 28
MW-304-65 L1147020-12 30
MW-304-70 L1147020-13 32
MW-304-75 L1147020-14 34
MW-304-80 L1147020-15 36
MW-304-85 L1147020-16 38
MW-304-90 L1147020-17 40
MW-304-95 L1147020-18 42
MW-304-100 L1147020-19 44
MW-304-105 L1147020-20 46
MW-304-110 L1147020-21 48
MW-304-115 L1147020-22 50
MW-2009-95 L1147020-23 52
TB-100219 L1147020-24 54
Qc: Quality Control Summary 56
Total Solids by Method 2540 G-2011 56
Volatile Organic Compounds (GC/MS) by Method 8260C 59
Gl: Glossary of Terms 77
Al: Accreditations & Locations 78
Sc: Sample Chain of Custody 79

MW-304-5 L1147020-01 Solid

Collected by: HW Small | Collected date/time: 10/01/19 10:00 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361905	1	10/12/19 12:52	10/12/19 13:04	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 10:00	10/14/19 16:20	ACG	Mt. Juliet, TN

MW-304-10 L1147020-02 Solid

Collected by: HW Small | Collected date/time: 10/01/19 10:05 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361905	1	10/12/19 12:52	10/12/19 13:04	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 10:05	10/14/19 16:41	ACG	Mt. Juliet, TN

MW-304-15 L1147020-03 Solid

Collected by: HW Small | Collected date/time: 10/01/19 10:10 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361905	1	10/12/19 12:52	10/12/19 13:04	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 10:10	10/14/19 17:01	ACG	Mt. Juliet, TN

MW-304-20 L1147020-04 Solid

Collected by: HW Small | Collected date/time: 10/01/19 10:15 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361905	1	10/12/19 12:52	10/12/19 13:04	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 10:15	10/14/19 17:22	ACG	Mt. Juliet, TN

MW-304-25 L1147020-05 Solid

Collected by: HW Small | Collected date/time: 10/01/19 10:20 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361905	1	10/12/19 12:52	10/12/19 13:04	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 10:20	10/14/19 17:43	ACG	Mt. Juliet, TN

MW-304-30 L1147020-06 Solid

Collected by: HW Small | Collected date/time: 10/01/19 10:25 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361905	1	10/12/19 12:52	10/12/19 13:04	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 10:25	10/14/19 18:04	ACG	Mt. Juliet, TN

MW-304-40 L1147020-07 Solid

Collected by: HW Small | Collected date/time: 10/01/19 10:30 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361905	1	10/12/19 12:52	10/12/19 13:04	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 10:30	10/14/19 18:24	ACG	Mt. Juliet, TN

MW-304-45 L1147020-08 Solid

Collected by: HW Small | Collected date/time: 10/01/19 10:35 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361906	1	10/12/19 12:38	10/12/19 12:50	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 10:35	10/14/19 18:44	ACG	Mt. Juliet, TN

MW-304-50 L1147020-09 Solid

Collected by: HW Small | Collected date/time: 10/01/19 10:40 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361906	1	10/12/19 12:38	10/12/19 12:50	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 10:40	10/14/19 19:05	ACG	Mt. Juliet, TN

MW-304-55 L1147020-10 Solid

Collected by: HW Small | Collected date/time: 10/01/19 10:45 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361906	1	10/12/19 12:38	10/12/19 12:50	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 10:45	10/14/19 19:25	ACG	Mt. Juliet, TN

MW-304-60 L1147020-11 Solid

Collected by: HW Small | Collected date/time: 10/01/19 10:50 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361906	1	10/12/19 12:38	10/12/19 12:50	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 10:50	10/14/19 19:46	ACG	Mt. Juliet, TN

MW-304-65 L1147020-12 Solid

Collected by: HW Small | Collected date/time: 10/01/19 11:30 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361906	1	10/12/19 12:38	10/12/19 12:50	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 11:30	10/14/19 20:07	ACG	Mt. Juliet, TN

MW-304-70 L1147020-13 Solid

Collected by: HW Small | Collected date/time: 10/01/19 11:35 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361906	1	10/12/19 12:38	10/12/19 12:50	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 11:35	10/14/19 20:28	ACG	Mt. Juliet, TN

MW-304-75 L1147020-14 Solid

Collected by: HW Small | Collected date/time: 10/01/19 11:40 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361906	1	10/12/19 12:38	10/12/19 12:50	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 11:40	10/14/19 20:48	ACG	Mt. Juliet, TN

MW-304-80 L1147020-15 Solid

Collected by: HW Small | Collected date/time: 10/01/19 11:45 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361906	1	10/12/19 12:38	10/12/19 12:50	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 11:45	10/14/19 21:09	ACG	Mt. Juliet, TN

MW-304-85 L1147020-16 Solid

Collected by: HW Small | Collected date/time: 10/01/19 13:30 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361906	1	10/12/19 12:38	10/12/19 12:50	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 13:30	10/14/19 21:30	ACG	Mt. Juliet, TN

MW-304-90 L1147020-17 Solid

Collected by: HW Small | Collected date/time: 10/01/19 13:35 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361906	1	10/12/19 12:38	10/12/19 12:50	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362682	1	10/01/19 13:35	10/14/19 21:51	ACG	Mt. Juliet, TN

MW-304-95 L1147020-18 Solid

Collected by: HW Small | Collected date/time: 10/02/19 10:15 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361907	1	10/12/19 12:25	10/12/19 12:37	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362726	1	10/02/19 10:15	10/14/19 21:23	ACG	Mt. Juliet, TN

MW-304-100 L1147020-19 Solid

Collected by: HW Small | Collected date/time: 10/02/19 10:30 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361907	1	10/12/19 12:25	10/12/19 12:37	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362726	1	10/02/19 10:30	10/14/19 21:45	ACG	Mt. Juliet, TN

MW-304-105 L1147020-20 Solid

Collected by: HW Small | Collected date/time: 10/02/19 10:45 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361907	1	10/12/19 12:25	10/12/19 12:37	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362726	1	10/02/19 10:45	10/14/19 22:06	ACG	Mt. Juliet, TN

MW-304-110 L1147020-21 Solid

Collected by: HW Small | Collected date/time: 10/02/19 11:00 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361907	1	10/12/19 12:25	10/12/19 12:37	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1363157	1	10/02/19 11:00	10/15/19 15:38	ACG	Mt. Juliet, TN

MW-304-115 L1147020-22 Solid

Collected by: HW Small
Collected date/time: 10/02/19 11:10
Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361907	1	10/12/19 12:25	10/12/19 12:37	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362726	1	10/02/19 11:10	10/14/19 23:01	ACG	Mt. Juliet, TN

MW-2009-95 L1147020-23 Solid

Collected by: HW Small
Collected date/time: 10/02/19 00:00
Received date/time: 10/05/19 08:45

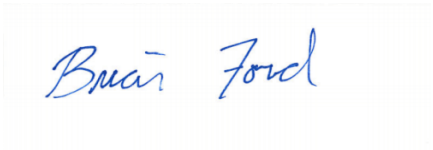
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361907	1	10/12/19 12:25	10/12/19 12:37	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362726	1	10/02/19 00:00	10/14/19 23:22	ACG	Mt. Juliet, TN

TB-100219 L1147020-24 GW

Collected by: HW Small
Collected date/time: 10/02/19 00:00
Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 01:53	10/15/19 01:53	JHH	Mt. Juliet, TN

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	88.8		1	10/12/2019 13:04	WG1361905

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0154	0.0282	1	10/14/2019 16:20	WG1362682
Acrylonitrile	U		0.00214	0.0141	1	10/14/2019 16:20	WG1362682
Benzene	U		0.000451	0.00113	1	10/14/2019 16:20	WG1362682
Bromobenzene	U		0.00118	0.0141	1	10/14/2019 16:20	WG1362682
Bromodichloromethane	U		0.000888	0.00282	1	10/14/2019 16:20	WG1362682
Bromochloromethane	U		0.00127	0.00563	1	10/14/2019 16:20	WG1362682
Bromoform	U		0.00674	0.0282	1	10/14/2019 16:20	WG1362682
Bromomethane	U		0.00417	0.0141	1	10/14/2019 16:20	WG1362682
n-Butylbenzene	U		0.00433	0.0141	1	10/14/2019 16:20	WG1362682
sec-Butylbenzene	U		0.00285	0.0141	1	10/14/2019 16:20	WG1362682
tert-Butylbenzene	U		0.00175	0.00563	1	10/14/2019 16:20	WG1362682
Carbon disulfide	U		0.00457	0.0141	1	10/14/2019 16:20	WG1362682
Carbon tetrachloride	U		0.00122	0.00563	1	10/14/2019 16:20	WG1362682
Chlorobenzene	U		0.000645	0.00282	1	10/14/2019 16:20	WG1362682
Chlorodibromomethane	U		0.000507	0.00282	1	10/14/2019 16:20	WG1362682
Chloroethane	U		0.00122	0.00563	1	10/14/2019 16:20	WG1362682
Chloroform	U		0.000467	0.00282	1	10/14/2019 16:20	WG1362682
Chloromethane	U		0.00157	0.0141	1	10/14/2019 16:20	WG1362682
2-Chlorotoluene	U		0.00104	0.00282	1	10/14/2019 16:20	WG1362682
4-Chlorotoluene	U		0.00127	0.00563	1	10/14/2019 16:20	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00574	0.0282	1	10/14/2019 16:20	WG1362682
1,2-Dibromoethane	U		0.000591	0.00282	1	10/14/2019 16:20	WG1362682
Dibromomethane	U		0.00113	0.00563	1	10/14/2019 16:20	WG1362682
1,2-Dichlorobenzene	U		0.00163	0.00563	1	10/14/2019 16:20	WG1362682
1,3-Dichlorobenzene	U		0.00191	0.00563	1	10/14/2019 16:20	WG1362682
1,4-Dichlorobenzene	U		0.00222	0.00563	1	10/14/2019 16:20	WG1362682
Dichlorodifluoromethane	U		0.000921	0.00282	1	10/14/2019 16:20	WG1362682
1,1-Dichloroethane	U		0.000648	0.00282	1	10/14/2019 16:20	WG1362682
1,2-Dichloroethane	U		0.000535	0.00282	1	10/14/2019 16:20	WG1362682
1,1-Dichloroethene	U		0.000563	0.00282	1	10/14/2019 16:20	WG1362682
cis-1,2-Dichloroethene	U		0.000777	0.00282	1	10/14/2019 16:20	WG1362682
trans-1,2-Dichloroethene	U		0.00161	0.00563	1	10/14/2019 16:20	WG1362682
1,2-Dichloropropane	U		0.00143	0.00563	1	10/14/2019 16:20	WG1362682
1,1-Dichloropropene	U		0.000788	0.00282	1	10/14/2019 16:20	WG1362682
1,3-Dichloropropane	U		0.00197	0.00563	1	10/14/2019 16:20	WG1362682
cis-1,3-Dichloropropene	U		0.000764	0.00282	1	10/14/2019 16:20	WG1362682
trans-1,3-Dichloropropene	U		0.00172	0.00563	1	10/14/2019 16:20	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00158	0.00563	1	10/14/2019 16:20	WG1362682
2,2-Dichloropropane	U		0.000893	0.00282	1	10/14/2019 16:20	WG1362682
Di-isopropyl ether	U		0.000394	0.00113	1	10/14/2019 16:20	WG1362682
Ethylbenzene	U		0.000597	0.00282	1	10/14/2019 16:20	WG1362682
Hexachloro-1,3-butadiene	U		0.0143	0.0282	1	10/14/2019 16:20	WG1362682
2-Hexanone	U		0.0113	0.0282	1	10/14/2019 16:20	WG1362682
n-Hexane	U		0.00119	0.00563	1	10/14/2019 16:20	WG1362682
Iodomethane	U		0.00681	0.0141	1	10/14/2019 16:20	WG1362682
Isopropylbenzene	U		0.000972	0.00282	1	10/14/2019 16:20	WG1362682
p-Isopropyltoluene	U		0.00262	0.00563	1	10/14/2019 16:20	WG1362682
2-Butanone (MEK)	0.0178	B J J0	0.0141	0.0282	1	10/14/2019 16:20	WG1362682
Methylene Chloride	U		0.00748	0.0282	1	10/14/2019 16:20	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0113	0.0282	1	10/14/2019 16:20	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000332	0.00113	1	10/14/2019 16:20	WG1362682
Naphthalene	0.00560	J	0.00351	0.0141	1	10/14/2019 16:20	WG1362682
n-Propylbenzene	U		0.00133	0.00563	1	10/14/2019 16:20	WG1362682
Styrene	U		0.00307	0.0141	1	10/14/2019 16:20	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000563	0.00282	1	10/14/2019 16:20	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000439	0.00282	1	10/14/2019 16:20	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000760	0.00282	1	10/14/2019 16:20	WG1362682
Tetrachloroethene	0.0250		0.000788	0.00282	1	10/14/2019 16:20	WG1362682
Toluene	0.00212	J	0.00141	0.00563	1	10/14/2019 16:20	WG1362682
1,2,3-Trichlorobenzene	0.00121	J	0.000704	0.00282	1	10/14/2019 16:20	WG1362682
1,2,4-Trichlorobenzene	0.0199		0.00543	0.0141	1	10/14/2019 16:20	WG1362682
1,1,1-Trichloroethane	U		0.000310	0.00282	1	10/14/2019 16:20	WG1362682
1,1,2-Trichloroethane	U		0.000995	0.00282	1	10/14/2019 16:20	WG1362682
Trichloroethene	U		0.000451	0.00113	1	10/14/2019 16:20	WG1362682
Trichlorofluoromethane	U		0.000563	0.00282	1	10/14/2019 16:20	WG1362682
1,2,3-Trichloropropane	U		0.00574	0.0141	1	10/14/2019 16:20	WG1362682
1,2,4-Trimethylbenzene	U		0.00131	0.00563	1	10/14/2019 16:20	WG1362682
1,2,3-Trimethylbenzene	U		0.00130	0.00563	1	10/14/2019 16:20	WG1362682
1,3,5-Trimethylbenzene	U		0.00122	0.00563	1	10/14/2019 16:20	WG1362682
Vinyl acetate	U		0.00396	0.0141	1	10/14/2019 16:20	WG1362682
Vinyl chloride	U		0.000769	0.00282	1	10/14/2019 16:20	WG1362682
Xylenes, Total	U		0.00538	0.00732	1	10/14/2019 16:20	WG1362682
(S) Toluene-d8	*99.5*			*75.0-131*		*10/14/2019 16:20*	WG1362682
(S) 4-Bromofluorobenzene	*98.9*			*67.0-138*		*10/14/2019 16:20*	WG1362682
(S) 1,2-Dichloroethane-d4	*98.4*			*70.0-130*		*10/14/2019 16:20*	WG1362682

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	87.8		1	10/12/2019 13:04	WG1361905

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0156	0.0285	1	10/14/2019 16:41	WG1362682
Acrylonitrile	U		0.00216	0.0142	1	10/14/2019 16:41	WG1362682
Benzene	U		0.000456	0.00114	1	10/14/2019 16:41	WG1362682
Bromobenzene	U		0.00120	0.0142	1	10/14/2019 16:41	WG1362682
Bromodichloromethane	U		0.000898	0.00285	1	10/14/2019 16:41	WG1362682
Bromochloromethane	U		0.00129	0.00570	1	10/14/2019 16:41	WG1362682
Bromoform	U		0.00681	0.0285	1	10/14/2019 16:41	WG1362682
Bromomethane	U		0.00422	0.0142	1	10/14/2019 16:41	WG1362682
n-Butylbenzene	U		0.00438	0.0142	1	10/14/2019 16:41	WG1362682
sec-Butylbenzene	U		0.00288	0.0142	1	10/14/2019 16:41	WG1362682
tert-Butylbenzene	U		0.00177	0.00570	1	10/14/2019 16:41	WG1362682
Carbon disulfide	U		0.00463	0.0142	1	10/14/2019 16:41	WG1362682
Carbon tetrachloride	U		0.00123	0.00570	1	10/14/2019 16:41	WG1362682
Chlorobenzene	U		0.000653	0.00285	1	10/14/2019 16:41	WG1362682
Chlorodibromomethane	U		0.000513	0.00285	1	10/14/2019 16:41	WG1362682
Chloroethane	U		0.00123	0.00570	1	10/14/2019 16:41	WG1362682
Chloroform	0.000522	B J	0.000473	0.00285	1	10/14/2019 16:41	WG1362682
Chloromethane	U		0.00158	0.0142	1	10/14/2019 16:41	WG1362682
2-Chlorotoluene	U		0.00105	0.00285	1	10/14/2019 16:41	WG1362682
4-Chlorotoluene	U		0.00129	0.00570	1	10/14/2019 16:41	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00581	0.0285	1	10/14/2019 16:41	WG1362682
1,2-Dibromoethane	U		0.000598	0.00285	1	10/14/2019 16:41	WG1362682
Dibromomethane	U		0.00114	0.00570	1	10/14/2019 16:41	WG1362682
1,2-Dichlorobenzene	U		0.00165	0.00570	1	10/14/2019 16:41	WG1362682
1,3-Dichlorobenzene	U		0.00194	0.00570	1	10/14/2019 16:41	WG1362682
1,4-Dichlorobenzene	U		0.00224	0.00570	1	10/14/2019 16:41	WG1362682
Dichlorodifluoromethane	U		0.000932	0.00285	1	10/14/2019 16:41	WG1362682
1,1-Dichloroethane	U		0.000655	0.00285	1	10/14/2019 16:41	WG1362682
1,2-Dichloroethane	U		0.000541	0.00285	1	10/14/2019 16:41	WG1362682
1,1-Dichloroethene	U		0.000570	0.00285	1	10/14/2019 16:41	WG1362682
cis-1,2-Dichloroethene	U		0.000786	0.00285	1	10/14/2019 16:41	WG1362682
trans-1,2-Dichloroethene	U		0.00163	0.00570	1	10/14/2019 16:41	WG1362682
1,2-Dichloropropane	U		0.00145	0.00570	1	10/14/2019 16:41	WG1362682
1,1-Dichloropropene	U		0.000798	0.00285	1	10/14/2019 16:41	WG1362682
1,3-Dichloropropane	U		0.00199	0.00570	1	10/14/2019 16:41	WG1362682
cis-1,3-Dichloropropene	U		0.000773	0.00285	1	10/14/2019 16:41	WG1362682
trans-1,3-Dichloropropene	U		0.00174	0.00570	1	10/14/2019 16:41	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00160	0.00570	1	10/14/2019 16:41	WG1362682
2,2-Dichloropropane	U		0.000904	0.00285	1	10/14/2019 16:41	WG1362682
Di-isopropyl ether	U		0.000399	0.00114	1	10/14/2019 16:41	WG1362682
Ethylbenzene	U		0.000604	0.00285	1	10/14/2019 16:41	WG1362682
Hexachloro-1,3-butadiene	U		0.0145	0.0285	1	10/14/2019 16:41	WG1362682
2-Hexanone	U		0.0114	0.0285	1	10/14/2019 16:41	WG1362682
n-Hexane	U		0.00121	0.00570	1	10/14/2019 16:41	WG1362682
Iodomethane	U		0.00689	0.0142	1	10/14/2019 16:41	WG1362682
Isopropylbenzene	U		0.000983	0.00285	1	10/14/2019 16:41	WG1362682
p-Isopropyltoluene	U		0.00265	0.00570	1	10/14/2019 16:41	WG1362682
2-Butanone (MEK)	0.0216	B J J0	0.0142	0.0285	1	10/14/2019 16:41	WG1362682
Methylene Chloride	U		0.00757	0.0285	1	10/14/2019 16:41	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0114	0.0285	1	10/14/2019 16:41	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000336	0.00114	1	10/14/2019 16:41	WG1362682
Naphthalene	U		0.00356	0.0142	1	10/14/2019 16:41	WG1362682
n-Propylbenzene	U		0.00134	0.00570	1	10/14/2019 16:41	WG1362682
Styrene	U		0.00311	0.0142	1	10/14/2019 16:41	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000570	0.00285	1	10/14/2019 16:41	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000444	0.00285	1	10/14/2019 16:41	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000769	0.00285	1	10/14/2019 16:41	WG1362682
Tetrachloroethene	0.0198		0.000798	0.00285	1	10/14/2019 16:41	WG1362682
Toluene	0.00202	J	0.00142	0.00570	1	10/14/2019 16:41	WG1362682
1,2,3-Trichlorobenzene	U		0.000712	0.00285	1	10/14/2019 16:41	WG1362682
1,2,4-Trichlorobenzene	U		0.00549	0.0142	1	10/14/2019 16:41	WG1362682
1,1,1-Trichloroethane	U		0.000313	0.00285	1	10/14/2019 16:41	WG1362682
1,1,2-Trichloroethane	U		0.00101	0.00285	1	10/14/2019 16:41	WG1362682
Trichloroethene	U		0.000456	0.00114	1	10/14/2019 16:41	WG1362682
Trichlorofluoromethane	U		0.000570	0.00285	1	10/14/2019 16:41	WG1362682
1,2,3-Trichloropropane	U		0.00581	0.0142	1	10/14/2019 16:41	WG1362682
1,2,4-Trimethylbenzene	U		0.00132	0.00570	1	10/14/2019 16:41	WG1362682
1,2,3-Trimethylbenzene	U		0.00131	0.00570	1	10/14/2019 16:41	WG1362682
1,3,5-Trimethylbenzene	U		0.00123	0.00570	1	10/14/2019 16:41	WG1362682
Vinyl acetate	U		0.00401	0.0142	1	10/14/2019 16:41	WG1362682
Vinyl chloride	U		0.000778	0.00285	1	10/14/2019 16:41	WG1362682
Xylenes, Total	U		0.00545	0.00741	1	10/14/2019 16:41	WG1362682
(S) Toluene-d8	*102*			*75.0-131*		*10/14/2019 16:41*	WG1362682
(S) 4-Bromofluorobenzene	*101*			*67.0-138*		*10/14/2019 16:41*	WG1362682
(S) 1,2-Dichloroethane-d4	*96.4*			*70.0-130*		*10/14/2019 16:41*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	84.1		1	10/12/2019 13:04	WG1361905

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0163	0.0297	1	10/14/2019 17:01	WG1362682
Acrylonitrile	U		0.00226	0.0149	1	10/14/2019 17:01	WG1362682
Benzene	U		0.000476	0.00119	1	10/14/2019 17:01	WG1362682
Bromobenzene	U		0.00125	0.0149	1	10/14/2019 17:01	WG1362682
Bromodichloromethane	U		0.000937	0.00297	1	10/14/2019 17:01	WG1362682
Bromochloromethane	U		0.00134	0.00595	1	10/14/2019 17:01	WG1362682
Bromoform	U		0.00711	0.0297	1	10/14/2019 17:01	WG1362682
Bromomethane	U		0.00440	0.0149	1	10/14/2019 17:01	WG1362682
n-Butylbenzene	U		0.00457	0.0149	1	10/14/2019 17:01	WG1362682
sec-Butylbenzene	U		0.00301	0.0149	1	10/14/2019 17:01	WG1362682
tert-Butylbenzene	U		0.00184	0.00595	1	10/14/2019 17:01	WG1362682
Carbon disulfide	U		0.00483	0.0149	1	10/14/2019 17:01	WG1362682
Carbon tetrachloride	U		0.00128	0.00595	1	10/14/2019 17:01	WG1362682
Chlorobenzene	U		0.000681	0.00297	1	10/14/2019 17:01	WG1362682
Chlorodibromomethane	U		0.000535	0.00297	1	10/14/2019 17:01	WG1362682
Chloroethane	U		0.00128	0.00595	1	10/14/2019 17:01	WG1362682
Chloroform	U		0.000493	0.00297	1	10/14/2019 17:01	WG1362682
Chloromethane	U		0.00165	0.0149	1	10/14/2019 17:01	WG1362682
2-Chlorotoluene	U		0.00109	0.00297	1	10/14/2019 17:01	WG1362682
4-Chlorotoluene	U		0.00134	0.00595	1	10/14/2019 17:01	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00606	0.0297	1	10/14/2019 17:01	WG1362682
1,2-Dibromoethane	U		0.000624	0.00297	1	10/14/2019 17:01	WG1362682
Dibromomethane	U		0.00119	0.00595	1	10/14/2019 17:01	WG1362682
1,2-Dichlorobenzene	U		0.00172	0.00595	1	10/14/2019 17:01	WG1362682
1,3-Dichlorobenzene	U		0.00202	0.00595	1	10/14/2019 17:01	WG1362682
1,4-Dichlorobenzene	U		0.00234	0.00595	1	10/14/2019 17:01	WG1362682
Dichlorodifluoromethane	U		0.000973	0.00297	1	10/14/2019 17:01	WG1362682
1,1-Dichloroethane	U		0.000684	0.00297	1	10/14/2019 17:01	WG1362682
1,2-Dichloroethane	U		0.000565	0.00297	1	10/14/2019 17:01	WG1362682
1,1-Dichloroethene	U		0.000595	0.00297	1	10/14/2019 17:01	WG1362682
cis-1,2-Dichloroethene	U		0.000820	0.00297	1	10/14/2019 17:01	WG1362682
trans-1,2-Dichloroethene	U		0.00170	0.00595	1	10/14/2019 17:01	WG1362682
1,2-Dichloropropane	U		0.00151	0.00595	1	10/14/2019 17:01	WG1362682
1,1-Dichloropropene	U		0.000832	0.00297	1	10/14/2019 17:01	WG1362682
1,3-Dichloropropane	U		0.00208	0.00595	1	10/14/2019 17:01	WG1362682
cis-1,3-Dichloropropene	U		0.000806	0.00297	1	10/14/2019 17:01	WG1362682
trans-1,3-Dichloropropene	U		0.00182	0.00595	1	10/14/2019 17:01	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00166	0.00595	1	10/14/2019 17:01	WG1362682
2,2-Dichloropropane	U		0.000943	0.00297	1	10/14/2019 17:01	WG1362682
Di-isopropyl ether	U		0.000416	0.00119	1	10/14/2019 17:01	WG1362682
Ethylbenzene	U		0.000630	0.00297	1	10/14/2019 17:01	WG1362682
Hexachloro-1,3-butadiene	U		0.0151	0.0297	1	10/14/2019 17:01	WG1362682
2-Hexanone	U		0.0119	0.0297	1	10/14/2019 17:01	WG1362682
n-Hexane	U		0.00126	0.00595	1	10/14/2019 17:01	WG1362682
Iodomethane	U		0.00719	0.0149	1	10/14/2019 17:01	WG1362682
Isopropylbenzene	U		0.00103	0.00297	1	10/14/2019 17:01	WG1362682
p-Isopropyltoluene	U		0.00277	0.00595	1	10/14/2019 17:01	WG1362682
2-Butanone (MEK)	0.0241	B J J0	0.0149	0.0297	1	10/14/2019 17:01	WG1362682
Methylene Chloride	U		0.00790	0.0297	1	10/14/2019 17:01	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0119	0.0297	1	10/14/2019 17:01	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000351	0.00119	1	10/14/2019 17:01	WG1362682
Naphthalene	U		0.00371	0.0149	1	10/14/2019 17:01	WG1362682
n-Propylbenzene	U		0.00140	0.00595	1	10/14/2019 17:01	WG1362682
Styrene	U		0.00325	0.0149	1	10/14/2019 17:01	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000595	0.00297	1	10/14/2019 17:01	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000464	0.00297	1	10/14/2019 17:01	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000803	0.00297	1	10/14/2019 17:01	WG1362682
Tetrachloroethene	0.00806		0.000832	0.00297	1	10/14/2019 17:01	WG1362682
Toluene	U		0.00149	0.00595	1	10/14/2019 17:01	WG1362682
1,2,3-Trichlorobenzene	U		0.000743	0.00297	1	10/14/2019 17:01	WG1362682
1,2,4-Trichlorobenzene	U		0.00573	0.0149	1	10/14/2019 17:01	WG1362682
1,1,1-Trichloroethane	U		0.000327	0.00297	1	10/14/2019 17:01	WG1362682
1,1,2-Trichloroethane	U		0.00105	0.00297	1	10/14/2019 17:01	WG1362682
Trichloroethene	U		0.000476	0.00119	1	10/14/2019 17:01	WG1362682
Trichlorofluoromethane	U		0.000595	0.00297	1	10/14/2019 17:01	WG1362682
1,2,3-Trichloropropane	U		0.00606	0.0149	1	10/14/2019 17:01	WG1362682
1,2,4-Trimethylbenzene	U		0.00138	0.00595	1	10/14/2019 17:01	WG1362682
1,2,3-Trimethylbenzene	U		0.00137	0.00595	1	10/14/2019 17:01	WG1362682
1,3,5-Trimethylbenzene	U		0.00128	0.00595	1	10/14/2019 17:01	WG1362682
Vinyl acetate	U		0.00419	0.0149	1	10/14/2019 17:01	WG1362682
Vinyl chloride	U		0.000812	0.00297	1	10/14/2019 17:01	WG1362682
Xylenes, Total	U		0.00568	0.00773	1	10/14/2019 17:01	WG1362682
(S) Toluene-d8	*105*			*75.0-131*		*10/14/2019 17:01*	WG1362682
(S) 4-Bromofluorobenzene	*103*			*67.0-138*		*10/14/2019 17:01*	WG1362682
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/14/2019 17:01*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	84.9		1	10/12/2019 13:04	WG1361905

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0333		0.0161	0.0294	1	10/14/2019 17:22	WG1362682
Acrylonitrile	U		0.00224	0.0147	1	10/14/2019 17:22	WG1362682
Benzene	0.00166	B	0.000471	0.00118	1	10/14/2019 17:22	WG1362682
Bromobenzene	U		0.00124	0.0147	1	10/14/2019 17:22	WG1362682
Bromodichloromethane	U		0.000928	0.00294	1	10/14/2019 17:22	WG1362682
Bromochloromethane	U		0.00133	0.00589	1	10/14/2019 17:22	WG1362682
Bromoform	U		0.00704	0.0294	1	10/14/2019 17:22	WG1362682
Bromomethane	U		0.00436	0.0147	1	10/14/2019 17:22	WG1362682
n-Butylbenzene	U		0.00452	0.0147	1	10/14/2019 17:22	WG1362682
sec-Butylbenzene	U		0.00298	0.0147	1	10/14/2019 17:22	WG1362682
tert-Butylbenzene	U		0.00183	0.00589	1	10/14/2019 17:22	WG1362682
Carbon disulfide	U		0.00478	0.0147	1	10/14/2019 17:22	WG1362682
Carbon tetrachloride	U		0.00127	0.00589	1	10/14/2019 17:22	WG1362682
Chlorobenzene	U		0.000675	0.00294	1	10/14/2019 17:22	WG1362682
Chlorodibromomethane	U		0.000530	0.00294	1	10/14/2019 17:22	WG1362682
Chloroethane	U		0.00127	0.00589	1	10/14/2019 17:22	WG1362682
Chloroform	0.000674	B J	0.000489	0.00294	1	10/14/2019 17:22	WG1362682
Chloromethane	U		0.00164	0.0147	1	10/14/2019 17:22	WG1362682
2-Chlorotoluene	U		0.00108	0.00294	1	10/14/2019 17:22	WG1362682
4-Chlorotoluene	U		0.00133	0.00589	1	10/14/2019 17:22	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00601	0.0294	1	10/14/2019 17:22	WG1362682
1,2-Dibromoethane	U		0.000618	0.00294	1	10/14/2019 17:22	WG1362682
Dibromomethane	U		0.00118	0.00589	1	10/14/2019 17:22	WG1362682
1,2-Dichlorobenzene	U		0.00171	0.00589	1	10/14/2019 17:22	WG1362682
1,3-Dichlorobenzene	U		0.00200	0.00589	1	10/14/2019 17:22	WG1362682
1,4-Dichlorobenzene	U		0.00232	0.00589	1	10/14/2019 17:22	WG1362682
Dichlorodifluoromethane	U		0.000963	0.00294	1	10/14/2019 17:22	WG1362682
1,1-Dichloroethane	U		0.000677	0.00294	1	10/14/2019 17:22	WG1362682
1,2-Dichloroethane	U		0.000559	0.00294	1	10/14/2019 17:22	WG1362682
1,1-Dichloroethene	U		0.000589	0.00294	1	10/14/2019 17:22	WG1362682
cis-1,2-Dichloroethene	U		0.000813	0.00294	1	10/14/2019 17:22	WG1362682
trans-1,2-Dichloroethene	U		0.00168	0.00589	1	10/14/2019 17:22	WG1362682
1,2-Dichloropropane	U		0.00150	0.00589	1	10/14/2019 17:22	WG1362682
1,1-Dichloropropene	U		0.000824	0.00294	1	10/14/2019 17:22	WG1362682
1,3-Dichloropropane	U		0.00206	0.00589	1	10/14/2019 17:22	WG1362682
cis-1,3-Dichloropropene	U		0.000799	0.00294	1	10/14/2019 17:22	WG1362682
trans-1,3-Dichloropropene	U		0.00180	0.00589	1	10/14/2019 17:22	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00165	0.00589	1	10/14/2019 17:22	WG1362682
2,2-Dichloropropane	U		0.000934	0.00294	1	10/14/2019 17:22	WG1362682
Di-isopropyl ether	U		0.000412	0.00118	1	10/14/2019 17:22	WG1362682
Ethylbenzene	U		0.000624	0.00294	1	10/14/2019 17:22	WG1362682
Hexachloro-1,3-butadiene	U		0.0150	0.0294	1	10/14/2019 17:22	WG1362682
2-Hexanone	U		0.0118	0.0294	1	10/14/2019 17:22	WG1362682
n-Hexane	U		0.00125	0.00589	1	10/14/2019 17:22	WG1362682
Iodomethane	U		0.00713	0.0147	1	10/14/2019 17:22	WG1362682
Isopropylbenzene	U		0.00102	0.00294	1	10/14/2019 17:22	WG1362682
p-Isopropyltoluene	0.00579	J	0.00274	0.00589	1	10/14/2019 17:22	WG1362682
2-Butanone (MEK)	0.0364	B J0	0.0147	0.0294	1	10/14/2019 17:22	WG1362682
Methylene Chloride	U		0.00782	0.0294	1	10/14/2019 17:22	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0118	0.0294	1	10/14/2019 17:22	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000347	0.00118	1	10/14/2019 17:22	WG1362682
Naphthalene	U		0.00367	0.0147	1	10/14/2019 17:22	WG1362682
n-Propylbenzene	U		0.00139	0.00589	1	10/14/2019 17:22	WG1362682
Styrene	U		0.00322	0.0147	1	10/14/2019 17:22	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000589	0.00294	1	10/14/2019 17:22	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000459	0.00294	1	10/14/2019 17:22	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000795	0.00294	1	10/14/2019 17:22	WG1362682
Tetrachloroethene	U		0.000824	0.00294	1	10/14/2019 17:22	WG1362682
Toluene	0.00496	J	0.00147	0.00589	1	10/14/2019 17:22	WG1362682
1,2,3-Trichlorobenzene	U		0.000736	0.00294	1	10/14/2019 17:22	WG1362682
1,2,4-Trichlorobenzene	U		0.00568	0.0147	1	10/14/2019 17:22	WG1362682
1,1,1-Trichloroethane	U		0.000324	0.00294	1	10/14/2019 17:22	WG1362682
1,1,2-Trichloroethane	U		0.00104	0.00294	1	10/14/2019 17:22	WG1362682
Trichloroethene	U		0.000471	0.00118	1	10/14/2019 17:22	WG1362682
Trichlorofluoromethane	U		0.000589	0.00294	1	10/14/2019 17:22	WG1362682
1,2,3-Trichloropropane	U		0.00601	0.0147	1	10/14/2019 17:22	WG1362682
1,2,4-Trimethylbenzene	U		0.00137	0.00589	1	10/14/2019 17:22	WG1362682
1,2,3-Trimethylbenzene	U		0.00135	0.00589	1	10/14/2019 17:22	WG1362682
1,3,5-Trimethylbenzene	U		0.00127	0.00589	1	10/14/2019 17:22	WG1362682
Vinyl acetate	U		0.00415	0.0147	1	10/14/2019 17:22	WG1362682
Vinyl chloride	U		0.000804	0.00294	1	10/14/2019 17:22	WG1362682
Xylenes, Total	U		0.00563	0.00766	1	10/14/2019 17:22	WG1362682
(S) Toluene-d8	*102*			*75.0-131*		*10/14/2019 17:22*	WG1362682
(S) 4-Bromofluorobenzene	*102*			*67.0-138*		*10/14/2019 17:22*	WG1362682
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/14/2019 17:22*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	91.4		1	10/12/2019 13:04	WG1361905

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0150	0.0273	1	10/14/2019 17:43	WG1362682
Acrylonitrile	U		0.00208	0.0137	1	10/14/2019 17:43	WG1362682
Benzene	U		0.000438	0.00109	1	10/14/2019 17:43	WG1362682
Bromobenzene	U		0.00115	0.0137	1	10/14/2019 17:43	WG1362682
Bromodichloromethane	U		0.000862	0.00273	1	10/14/2019 17:43	WG1362682
Bromochloromethane	U		0.00124	0.00547	1	10/14/2019 17:43	WG1362682
Bromoform	U		0.00654	0.0273	1	10/14/2019 17:43	WG1362682
Bromomethane	U		0.00405	0.0137	1	10/14/2019 17:43	WG1362682
n-Butylbenzene	U		0.00420	0.0137	1	10/14/2019 17:43	WG1362682
sec-Butylbenzene	U		0.00277	0.0137	1	10/14/2019 17:43	WG1362682
tert-Butylbenzene	U		0.00170	0.00547	1	10/14/2019 17:43	WG1362682
Carbon disulfide	U		0.00444	0.0137	1	10/14/2019 17:43	WG1362682
Carbon tetrachloride	U		0.00118	0.00547	1	10/14/2019 17:43	WG1362682
Chlorobenzene	U		0.000627	0.00273	1	10/14/2019 17:43	WG1362682
Chlorodibromomethane	U		0.000492	0.00273	1	10/14/2019 17:43	WG1362682
Chloroethane	U		0.00118	0.00547	1	10/14/2019 17:43	WG1362682
Chloroform	U		0.000454	0.00273	1	10/14/2019 17:43	WG1362682
Chloromethane	U		0.00152	0.0137	1	10/14/2019 17:43	WG1362682
2-Chlorotoluene	U		0.00101	0.00273	1	10/14/2019 17:43	WG1362682
4-Chlorotoluene	U		0.00124	0.00547	1	10/14/2019 17:43	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00558	0.0273	1	10/14/2019 17:43	WG1362682
1,2-Dibromoethane	U		0.000574	0.00273	1	10/14/2019 17:43	WG1362682
Dibromomethane	U		0.00109	0.00547	1	10/14/2019 17:43	WG1362682
1,2-Dichlorobenzene	U		0.00159	0.00547	1	10/14/2019 17:43	WG1362682
1,3-Dichlorobenzene	U		0.00186	0.00547	1	10/14/2019 17:43	WG1362682
1,4-Dichlorobenzene	U		0.00215	0.00547	1	10/14/2019 17:43	WG1362682
Dichlorodifluoromethane	U		0.000895	0.00273	1	10/14/2019 17:43	WG1362682
1,1-Dichloroethane	U		0.000629	0.00273	1	10/14/2019 17:43	WG1362682
1,2-Dichloroethane	U		0.000520	0.00273	1	10/14/2019 17:43	WG1362682
1,1-Dichloroethene	U		0.000547	0.00273	1	10/14/2019 17:43	WG1362682
cis-1,2-Dichloroethene	U		0.000755	0.00273	1	10/14/2019 17:43	WG1362682
trans-1,2-Dichloroethene	U		0.00156	0.00547	1	10/14/2019 17:43	WG1362682
1,2-Dichloropropane	U		0.00139	0.00547	1	10/14/2019 17:43	WG1362682
1,1-Dichloropropene	U		0.000766	0.00273	1	10/14/2019 17:43	WG1362682
1,3-Dichloropropane	U		0.00191	0.00547	1	10/14/2019 17:43	WG1362682
cis-1,3-Dichloropropene	U		0.000742	0.00273	1	10/14/2019 17:43	WG1362682
trans-1,3-Dichloropropene	U		0.00167	0.00547	1	10/14/2019 17:43	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00153	0.00547	1	10/14/2019 17:43	WG1362682
2,2-Dichloropropane	U		0.000867	0.00273	1	10/14/2019 17:43	WG1362682
Di-isopropyl ether	U		0.000383	0.00109	1	10/14/2019 17:43	WG1362682
Ethylbenzene	U		0.000580	0.00273	1	10/14/2019 17:43	WG1362682
Hexachloro-1,3-butadiene	U		0.0139	0.0273	1	10/14/2019 17:43	WG1362682
2-Hexanone	U		0.0109	0.0273	1	10/14/2019 17:43	WG1362682
n-Hexane	U		0.00116	0.00547	1	10/14/2019 17:43	WG1362682
Iodomethane	U		0.00662	0.0137	1	10/14/2019 17:43	WG1362682
Isopropylbenzene	U		0.000944	0.00273	1	10/14/2019 17:43	WG1362682
p-Isopropyltoluene	U		0.00255	0.00547	1	10/14/2019 17:43	WG1362682
2-Butanone (MEK)	0.0254	B J J0	0.0137	0.0273	1	10/14/2019 17:43	WG1362682
Methylene Chloride	U		0.00726	0.0273	1	10/14/2019 17:43	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0109	0.0273	1	10/14/2019 17:43	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000323	0.00109	1	10/14/2019 17:43	WG1362682
Naphthalene	U		0.00341	0.0137	1	10/14/2019 17:43	WG1362682
n-Propylbenzene	U		0.00129	0.00547	1	10/14/2019 17:43	WG1362682
Styrene	U		0.00299	0.0137	1	10/14/2019 17:43	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000547	0.00273	1	10/14/2019 17:43	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000427	0.00273	1	10/14/2019 17:43	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000738	0.00273	1	10/14/2019 17:43	WG1362682
Tetrachloroethene	U		0.000766	0.00273	1	10/14/2019 17:43	WG1362682
Toluene	U		0.00137	0.00547	1	10/14/2019 17:43	WG1362682
1,2,3-Trichlorobenzene	U		0.000684	0.00273	1	10/14/2019 17:43	WG1362682
1,2,4-Trichlorobenzene	U		0.00527	0.0137	1	10/14/2019 17:43	WG1362682
1,1,1-Trichloroethane	U		0.000301	0.00273	1	10/14/2019 17:43	WG1362682
1,1,2-Trichloroethane	U		0.000966	0.00273	1	10/14/2019 17:43	WG1362682
Trichloroethene	U		0.000438	0.00109	1	10/14/2019 17:43	WG1362682
Trichlorofluoromethane	U		0.000547	0.00273	1	10/14/2019 17:43	WG1362682
1,2,3-Trichloropropane	U		0.00558	0.0137	1	10/14/2019 17:43	WG1362682
1,2,4-Trimethylbenzene	U		0.00127	0.00547	1	10/14/2019 17:43	WG1362682
1,2,3-Trimethylbenzene	U		0.00126	0.00547	1	10/14/2019 17:43	WG1362682
1,3,5-Trimethylbenzene	U		0.00118	0.00547	1	10/14/2019 17:43	WG1362682
Vinyl acetate	U		0.00385	0.0137	1	10/14/2019 17:43	WG1362682
Vinyl chloride	U		0.000747	0.00273	1	10/14/2019 17:43	WG1362682
Xylenes, Total	U		0.00523	0.00711	1	10/14/2019 17:43	WG1362682
(S) Toluene-d8	*104*			*75.0-131*		*10/14/2019 17:43*	WG1362682
(S) 4-Bromofluorobenzene	*101*			*67.0-138*		*10/14/2019 17:43*	WG1362682
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*		*10/14/2019 17:43*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	85.0		1	10/12/2019 13:04	WG1361905

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0161	0.0294	1	10/14/2019 18:04	WG1362682
Acrylonitrile	U		0.00223	0.0147	1	10/14/2019 18:04	WG1362682
Benzene	U		0.000470	0.00118	1	10/14/2019 18:04	WG1362682
Bromobenzene	U		0.00124	0.0147	1	10/14/2019 18:04	WG1362682
Bromodichloromethane	U		0.000927	0.00294	1	10/14/2019 18:04	WG1362682
Bromochloromethane	U		0.00133	0.00588	1	10/14/2019 18:04	WG1362682
Bromoform	U		0.00703	0.0294	1	10/14/2019 18:04	WG1362682
Bromomethane	U		0.00435	0.0147	1	10/14/2019 18:04	WG1362682
n-Butylbenzene	U		0.00452	0.0147	1	10/14/2019 18:04	WG1362682
sec-Butylbenzene	U		0.00298	0.0147	1	10/14/2019 18:04	WG1362682
tert-Butylbenzene	U		0.00182	0.00588	1	10/14/2019 18:04	WG1362682
Carbon disulfide	U		0.00478	0.0147	1	10/14/2019 18:04	WG1362682
Carbon tetrachloride	U		0.00127	0.00588	1	10/14/2019 18:04	WG1362682
Chlorobenzene	U		0.000674	0.00294	1	10/14/2019 18:04	WG1362682
Chlorodibromomethane	U		0.000529	0.00294	1	10/14/2019 18:04	WG1362682
Chloroethane	U		0.00127	0.00588	1	10/14/2019 18:04	WG1362682
Chloroform	U		0.000488	0.00294	1	10/14/2019 18:04	WG1362682
Chloromethane	U		0.00163	0.0147	1	10/14/2019 18:04	WG1362682
2-Chlorotoluene	U		0.00108	0.00294	1	10/14/2019 18:04	WG1362682
4-Chlorotoluene	U		0.00133	0.00588	1	10/14/2019 18:04	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00600	0.0294	1	10/14/2019 18:04	WG1362682
1,2-Dibromoethane	U		0.000618	0.00294	1	10/14/2019 18:04	WG1362682
Dibromomethane	U		0.00118	0.00588	1	10/14/2019 18:04	WG1362682
1,2-Dichlorobenzene	U		0.00171	0.00588	1	10/14/2019 18:04	WG1362682
1,3-Dichlorobenzene	U		0.00200	0.00588	1	10/14/2019 18:04	WG1362682
1,4-Dichlorobenzene	U		0.00232	0.00588	1	10/14/2019 18:04	WG1362682
Dichlorodifluoromethane	U		0.000962	0.00294	1	10/14/2019 18:04	WG1362682
1,1-Dichloroethane	U		0.000676	0.00294	1	10/14/2019 18:04	WG1362682
1,2-Dichloroethane	U		0.000559	0.00294	1	10/14/2019 18:04	WG1362682
1,1-Dichloroethene	U		0.000588	0.00294	1	10/14/2019 18:04	WG1362682
cis-1,2-Dichloroethene	U		0.000812	0.00294	1	10/14/2019 18:04	WG1362682
trans-1,2-Dichloroethene	U		0.00168	0.00588	1	10/14/2019 18:04	WG1362682
1,2-Dichloropropane	U		0.00149	0.00588	1	10/14/2019 18:04	WG1362682
1,1-Dichloropropene	U		0.000823	0.00294	1	10/14/2019 18:04	WG1362682
1,3-Dichloropropane	U		0.00206	0.00588	1	10/14/2019 18:04	WG1362682
cis-1,3-Dichloropropene	U		0.000797	0.00294	1	10/14/2019 18:04	WG1362682
trans-1,3-Dichloropropene	U		0.00180	0.00588	1	10/14/2019 18:04	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00165	0.00588	1	10/14/2019 18:04	WG1362682
2,2-Dichloropropane	U		0.000933	0.00294	1	10/14/2019 18:04	WG1362682
Di-isopropyl ether	U		0.000412	0.00118	1	10/14/2019 18:04	WG1362682
Ethylbenzene	U		0.000623	0.00294	1	10/14/2019 18:04	WG1362682
Hexachloro-1,3-butadiene	U		0.0149	0.0294	1	10/14/2019 18:04	WG1362682
2-Hexanone	U		0.0118	0.0294	1	10/14/2019 18:04	WG1362682
n-Hexane	U		0.00125	0.00588	1	10/14/2019 18:04	WG1362682
Iodomethane	U		0.00712	0.0147	1	10/14/2019 18:04	WG1362682
Isopropylbenzene	U		0.00102	0.00294	1	10/14/2019 18:04	WG1362682
p-Isopropyltoluene	U		0.00274	0.00588	1	10/14/2019 18:04	WG1362682
2-Butanone (MEK)	0.0222	B J J0	0.0147	0.0294	1	10/14/2019 18:04	WG1362682
Methylene Chloride	U		0.00781	0.0294	1	10/14/2019 18:04	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0118	0.0294	1	10/14/2019 18:04	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000347	0.00118	1	10/14/2019 18:04	WG1362682
Naphthalene	U		0.00367	0.0147	1	10/14/2019 18:04	WG1362682
n-Propylbenzene	U		0.00139	0.00588	1	10/14/2019 18:04	WG1362682
Styrene	U		0.00321	0.0147	1	10/14/2019 18:04	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000588	0.00294	1	10/14/2019 18:04	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000459	0.00294	1	10/14/2019 18:04	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000794	0.00294	1	10/14/2019 18:04	WG1362682
Tetrachloroethene	U		0.000823	0.00294	1	10/14/2019 18:04	WG1362682
Toluene	U		0.00147	0.00588	1	10/14/2019 18:04	WG1362682
1,2,3-Trichlorobenzene	U		0.000735	0.00294	1	10/14/2019 18:04	WG1362682
1,2,4-Trichlorobenzene	U		0.00567	0.0147	1	10/14/2019 18:04	WG1362682
1,1,1-Trichloroethane	U		0.000323	0.00294	1	10/14/2019 18:04	WG1362682
1,1,2-Trichloroethane	U		0.00104	0.00294	1	10/14/2019 18:04	WG1362682
Trichloroethene	U		0.000470	0.00118	1	10/14/2019 18:04	WG1362682
Trichlorofluoromethane	U		0.000588	0.00294	1	10/14/2019 18:04	WG1362682
1,2,3-Trichloropropane	U		0.00600	0.0147	1	10/14/2019 18:04	WG1362682
1,2,4-Trimethylbenzene	U		0.00136	0.00588	1	10/14/2019 18:04	WG1362682
1,2,3-Trimethylbenzene	U		0.00135	0.00588	1	10/14/2019 18:04	WG1362682
1,3,5-Trimethylbenzene	U		0.00127	0.00588	1	10/14/2019 18:04	WG1362682
Vinyl acetate	U		0.00414	0.0147	1	10/14/2019 18:04	WG1362682
Vinyl chloride	U		0.000803	0.00294	1	10/14/2019 18:04	WG1362682
Xylenes, Total	U		0.00562	0.00765	1	10/14/2019 18:04	WG1362682
(S) Toluene-d8	*103*			*75.0-131*		*10/14/2019 18:04*	WG1362682
(S) 4-Bromofluorobenzene	*101*			*67.0-138*		*10/14/2019 18:04*	WG1362682
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/14/2019 18:04*	WG1362682

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	92.2		1	10/12/2019 13:04	WG1361905

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0149	0.0271	1	10/14/2019 18:24	WG1362682
Acrylonitrile	U		0.00206	0.0136	1	10/14/2019 18:24	WG1362682
Benzene	U		0.000434	0.00109	1	10/14/2019 18:24	WG1362682
Bromobenzene	U		0.00114	0.0136	1	10/14/2019 18:24	WG1362682
Bromodichloromethane	U		0.000855	0.00271	1	10/14/2019 18:24	WG1362682
Bromochloromethane	U		0.00123	0.00543	1	10/14/2019 18:24	WG1362682
Bromoform	U		0.00649	0.0271	1	10/14/2019 18:24	WG1362682
Bromomethane	U		0.00402	0.0136	1	10/14/2019 18:24	WG1362682
n-Butylbenzene	U		0.00417	0.0136	1	10/14/2019 18:24	WG1362682
sec-Butylbenzene	U		0.00275	0.0136	1	10/14/2019 18:24	WG1362682
tert-Butylbenzene	U		0.00168	0.00543	1	10/14/2019 18:24	WG1362682
Carbon disulfide	U		0.00441	0.0136	1	10/14/2019 18:24	WG1362682
Carbon tetrachloride	U		0.00117	0.00543	1	10/14/2019 18:24	WG1362682
Chlorobenzene	U		0.000622	0.00271	1	10/14/2019 18:24	WG1362682
Chlorodibromomethane	U		0.000488	0.00271	1	10/14/2019 18:24	WG1362682
Chloroethane	U		0.00117	0.00543	1	10/14/2019 18:24	WG1362682
Chloroform	U		0.000450	0.00271	1	10/14/2019 18:24	WG1362682
Chloromethane	U		0.00151	0.0136	1	10/14/2019 18:24	WG1362682
2-Chlorotoluene	U		0.000998	0.00271	1	10/14/2019 18:24	WG1362682
4-Chlorotoluene	U		0.00123	0.00543	1	10/14/2019 18:24	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00553	0.0271	1	10/14/2019 18:24	WG1362682
1,2-Dibromoethane	U		0.000570	0.00271	1	10/14/2019 18:24	WG1362682
Dibromomethane	U		0.00109	0.00543	1	10/14/2019 18:24	WG1362682
1,2-Dichlorobenzene	U		0.00157	0.00543	1	10/14/2019 18:24	WG1362682
1,3-Dichlorobenzene	U		0.00184	0.00543	1	10/14/2019 18:24	WG1362682
1,4-Dichlorobenzene	U		0.00214	0.00543	1	10/14/2019 18:24	WG1362682
Dichlorodifluoromethane	U		0.000888	0.00271	1	10/14/2019 18:24	WG1362682
1,1-Dichloroethane	U		0.000624	0.00271	1	10/14/2019 18:24	WG1362682
1,2-Dichloroethane	U		0.000515	0.00271	1	10/14/2019 18:24	WG1362682
1,1-Dichloroethene	U		0.000543	0.00271	1	10/14/2019 18:24	WG1362682
cis-1,2-Dichloroethene	U		0.000749	0.00271	1	10/14/2019 18:24	WG1362682
trans-1,2-Dichloroethene	U		0.00155	0.00543	1	10/14/2019 18:24	WG1362682
1,2-Dichloropropane	U		0.00138	0.00543	1	10/14/2019 18:24	WG1362682
1,1-Dichloropropene	U		0.000760	0.00271	1	10/14/2019 18:24	WG1362682
1,3-Dichloropropane	U		0.00190	0.00543	1	10/14/2019 18:24	WG1362682
cis-1,3-Dichloropropene	U		0.000736	0.00271	1	10/14/2019 18:24	WG1362682
trans-1,3-Dichloropropene	U		0.00166	0.00543	1	10/14/2019 18:24	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00152	0.00543	1	10/14/2019 18:24	WG1362682
2,2-Dichloropropane	U		0.000861	0.00271	1	10/14/2019 18:24	WG1362682
Di-isopropyl ether	U		0.000380	0.00109	1	10/14/2019 18:24	WG1362682
Ethylbenzene	U		0.000575	0.00271	1	10/14/2019 18:24	WG1362682
Hexachloro-1,3-butadiene	U		0.0138	0.0271	1	10/14/2019 18:24	WG1362682
2-Hexanone	U		0.0109	0.0271	1	10/14/2019 18:24	WG1362682
n-Hexane	U		0.00115	0.00543	1	10/14/2019 18:24	WG1362682
Iodomethane	U		0.00657	0.0136	1	10/14/2019 18:24	WG1362682
Isopropylbenzene	U		0.000936	0.00271	1	10/14/2019 18:24	WG1362682
p-Isopropyltoluene	U		0.00253	0.00543	1	10/14/2019 18:24	WG1362682
2-Butanone (MEK)	0.0220	B J J0	0.0136	0.0271	1	10/14/2019 18:24	WG1362682
Methylene Chloride	U		0.00721	0.0271	1	10/14/2019 18:24	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0109	0.0271	1	10/14/2019 18:24	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000320	0.00109	1	10/14/2019 18:24	WG1362682
Naphthalene	U		0.00339	0.0136	1	10/14/2019 18:24	WG1362682
n-Propylbenzene	U		0.00128	0.00543	1	10/14/2019 18:24	WG1362682
Styrene	U		0.00296	0.0136	1	10/14/2019 18:24	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000543	0.00271	1	10/14/2019 18:24	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000423	0.00271	1	10/14/2019 18:24	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000732	0.00271	1	10/14/2019 18:24	WG1362682
Tetrachloroethene	U		0.000760	0.00271	1	10/14/2019 18:24	WG1362682
Toluene	0.00211	J	0.00136	0.00543	1	10/14/2019 18:24	WG1362682
1,2,3-Trichlorobenzene	U		0.000678	0.00271	1	10/14/2019 18:24	WG1362682
1,2,4-Trichlorobenzene	U		0.00523	0.0136	1	10/14/2019 18:24	WG1362682
1,1,1-Trichloroethane	U		0.000298	0.00271	1	10/14/2019 18:24	WG1362682
1,1,2-Trichloroethane	U		0.000958	0.00271	1	10/14/2019 18:24	WG1362682
Trichloroethene	U		0.000434	0.00109	1	10/14/2019 18:24	WG1362682
Trichlorofluoromethane	U		0.000543	0.00271	1	10/14/2019 18:24	WG1362682
1,2,3-Trichloropropane	U		0.00553	0.0136	1	10/14/2019 18:24	WG1362682
1,2,4-Trimethylbenzene	U		0.00126	0.00543	1	10/14/2019 18:24	WG1362682
1,2,3-Trimethylbenzene	U		0.00125	0.00543	1	10/14/2019 18:24	WG1362682
1,3,5-Trimethylbenzene	U		0.00117	0.00543	1	10/14/2019 18:24	WG1362682
Vinyl acetate	U		0.00382	0.0136	1	10/14/2019 18:24	WG1362682
Vinyl chloride	U		0.000741	0.00271	1	10/14/2019 18:24	WG1362682
Xylenes, Total	U		0.00519	0.00705	1	10/14/2019 18:24	WG1362682
(S) Toluene-d8	*103*			*75.0-131*		*10/14/2019 18:24*	WG1362682
(S) 4-Bromofluorobenzene	*104*			*67.0-138*		*10/14/2019 18:24*	WG1362682
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*		*10/14/2019 18:24*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	98.4		1	10/12/2019 12:50	WG1361906

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0139	0.0254	1	10/14/2019 18:44	WG1362682
Acrylonitrile	U		0.00193	0.0127	1	10/14/2019 18:44	WG1362682
Benzene	U		0.000406	0.00102	1	10/14/2019 18:44	WG1362682
Bromobenzene	U		0.00107	0.0127	1	10/14/2019 18:44	WG1362682
Bromodichloromethane	U		0.000800	0.00254	1	10/14/2019 18:44	WG1362682
Bromochloromethane	U		0.00115	0.00508	1	10/14/2019 18:44	WG1362682
Bromoform	U		0.00607	0.0254	1	10/14/2019 18:44	WG1362682
Bromomethane	U		0.00376	0.0127	1	10/14/2019 18:44	WG1362682
n-Butylbenzene	U		0.00390	0.0127	1	10/14/2019 18:44	WG1362682
sec-Butylbenzene	U		0.00257	0.0127	1	10/14/2019 18:44	WG1362682
tert-Butylbenzene	U		0.00157	0.00508	1	10/14/2019 18:44	WG1362682
Carbon disulfide	U		0.00412	0.0127	1	10/14/2019 18:44	WG1362682
Carbon tetrachloride	U		0.00110	0.00508	1	10/14/2019 18:44	WG1362682
Chlorobenzene	U		0.000582	0.00254	1	10/14/2019 18:44	WG1362682
Chlorodibromomethane	U		0.000457	0.00254	1	10/14/2019 18:44	WG1362682
Chloroethane	U		0.00110	0.00508	1	10/14/2019 18:44	WG1362682
Chloroform	U		0.000422	0.00254	1	10/14/2019 18:44	WG1362682
Chloromethane	U		0.00141	0.0127	1	10/14/2019 18:44	WG1362682
2-Chlorotoluene	U		0.000935	0.00254	1	10/14/2019 18:44	WG1362682
4-Chlorotoluene	U		0.00115	0.00508	1	10/14/2019 18:44	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00518	0.0254	1	10/14/2019 18:44	WG1362682
1,2-Dibromoethane	U		0.000533	0.00254	1	10/14/2019 18:44	WG1362682
Dibromomethane	U		0.00102	0.00508	1	10/14/2019 18:44	WG1362682
1,2-Dichlorobenzene	U		0.00147	0.00508	1	10/14/2019 18:44	WG1362682
1,3-Dichlorobenzene	U		0.00173	0.00508	1	10/14/2019 18:44	WG1362682
1,4-Dichlorobenzene	U		0.00200	0.00508	1	10/14/2019 18:44	WG1362682
Dichlorodifluoromethane	U		0.000831	0.00254	1	10/14/2019 18:44	WG1362682
1,1-Dichloroethane	U		0.000584	0.00254	1	10/14/2019 18:44	WG1362682
1,2-Dichloroethane	U		0.000483	0.00254	1	10/14/2019 18:44	WG1362682
1,1-Dichloroethene	U		0.000508	0.00254	1	10/14/2019 18:44	WG1362682
cis-1,2-Dichloroethene	U		0.000701	0.00254	1	10/14/2019 18:44	WG1362682
trans-1,2-Dichloroethene	U		0.00145	0.00508	1	10/14/2019 18:44	WG1362682
1,2-Dichloropropane	U		0.00129	0.00508	1	10/14/2019 18:44	WG1362682
1,1-Dichloropropene	U		0.000711	0.00254	1	10/14/2019 18:44	WG1362682
1,3-Dichloropropane	U		0.00178	0.00508	1	10/14/2019 18:44	WG1362682
cis-1,3-Dichloropropene	U		0.000689	0.00254	1	10/14/2019 18:44	WG1362682
trans-1,3-Dichloropropene	U		0.00155	0.00508	1	10/14/2019 18:44	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00142	0.00508	1	10/14/2019 18:44	WG1362682
2,2-Dichloropropane	U		0.000806	0.00254	1	10/14/2019 18:44	WG1362682
Di-isopropyl ether	U		0.000356	0.00102	1	10/14/2019 18:44	WG1362682
Ethylbenzene	U		0.000538	0.00254	1	10/14/2019 18:44	WG1362682
Hexachloro-1,3-butadiene	U		0.0129	0.0254	1	10/14/2019 18:44	WG1362682
2-Hexanone	U		0.0102	0.0254	1	10/14/2019 18:44	WG1362682
n-Hexane	U		0.00108	0.00508	1	10/14/2019 18:44	WG1362682
Iodomethane	U		0.00615	0.0127	1	10/14/2019 18:44	WG1362682
Isopropylbenzene	U		0.000877	0.00254	1	10/14/2019 18:44	WG1362682
p-Isopropyltoluene	U		0.00237	0.00508	1	10/14/2019 18:44	WG1362682
2-Butanone (MEK)	0.0207	B J J0	0.0127	0.0254	1	10/14/2019 18:44	WG1362682
Methylene Chloride	U		0.00675	0.0254	1	10/14/2019 18:44	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0102	0.0254	1	10/14/2019 18:44	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000300	0.00102	1	10/14/2019 18:44	WG1362682
Naphthalene	U		0.00317	0.0127	1	10/14/2019 18:44	WG1362682
n-Propylbenzene	U		0.00120	0.00508	1	10/14/2019 18:44	WG1362682
Styrene	U		0.00277	0.0127	1	10/14/2019 18:44	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000508	0.00254	1	10/14/2019 18:44	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000396	0.00254	1	10/14/2019 18:44	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000686	0.00254	1	10/14/2019 18:44	WG1362682
Tetrachloroethene	U		0.000711	0.00254	1	10/14/2019 18:44	WG1362682
Toluene	0.00130	J	0.00127	0.00508	1	10/14/2019 18:44	WG1362682
1,2,3-Trichlorobenzene	U		0.000635	0.00254	1	10/14/2019 18:44	WG1362682
1,2,4-Trichlorobenzene	U		0.00490	0.0127	1	10/14/2019 18:44	WG1362682
1,1,1-Trichloroethane	U		0.000279	0.00254	1	10/14/2019 18:44	WG1362682
1,1,2-Trichloroethane	U		0.000897	0.00254	1	10/14/2019 18:44	WG1362682
Trichloroethene	U		0.000406	0.00102	1	10/14/2019 18:44	WG1362682
Trichlorofluoromethane	U		0.000508	0.00254	1	10/14/2019 18:44	WG1362682
1,2,3-Trichloropropane	U		0.00518	0.0127	1	10/14/2019 18:44	WG1362682
1,2,4-Trimethylbenzene	U		0.00118	0.00508	1	10/14/2019 18:44	WG1362682
1,2,3-Trimethylbenzene	U		0.00117	0.00508	1	10/14/2019 18:44	WG1362682
1,3,5-Trimethylbenzene	U		0.00110	0.00508	1	10/14/2019 18:44	WG1362682
Vinyl acetate	U		0.00358	0.0127	1	10/14/2019 18:44	WG1362682
Vinyl chloride	U		0.000694	0.00254	1	10/14/2019 18:44	WG1362682
Xylenes, Total	U		0.00486	0.00660	1	10/14/2019 18:44	WG1362682
(S) Toluene-d8	*103*			*75.0-131*		*10/14/2019 18:44*	WG1362682
(S) 4-Bromofluorobenzene	*102*			*67.0-138*		*10/14/2019 18:44*	WG1362682
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/14/2019 18:44*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	92.9		1	10/12/2019 12:50	WG1361906

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0147	0.0269	1	10/14/2019 19:05	WG1362682
Acrylonitrile	U		0.00205	0.0135	1	10/14/2019 19:05	WG1362682
Benzene	U		0.000431	0.00108	1	10/14/2019 19:05	WG1362682
Bromobenzene	U		0.00113	0.0135	1	10/14/2019 19:05	WG1362682
Bromodichloromethane	U		0.000848	0.00269	1	10/14/2019 19:05	WG1362682
Bromochloromethane	U		0.00122	0.00538	1	10/14/2019 19:05	WG1362682
Bromoform	U		0.00644	0.0269	1	10/14/2019 19:05	WG1362682
Bromomethane	U		0.00398	0.0135	1	10/14/2019 19:05	WG1362682
n-Butylbenzene	U		0.00413	0.0135	1	10/14/2019 19:05	WG1362682
sec-Butylbenzene	U		0.00272	0.0135	1	10/14/2019 19:05	WG1362682
tert-Butylbenzene	U		0.00167	0.00538	1	10/14/2019 19:05	WG1362682
Carbon disulfide	U		0.00437	0.0135	1	10/14/2019 19:05	WG1362682
Carbon tetrachloride	U		0.00116	0.00538	1	10/14/2019 19:05	WG1362682
Chlorobenzene	U		0.000617	0.00269	1	10/14/2019 19:05	WG1362682
Chlorodibromomethane	U		0.000484	0.00269	1	10/14/2019 19:05	WG1362682
Chloroethane	U		0.00116	0.00538	1	10/14/2019 19:05	WG1362682
Chloroform	0.000503	B J	0.000447	0.00269	1	10/14/2019 19:05	WG1362682
Chloromethane	U		0.00150	0.0135	1	10/14/2019 19:05	WG1362682
2-Chlorotoluene	U		0.000991	0.00269	1	10/14/2019 19:05	WG1362682
4-Chlorotoluene	U		0.00122	0.00538	1	10/14/2019 19:05	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00549	0.0269	1	10/14/2019 19:05	WG1362682
1,2-Dibromoethane	U		0.000565	0.00269	1	10/14/2019 19:05	WG1362682
Dibromomethane	U		0.00108	0.00538	1	10/14/2019 19:05	WG1362682
1,2-Dichlorobenzene	U		0.00156	0.00538	1	10/14/2019 19:05	WG1362682
1,3-Dichlorobenzene	U		0.00183	0.00538	1	10/14/2019 19:05	WG1362682
1,4-Dichlorobenzene	U		0.00212	0.00538	1	10/14/2019 19:05	WG1362682
Dichlorodifluoromethane	U		0.000881	0.00269	1	10/14/2019 19:05	WG1362682
1,1-Dichloroethane	U		0.000619	0.00269	1	10/14/2019 19:05	WG1362682
1,2-Dichloroethane	U		0.000511	0.00269	1	10/14/2019 19:05	WG1362682
1,1-Dichloroethene	U		0.000538	0.00269	1	10/14/2019 19:05	WG1362682
cis-1,2-Dichloroethene	U		0.000743	0.00269	1	10/14/2019 19:05	WG1362682
trans-1,2-Dichloroethene	U		0.00154	0.00538	1	10/14/2019 19:05	WG1362682
1,2-Dichloropropane	U		0.00137	0.00538	1	10/14/2019 19:05	WG1362682
1,1-Dichloropropene	U		0.000754	0.00269	1	10/14/2019 19:05	WG1362682
1,3-Dichloropropane	U		0.00188	0.00538	1	10/14/2019 19:05	WG1362682
cis-1,3-Dichloropropene	U		0.000730	0.00269	1	10/14/2019 19:05	WG1362682
trans-1,3-Dichloropropene	U		0.00165	0.00538	1	10/14/2019 19:05	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00151	0.00538	1	10/14/2019 19:05	WG1362682
2,2-Dichloropropane	U		0.000854	0.00269	1	10/14/2019 19:05	WG1362682
Di-isopropyl ether	U		0.000377	0.00108	1	10/14/2019 19:05	WG1362682
Ethylbenzene	U		0.000571	0.00269	1	10/14/2019 19:05	WG1362682
Hexachloro-1,3-butadiene	U		0.0137	0.0269	1	10/14/2019 19:05	WG1362682
2-Hexanone	U		0.0108	0.0269	1	10/14/2019 19:05	WG1362682
n-Hexane	U		0.00114	0.00538	1	10/14/2019 19:05	WG1362682
Iodomethane	U		0.00651	0.0135	1	10/14/2019 19:05	WG1362682
Isopropylbenzene	U		0.000929	0.00269	1	10/14/2019 19:05	WG1362682
p-Isopropyltoluene	U		0.00251	0.00538	1	10/14/2019 19:05	WG1362682
2-Butanone (MEK)	0.0173	B J J0	0.0135	0.0269	1	10/14/2019 19:05	WG1362682
Methylene Chloride	U		0.00715	0.0269	1	10/14/2019 19:05	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0108	0.0269	1	10/14/2019 19:05	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000318	0.00108	1	10/14/2019 19:05	WG1362682
Naphthalene	U		0.00336	0.0135	1	10/14/2019 19:05	WG1362682
n-Propylbenzene	U		0.00127	0.00538	1	10/14/2019 19:05	WG1362682
Styrene	U		0.00294	0.0135	1	10/14/2019 19:05	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000538	0.00269	1	10/14/2019 19:05	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000420	0.00269	1	10/14/2019 19:05	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000727	0.00269	1	10/14/2019 19:05	WG1362682
Tetrachloroethene	U		0.000754	0.00269	1	10/14/2019 19:05	WG1362682
Toluene	0.00241	J	0.00135	0.00538	1	10/14/2019 19:05	WG1362682
1,2,3-Trichlorobenzene	U		0.000673	0.00269	1	10/14/2019 19:05	WG1362682
1,2,4-Trichlorobenzene	U		0.00519	0.0135	1	10/14/2019 19:05	WG1362682
1,1,1-Trichloroethane	U		0.000296	0.00269	1	10/14/2019 19:05	WG1362682
1,1,2-Trichloroethane	U		0.000951	0.00269	1	10/14/2019 19:05	WG1362682
Trichloroethene	U		0.000431	0.00108	1	10/14/2019 19:05	WG1362682
Trichlorofluoromethane	U		0.000538	0.00269	1	10/14/2019 19:05	WG1362682
1,2,3-Trichloropropane	U		0.00549	0.0135	1	10/14/2019 19:05	WG1362682
1,2,4-Trimethylbenzene	U		0.00125	0.00538	1	10/14/2019 19:05	WG1362682
1,2,3-Trimethylbenzene	U		0.00124	0.00538	1	10/14/2019 19:05	WG1362682
1,3,5-Trimethylbenzene	U		0.00116	0.00538	1	10/14/2019 19:05	WG1362682
Vinyl acetate	U		0.00379	0.0135	1	10/14/2019 19:05	WG1362682
Vinyl chloride	U		0.000735	0.00269	1	10/14/2019 19:05	WG1362682
Xylenes, Total	U		0.00515	0.00700	1	10/14/2019 19:05	WG1362682
(S) Toluene-d8	*104*			*75.0-131*		*10/14/2019 19:05*	WG1362682
(S) 4-Bromofluorobenzene	*102*			*67.0-138*		*10/14/2019 19:05*	WG1362682
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*		*10/14/2019 19:05*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	99.2		1	10/12/2019 12:50	WG1361906

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0138	0.0252	1	10/14/2019 19:25	WG1362682
Acrylonitrile	U		0.00192	0.0126	1	10/14/2019 19:25	WG1362682
Benzene	U		0.000403	0.00101	1	10/14/2019 19:25	WG1362682
Bromobenzene	U		0.00106	0.0126	1	10/14/2019 19:25	WG1362682
Bromodichloromethane	U		0.000794	0.00252	1	10/14/2019 19:25	WG1362682
Bromochloromethane	U		0.00114	0.00504	1	10/14/2019 19:25	WG1362682
Bromoform	U		0.00603	0.0252	1	10/14/2019 19:25	WG1362682
Bromomethane	U		0.00373	0.0126	1	10/14/2019 19:25	WG1362682
n-Butylbenzene	U		0.00387	0.0126	1	10/14/2019 19:25	WG1362682
sec-Butylbenzene	U		0.00255	0.0126	1	10/14/2019 19:25	WG1362682
tert-Butylbenzene	U		0.00156	0.00504	1	10/14/2019 19:25	WG1362682
Carbon disulfide	U		0.00409	0.0126	1	10/14/2019 19:25	WG1362682
Carbon tetrachloride	U		0.00109	0.00504	1	10/14/2019 19:25	WG1362682
Chlorobenzene	U		0.000578	0.00252	1	10/14/2019 19:25	WG1362682
Chlorodibromomethane	U		0.000454	0.00252	1	10/14/2019 19:25	WG1362682
Chloroethane	U		0.00109	0.00504	1	10/14/2019 19:25	WG1362682
Chloroform	0.000454	B J	0.000418	0.00252	1	10/14/2019 19:25	WG1362682
Chloromethane	U		0.00140	0.0126	1	10/14/2019 19:25	WG1362682
2-Chlorotoluene	U		0.000927	0.00252	1	10/14/2019 19:25	WG1362682
4-Chlorotoluene	U		0.00114	0.00504	1	10/14/2019 19:25	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00514	0.0252	1	10/14/2019 19:25	WG1362682
1,2-Dibromoethane	U		0.000529	0.00252	1	10/14/2019 19:25	WG1362682
Dibromomethane	U		0.00101	0.00504	1	10/14/2019 19:25	WG1362682
1,2-Dichlorobenzene	U		0.00146	0.00504	1	10/14/2019 19:25	WG1362682
1,3-Dichlorobenzene	U		0.00171	0.00504	1	10/14/2019 19:25	WG1362682
1,4-Dichlorobenzene	U		0.00199	0.00504	1	10/14/2019 19:25	WG1362682
Dichlorodifluoromethane	U		0.000825	0.00252	1	10/14/2019 19:25	WG1362682
1,1-Dichloroethane	U		0.000580	0.00252	1	10/14/2019 19:25	WG1362682
1,2-Dichloroethane	U		0.000479	0.00252	1	10/14/2019 19:25	WG1362682
1,1-Dichloroethene	U		0.000504	0.00252	1	10/14/2019 19:25	WG1362682
cis-1,2-Dichloroethene	U		0.000695	0.00252	1	10/14/2019 19:25	WG1362682
trans-1,2-Dichloroethene	U		0.00144	0.00504	1	10/14/2019 19:25	WG1362682
1,2-Dichloropropane	U		0.00128	0.00504	1	10/14/2019 19:25	WG1362682
1,1-Dichloropropene	U		0.000706	0.00252	1	10/14/2019 19:25	WG1362682
1,3-Dichloropropane	U		0.00176	0.00504	1	10/14/2019 19:25	WG1362682
cis-1,3-Dichloropropene	U		0.000683	0.00252	1	10/14/2019 19:25	WG1362682
trans-1,3-Dichloropropene	U		0.00154	0.00504	1	10/14/2019 19:25	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00141	0.00504	1	10/14/2019 19:25	WG1362682
2,2-Dichloropropane	U		0.000799	0.00252	1	10/14/2019 19:25	WG1362682
Di-isopropyl ether	U		0.000353	0.00101	1	10/14/2019 19:25	WG1362682
Ethylbenzene	U		0.000534	0.00252	1	10/14/2019 19:25	WG1362682
Hexachloro-1,3-butadiene	U		0.0128	0.0252	1	10/14/2019 19:25	WG1362682
2-Hexanone	U		0.0101	0.0252	1	10/14/2019 19:25	WG1362682
n-Hexane	U		0.00107	0.00504	1	10/14/2019 19:25	WG1362682
Iodomethane	U		0.00610	0.0126	1	10/14/2019 19:25	WG1362682
Isopropylbenzene	U		0.000870	0.00252	1	10/14/2019 19:25	WG1362682
p-Isopropyltoluene	U		0.00235	0.00504	1	10/14/2019 19:25	WG1362682
2-Butanone (MEK)	0.0163	B J J0	0.0126	0.0252	1	10/14/2019 19:25	WG1362682
Methylene Chloride	U		0.00669	0.0252	1	10/14/2019 19:25	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0101	0.0252	1	10/14/2019 19:25	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000297	0.00101	1	10/14/2019 19:25	WG1362682
Naphthalene	U		0.00314	0.0126	1	10/14/2019 19:25	WG1362682
n-Propylbenzene	U		0.00119	0.00504	1	10/14/2019 19:25	WG1362682
Styrene	U		0.00275	0.0126	1	10/14/2019 19:25	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000504	0.00252	1	10/14/2019 19:25	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000393	0.00252	1	10/14/2019 19:25	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000680	0.00252	1	10/14/2019 19:25	WG1362682
Tetrachloroethene	U		0.000706	0.00252	1	10/14/2019 19:25	WG1362682
Toluene	0.00212	J	0.00126	0.00504	1	10/14/2019 19:25	WG1362682
1,2,3-Trichlorobenzene	U		0.000630	0.00252	1	10/14/2019 19:25	WG1362682
1,2,4-Trichlorobenzene	U		0.00486	0.0126	1	10/14/2019 19:25	WG1362682
1,1,1-Trichloroethane	U		0.000277	0.00252	1	10/14/2019 19:25	WG1362682
1,1,2-Trichloroethane	U		0.000890	0.00252	1	10/14/2019 19:25	WG1362682
Trichloroethene	U		0.000403	0.00101	1	10/14/2019 19:25	WG1362682
Trichlorofluoromethane	U		0.000504	0.00252	1	10/14/2019 19:25	WG1362682
1,2,3-Trichloropropane	U		0.00514	0.0126	1	10/14/2019 19:25	WG1362682
1,2,4-Trimethylbenzene	U		0.00117	0.00504	1	10/14/2019 19:25	WG1362682
1,2,3-Trimethylbenzene	U		0.00116	0.00504	1	10/14/2019 19:25	WG1362682
1,3,5-Trimethylbenzene	U		0.00109	0.00504	1	10/14/2019 19:25	WG1362682
Vinyl acetate	U		0.00355	0.0126	1	10/14/2019 19:25	WG1362682
Vinyl chloride	U		0.000688	0.00252	1	10/14/2019 19:25	WG1362682
Xylenes, Total	U		0.00482	0.00655	1	10/14/2019 19:25	WG1362682
(S) Toluene-d8	*103*			*75.0-131*		*10/14/2019 19:25*	WG1362682
(S) 4-Bromofluorobenzene	*101*			*67.0-138*		*10/14/2019 19:25*	WG1362682
(S) 1,2-Dichloroethane-d4	*104*			*70.0-130*		*10/14/2019 19:25*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	94.8		1	10/12/2019 12:50	WG1361906

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0144	0.0264	1	10/14/2019 19:46	WG1362682
Acrylonitrile	U		0.00200	0.0132	1	10/14/2019 19:46	WG1362682
Benzene	0.000423	B J	0.000422	0.00105	1	10/14/2019 19:46	WG1362682
Bromobenzene	U		0.00111	0.0132	1	10/14/2019 19:46	WG1362682
Bromodichloromethane	U		0.000831	0.00264	1	10/14/2019 19:46	WG1362682
Bromochloromethane	U		0.00119	0.00527	1	10/14/2019 19:46	WG1362682
Bromoform	U		0.00631	0.0264	1	10/14/2019 19:46	WG1362682
Bromomethane	U		0.00390	0.0132	1	10/14/2019 19:46	WG1362682
n-Butylbenzene	U		0.00405	0.0132	1	10/14/2019 19:46	WG1362682
sec-Butylbenzene	U		0.00267	0.0132	1	10/14/2019 19:46	WG1362682
tert-Butylbenzene	U		0.00163	0.00527	1	10/14/2019 19:46	WG1362682
Carbon disulfide	U		0.00428	0.0132	1	10/14/2019 19:46	WG1362682
Carbon tetrachloride	U		0.00114	0.00527	1	10/14/2019 19:46	WG1362682
Chlorobenzene	U		0.000604	0.00264	1	10/14/2019 19:46	WG1362682
Chlorodibromomethane	U		0.000475	0.00264	1	10/14/2019 19:46	WG1362682
Chloroethane	U		0.00114	0.00527	1	10/14/2019 19:46	WG1362682
Chloroform	U		0.000438	0.00264	1	10/14/2019 19:46	WG1362682
Chloromethane	U		0.00147	0.0132	1	10/14/2019 19:46	WG1362682
2-Chlorotoluene	U		0.000970	0.00264	1	10/14/2019 19:46	WG1362682
4-Chlorotoluene	U		0.00119	0.00527	1	10/14/2019 19:46	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00538	0.0264	1	10/14/2019 19:46	WG1362682
1,2-Dibromoethane	U		0.000554	0.00264	1	10/14/2019 19:46	WG1362682
Dibromomethane	U		0.00105	0.00527	1	10/14/2019 19:46	WG1362682
1,2-Dichlorobenzene	U		0.00153	0.00527	1	10/14/2019 19:46	WG1362682
1,3-Dichlorobenzene	U		0.00179	0.00527	1	10/14/2019 19:46	WG1362682
1,4-Dichlorobenzene	U		0.00208	0.00527	1	10/14/2019 19:46	WG1362682
Dichlorodifluoromethane	U		0.000863	0.00264	1	10/14/2019 19:46	WG1362682
1,1-Dichloroethane	U		0.000606	0.00264	1	10/14/2019 19:46	WG1362682
1,2-Dichloroethane	U		0.000501	0.00264	1	10/14/2019 19:46	WG1362682
1,1-Dichloroethene	U		0.000527	0.00264	1	10/14/2019 19:46	WG1362682
cis-1,2-Dichloroethene	U		0.000728	0.00264	1	10/14/2019 19:46	WG1362682
trans-1,2-Dichloroethene	U		0.00151	0.00527	1	10/14/2019 19:46	WG1362682
1,2-Dichloropropane	U		0.00134	0.00527	1	10/14/2019 19:46	WG1362682
1,1-Dichloropropene	U		0.000738	0.00264	1	10/14/2019 19:46	WG1362682
1,3-Dichloropropane	U		0.00185	0.00527	1	10/14/2019 19:46	WG1362682
cis-1,3-Dichloropropene	U		0.000715	0.00264	1	10/14/2019 19:46	WG1362682
trans-1,3-Dichloropropene	U		0.00161	0.00527	1	10/14/2019 19:46	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00148	0.00527	1	10/14/2019 19:46	WG1362682
2,2-Dichloropropane	U		0.000836	0.00264	1	10/14/2019 19:46	WG1362682
Di-isopropyl ether	U		0.000369	0.00105	1	10/14/2019 19:46	WG1362682
Ethylbenzene	U		0.000559	0.00264	1	10/14/2019 19:46	WG1362682
Hexachloro-1,3-butadiene	U		0.0134	0.0264	1	10/14/2019 19:46	WG1362682
2-Hexanone	U		0.0105	0.0264	1	10/14/2019 19:46	WG1362682
n-Hexane	0.00452	J	0.00112	0.00527	1	10/14/2019 19:46	WG1362682
Iodomethane	U		0.00638	0.0132	1	10/14/2019 19:46	WG1362682
Isopropylbenzene	U		0.000910	0.00264	1	10/14/2019 19:46	WG1362682
p-Isopropyltoluene	U		0.00246	0.00527	1	10/14/2019 19:46	WG1362682
2-Butanone (MEK)	0.0183	B J J0	0.0132	0.0264	1	10/14/2019 19:46	WG1362682
Methylene Chloride	U		0.00700	0.0264	1	10/14/2019 19:46	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0105	0.0264	1	10/14/2019 19:46	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000311	0.00105	1	10/14/2019 19:46	WG1362682
Naphthalene	U		0.00329	0.0132	1	10/14/2019 19:46	WG1362682
n-Propylbenzene	U		0.00124	0.00527	1	10/14/2019 19:46	WG1362682
Styrene	U		0.00288	0.0132	1	10/14/2019 19:46	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000527	0.00264	1	10/14/2019 19:46	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000411	0.00264	1	10/14/2019 19:46	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000712	0.00264	1	10/14/2019 19:46	WG1362682
Tetrachloroethene	U		0.000738	0.00264	1	10/14/2019 19:46	WG1362682
Toluene	0.00355	J	0.00132	0.00527	1	10/14/2019 19:46	WG1362682
1,2,3-Trichlorobenzene	U		0.000659	0.00264	1	10/14/2019 19:46	WG1362682
1,2,4-Trichlorobenzene	U		0.00508	0.0132	1	10/14/2019 19:46	WG1362682
1,1,1-Trichloroethane	U		0.000290	0.00264	1	10/14/2019 19:46	WG1362682
1,1,2-Trichloroethane	U		0.000931	0.00264	1	10/14/2019 19:46	WG1362682
Trichloroethene	U		0.000422	0.00105	1	10/14/2019 19:46	WG1362682
Trichlorofluoromethane	U		0.000527	0.00264	1	10/14/2019 19:46	WG1362682
1,2,3-Trichloropropane	U		0.00538	0.0132	1	10/14/2019 19:46	WG1362682
1,2,4-Trimethylbenzene	U		0.00122	0.00527	1	10/14/2019 19:46	WG1362682
1,2,3-Trimethylbenzene	U		0.00121	0.00527	1	10/14/2019 19:46	WG1362682
1,3,5-Trimethylbenzene	U		0.00114	0.00527	1	10/14/2019 19:46	WG1362682
Vinyl acetate	U		0.00371	0.0132	1	10/14/2019 19:46	WG1362682
Vinyl chloride	U		0.000720	0.00264	1	10/14/2019 19:46	WG1362682
Xylenes, Total	U		0.00504	0.00685	1	10/14/2019 19:46	WG1362682
(S) Toluene-d8	*104*			*75.0-131*		*10/14/2019 19:46*	WG1362682
(S) 4-Bromofluorobenzene	*103*			*67.0-138*		*10/14/2019 19:46*	WG1362682
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/14/2019 19:46*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	86.3		1	10/12/2019 12:50	WG1361906

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0159	0.0290	1	10/14/2019 20:07	WG1362682
Acrylonitrile	U		0.00220	0.0145	1	10/14/2019 20:07	WG1362682
Benzene	U		0.000463	0.00116	1	10/14/2019 20:07	WG1362682
Bromobenzene	U		0.00122	0.0145	1	10/14/2019 20:07	WG1362682
Bromodichloromethane	U		0.000913	0.00290	1	10/14/2019 20:07	WG1362682
Bromochloromethane	U		0.00131	0.00579	1	10/14/2019 20:07	WG1362682
Bromoform	U		0.00693	0.0290	1	10/14/2019 20:07	WG1362682
Bromomethane	U		0.00429	0.0145	1	10/14/2019 20:07	WG1362682
n-Butylbenzene	U		0.00445	0.0145	1	10/14/2019 20:07	WG1362682
sec-Butylbenzene	U		0.00293	0.0145	1	10/14/2019 20:07	WG1362682
tert-Butylbenzene	U		0.00180	0.00579	1	10/14/2019 20:07	WG1362682
Carbon disulfide	U		0.00470	0.0145	1	10/14/2019 20:07	WG1362682
Carbon tetrachloride	U		0.00125	0.00579	1	10/14/2019 20:07	WG1362682
Chlorobenzene	U		0.000664	0.00290	1	10/14/2019 20:07	WG1362682
Chlorodibromomethane	U		0.000521	0.00290	1	10/14/2019 20:07	WG1362682
Chloroethane	U		0.00125	0.00579	1	10/14/2019 20:07	WG1362682
Chloroform	U		0.000481	0.00290	1	10/14/2019 20:07	WG1362682
Chloromethane	U		0.00161	0.0145	1	10/14/2019 20:07	WG1362682
2-Chlorotoluene	U		0.00107	0.00290	1	10/14/2019 20:07	WG1362682
4-Chlorotoluene	U		0.00131	0.00579	1	10/14/2019 20:07	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00591	0.0290	1	10/14/2019 20:07	WG1362682
1,2-Dibromoethane	U		0.000608	0.00290	1	10/14/2019 20:07	WG1362682
Dibromomethane	U		0.00116	0.00579	1	10/14/2019 20:07	WG1362682
1,2-Dichlorobenzene	U		0.00168	0.00579	1	10/14/2019 20:07	WG1362682
1,3-Dichlorobenzene	U		0.00197	0.00579	1	10/14/2019 20:07	WG1362682
1,4-Dichlorobenzene	U		0.00228	0.00579	1	10/14/2019 20:07	WG1362682
Dichlorodifluoromethane	U		0.000947	0.00290	1	10/14/2019 20:07	WG1362682
1,1-Dichloroethane	U		0.000666	0.00290	1	10/14/2019 20:07	WG1362682
1,2-Dichloroethane	U		0.000550	0.00290	1	10/14/2019 20:07	WG1362682
1,1-Dichloroethene	U		0.000579	0.00290	1	10/14/2019 20:07	WG1362682
cis-1,2-Dichloroethene	U		0.000799	0.00290	1	10/14/2019 20:07	WG1362682
trans-1,2-Dichloroethene	U		0.00166	0.00579	1	10/14/2019 20:07	WG1362682
1,2-Dichloropropane	U		0.00147	0.00579	1	10/14/2019 20:07	WG1362682
1,1-Dichloropropene	U		0.000811	0.00290	1	10/14/2019 20:07	WG1362682
1,3-Dichloropropane	U		0.00203	0.00579	1	10/14/2019 20:07	WG1362682
cis-1,3-Dichloropropene	U		0.000785	0.00290	1	10/14/2019 20:07	WG1362682
trans-1,3-Dichloropropene	U		0.00177	0.00579	1	10/14/2019 20:07	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00162	0.00579	1	10/14/2019 20:07	WG1362682
2,2-Dichloropropane	U		0.000918	0.00290	1	10/14/2019 20:07	WG1362682
Di-isopropyl ether	U		0.000405	0.00116	1	10/14/2019 20:07	WG1362682
Ethylbenzene	U		0.000614	0.00290	1	10/14/2019 20:07	WG1362682
Hexachloro-1,3-butadiene	U		0.0147	0.0290	1	10/14/2019 20:07	WG1362682
2-Hexanone	U		0.0116	0.0290	1	10/14/2019 20:07	WG1362682
n-Hexane	U		0.00123	0.00579	1	10/14/2019 20:07	WG1362682
Iodomethane	U		0.00701	0.0145	1	10/14/2019 20:07	WG1362682
Isopropylbenzene	U		0.000999	0.00290	1	10/14/2019 20:07	WG1362682
p-Isopropyltoluene	U		0.00270	0.00579	1	10/14/2019 20:07	WG1362682
2-Butanone (MEK)	0.0199	B J J0	0.0145	0.0290	1	10/14/2019 20:07	WG1362682
Methylene Chloride	U		0.00769	0.0290	1	10/14/2019 20:07	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0116	0.0290	1	10/14/2019 20:07	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000342	0.00116	1	10/14/2019 20:07	WG1362682
Naphthalene	U		0.00361	0.0145	1	10/14/2019 20:07	WG1362682
n-Propylbenzene	U		0.00137	0.00579	1	10/14/2019 20:07	WG1362682
Styrene	U		0.00316	0.0145	1	10/14/2019 20:07	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000579	0.00290	1	10/14/2019 20:07	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000452	0.00290	1	10/14/2019 20:07	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000782	0.00290	1	10/14/2019 20:07	WG1362682
Tetrachloroethene	U		0.000811	0.00290	1	10/14/2019 20:07	WG1362682
Toluene	0.00168	J	0.00145	0.00579	1	10/14/2019 20:07	WG1362682
1,2,3-Trichlorobenzene	U		0.000724	0.00290	1	10/14/2019 20:07	WG1362682
1,2,4-Trichlorobenzene	U		0.00558	0.0145	1	10/14/2019 20:07	WG1362682
1,1,1-Trichloroethane	U		0.000318	0.00290	1	10/14/2019 20:07	WG1362682
1,1,2-Trichloroethane	U		0.00102	0.00290	1	10/14/2019 20:07	WG1362682
Trichloroethene	U		0.000463	0.00116	1	10/14/2019 20:07	WG1362682
Trichlorofluoromethane	U		0.000579	0.00290	1	10/14/2019 20:07	WG1362682
1,2,3-Trichloropropane	U		0.00591	0.0145	1	10/14/2019 20:07	WG1362682
1,2,4-Trimethylbenzene	U		0.00134	0.00579	1	10/14/2019 20:07	WG1362682
1,2,3-Trimethylbenzene	U		0.00133	0.00579	1	10/14/2019 20:07	WG1362682
1,3,5-Trimethylbenzene	U		0.00125	0.00579	1	10/14/2019 20:07	WG1362682
Vinyl acetate	U		0.00408	0.0145	1	10/14/2019 20:07	WG1362682
Vinyl chloride	U		0.000791	0.00290	1	10/14/2019 20:07	WG1362682
Xylenes, Total	U		0.00554	0.00753	1	10/14/2019 20:07	WG1362682
(S) Toluene-d8	*103*			*75.0-131*		*10/14/2019 20:07*	WG1362682
(S) 4-Bromofluorobenzene	*104*			*67.0-138*		*10/14/2019 20:07*	WG1362682
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/14/2019 20:07*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	82.3		1	10/12/2019 12:50	WG1361906

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0166	0.0304	1	10/14/2019 20:28	WG1362682
Acrylonitrile	U		0.00231	0.0152	1	10/14/2019 20:28	WG1362682
Benzene	U		0.000486	0.00121	1	10/14/2019 20:28	WG1362682
Bromobenzene	U		0.00128	0.0152	1	10/14/2019 20:28	WG1362682
Bromodichloromethane	U		0.000957	0.00304	1	10/14/2019 20:28	WG1362682
Bromochloromethane	U		0.00137	0.00607	1	10/14/2019 20:28	WG1362682
Bromoform	U		0.00726	0.0304	1	10/14/2019 20:28	WG1362682
Bromomethane	U		0.00449	0.0152	1	10/14/2019 20:28	WG1362682
n-Butylbenzene	U		0.00467	0.0152	1	10/14/2019 20:28	WG1362682
sec-Butylbenzene	U		0.00307	0.0152	1	10/14/2019 20:28	WG1362682
tert-Butylbenzene	U		0.00188	0.00607	1	10/14/2019 20:28	WG1362682
Carbon disulfide	U		0.00493	0.0152	1	10/14/2019 20:28	WG1362682
Carbon tetrachloride	U		0.00131	0.00607	1	10/14/2019 20:28	WG1362682
Chlorobenzene	U		0.000696	0.00304	1	10/14/2019 20:28	WG1362682
Chlorodibromomethane	U		0.000547	0.00304	1	10/14/2019 20:28	WG1362682
Chloroethane	U		0.00131	0.00607	1	10/14/2019 20:28	WG1362682
Chloroform	U		0.000504	0.00304	1	10/14/2019 20:28	WG1362682
Chloromethane	U		0.00169	0.0152	1	10/14/2019 20:28	WG1362682
2-Chlorotoluene	U		0.00112	0.00304	1	10/14/2019 20:28	WG1362682
4-Chlorotoluene	U		0.00137	0.00607	1	10/14/2019 20:28	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00620	0.0304	1	10/14/2019 20:28	WG1362682
1,2-Dibromoethane	U		0.000638	0.00304	1	10/14/2019 20:28	WG1362682
Dibromomethane	U		0.00121	0.00607	1	10/14/2019 20:28	WG1362682
1,2-Dichlorobenzene	U		0.00176	0.00607	1	10/14/2019 20:28	WG1362682
1,3-Dichlorobenzene	U		0.00207	0.00607	1	10/14/2019 20:28	WG1362682
1,4-Dichlorobenzene	U		0.00239	0.00607	1	10/14/2019 20:28	WG1362682
Dichlorodifluoromethane	U		0.000994	0.00304	1	10/14/2019 20:28	WG1362682
1,1-Dichloroethane	U		0.000699	0.00304	1	10/14/2019 20:28	WG1362682
1,2-Dichloroethane	U		0.000577	0.00304	1	10/14/2019 20:28	WG1362682
1,1-Dichloroethene	U		0.000607	0.00304	1	10/14/2019 20:28	WG1362682
cis-1,2-Dichloroethene	U		0.000838	0.00304	1	10/14/2019 20:28	WG1362682
trans-1,2-Dichloroethene	U		0.00174	0.00607	1	10/14/2019 20:28	WG1362682
1,2-Dichloropropane	U		0.00154	0.00607	1	10/14/2019 20:28	WG1362682
1,1-Dichloropropene	U		0.000850	0.00304	1	10/14/2019 20:28	WG1362682
1,3-Dichloropropane	U		0.00213	0.00607	1	10/14/2019 20:28	WG1362682
cis-1,3-Dichloropropene	U		0.000824	0.00304	1	10/14/2019 20:28	WG1362682
trans-1,3-Dichloropropene	U		0.00186	0.00607	1	10/14/2019 20:28	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00170	0.00607	1	10/14/2019 20:28	WG1362682
2,2-Dichloropropane	U		0.000963	0.00304	1	10/14/2019 20:28	WG1362682
Di-isopropyl ether	U		0.000425	0.00121	1	10/14/2019 20:28	WG1362682
Ethylbenzene	U		0.000644	0.00304	1	10/14/2019 20:28	WG1362682
Hexachloro-1,3-butadiene	U		0.0154	0.0304	1	10/14/2019 20:28	WG1362682
2-Hexanone	U		0.0121	0.0304	1	10/14/2019 20:28	WG1362682
n-Hexane	U		0.00129	0.00607	1	10/14/2019 20:28	WG1362682
Iodomethane	U		0.00735	0.0152	1	10/14/2019 20:28	WG1362682
Isopropylbenzene	U		0.00105	0.00304	1	10/14/2019 20:28	WG1362682
p-Isopropyltoluene	U		0.00283	0.00607	1	10/14/2019 20:28	WG1362682
2-Butanone (MEK)	0.0198	B J J0	0.0152	0.0304	1	10/14/2019 20:28	WG1362682
Methylene Chloride	U		0.00807	0.0304	1	10/14/2019 20:28	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0121	0.0304	1	10/14/2019 20:28	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000358	0.00121	1	10/14/2019 20:28	WG1362682
Naphthalene	U		0.00379	0.0152	1	10/14/2019 20:28	WG1362682
n-Propylbenzene	U		0.00143	0.00607	1	10/14/2019 20:28	WG1362682
Styrene	U		0.00332	0.0152	1	10/14/2019 20:28	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000607	0.00304	1	10/14/2019 20:28	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000474	0.00304	1	10/14/2019 20:28	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000820	0.00304	1	10/14/2019 20:28	WG1362682
Tetrachloroethene	U		0.000850	0.00304	1	10/14/2019 20:28	WG1362682
Toluene	0.00270	J	0.00152	0.00607	1	10/14/2019 20:28	WG1362682
1,2,3-Trichlorobenzene	U		0.000759	0.00304	1	10/14/2019 20:28	WG1362682
1,2,4-Trichlorobenzene	U		0.00586	0.0152	1	10/14/2019 20:28	WG1362682
1,1,1-Trichloroethane	U		0.000334	0.00304	1	10/14/2019 20:28	WG1362682
1,1,2-Trichloroethane	U		0.00107	0.00304	1	10/14/2019 20:28	WG1362682
Trichloroethene	U		0.000486	0.00121	1	10/14/2019 20:28	WG1362682
Trichlorofluoromethane	U		0.000607	0.00304	1	10/14/2019 20:28	WG1362682
1,2,3-Trichloropropane	U		0.00620	0.0152	1	10/14/2019 20:28	WG1362682
1,2,4-Trimethylbenzene	U		0.00141	0.00607	1	10/14/2019 20:28	WG1362682
1,2,3-Trimethylbenzene	U		0.00140	0.00607	1	10/14/2019 20:28	WG1362682
1,3,5-Trimethylbenzene	U		0.00131	0.00607	1	10/14/2019 20:28	WG1362682
Vinyl acetate	U		0.00428	0.0152	1	10/14/2019 20:28	WG1362682
Vinyl chloride	U		0.000830	0.00304	1	10/14/2019 20:28	WG1362682
Xylenes, Total	U		0.00581	0.00790	1	10/14/2019 20:28	WG1362682
(S) Toluene-d8	*104*			*75.0-131*		*10/14/2019 20:28*	WG1362682
(S) 4-Bromofluorobenzene	*103*			*67.0-138*		*10/14/2019 20:28*	WG1362682
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/14/2019 20:28*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	87.3		1	10/12/2019 12:50	WG1361906

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0157	0.0286	1	10/14/2019 20:48	WG1362682
Acrylonitrile	U		0.00218	0.0143	1	10/14/2019 20:48	WG1362682
Benzene	U		0.000458	0.00114	1	10/14/2019 20:48	WG1362682
Bromobenzene	U		0.00120	0.0143	1	10/14/2019 20:48	WG1362682
Bromodichloromethane	U		0.000902	0.00286	1	10/14/2019 20:48	WG1362682
Bromochloromethane	U		0.00129	0.00572	1	10/14/2019 20:48	WG1362682
Bromoform	U		0.00685	0.0286	1	10/14/2019 20:48	WG1362682
Bromomethane	U		0.00424	0.0143	1	10/14/2019 20:48	WG1362682
n-Butylbenzene	U		0.00440	0.0143	1	10/14/2019 20:48	WG1362682
sec-Butylbenzene	U		0.00290	0.0143	1	10/14/2019 20:48	WG1362682
tert-Butylbenzene	U		0.00177	0.00572	1	10/14/2019 20:48	WG1362682
Carbon disulfide	U		0.00465	0.0143	1	10/14/2019 20:48	WG1362682
Carbon tetrachloride	U		0.00124	0.00572	1	10/14/2019 20:48	WG1362682
Chlorobenzene	U		0.000656	0.00286	1	10/14/2019 20:48	WG1362682
Chlorodibromomethane	U		0.000515	0.00286	1	10/14/2019 20:48	WG1362682
Chloroethane	U		0.00124	0.00572	1	10/14/2019 20:48	WG1362682
Chloroform	0.000661	B J	0.000475	0.00286	1	10/14/2019 20:48	WG1362682
Chloromethane	U		0.00159	0.0143	1	10/14/2019 20:48	WG1362682
2-Chlorotoluene	U		0.00105	0.00286	1	10/14/2019 20:48	WG1362682
4-Chlorotoluene	U		0.00129	0.00572	1	10/14/2019 20:48	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00584	0.0286	1	10/14/2019 20:48	WG1362682
1,2-Dibromoethane	U		0.000601	0.00286	1	10/14/2019 20:48	WG1362682
Dibromomethane	U		0.00114	0.00572	1	10/14/2019 20:48	WG1362682
1,2-Dichlorobenzene	U		0.00166	0.00572	1	10/14/2019 20:48	WG1362682
1,3-Dichlorobenzene	U		0.00195	0.00572	1	10/14/2019 20:48	WG1362682
1,4-Dichlorobenzene	U		0.00226	0.00572	1	10/14/2019 20:48	WG1362682
Dichlorodifluoromethane	U		0.000937	0.00286	1	10/14/2019 20:48	WG1362682
1,1-Dichloroethane	U		0.000658	0.00286	1	10/14/2019 20:48	WG1362682
1,2-Dichloroethane	U		0.000544	0.00286	1	10/14/2019 20:48	WG1362682
1,1-Dichloroethene	U		0.000572	0.00286	1	10/14/2019 20:48	WG1362682
cis-1,2-Dichloroethene	U		0.000790	0.00286	1	10/14/2019 20:48	WG1362682
trans-1,2-Dichloroethene	0.00185	J	0.00164	0.00572	1	10/14/2019 20:48	WG1362682
1,2-Dichloropropane	U		0.00145	0.00572	1	10/14/2019 20:48	WG1362682
1,1-Dichloropropene	U		0.000801	0.00286	1	10/14/2019 20:48	WG1362682
1,3-Dichloropropane	U		0.00200	0.00572	1	10/14/2019 20:48	WG1362682
cis-1,3-Dichloropropene	U		0.000776	0.00286	1	10/14/2019 20:48	WG1362682
trans-1,3-Dichloropropene	U		0.00175	0.00572	1	10/14/2019 20:48	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00160	0.00572	1	10/14/2019 20:48	WG1362682
2,2-Dichloropropane	U		0.000908	0.00286	1	10/14/2019 20:48	WG1362682
Di-isopropyl ether	U		0.000401	0.00114	1	10/14/2019 20:48	WG1362682
Ethylbenzene	0.000619	J	0.000607	0.00286	1	10/14/2019 20:48	WG1362682
Hexachloro-1,3-butadiene	U		0.0145	0.0286	1	10/14/2019 20:48	WG1362682
2-Hexanone	U		0.0114	0.0286	1	10/14/2019 20:48	WG1362682
n-Hexane	U		0.00121	0.00572	1	10/14/2019 20:48	WG1362682
Iodomethane	U		0.00693	0.0143	1	10/14/2019 20:48	WG1362682
Isopropylbenzene	U		0.000988	0.00286	1	10/14/2019 20:48	WG1362682
p-Isopropyltoluene	U		0.00267	0.00572	1	10/14/2019 20:48	WG1362682
2-Butanone (MEK)	0.0396	B J0	0.0143	0.0286	1	10/14/2019 20:48	WG1362682
Methylene Chloride	0.00789	J	0.00760	0.0286	1	10/14/2019 20:48	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0114	0.0286	1	10/14/2019 20:48	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000338	0.00114	1	10/14/2019 20:48	WG1362682
Naphthalene	U		0.00357	0.0143	1	10/14/2019 20:48	WG1362682
n-Propylbenzene	U		0.00135	0.00572	1	10/14/2019 20:48	WG1362682
Styrene	U		0.00313	0.0143	1	10/14/2019 20:48	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000572	0.00286	1	10/14/2019 20:48	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000447	0.00286	1	10/14/2019 20:48	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000773	0.00286	1	10/14/2019 20:48	WG1362682
Tetrachloroethene	U		0.000801	0.00286	1	10/14/2019 20:48	WG1362682
Toluene	0.0284		0.00143	0.00572	1	10/14/2019 20:48	WG1362682
1,2,3-Trichlorobenzene	U		0.000716	0.00286	1	10/14/2019 20:48	WG1362682
1,2,4-Trichlorobenzene	U		0.00552	0.0143	1	10/14/2019 20:48	WG1362682
1,1,1-Trichloroethane	U		0.000315	0.00286	1	10/14/2019 20:48	WG1362682
1,1,2-Trichloroethane	U		0.00101	0.00286	1	10/14/2019 20:48	WG1362682
Trichloroethene	U		0.000458	0.00114	1	10/14/2019 20:48	WG1362682
Trichlorofluoromethane	U		0.000572	0.00286	1	10/14/2019 20:48	WG1362682
1,2,3-Trichloropropane	U		0.00584	0.0143	1	10/14/2019 20:48	WG1362682
1,2,4-Trimethylbenzene	U		0.00133	0.00572	1	10/14/2019 20:48	WG1362682
1,2,3-Trimethylbenzene	U		0.00132	0.00572	1	10/14/2019 20:48	WG1362682
1,3,5-Trimethylbenzene	U		0.00124	0.00572	1	10/14/2019 20:48	WG1362682
Vinyl acetate	U		0.00403	0.0143	1	10/14/2019 20:48	WG1362682
Vinyl chloride	U		0.000782	0.00286	1	10/14/2019 20:48	WG1362682
Xylenes, Total	U		0.00547	0.00744	1	10/14/2019 20:48	WG1362682
(S) Toluene-d8	*103*			*75.0-131*		*10/14/2019 20:48*	WG1362682
(S) 4-Bromofluorobenzene	*104*			*67.0-138*		*10/14/2019 20:48*	WG1362682
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*		*10/14/2019 20:48*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	91.4		1	10/12/2019 12:50	WG1361906

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0150	0.0274	1	10/14/2019 21:09	WG1362682
Acrylonitrile	U		0.00208	0.0137	1	10/14/2019 21:09	WG1362682
Benzene	U		0.000438	0.00109	1	10/14/2019 21:09	WG1362682
Bromobenzene	U		0.00115	0.0137	1	10/14/2019 21:09	WG1362682
Bromodichloromethane	U		0.000862	0.00274	1	10/14/2019 21:09	WG1362682
Bromochloromethane	U		0.00124	0.00547	1	10/14/2019 21:09	WG1362682
Bromoform	U		0.00655	0.0274	1	10/14/2019 21:09	WG1362682
Bromomethane	U		0.00405	0.0137	1	10/14/2019 21:09	WG1362682
n-Butylbenzene	U		0.00420	0.0137	1	10/14/2019 21:09	WG1362682
sec-Butylbenzene	U		0.00277	0.0137	1	10/14/2019 21:09	WG1362682
tert-Butylbenzene	U		0.00170	0.00547	1	10/14/2019 21:09	WG1362682
Carbon disulfide	U		0.00444	0.0137	1	10/14/2019 21:09	WG1362682
Carbon tetrachloride	U		0.00118	0.00547	1	10/14/2019 21:09	WG1362682
Chlorobenzene	U		0.000627	0.00274	1	10/14/2019 21:09	WG1362682
Chlorodibromomethane	U		0.000493	0.00274	1	10/14/2019 21:09	WG1362682
Chloroethane	U		0.00118	0.00547	1	10/14/2019 21:09	WG1362682
Chloroform	U		0.000454	0.00274	1	10/14/2019 21:09	WG1362682
Chloromethane	U		0.00152	0.0137	1	10/14/2019 21:09	WG1362682
2-Chlorotoluene	U		0.00101	0.00274	1	10/14/2019 21:09	WG1362682
4-Chlorotoluene	U		0.00124	0.00547	1	10/14/2019 21:09	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00558	0.0274	1	10/14/2019 21:09	WG1362682
1,2-Dibromoethane	U		0.000575	0.00274	1	10/14/2019 21:09	WG1362682
Dibromomethane	U		0.00109	0.00547	1	10/14/2019 21:09	WG1362682
1,2-Dichlorobenzene	U		0.00159	0.00547	1	10/14/2019 21:09	WG1362682
1,3-Dichlorobenzene	U		0.00186	0.00547	1	10/14/2019 21:09	WG1362682
1,4-Dichlorobenzene	U		0.00216	0.00547	1	10/14/2019 21:09	WG1362682
Dichlorodifluoromethane	U		0.000895	0.00274	1	10/14/2019 21:09	WG1362682
1,1-Dichloroethane	U		0.000629	0.00274	1	10/14/2019 21:09	WG1362682
1,2-Dichloroethane	U		0.000520	0.00274	1	10/14/2019 21:09	WG1362682
1,1-Dichloroethene	U		0.000547	0.00274	1	10/14/2019 21:09	WG1362682
cis-1,2-Dichloroethene	U		0.000755	0.00274	1	10/14/2019 21:09	WG1362682
trans-1,2-Dichloroethene	U		0.00157	0.00547	1	10/14/2019 21:09	WG1362682
1,2-Dichloropropane	U		0.00139	0.00547	1	10/14/2019 21:09	WG1362682
1,1-Dichloropropene	U		0.000766	0.00274	1	10/14/2019 21:09	WG1362682
1,3-Dichloropropane	U		0.00192	0.00547	1	10/14/2019 21:09	WG1362682
cis-1,3-Dichloropropene	U		0.000742	0.00274	1	10/14/2019 21:09	WG1362682
trans-1,3-Dichloropropene	U		0.00167	0.00547	1	10/14/2019 21:09	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00153	0.00547	1	10/14/2019 21:09	WG1362682
2,2-Dichloropropane	U		0.000868	0.00274	1	10/14/2019 21:09	WG1362682
Di-isopropyl ether	U		0.000383	0.00109	1	10/14/2019 21:09	WG1362682
Ethylbenzene	U		0.000580	0.00274	1	10/14/2019 21:09	WG1362682
Hexachloro-1,3-butadiene	U		0.0139	0.0274	1	10/14/2019 21:09	WG1362682
2-Hexanone	U		0.0109	0.0274	1	10/14/2019 21:09	WG1362682
n-Hexane	U		0.00116	0.00547	1	10/14/2019 21:09	WG1362682
Iodomethane	U		0.00662	0.0137	1	10/14/2019 21:09	WG1362682
Isopropylbenzene	U		0.000945	0.00274	1	10/14/2019 21:09	WG1362682
p-Isopropyltoluene	U		0.00255	0.00547	1	10/14/2019 21:09	WG1362682
2-Butanone (MEK)	0.0204	B J J0	0.0137	0.0274	1	10/14/2019 21:09	WG1362682
Methylene Chloride	U		0.00727	0.0274	1	10/14/2019 21:09	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0109	0.0274	1	10/14/2019 21:09	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000323	0.00109	1	10/14/2019 21:09	WG1362682
Naphthalene	U		0.00341	0.0137	1	10/14/2019 21:09	WG1362682
n-Propylbenzene	U		0.00129	0.00547	1	10/14/2019 21:09	WG1362682
Styrene	U		0.00299	0.0137	1	10/14/2019 21:09	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000547	0.00274	1	10/14/2019 21:09	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000427	0.00274	1	10/14/2019 21:09	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000739	0.00274	1	10/14/2019 21:09	WG1362682
Tetrachloroethene	U		0.000766	0.00274	1	10/14/2019 21:09	WG1362682
Toluene	0.00188	J	0.00137	0.00547	1	10/14/2019 21:09	WG1362682
1,2,3-Trichlorobenzene	U		0.000684	0.00274	1	10/14/2019 21:09	WG1362682
1,2,4-Trichlorobenzene	U		0.00528	0.0137	1	10/14/2019 21:09	WG1362682
1,1,1-Trichloroethane	U		0.000301	0.00274	1	10/14/2019 21:09	WG1362682
1,1,2-Trichloroethane	U		0.000966	0.00274	1	10/14/2019 21:09	WG1362682
Trichloroethene	U		0.000438	0.00109	1	10/14/2019 21:09	WG1362682
Trichlorofluoromethane	U		0.000547	0.00274	1	10/14/2019 21:09	WG1362682
1,2,3-Trichloropropane	U		0.00558	0.0137	1	10/14/2019 21:09	WG1362682
1,2,4-Trimethylbenzene	U		0.00127	0.00547	1	10/14/2019 21:09	WG1362682
1,2,3-Trimethylbenzene	U		0.00126	0.00547	1	10/14/2019 21:09	WG1362682
1,3,5-Trimethylbenzene	U		0.00118	0.00547	1	10/14/2019 21:09	WG1362682
Vinyl acetate	U		0.00385	0.0137	1	10/14/2019 21:09	WG1362682
Vinyl chloride	U		0.000748	0.00274	1	10/14/2019 21:09	WG1362682
Xylenes, Total	U		0.00523	0.00711	1	10/14/2019 21:09	WG1362682
(S) Toluene-d8	*102*			*75.0-131*		*10/14/2019 21:09*	WG1362682
(S) 4-Bromofluorobenzene	*103*			*67.0-138*		*10/14/2019 21:09*	WG1362682
(S) 1,2-Dichloroethane-d4	*105*			*70.0-130*		*10/14/2019 21:09*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	91.3		1	10/12/2019 12:50	WG1361906

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0150	0.0274	1	10/14/2019 21:30	WG1362682
Acrylonitrile	U		0.00208	0.0137	1	10/14/2019 21:30	WG1362682
Benzene	U		0.000438	0.00110	1	10/14/2019 21:30	WG1362682
Bromobenzene	U		0.00115	0.0137	1	10/14/2019 21:30	WG1362682
Bromodichloromethane	U		0.000863	0.00274	1	10/14/2019 21:30	WG1362682
Bromochloromethane	U		0.00124	0.00548	1	10/14/2019 21:30	WG1362682
Bromoform	U		0.00655	0.0274	1	10/14/2019 21:30	WG1362682
Bromomethane	U		0.00405	0.0137	1	10/14/2019 21:30	WG1362682
n-Butylbenzene	U		0.00421	0.0137	1	10/14/2019 21:30	WG1362682
sec-Butylbenzene	U		0.00277	0.0137	1	10/14/2019 21:30	WG1362682
tert-Butylbenzene	U		0.00170	0.00548	1	10/14/2019 21:30	WG1362682
Carbon disulfide	U		0.00445	0.0137	1	10/14/2019 21:30	WG1362682
Carbon tetrachloride	U		0.00118	0.00548	1	10/14/2019 21:30	WG1362682
Chlorobenzene	U		0.000628	0.00274	1	10/14/2019 21:30	WG1362682
Chlorodibromomethane	U		0.000493	0.00274	1	10/14/2019 21:30	WG1362682
Chloroethane	U		0.00118	0.00548	1	10/14/2019 21:30	WG1362682
Chloroform	U		0.000455	0.00274	1	10/14/2019 21:30	WG1362682
Chloromethane	U		0.00152	0.0137	1	10/14/2019 21:30	WG1362682
2-Chlorotoluene	U		0.00101	0.00274	1	10/14/2019 21:30	WG1362682
4-Chlorotoluene	U		0.00124	0.00548	1	10/14/2019 21:30	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00559	0.0274	1	10/14/2019 21:30	WG1362682
1,2-Dibromoethane	U		0.000575	0.00274	1	10/14/2019 21:30	WG1362682
Dibromomethane	U		0.00110	0.00548	1	10/14/2019 21:30	WG1362682
1,2-Dichlorobenzene	U		0.00159	0.00548	1	10/14/2019 21:30	WG1362682
1,3-Dichlorobenzene	U		0.00186	0.00548	1	10/14/2019 21:30	WG1362682
1,4-Dichlorobenzene	U		0.00216	0.00548	1	10/14/2019 21:30	WG1362682
Dichlorodifluoromethane	U		0.000896	0.00274	1	10/14/2019 21:30	WG1362682
1,1-Dichloroethane	U		0.000630	0.00274	1	10/14/2019 21:30	WG1362682
1,2-Dichloroethane	U		0.000520	0.00274	1	10/14/2019 21:30	WG1362682
1,1-Dichloroethene	U		0.000548	0.00274	1	10/14/2019 21:30	WG1362682
cis-1,2-Dichloroethene	U		0.000756	0.00274	1	10/14/2019 21:30	WG1362682
trans-1,2-Dichloroethene	U		0.00157	0.00548	1	10/14/2019 21:30	WG1362682
1,2-Dichloropropane	U		0.00139	0.00548	1	10/14/2019 21:30	WG1362682
1,1-Dichloropropene	U		0.000767	0.00274	1	10/14/2019 21:30	WG1362682
1,3-Dichloropropane	U		0.00192	0.00548	1	10/14/2019 21:30	WG1362682
cis-1,3-Dichloropropene	U		0.000743	0.00274	1	10/14/2019 21:30	WG1362682
trans-1,3-Dichloropropene	U		0.00168	0.00548	1	10/14/2019 21:30	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00153	0.00548	1	10/14/2019 21:30	WG1362682
2,2-Dichloropropane	U		0.000869	0.00274	1	10/14/2019 21:30	WG1362682
Di-isopropyl ether	U		0.000383	0.00110	1	10/14/2019 21:30	WG1362682
Ethylbenzene	U		0.000580	0.00274	1	10/14/2019 21:30	WG1362682
Hexachloro-1,3-butadiene	U		0.0139	0.0274	1	10/14/2019 21:30	WG1362682
2-Hexanone	U		0.0110	0.0274	1	10/14/2019 21:30	WG1362682
n-Hexane	U		0.00116	0.00548	1	10/14/2019 21:30	WG1362682
Iodomethane	U		0.00663	0.0137	1	10/14/2019 21:30	WG1362682
Isopropylbenzene	U		0.000945	0.00274	1	10/14/2019 21:30	WG1362682
p-Isopropyltoluene	U		0.00255	0.00548	1	10/14/2019 21:30	WG1362682
2-Butanone (MEK)	0.0196	B J J0	0.0137	0.0274	1	10/14/2019 21:30	WG1362682
Methylene Chloride	U		0.00727	0.0274	1	10/14/2019 21:30	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0110	0.0274	1	10/14/2019 21:30	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000323	0.00110	1	10/14/2019 21:30	WG1362682
Naphthalene	U		0.00342	0.0137	1	10/14/2019 21:30	WG1362682
n-Propylbenzene	U		0.00129	0.00548	1	10/14/2019 21:30	WG1362682
Styrene	U		0.00299	0.0137	1	10/14/2019 21:30	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000548	0.00274	1	10/14/2019 21:30	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000427	0.00274	1	10/14/2019 21:30	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000739	0.00274	1	10/14/2019 21:30	WG1362682
Tetrachloroethene	U		0.000767	0.00274	1	10/14/2019 21:30	WG1362682
Toluene	0.00264	J	0.00137	0.00548	1	10/14/2019 21:30	WG1362682
1,2,3-Trichlorobenzene	U		0.000685	0.00274	1	10/14/2019 21:30	WG1362682
1,2,4-Trichlorobenzene	U		0.00528	0.0137	1	10/14/2019 21:30	WG1362682
1,1,1-Trichloroethane	U		0.000301	0.00274	1	10/14/2019 21:30	WG1362682
1,1,2-Trichloroethane	U		0.000967	0.00274	1	10/14/2019 21:30	WG1362682
Trichloroethene	U		0.000438	0.00110	1	10/14/2019 21:30	WG1362682
Trichlorofluoromethane	U		0.000548	0.00274	1	10/14/2019 21:30	WG1362682
1,2,3-Trichloropropane	U		0.00559	0.0137	1	10/14/2019 21:30	WG1362682
1,2,4-Trimethylbenzene	U		0.00127	0.00548	1	10/14/2019 21:30	WG1362682
1,2,3-Trimethylbenzene	U		0.00126	0.00548	1	10/14/2019 21:30	WG1362682
1,3,5-Trimethylbenzene	U		0.00118	0.00548	1	10/14/2019 21:30	WG1362682
Vinyl acetate	U		0.00386	0.0137	1	10/14/2019 21:30	WG1362682
Vinyl chloride	U		0.000748	0.00274	1	10/14/2019 21:30	WG1362682
Xylenes, Total	U		0.00524	0.00712	1	10/14/2019 21:30	WG1362682
(S) Toluene-d8	*105*			*75.0-131*		*10/14/2019 21:30*	WG1362682
(S) 4-Bromofluorobenzene	*103*			*67.0-138*		*10/14/2019 21:30*	WG1362682
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/14/2019 21:30*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	83.4		1	10/12/2019 12:50	WG1361906

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0164	0.0300	1	10/14/2019 21:51	WG1362682
Acrylonitrile	U		0.00228	0.0150	1	10/14/2019 21:51	WG1362682
Benzene	U		0.000480	0.00120	1	10/14/2019 21:51	WG1362682
Bromobenzene	U		0.00126	0.0150	1	10/14/2019 21:51	WG1362682
Bromodichloromethane	U		0.000945	0.00300	1	10/14/2019 21:51	WG1362682
Bromochloromethane	U		0.00135	0.00599	1	10/14/2019 21:51	WG1362682
Bromoform	U		0.00717	0.0300	1	10/14/2019 21:51	WG1362682
Bromomethane	U		0.00444	0.0150	1	10/14/2019 21:51	WG1362682
n-Butylbenzene	U		0.00460	0.0150	1	10/14/2019 21:51	WG1362682
sec-Butylbenzene	U		0.00303	0.0150	1	10/14/2019 21:51	WG1362682
tert-Butylbenzene	U		0.00186	0.00599	1	10/14/2019 21:51	WG1362682
Carbon disulfide	U		0.00487	0.0150	1	10/14/2019 21:51	WG1362682
Carbon tetrachloride	U		0.00129	0.00599	1	10/14/2019 21:51	WG1362682
Chlorobenzene	U		0.000687	0.00300	1	10/14/2019 21:51	WG1362682
Chlorodibromomethane	U		0.000540	0.00300	1	10/14/2019 21:51	WG1362682
Chloroethane	U		0.00129	0.00599	1	10/14/2019 21:51	WG1362682
Chloroform	0.000587	B J	0.000498	0.00300	1	10/14/2019 21:51	WG1362682
Chloromethane	U		0.00167	0.0150	1	10/14/2019 21:51	WG1362682
2-Chlorotoluene	U		0.00110	0.00300	1	10/14/2019 21:51	WG1362682
4-Chlorotoluene	U		0.00135	0.00599	1	10/14/2019 21:51	WG1362682
1,2-Dibromo-3-Chloropropane	U		0.00611	0.0300	1	10/14/2019 21:51	WG1362682
1,2-Dibromoethane	U		0.000629	0.00300	1	10/14/2019 21:51	WG1362682
Dibromomethane	U		0.00120	0.00599	1	10/14/2019 21:51	WG1362682
1,2-Dichlorobenzene	U		0.00174	0.00599	1	10/14/2019 21:51	WG1362682
1,3-Dichlorobenzene	U		0.00204	0.00599	1	10/14/2019 21:51	WG1362682
1,4-Dichlorobenzene	U		0.00236	0.00599	1	10/14/2019 21:51	WG1362682
Dichlorodifluoromethane	U		0.000981	0.00300	1	10/14/2019 21:51	WG1362682
1,1-Dichloroethane	U		0.000689	0.00300	1	10/14/2019 21:51	WG1362682
1,2-Dichloroethane	U		0.000570	0.00300	1	10/14/2019 21:51	WG1362682
1,1-Dichloroethene	U		0.000599	0.00300	1	10/14/2019 21:51	WG1362682
cis-1,2-Dichloroethene	U		0.000827	0.00300	1	10/14/2019 21:51	WG1362682
trans-1,2-Dichloroethene	U		0.00171	0.00599	1	10/14/2019 21:51	WG1362682
1,2-Dichloropropane	U		0.00152	0.00599	1	10/14/2019 21:51	WG1362682
1,1-Dichloropropene	U		0.000839	0.00300	1	10/14/2019 21:51	WG1362682
1,3-Dichloropropane	U		0.00210	0.00599	1	10/14/2019 21:51	WG1362682
cis-1,3-Dichloropropene	U		0.000813	0.00300	1	10/14/2019 21:51	WG1362682
trans-1,3-Dichloropropene	U		0.00183	0.00599	1	10/14/2019 21:51	WG1362682
trans-1,4-Dichloro-2-butene	U		0.00168	0.00599	1	10/14/2019 21:51	WG1362682
2,2-Dichloropropane	U		0.000951	0.00300	1	10/14/2019 21:51	WG1362682
Di-isopropyl ether	U		0.000420	0.00120	1	10/14/2019 21:51	WG1362682
Ethylbenzene	U		0.000635	0.00300	1	10/14/2019 21:51	WG1362682
Hexachloro-1,3-butadiene	U		0.0152	0.0300	1	10/14/2019 21:51	WG1362682
2-Hexanone	U		0.0120	0.0300	1	10/14/2019 21:51	WG1362682
n-Hexane	U		0.00127	0.00599	1	10/14/2019 21:51	WG1362682
Iodomethane	U		0.00725	0.0150	1	10/14/2019 21:51	WG1362682
Isopropylbenzene	U		0.00103	0.00300	1	10/14/2019 21:51	WG1362682
p-Isopropyltoluene	U		0.00279	0.00599	1	10/14/2019 21:51	WG1362682
2-Butanone (MEK)	0.0287	B J J0	0.0150	0.0300	1	10/14/2019 21:51	WG1362682
Methylene Chloride	U		0.00796	0.0300	1	10/14/2019 21:51	WG1362682
4-Methyl-2-pentanone (MIBK)	U		0.0120	0.0300	1	10/14/2019 21:51	WG1362682

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000354	0.00120	1	10/14/2019 21:51	WG1362682
Naphthalene	U		0.00374	0.0150	1	10/14/2019 21:51	WG1362682
n-Propylbenzene	U		0.00141	0.00599	1	10/14/2019 21:51	WG1362682
Styrene	U		0.00327	0.0150	1	10/14/2019 21:51	WG1362682
1,1,1,2-Tetrachloroethane	U		0.000599	0.00300	1	10/14/2019 21:51	WG1362682
1,1,2,2-Tetrachloroethane	U		0.000468	0.00300	1	10/14/2019 21:51	WG1362682
1,1,2-Trichlorotrifluoroethane	U		0.000809	0.00300	1	10/14/2019 21:51	WG1362682
Tetrachloroethene	U		0.000839	0.00300	1	10/14/2019 21:51	WG1362682
Toluene	0.00223	J	0.00150	0.00599	1	10/14/2019 21:51	WG1362682
1,2,3-Trichlorobenzene	U		0.000749	0.00300	1	10/14/2019 21:51	WG1362682
1,2,4-Trichlorobenzene	U		0.00578	0.0150	1	10/14/2019 21:51	WG1362682
1,1,1-Trichloroethane	U		0.000330	0.00300	1	10/14/2019 21:51	WG1362682
1,1,2-Trichloroethane	U		0.00106	0.00300	1	10/14/2019 21:51	WG1362682
Trichloroethene	U		0.000480	0.00120	1	10/14/2019 21:51	WG1362682
Trichlorofluoromethane	U		0.000599	0.00300	1	10/14/2019 21:51	WG1362682
1,2,3-Trichloropropane	U		0.00611	0.0150	1	10/14/2019 21:51	WG1362682
1,2,4-Trimethylbenzene	U		0.00139	0.00599	1	10/14/2019 21:51	WG1362682
1,2,3-Trimethylbenzene	U		0.00138	0.00599	1	10/14/2019 21:51	WG1362682
1,3,5-Trimethylbenzene	U		0.00129	0.00599	1	10/14/2019 21:51	WG1362682
Vinyl acetate	U		0.00422	0.0150	1	10/14/2019 21:51	WG1362682
Vinyl chloride	U		0.000819	0.00300	1	10/14/2019 21:51	WG1362682
Xylenes, Total	U		0.00573	0.00779	1	10/14/2019 21:51	WG1362682
(S) Toluene-d8	*103*			*75.0-131*		*10/14/2019 21:51*	WG1362682
(S) 4-Bromofluorobenzene	*102*			*67.0-138*		*10/14/2019 21:51*	WG1362682
(S) 1,2-Dichloroethane-d4	*104*			*70.0-130*		*10/14/2019 21:51*	WG1362682

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	84.4		1	10/12/2019 12:37	WG1361907

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U	J0	0.0162	0.0296	1	10/14/2019 21:23	WG1362726
Acrylonitrile	U		0.00225	0.0148	1	10/14/2019 21:23	WG1362726
Benzene	U		0.000474	0.00118	1	10/14/2019 21:23	WG1362726
Bromobenzene	U		0.00124	0.0148	1	10/14/2019 21:23	WG1362726
Bromodichloromethane	U		0.000934	0.00296	1	10/14/2019 21:23	WG1362726
Bromochloromethane	U		0.00134	0.00592	1	10/14/2019 21:23	WG1362726
Bromoform	U		0.00709	0.0296	1	10/14/2019 21:23	WG1362726
Bromomethane	U		0.00438	0.0148	1	10/14/2019 21:23	WG1362726
n-Butylbenzene	U		0.00455	0.0148	1	10/14/2019 21:23	WG1362726
sec-Butylbenzene	U		0.00300	0.0148	1	10/14/2019 21:23	WG1362726
tert-Butylbenzene	U		0.00184	0.00592	1	10/14/2019 21:23	WG1362726
Carbon disulfide	U		0.00481	0.0148	1	10/14/2019 21:23	WG1362726
Carbon tetrachloride	U	J0	0.00128	0.00592	1	10/14/2019 21:23	WG1362726
Chlorobenzene	U		0.000679	0.00296	1	10/14/2019 21:23	WG1362726
Chlorodibromomethane	U		0.000533	0.00296	1	10/14/2019 21:23	WG1362726
Chloroethane	U		0.00128	0.00592	1	10/14/2019 21:23	WG1362726
Chloroform	U		0.000492	0.00296	1	10/14/2019 21:23	WG1362726
Chloromethane	U		0.00165	0.0148	1	10/14/2019 21:23	WG1362726
2-Chlorotoluene	U		0.00109	0.00296	1	10/14/2019 21:23	WG1362726
4-Chlorotoluene	U		0.00134	0.00592	1	10/14/2019 21:23	WG1362726
1,2-Dibromo-3-Chloropropane	U		0.00604	0.0296	1	10/14/2019 21:23	WG1362726
1,2-Dibromoethane	U		0.000622	0.00296	1	10/14/2019 21:23	WG1362726
Dibromomethane	U		0.00118	0.00592	1	10/14/2019 21:23	WG1362726
1,2-Dichlorobenzene	U		0.00172	0.00592	1	10/14/2019 21:23	WG1362726
1,3-Dichlorobenzene	U		0.00201	0.00592	1	10/14/2019 21:23	WG1362726
1,4-Dichlorobenzene	U		0.00233	0.00592	1	10/14/2019 21:23	WG1362726
Dichlorodifluoromethane	U		0.000969	0.00296	1	10/14/2019 21:23	WG1362726
1,1-Dichloroethane	U		0.000681	0.00296	1	10/14/2019 21:23	WG1362726
1,2-Dichloroethane	U		0.000563	0.00296	1	10/14/2019 21:23	WG1362726
1,1-Dichloroethene	U		0.000592	0.00296	1	10/14/2019 21:23	WG1362726
cis-1,2-Dichloroethene	U		0.000818	0.00296	1	10/14/2019 21:23	WG1362726
trans-1,2-Dichloroethene	U		0.00169	0.00592	1	10/14/2019 21:23	WG1362726
1,2-Dichloropropane	U		0.00150	0.00592	1	10/14/2019 21:23	WG1362726
1,1-Dichloropropene	U		0.000829	0.00296	1	10/14/2019 21:23	WG1362726
1,3-Dichloropropane	U		0.00207	0.00592	1	10/14/2019 21:23	WG1362726
cis-1,3-Dichloropropene	U		0.000803	0.00296	1	10/14/2019 21:23	WG1362726
trans-1,3-Dichloropropene	U		0.00181	0.00592	1	10/14/2019 21:23	WG1362726
trans-1,4-Dichloro-2-butene	U		0.00166	0.00592	1	10/14/2019 21:23	WG1362726
2,2-Dichloropropane	U		0.000940	0.00296	1	10/14/2019 21:23	WG1362726
Di-isopropyl ether	U		0.000415	0.00118	1	10/14/2019 21:23	WG1362726
Ethylbenzene	U		0.000628	0.00296	1	10/14/2019 21:23	WG1362726
Hexachloro-1,3-butadiene	U		0.0150	0.0296	1	10/14/2019 21:23	WG1362726
2-Hexanone	U		0.0118	0.0296	1	10/14/2019 21:23	WG1362726
n-Hexane	U		0.00126	0.00592	1	10/14/2019 21:23	WG1362726
Iodomethane	U	J3 J4	0.00717	0.0148	1	10/14/2019 21:23	WG1362726
Isopropylbenzene	U		0.00102	0.00296	1	10/14/2019 21:23	WG1362726
p-Isopropyltoluene	U		0.00276	0.00592	1	10/14/2019 21:23	WG1362726
2-Butanone (MEK)	U		0.0148	0.0296	1	10/14/2019 21:23	WG1362726
Methylene Chloride	U		0.00787	0.0296	1	10/14/2019 21:23	WG1362726
4-Methyl-2-pentanone (MIBK)	U		0.0118	0.0296	1	10/14/2019 21:23	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000350	0.00118	1	10/14/2019 21:23	WG1362726
Naphthalene	U		0.00370	0.0148	1	10/14/2019 21:23	WG1362726
n-Propylbenzene	U		0.00140	0.00592	1	10/14/2019 21:23	WG1362726
Styrene	U		0.00323	0.0148	1	10/14/2019 21:23	WG1362726
1,1,1,2-Tetrachloroethane	U		0.000592	0.00296	1	10/14/2019 21:23	WG1362726
1,1,2,2-Tetrachloroethane	U		0.000462	0.00296	1	10/14/2019 21:23	WG1362726
1,1,2-Trichlorotrifluoroethane	U		0.000800	0.00296	1	10/14/2019 21:23	WG1362726
Tetrachloroethene	U		0.000829	0.00296	1	10/14/2019 21:23	WG1362726
Toluene	0.00263	J	0.00148	0.00592	1	10/14/2019 21:23	WG1362726
1,2,3-Trichlorobenzene	U		0.000741	0.00296	1	10/14/2019 21:23	WG1362726
1,2,4-Trichlorobenzene	U		0.00571	0.0148	1	10/14/2019 21:23	WG1362726
1,1,1-Trichloroethane	U		0.000326	0.00296	1	10/14/2019 21:23	WG1362726
1,1,2-Trichloroethane	U		0.00105	0.00296	1	10/14/2019 21:23	WG1362726
Trichloroethene	U		0.000474	0.00118	1	10/14/2019 21:23	WG1362726
Trichlorofluoromethane	U		0.000592	0.00296	1	10/14/2019 21:23	WG1362726
1,2,3-Trichloropropane	U		0.00604	0.0148	1	10/14/2019 21:23	WG1362726
1,2,4-Trimethylbenzene	U		0.00137	0.00592	1	10/14/2019 21:23	WG1362726
1,2,3-Trimethylbenzene	U		0.00136	0.00592	1	10/14/2019 21:23	WG1362726
1,3,5-Trimethylbenzene	U		0.00128	0.00592	1	10/14/2019 21:23	WG1362726
Vinyl acetate	U	J0	0.00417	0.0148	1	10/14/2019 21:23	WG1362726
Vinyl chloride	U		0.000809	0.00296	1	10/14/2019 21:23	WG1362726
Xylenes, Total	U		0.00566	0.00770	1	10/14/2019 21:23	WG1362726
(S) Toluene-d8	*106*			*75.0-131*		*10/14/2019 21:23*	WG1362726
(S) 4-Bromofluorobenzene	*99.2*			*67.0-138*		*10/14/2019 21:23*	WG1362726
(S) 1,2-Dichloroethane-d4	*92.6*			*70.0-130*		*10/14/2019 21:23*	WG1362726

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	84.8		1	10/12/2019 12:37	WG1361907

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U	J0	0.0161	0.0295	1	10/14/2019 21:45	WG1362726
Acrylonitrile	U		0.00224	0.0147	1	10/14/2019 21:45	WG1362726
Benzene	U		0.000471	0.00118	1	10/14/2019 21:45	WG1362726
Bromobenzene	U		0.00124	0.0147	1	10/14/2019 21:45	WG1362726
Bromodichloromethane	U		0.000929	0.00295	1	10/14/2019 21:45	WG1362726
Bromochloromethane	U		0.00133	0.00589	1	10/14/2019 21:45	WG1362726
Bromoform	U		0.00705	0.0295	1	10/14/2019 21:45	WG1362726
Bromomethane	U		0.00436	0.0147	1	10/14/2019 21:45	WG1362726
n-Butylbenzene	U		0.00453	0.0147	1	10/14/2019 21:45	WG1362726
sec-Butylbenzene	U		0.00298	0.0147	1	10/14/2019 21:45	WG1362726
tert-Butylbenzene	U		0.00183	0.00589	1	10/14/2019 21:45	WG1362726
Carbon disulfide	U		0.00479	0.0147	1	10/14/2019 21:45	WG1362726
Carbon tetrachloride	U	J0	0.00127	0.00589	1	10/14/2019 21:45	WG1362726
Chlorobenzene	U		0.000675	0.00295	1	10/14/2019 21:45	WG1362726
Chlorodibromomethane	U		0.000530	0.00295	1	10/14/2019 21:45	WG1362726
Chloroethane	U		0.00127	0.00589	1	10/14/2019 21:45	WG1362726
Chloroform	0.000500	J	0.000489	0.00295	1	10/14/2019 21:45	WG1362726
Chloromethane	U		0.00164	0.0147	1	10/14/2019 21:45	WG1362726
2-Chlorotoluene	U		0.00108	0.00295	1	10/14/2019 21:45	WG1362726
4-Chlorotoluene	U		0.00133	0.00589	1	10/14/2019 21:45	WG1362726
1,2-Dibromo-3-Chloropropane	U		0.00601	0.0295	1	10/14/2019 21:45	WG1362726
1,2-Dibromoethane	U		0.000619	0.00295	1	10/14/2019 21:45	WG1362726
Dibromomethane	U		0.00118	0.00589	1	10/14/2019 21:45	WG1362726
1,2-Dichlorobenzene	U		0.00171	0.00589	1	10/14/2019 21:45	WG1362726
1,3-Dichlorobenzene	U		0.00200	0.00589	1	10/14/2019 21:45	WG1362726
1,4-Dichlorobenzene	U		0.00232	0.00589	1	10/14/2019 21:45	WG1362726
Dichlorodifluoromethane	U		0.000964	0.00295	1	10/14/2019 21:45	WG1362726
1,1-Dichloroethane	U		0.000678	0.00295	1	10/14/2019 21:45	WG1362726
1,2-Dichloroethane	U		0.000560	0.00295	1	10/14/2019 21:45	WG1362726
1,1-Dichloroethene	U		0.000589	0.00295	1	10/14/2019 21:45	WG1362726
cis-1,2-Dichloroethene	U		0.000813	0.00295	1	10/14/2019 21:45	WG1362726
trans-1,2-Dichloroethene	U		0.00169	0.00589	1	10/14/2019 21:45	WG1362726
1,2-Dichloropropane	U		0.00150	0.00589	1	10/14/2019 21:45	WG1362726
1,1-Dichloropropene	U		0.000825	0.00295	1	10/14/2019 21:45	WG1362726
1,3-Dichloropropane	U		0.00206	0.00589	1	10/14/2019 21:45	WG1362726
cis-1,3-Dichloropropene	U		0.000799	0.00295	1	10/14/2019 21:45	WG1362726
trans-1,3-Dichloropropene	U		0.00180	0.00589	1	10/14/2019 21:45	WG1362726
trans-1,4-Dichloro-2-butene	U		0.00165	0.00589	1	10/14/2019 21:45	WG1362726
2,2-Dichloropropane	U		0.000935	0.00295	1	10/14/2019 21:45	WG1362726
Di-isopropyl ether	U		0.000413	0.00118	1	10/14/2019 21:45	WG1362726
Ethylbenzene	U		0.000625	0.00295	1	10/14/2019 21:45	WG1362726
Hexachloro-1,3-butadiene	U		0.0150	0.0295	1	10/14/2019 21:45	WG1362726
2-Hexanone	U		0.0118	0.0295	1	10/14/2019 21:45	WG1362726
n-Hexane	U		0.00125	0.00589	1	10/14/2019 21:45	WG1362726
Iodomethane	U	J3 J4	0.00713	0.0147	1	10/14/2019 21:45	WG1362726
Isopropylbenzene	U		0.00102	0.00295	1	10/14/2019 21:45	WG1362726
p-Isopropyltoluene	U		0.00275	0.00589	1	10/14/2019 21:45	WG1362726
2-Butanone (MEK)	U		0.0147	0.0295	1	10/14/2019 21:45	WG1362726
Methylene Chloride	U		0.00783	0.0295	1	10/14/2019 21:45	WG1362726
4-Methyl-2-pentanone (MIBK)	U		0.0118	0.0295	1	10/14/2019 21:45	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000348	0.00118	1	10/14/2019 21:45	WG1362726
Naphthalene	U		0.00368	0.0147	1	10/14/2019 21:45	WG1362726
n-Propylbenzene	U		0.00139	0.00589	1	10/14/2019 21:45	WG1362726
Styrene	U		0.00322	0.0147	1	10/14/2019 21:45	WG1362726
1,1,1,2-Tetrachloroethane	U		0.000589	0.00295	1	10/14/2019 21:45	WG1362726
1,1,2,2-Tetrachloroethane	U		0.000460	0.00295	1	10/14/2019 21:45	WG1362726
1,1,2-Trichlorotrifluoroethane	U		0.000796	0.00295	1	10/14/2019 21:45	WG1362726
Tetrachloroethene	U		0.000825	0.00295	1	10/14/2019 21:45	WG1362726
Toluene	0.00206	J	0.00147	0.00589	1	10/14/2019 21:45	WG1362726
1,2,3-Trichlorobenzene	U		0.000737	0.00295	1	10/14/2019 21:45	WG1362726
1,2,4-Trichlorobenzene	U		0.00568	0.0147	1	10/14/2019 21:45	WG1362726
1,1,1-Trichloroethane	U		0.000324	0.00295	1	10/14/2019 21:45	WG1362726
1,1,2-Trichloroethane	U		0.00104	0.00295	1	10/14/2019 21:45	WG1362726
Trichloroethene	U		0.000471	0.00118	1	10/14/2019 21:45	WG1362726
Trichlorofluoromethane	U		0.000589	0.00295	1	10/14/2019 21:45	WG1362726
1,2,3-Trichloropropane	U		0.00601	0.0147	1	10/14/2019 21:45	WG1362726
1,2,4-Trimethylbenzene	U		0.00137	0.00589	1	10/14/2019 21:45	WG1362726
1,2,3-Trimethylbenzene	U		0.00136	0.00589	1	10/14/2019 21:45	WG1362726
1,3,5-Trimethylbenzene	U		0.00127	0.00589	1	10/14/2019 21:45	WG1362726
Vinyl acetate	U	J0	0.00415	0.0147	1	10/14/2019 21:45	WG1362726
Vinyl chloride	U		0.000805	0.00295	1	10/14/2019 21:45	WG1362726
Xylenes, Total	U		0.00563	0.00766	1	10/14/2019 21:45	WG1362726
(S) Toluene-d8	*106*			*75.0-131*		*10/14/2019 21:45*	WG1362726
(S) 4-Bromofluorobenzene	*96.1*			*67.0-138*		*10/14/2019 21:45*	WG1362726
(S) 1,2-Dichloroethane-d4	*93.7*			*70.0-130*		*10/14/2019 21:45*	WG1362726

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	85.5		1	10/12/2019 12:37	WG1361907

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U	J0	0.0160	0.0293	1	10/14/2019 22:06	WG1362726
Acrylonitrile	U		0.00222	0.0146	1	10/14/2019 22:06	WG1362726
Benzene	U		0.000468	0.00117	1	10/14/2019 22:06	WG1362726
Bromobenzene	U		0.00123	0.0146	1	10/14/2019 22:06	WG1362726
Bromodichloromethane	U		0.000922	0.00293	1	10/14/2019 22:06	WG1362726
Bromochloromethane	U		0.00132	0.00585	1	10/14/2019 22:06	WG1362726
Bromoform	U		0.00700	0.0293	1	10/14/2019 22:06	WG1362726
Bromomethane	U		0.00433	0.0146	1	10/14/2019 22:06	WG1362726
n-Butylbenzene	U		0.00449	0.0146	1	10/14/2019 22:06	WG1362726
sec-Butylbenzene	U		0.00296	0.0146	1	10/14/2019 22:06	WG1362726
tert-Butylbenzene	U		0.00181	0.00585	1	10/14/2019 22:06	WG1362726
Carbon disulfide	U		0.00475	0.0146	1	10/14/2019 22:06	WG1362726
Carbon tetrachloride	U	J0	0.00126	0.00585	1	10/14/2019 22:06	WG1362726
Chlorobenzene	U		0.000671	0.00293	1	10/14/2019 22:06	WG1362726
Chlorodibromomethane	U		0.000527	0.00293	1	10/14/2019 22:06	WG1362726
Chloroethane	U		0.00126	0.00585	1	10/14/2019 22:06	WG1362726
Chloroform	U		0.000486	0.00293	1	10/14/2019 22:06	WG1362726
Chloromethane	U		0.00163	0.0146	1	10/14/2019 22:06	WG1362726
2-Chlorotoluene	U		0.00108	0.00293	1	10/14/2019 22:06	WG1362726
4-Chlorotoluene	U		0.00132	0.00585	1	10/14/2019 22:06	WG1362726
1,2-Dibromo-3-Chloropropane	U		0.00597	0.0293	1	10/14/2019 22:06	WG1362726
1,2-Dibromoethane	U		0.000614	0.00293	1	10/14/2019 22:06	WG1362726
Dibromomethane	U		0.00117	0.00585	1	10/14/2019 22:06	WG1362726
1,2-Dichlorobenzene	U		0.00170	0.00585	1	10/14/2019 22:06	WG1362726
1,3-Dichlorobenzene	U		0.00199	0.00585	1	10/14/2019 22:06	WG1362726
1,4-Dichlorobenzene	U		0.00231	0.00585	1	10/14/2019 22:06	WG1362726
Dichlorodifluoromethane	U		0.000957	0.00293	1	10/14/2019 22:06	WG1362726
1,1-Dichloroethane	U		0.000673	0.00293	1	10/14/2019 22:06	WG1362726
1,2-Dichloroethane	U		0.000556	0.00293	1	10/14/2019 22:06	WG1362726
1,1-Dichloroethene	U		0.000585	0.00293	1	10/14/2019 22:06	WG1362726
cis-1,2-Dichloroethene	U		0.000807	0.00293	1	10/14/2019 22:06	WG1362726
trans-1,2-Dichloroethene	U		0.00167	0.00585	1	10/14/2019 22:06	WG1362726
1,2-Dichloropropane	U		0.00149	0.00585	1	10/14/2019 22:06	WG1362726
1,1-Dichloropropene	U		0.000819	0.00293	1	10/14/2019 22:06	WG1362726
1,3-Dichloropropane	U		0.00205	0.00585	1	10/14/2019 22:06	WG1362726
cis-1,3-Dichloropropene	U		0.000793	0.00293	1	10/14/2019 22:06	WG1362726
trans-1,3-Dichloropropene	U		0.00179	0.00585	1	10/14/2019 22:06	WG1362726
trans-1,4-Dichloro-2-butene	U		0.00164	0.00585	1	10/14/2019 22:06	WG1362726
2,2-Dichloropropane	U		0.000928	0.00293	1	10/14/2019 22:06	WG1362726
Di-isopropyl ether	U		0.000410	0.00117	1	10/14/2019 22:06	WG1362726
Ethylbenzene	U		0.000620	0.00293	1	10/14/2019 22:06	WG1362726
Hexachloro-1,3-butadiene	U		0.0149	0.0293	1	10/14/2019 22:06	WG1362726
2-Hexanone	U		0.0117	0.0293	1	10/14/2019 22:06	WG1362726
n-Hexane	U		0.00124	0.00585	1	10/14/2019 22:06	WG1362726
Iodomethane	U	J3 J4	0.00708	0.0146	1	10/14/2019 22:06	WG1362726
Isopropylbenzene	U		0.00101	0.00293	1	10/14/2019 22:06	WG1362726
p-Isopropyltoluene	U		0.00273	0.00585	1	10/14/2019 22:06	WG1362726
2-Butanone (MEK)	U		0.0146	0.0293	1	10/14/2019 22:06	WG1362726
Methylene Chloride	U		0.00777	0.0293	1	10/14/2019 22:06	WG1362726
4-Methyl-2-pentanone (MIBK)	U		0.0117	0.0293	1	10/14/2019 22:06	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000345	0.00117	1	10/14/2019 22:06	WG1362726
Naphthalene	U		0.00365	0.0146	1	10/14/2019 22:06	WG1362726
n-Propylbenzene	U		0.00138	0.00585	1	10/14/2019 22:06	WG1362726
Styrene	U		0.00319	0.0146	1	10/14/2019 22:06	WG1362726
1,1,1,2-Tetrachloroethane	U		0.000585	0.00293	1	10/14/2019 22:06	WG1362726
1,1,2,2-Tetrachloroethane	U		0.000456	0.00293	1	10/14/2019 22:06	WG1362726
1,1,2-Trichlorotrifluoroethane	U		0.000790	0.00293	1	10/14/2019 22:06	WG1362726
Tetrachloroethene	U		0.000819	0.00293	1	10/14/2019 22:06	WG1362726
Toluene	0.00166	J	0.00146	0.00585	1	10/14/2019 22:06	WG1362726
1,2,3-Trichlorobenzene	U		0.000731	0.00293	1	10/14/2019 22:06	WG1362726
1,2,4-Trichlorobenzene	U		0.00564	0.0146	1	10/14/2019 22:06	WG1362726
1,1,1-Trichloroethane	U		0.000322	0.00293	1	10/14/2019 22:06	WG1362726
1,1,2-Trichloroethane	U		0.00103	0.00293	1	10/14/2019 22:06	WG1362726
Trichloroethene	U		0.000468	0.00117	1	10/14/2019 22:06	WG1362726
Trichlorofluoromethane	U		0.000585	0.00293	1	10/14/2019 22:06	WG1362726
1,2,3-Trichloropropane	U		0.00597	0.0146	1	10/14/2019 22:06	WG1362726
1,2,4-Trimethylbenzene	U		0.00136	0.00585	1	10/14/2019 22:06	WG1362726
1,2,3-Trimethylbenzene	U		0.00135	0.00585	1	10/14/2019 22:06	WG1362726
1,3,5-Trimethylbenzene	U		0.00126	0.00585	1	10/14/2019 22:06	WG1362726
Vinyl acetate	U	J0	0.00412	0.0146	1	10/14/2019 22:06	WG1362726
Vinyl chloride	U		0.000799	0.00293	1	10/14/2019 22:06	WG1362726
Xylenes, Total	U		0.00559	0.00761	1	10/14/2019 22:06	WG1362726
(S) Toluene-d8	*106*			*75.0-131*		*10/14/2019 22:06*	WG1362726
(S) 4-Bromofluorobenzene	*97.1*			*67.0-138*		*10/14/2019 22:06*	WG1362726
(S) 1,2-Dichloroethane-d4	*94.3*			*70.0-130*		*10/14/2019 22:06*	WG1362726

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	79.1		1	10/12/2019 12:37	WG1361907

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0173	0.0316	1	10/15/2019 15:38	WG1363157
Acrylonitrile	U		0.00240	0.0158	1	10/15/2019 15:38	WG1363157
Benzene	U		0.000506	0.00126	1	10/15/2019 15:38	WG1363157
Bromobenzene	U		0.00133	0.0158	1	10/15/2019 15:38	WG1363157
Bromodichloromethane	U		0.000996	0.00316	1	10/15/2019 15:38	WG1363157
Bromochloromethane	U		0.00143	0.00632	1	10/15/2019 15:38	WG1363157
Bromoform	U		0.00756	0.0316	1	10/15/2019 15:38	WG1363157
Bromomethane	U		0.00468	0.0158	1	10/15/2019 15:38	WG1363157
n-Butylbenzene	U		0.00486	0.0158	1	10/15/2019 15:38	WG1363157
sec-Butylbenzene	U		0.00320	0.0158	1	10/15/2019 15:38	WG1363157
tert-Butylbenzene	U		0.00196	0.00632	1	10/15/2019 15:38	WG1363157
Carbon disulfide	U		0.00513	0.0158	1	10/15/2019 15:38	WG1363157
Carbon tetrachloride	U		0.00137	0.00632	1	10/15/2019 15:38	WG1363157
Chlorobenzene	U		0.000725	0.00316	1	10/15/2019 15:38	WG1363157
Chlorodibromomethane	U		0.000569	0.00316	1	10/15/2019 15:38	WG1363157
Chloroethane	U		0.00137	0.00632	1	10/15/2019 15:38	WG1363157
Chloroform	U		0.000525	0.00316	1	10/15/2019 15:38	WG1363157
Chloromethane	U	J4	0.00176	0.0158	1	10/15/2019 15:38	WG1363157
2-Chlorotoluene	U		0.00116	0.00316	1	10/15/2019 15:38	WG1363157
4-Chlorotoluene	U		0.00143	0.00632	1	10/15/2019 15:38	WG1363157
1,2-Dibromo-3-Chloropropane	U		0.00645	0.0316	1	10/15/2019 15:38	WG1363157
1,2-Dibromoethane	U		0.000664	0.00316	1	10/15/2019 15:38	WG1363157
Dibromomethane	U		0.00126	0.00632	1	10/15/2019 15:38	WG1363157
1,2-Dichlorobenzene	U		0.00183	0.00632	1	10/15/2019 15:38	WG1363157
1,3-Dichlorobenzene	U		0.00215	0.00632	1	10/15/2019 15:38	WG1363157
1,4-Dichlorobenzene	U		0.00249	0.00632	1	10/15/2019 15:38	WG1363157
Dichlorodifluoromethane	U		0.00103	0.00316	1	10/15/2019 15:38	WG1363157
1,1-Dichloroethane	U		0.000727	0.00316	1	10/15/2019 15:38	WG1363157
1,2-Dichloroethane	U		0.000601	0.00316	1	10/15/2019 15:38	WG1363157
1,1-Dichloroethene	U		0.000632	0.00316	1	10/15/2019 15:38	WG1363157
cis-1,2-Dichloroethene	U		0.000872	0.00316	1	10/15/2019 15:38	WG1363157
trans-1,2-Dichloroethene	U		0.00181	0.00632	1	10/15/2019 15:38	WG1363157
1,2-Dichloropropane	U		0.00161	0.00632	1	10/15/2019 15:38	WG1363157
1,1-Dichloropropene	U		0.000885	0.00316	1	10/15/2019 15:38	WG1363157
1,3-Dichloropropane	U		0.00221	0.00632	1	10/15/2019 15:38	WG1363157
cis-1,3-Dichloropropene	U		0.000857	0.00316	1	10/15/2019 15:38	WG1363157
trans-1,3-Dichloropropene	U		0.00193	0.00632	1	10/15/2019 15:38	WG1363157
trans-1,4-Dichloro-2-butene	U		0.00177	0.00632	1	10/15/2019 15:38	WG1363157
2,2-Dichloropropane	U	J0	0.00100	0.00316	1	10/15/2019 15:38	WG1363157
Di-isopropyl ether	U		0.000443	0.00126	1	10/15/2019 15:38	WG1363157
Ethylbenzene	0.000699	J	0.000670	0.00316	1	10/15/2019 15:38	WG1363157
Hexachloro-1,3-butadiene	U		0.0161	0.0316	1	10/15/2019 15:38	WG1363157
2-Hexanone	U		0.0126	0.0316	1	10/15/2019 15:38	WG1363157
n-Hexane	U		0.00134	0.00632	1	10/15/2019 15:38	WG1363157
Iodomethane	U		0.00765	0.0158	1	10/15/2019 15:38	WG1363157
Isopropylbenzene	U		0.00109	0.00316	1	10/15/2019 15:38	WG1363157
p-Isopropyltoluene	U		0.00295	0.00632	1	10/15/2019 15:38	WG1363157
2-Butanone (MEK)	0.0327	B J0	0.0158	0.0316	1	10/15/2019 15:38	WG1363157
Methylene Chloride	U		0.00840	0.0316	1	10/15/2019 15:38	WG1363157
4-Methyl-2-pentanone (MIBK)	U		0.0126	0.0316	1	10/15/2019 15:38	WG1363157

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000373	0.00126	1	10/15/2019 15:38	WG1363157
Naphthalene	U		0.00394	0.0158	1	10/15/2019 15:38	WG1363157
n-Propylbenzene	U		0.00149	0.00632	1	10/15/2019 15:38	WG1363157
Styrene	U		0.00345	0.0158	1	10/15/2019 15:38	WG1363157
1,1,1,2-Tetrachloroethane	U		0.000632	0.00316	1	10/15/2019 15:38	WG1363157
1,1,2,2-Tetrachloroethane	U		0.000493	0.00316	1	10/15/2019 15:38	WG1363157
1,1,2-Trichlorotrifluoroethane	U		0.000853	0.00316	1	10/15/2019 15:38	WG1363157
Tetrachloroethene	U		0.000885	0.00316	1	10/15/2019 15:38	WG1363157
Toluene	0.00321	J	0.00158	0.00632	1	10/15/2019 15:38	WG1363157
1,2,3-Trichlorobenzene	U		0.000790	0.00316	1	10/15/2019 15:38	WG1363157
1,2,4-Trichlorobenzene	U		0.00609	0.0158	1	10/15/2019 15:38	WG1363157
1,1,1-Trichloroethane	U		0.000348	0.00316	1	10/15/2019 15:38	WG1363157
1,1,2-Trichloroethane	U		0.00112	0.00316	1	10/15/2019 15:38	WG1363157
Trichloroethene	U		0.000506	0.00126	1	10/15/2019 15:38	WG1363157
Trichlorofluoromethane	U		0.000632	0.00316	1	10/15/2019 15:38	WG1363157
1,2,3-Trichloropropane	U		0.00645	0.0158	1	10/15/2019 15:38	WG1363157
1,2,4-Trimethylbenzene	U		0.00147	0.00632	1	10/15/2019 15:38	WG1363157
1,2,3-Trimethylbenzene	U		0.00145	0.00632	1	10/15/2019 15:38	WG1363157
1,3,5-Trimethylbenzene	U		0.00137	0.00632	1	10/15/2019 15:38	WG1363157
Vinyl acetate	U	J0	0.00445	0.0158	1	10/15/2019 15:38	WG1363157
Vinyl chloride	U		0.000864	0.00316	1	10/15/2019 15:38	WG1363157
Xylenes, Total	U		0.00604	0.00822	1	10/15/2019 15:38	WG1363157
(S) Toluene-d8	*103*			*75.0-131*		*10/15/2019 15:38*	WG1363157
(S) 4-Bromofluorobenzene	*103*			*67.0-138*		*10/15/2019 15:38*	WG1363157
(S) 1,2-Dichloroethane-d4	*105*			*70.0-130*		*10/15/2019 15:38*	WG1363157

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	85.8		1	10/12/2019 12:37	WG1361907

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U	J0	0.0160	0.0291	1	10/14/2019 23:01	WG1362726
Acrylonitrile	U		0.00221	0.0146	1	10/14/2019 23:01	WG1362726
Benzene	U		0.000466	0.00117	1	10/14/2019 23:01	WG1362726
Bromobenzene	U		0.00122	0.0146	1	10/14/2019 23:01	WG1362726
Bromodichloromethane	U		0.000918	0.00291	1	10/14/2019 23:01	WG1362726
Bromochloromethane	U		0.00132	0.00583	1	10/14/2019 23:01	WG1362726
Bromoform	U		0.00697	0.0291	1	10/14/2019 23:01	WG1362726
Bromomethane	U		0.00431	0.0146	1	10/14/2019 23:01	WG1362726
n-Butylbenzene	U		0.00447	0.0146	1	10/14/2019 23:01	WG1362726
sec-Butylbenzene	U		0.00295	0.0146	1	10/14/2019 23:01	WG1362726
tert-Butylbenzene	U		0.00181	0.00583	1	10/14/2019 23:01	WG1362726
Carbon disulfide	U		0.00473	0.0146	1	10/14/2019 23:01	WG1362726
Carbon tetrachloride	U	J0	0.00126	0.00583	1	10/14/2019 23:01	WG1362726
Chlorobenzene	U		0.000668	0.00291	1	10/14/2019 23:01	WG1362726
Chlorodibromomethane	U		0.000524	0.00291	1	10/14/2019 23:01	WG1362726
Chloroethane	U		0.00126	0.00583	1	10/14/2019 23:01	WG1362726
Chloroform	U		0.000484	0.00291	1	10/14/2019 23:01	WG1362726
Chloromethane	U		0.00162	0.0146	1	10/14/2019 23:01	WG1362726
2-Chlorotoluene	U		0.00107	0.00291	1	10/14/2019 23:01	WG1362726
4-Chlorotoluene	U		0.00132	0.00583	1	10/14/2019 23:01	WG1362726
1,2-Dibromo-3-Chloropropane	U		0.00594	0.0291	1	10/14/2019 23:01	WG1362726
1,2-Dibromoethane	U		0.000612	0.00291	1	10/14/2019 23:01	WG1362726
Dibromomethane	U		0.00117	0.00583	1	10/14/2019 23:01	WG1362726
1,2-Dichlorobenzene	U		0.00169	0.00583	1	10/14/2019 23:01	WG1362726
1,3-Dichlorobenzene	U		0.00198	0.00583	1	10/14/2019 23:01	WG1362726
1,4-Dichlorobenzene	U		0.00230	0.00583	1	10/14/2019 23:01	WG1362726
Dichlorodifluoromethane	U		0.000953	0.00291	1	10/14/2019 23:01	WG1362726
1,1-Dichloroethane	U		0.000670	0.00291	1	10/14/2019 23:01	WG1362726
1,2-Dichloroethane	U		0.000553	0.00291	1	10/14/2019 23:01	WG1362726
1,1-Dichloroethene	U		0.000583	0.00291	1	10/14/2019 23:01	WG1362726
cis-1,2-Dichloroethene	U		0.000804	0.00291	1	10/14/2019 23:01	WG1362726
trans-1,2-Dichloroethene	U		0.00167	0.00583	1	10/14/2019 23:01	WG1362726
1,2-Dichloropropane	U		0.00148	0.00583	1	10/14/2019 23:01	WG1362726
1,1-Dichloropropene	U		0.000816	0.00291	1	10/14/2019 23:01	WG1362726
1,3-Dichloropropane	U		0.00204	0.00583	1	10/14/2019 23:01	WG1362726
cis-1,3-Dichloropropene	U		0.000790	0.00291	1	10/14/2019 23:01	WG1362726
trans-1,3-Dichloropropene	U		0.00178	0.00583	1	10/14/2019 23:01	WG1362726
trans-1,4-Dichloro-2-butene	U		0.00163	0.00583	1	10/14/2019 23:01	WG1362726
2,2-Dichloropropane	U		0.000924	0.00291	1	10/14/2019 23:01	WG1362726
Di-isopropyl ether	U		0.000408	0.00117	1	10/14/2019 23:01	WG1362726
Ethylbenzene	U		0.000617	0.00291	1	10/14/2019 23:01	WG1362726
Hexachloro-1,3-butadiene	U		0.0148	0.0291	1	10/14/2019 23:01	WG1362726
2-Hexanone	U		0.0117	0.0291	1	10/14/2019 23:01	WG1362726
n-Hexane	U		0.00123	0.00583	1	10/14/2019 23:01	WG1362726
Iodomethane	U	J3 J4	0.00705	0.0146	1	10/14/2019 23:01	WG1362726
Isopropylbenzene	U		0.00101	0.00291	1	10/14/2019 23:01	WG1362726
p-Isopropyltoluene	U		0.00271	0.00583	1	10/14/2019 23:01	WG1362726
2-Butanone (MEK)	U		0.0146	0.0291	1	10/14/2019 23:01	WG1362726
Methylene Chloride	U		0.00774	0.0291	1	10/14/2019 23:01	WG1362726
4-Methyl-2-pentanone (MIBK)	U		0.0117	0.0291	1	10/14/2019 23:01	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000344	0.00117	1	10/14/2019 23:01	WG1362726
Naphthalene	U		0.00364	0.0146	1	10/14/2019 23:01	WG1362726
n-Propylbenzene	U		0.00137	0.00583	1	10/14/2019 23:01	WG1362726
Styrene	U		0.00318	0.0146	1	10/14/2019 23:01	WG1362726
1,1,1,2-Tetrachloroethane	U		0.000583	0.00291	1	10/14/2019 23:01	WG1362726
1,1,2,2-Tetrachloroethane	U		0.000454	0.00291	1	10/14/2019 23:01	WG1362726
1,1,2-Trichlorotrifluoroethane	U		0.000786	0.00291	1	10/14/2019 23:01	WG1362726
Tetrachloroethene	U		0.000816	0.00291	1	10/14/2019 23:01	WG1362726
Toluene	0.00223	J	0.00146	0.00583	1	10/14/2019 23:01	WG1362726
1,2,3-Trichlorobenzene	U		0.000728	0.00291	1	10/14/2019 23:01	WG1362726
1,2,4-Trichlorobenzene	U		0.00562	0.0146	1	10/14/2019 23:01	WG1362726
1,1,1-Trichloroethane	U		0.000320	0.00291	1	10/14/2019 23:01	WG1362726
1,1,2-Trichloroethane	U		0.00103	0.00291	1	10/14/2019 23:01	WG1362726
Trichloroethene	U		0.000466	0.00117	1	10/14/2019 23:01	WG1362726
Trichlorofluoromethane	U		0.000583	0.00291	1	10/14/2019 23:01	WG1362726
1,2,3-Trichloropropane	U		0.00594	0.0146	1	10/14/2019 23:01	WG1362726
1,2,4-Trimethylbenzene	U		0.00135	0.00583	1	10/14/2019 23:01	WG1362726
1,2,3-Trimethylbenzene	U		0.00134	0.00583	1	10/14/2019 23:01	WG1362726
1,3,5-Trimethylbenzene	U		0.00126	0.00583	1	10/14/2019 23:01	WG1362726
Vinyl acetate	U	J0	0.00410	0.0146	1	10/14/2019 23:01	WG1362726
Vinyl chloride	U		0.000796	0.00291	1	10/14/2019 23:01	WG1362726
Xylenes, Total	U		0.00557	0.00757	1	10/14/2019 23:01	WG1362726
(S) Toluene-d8	*107*			*75.0-131*		*10/14/2019 23:01*	WG1362726
(S) 4-Bromofluorobenzene	*97.9*			*67.0-138*		*10/14/2019 23:01*	WG1362726
(S) 1,2-Dichloroethane-d4	*93.3*			*70.0-130*		*10/14/2019 23:01*	WG1362726

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	83.2		1	10/12/2019 12:37	WG1361907

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U	J0	0.0165	0.0300	1	10/14/2019 23:22	WG1362726
Acrylonitrile	U		0.00228	0.0150	1	10/14/2019 23:22	WG1362726
Benzene	U		0.000481	0.00120	1	10/14/2019 23:22	WG1362726
Bromobenzene	U		0.00126	0.0150	1	10/14/2019 23:22	WG1362726
Bromodichloromethane	U		0.000947	0.00300	1	10/14/2019 23:22	WG1362726
Bromochloromethane	U		0.00136	0.00601	1	10/14/2019 23:22	WG1362726
Bromoform	U		0.00718	0.0300	1	10/14/2019 23:22	WG1362726
Bromomethane	U		0.00444	0.0150	1	10/14/2019 23:22	WG1362726
n-Butylbenzene	U		0.00461	0.0150	1	10/14/2019 23:22	WG1362726
sec-Butylbenzene	U		0.00304	0.0150	1	10/14/2019 23:22	WG1362726
tert-Butylbenzene	U		0.00186	0.00601	1	10/14/2019 23:22	WG1362726
Carbon disulfide	U		0.00488	0.0150	1	10/14/2019 23:22	WG1362726
Carbon tetrachloride	U	J0	0.00130	0.00601	1	10/14/2019 23:22	WG1362726
Chlorobenzene	U		0.000688	0.00300	1	10/14/2019 23:22	WG1362726
Chlorodibromomethane	U		0.000541	0.00300	1	10/14/2019 23:22	WG1362726
Chloroethane	U		0.00130	0.00601	1	10/14/2019 23:22	WG1362726
Chloroform	U		0.000499	0.00300	1	10/14/2019 23:22	WG1362726
Chloromethane	U		0.00167	0.0150	1	10/14/2019 23:22	WG1362726
2-Chlorotoluene	U		0.00111	0.00300	1	10/14/2019 23:22	WG1362726
4-Chlorotoluene	U		0.00136	0.00601	1	10/14/2019 23:22	WG1362726
1,2-Dibromo-3-Chloropropane	U		0.00613	0.0300	1	10/14/2019 23:22	WG1362726
1,2-Dibromoethane	U		0.000631	0.00300	1	10/14/2019 23:22	WG1362726
Dibromomethane	U		0.00120	0.00601	1	10/14/2019 23:22	WG1362726
1,2-Dichlorobenzene	U		0.00174	0.00601	1	10/14/2019 23:22	WG1362726
1,3-Dichlorobenzene	U		0.00204	0.00601	1	10/14/2019 23:22	WG1362726
1,4-Dichlorobenzene	U		0.00237	0.00601	1	10/14/2019 23:22	WG1362726
Dichlorodifluoromethane	U		0.000983	0.00300	1	10/14/2019 23:22	WG1362726
1,1-Dichloroethane	U		0.000691	0.00300	1	10/14/2019 23:22	WG1362726
1,2-Dichloroethane	U		0.000571	0.00300	1	10/14/2019 23:22	WG1362726
1,1-Dichloroethene	U		0.000601	0.00300	1	10/14/2019 23:22	WG1362726
cis-1,2-Dichloroethene	U		0.000829	0.00300	1	10/14/2019 23:22	WG1362726
trans-1,2-Dichloroethene	U		0.00172	0.00601	1	10/14/2019 23:22	WG1362726
1,2-Dichloropropane	U		0.00153	0.00601	1	10/14/2019 23:22	WG1362726
1,1-Dichloropropene	U		0.000841	0.00300	1	10/14/2019 23:22	WG1362726
1,3-Dichloropropane	U		0.00210	0.00601	1	10/14/2019 23:22	WG1362726
cis-1,3-Dichloropropene	U		0.000814	0.00300	1	10/14/2019 23:22	WG1362726
trans-1,3-Dichloropropene	U		0.00184	0.00601	1	10/14/2019 23:22	WG1362726
trans-1,4-Dichloro-2-butene	U		0.00168	0.00601	1	10/14/2019 23:22	WG1362726
2,2-Dichloropropane	U		0.000953	0.00300	1	10/14/2019 23:22	WG1362726
Di-isopropyl ether	U		0.000420	0.00120	1	10/14/2019 23:22	WG1362726
Ethylbenzene	U		0.000637	0.00300	1	10/14/2019 23:22	WG1362726
Hexachloro-1,3-butadiene	U		0.0153	0.0300	1	10/14/2019 23:22	WG1362726
2-Hexanone	U		0.0120	0.0300	1	10/14/2019 23:22	WG1362726
n-Hexane	U		0.00127	0.00601	1	10/14/2019 23:22	WG1362726
Iodomethane	U	J3 J4	0.00727	0.0150	1	10/14/2019 23:22	WG1362726
Isopropylbenzene	U		0.00104	0.00300	1	10/14/2019 23:22	WG1362726
p-Isopropyltoluene	U		0.00280	0.00601	1	10/14/2019 23:22	WG1362726
2-Butanone (MEK)	U		0.0150	0.0300	1	10/14/2019 23:22	WG1362726
Methylene Chloride	U		0.00798	0.0300	1	10/14/2019 23:22	WG1362726
4-Methyl-2-pentanone (MIBK)	U		0.0120	0.0300	1	10/14/2019 23:22	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000354	0.00120	1	10/14/2019 23:22	WG1362726
Naphthalene	U		0.00375	0.0150	1	10/14/2019 23:22	WG1362726
n-Propylbenzene	U		0.00142	0.00601	1	10/14/2019 23:22	WG1362726
Styrene	U		0.00328	0.0150	1	10/14/2019 23:22	WG1362726
1,1,1,2-Tetrachloroethane	U		0.000601	0.00300	1	10/14/2019 23:22	WG1362726
1,1,2,2-Tetrachloroethane	U		0.000469	0.00300	1	10/14/2019 23:22	WG1362726
1,1,2-Trichlorotrifluoroethane	U		0.000811	0.00300	1	10/14/2019 23:22	WG1362726
Tetrachloroethene	U		0.000841	0.00300	1	10/14/2019 23:22	WG1362726
Toluene	0.00217	J	0.00150	0.00601	1	10/14/2019 23:22	WG1362726
1,2,3-Trichlorobenzene	U		0.000751	0.00300	1	10/14/2019 23:22	WG1362726
1,2,4-Trichlorobenzene	U		0.00579	0.0150	1	10/14/2019 23:22	WG1362726
1,1,1-Trichloroethane	U		0.000330	0.00300	1	10/14/2019 23:22	WG1362726
1,1,2-Trichloroethane	U		0.00106	0.00300	1	10/14/2019 23:22	WG1362726
Trichloroethene	U		0.000481	0.00120	1	10/14/2019 23:22	WG1362726
Trichlorofluoromethane	U		0.000601	0.00300	1	10/14/2019 23:22	WG1362726
1,2,3-Trichloropropane	U		0.00613	0.0150	1	10/14/2019 23:22	WG1362726
1,2,4-Trimethylbenzene	U		0.00139	0.00601	1	10/14/2019 23:22	WG1362726
1,2,3-Trimethylbenzene	U		0.00138	0.00601	1	10/14/2019 23:22	WG1362726
1,3,5-Trimethylbenzene	U		0.00130	0.00601	1	10/14/2019 23:22	WG1362726
Vinyl acetate	U	J0	0.00423	0.0150	1	10/14/2019 23:22	WG1362726
Vinyl chloride	U		0.000820	0.00300	1	10/14/2019 23:22	WG1362726
Xylenes, Total	U		0.00574	0.00781	1	10/14/2019 23:22	WG1362726
(S) Toluene-d8	*107*			*75.0-131*		*10/14/2019 23:22*	WG1362726
(S) 4-Bromofluorobenzene	*96.4*			*67.0-138*		*10/14/2019 23:22*	WG1362726
(S) 1,2-Dichloroethane-d4	*92.8*			*70.0-130*		*10/14/2019 23:22*	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.51	J J0	1.05	25.0	1	10/15/2019 01:53	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 01:53	WG1362918
Benzene	U		0.0896	0.500	1	10/15/2019 01:53	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 01:53	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 01:53	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 01:53	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 01:53	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 01:53	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 01:53	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 01:53	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 01:53	WG1362918
Carbon disulfide	U		0.101	0.500	1	10/15/2019 01:53	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 01:53	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 01:53	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 01:53	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 01:53	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 01:53	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 01:53	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 01:53	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 01:53	WG1362918
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 01:53	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 01:53	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 01:53	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 01:53	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 01:53	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 01:53	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 01:53	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 01:53	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 01:53	WG1362918
1,1-Dichloroethene	U		0.188	0.500	1	10/15/2019 01:53	WG1362918
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/15/2019 01:53	WG1362918
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/15/2019 01:53	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 01:53	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 01:53	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 01:53	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 01:53	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 01:53	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 01:53	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 01:53	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 01:53	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 01:53	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 01:53	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 01:53	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 01:53	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 01:53	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 01:53	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 01:53	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 01:53	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 01:53	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 01:53	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 01:53	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 01:53	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 01:53	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 01:53	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 01:53	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 01:53	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 01:53	WG1362918
Tetrachloroethene	U		0.199	0.500	1	10/15/2019 01:53	WG1362918
Toluene	U		0.412	0.500	1	10/15/2019 01:53	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 01:53	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 01:53	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 01:53	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 01:53	WG1362918
Trichloroethene	U		0.153	0.500	1	10/15/2019 01:53	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 01:53	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 01:53	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 01:53	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 01:53	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 01:53	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 01:53	WG1362918
Vinyl chloride	U		0.118	0.500	1	10/15/2019 01:53	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 01:53	WG1362918
(S) Toluene-d8	*105*			*80.0-120*		*10/15/2019 01:53*	WG1362918
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/15/2019 01:53*	WG1362918
(S) 1,2-Dichloroethane-d4	*104*			*70.0-130*		*10/15/2019 01:53*	WG1362918

Method Blank (MB)

(MB) R3460812-1 10/12/19 13:04

Analyte	MB Result %	MB Qualifier	MB MDL %	MB RDL %
Total Solids	0.000			

L1147020-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1147020-02 10/12/19 13:04 • (DUP) R3460812-3 10/12/19 13:04

Analyte	Original Result %	DUP Result %	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Total Solids	87.8	89.1	1	1.53		10

Laboratory Control Sample (LCS)

(LCS) R3460812-2 10/12/19 13:04

Analyte	Spike Amount %	LCS Result %	LCS Rec. %	Rec. Limits %	LCS Qualifier
Total Solids	50.0	50.0	100	85.0-115	

Method Blank (MB)

(MB) R3460808-1 10/12/19 12:50

Analyte	MB Result %	MB Qualifier	MB MDL %	MB RDL %
Total Solids	0.000			

L1147020-09 Original Sample (OS) • Duplicate (DUP)

(OS) L1147020-09 10/12/19 12:50 • (DUP) R3460808-3 10/12/19 12:50

Analyte	Original Result %	DUP Result %	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Total Solids	92.9	92.8	1	0.0406		10

Laboratory Control Sample (LCS)

(LCS) R3460808-2 10/12/19 12:50

Analyte	Spike Amount %	LCS Result %	LCS Rec. %	Rec. Limits %	LCS Qualifier
Total Solids	50.0	50.0	100	85.0-115	

Method Blank (MB)

(MB) R3460806-1 10/12/19 12:37

Analyte	MB Result %	MB Qualifier	MB MDL %	MB RDL %
Total Solids	0.00100			

L1147020-19 Original Sample (OS) • Duplicate (DUP)

(OS) L1147020-19 10/12/19 12:37 • (DUP) R3460806-3 10/12/19 12:37

Analyte	Original Result %	DUP Result %	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Total Solids	84.8	88.7	1	4.49		10

Laboratory Control Sample (LCS)

(LCS) R3460806-2 10/12/19 12:37

Analyte	Spike Amount %	LCS Result %	LCS Rec. %	Rec. Limits %	LCS Qualifier
Total Solids	50.0	50.0	100	85.0-115	

Method Blank (MB)

(MB) R3461055-3 10/14/19 12:22

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Acetone	U		0.0137	0.0250
Acrylonitrile	U		0.00190	0.0125
Benzene	0.000513	J	0.000400	0.00100
Bromobenzene	U		0.00105	0.0125
Bromodichloromethane	U		0.000788	0.00250
Bromochloromethane	U		0.00113	0.00500
Bromoform	U		0.00598	0.0250
Bromomethane	U		0.00370	0.0125
n-Butylbenzene	U		0.00384	0.0125
sec-Butylbenzene	U		0.00253	0.0125
tert-Butylbenzene	U		0.00155	0.00500
Carbon disulfide	U		0.00406	0.0125
Carbon tetrachloride	U		0.00108	0.00500
Chlorobenzene	U		0.000573	0.00250
Chlorodibromomethane	U		0.000450	0.00250
Chloroethane	U		0.00108	0.00500
Chloroform	0.00137	J	0.000415	0.00250
Chloromethane	U		0.00139	0.0125
2-Chlorotoluene	U		0.000920	0.00250
4-Chlorotoluene	U		0.00113	0.00500
1,2-Dibromo-3-Chloropropane	U		0.00510	0.0250
1,2-Dibromoethane	U		0.000525	0.00250
Dibromomethane	U		0.00100	0.00500
1,2-Dichlorobenzene	U		0.00145	0.00500
1,3-Dichlorobenzene	U		0.00170	0.00500
1,4-Dichlorobenzene	U		0.00197	0.00500
trans-1,4-Dichloro-2-butene	U		0.00140	0.00500
Dichlorodifluoromethane	U		0.000818	0.00250
1,1-Dichloroethane	U		0.000575	0.00250
1,2-Dichloroethane	U		0.000475	0.00250
1,1-Dichloroethene	U		0.000500	0.00250
cis-1,2-Dichloroethene	U		0.000690	0.00250
trans-1,2-Dichloroethene	U		0.00143	0.00500
1,2-Dichloropropane	U		0.00127	0.00500
1,1-Dichloropropene	U		0.000700	0.00250
1,3-Dichloropropane	U		0.00175	0.00500
cis-1,3-Dichloropropene	U		0.000678	0.00250
trans-1,3-Dichloropropene	U		0.00153	0.00500
2,2-Dichloropropane	U		0.000793	0.00250
Di-isopropyl ether	U		0.000350	0.00100

Method Blank (MB)

(MB) R3461055-3 10/14/19 12:22

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Ethylbenzene	U		0.000530	0.00250
Hexachloro-1,3-butadiene	U		0.0127	0.0250
n-Hexane	U		0.00106	0.00500
2-Hexanone	U		0.0100	0.0250
Iodomethane	U		0.00605	0.0125
Isopropylbenzene	U		0.000863	0.00250
p-Isopropyltoluene	U		0.00233	0.00500
2-Butanone (MEK)	0.0389	J	0.0125	0.0250
Methylene Chloride	U		0.00664	0.0250
4-Methyl-2-pentanone (MIBK)	U		0.0100	0.0250
Methyl tert-butyl ether	U		0.000295	0.00100
Naphthalene	U		0.00312	0.0125
n-Propylbenzene	U		0.00118	0.00500
Styrene	U		0.00273	0.0125
1,1,1,2-Tetrachloroethane	U		0.000500	0.00250
1,1,2,2-Tetrachloroethane	U		0.000390	0.00250
Tetrachloroethene	U		0.000700	0.00250
Toluene	U		0.00125	0.00500
1,1,2-Trichlorotrifluoroethane	U		0.000675	0.00250
1,2,3-Trichlorobenzene	U		0.000625	0.00250
1,2,4-Trichlorobenzene	U		0.00482	0.0125
1,1,1-Trichloroethane	U		0.000275	0.00250
1,1,2-Trichloroethane	U		0.000883	0.00250
Trichloroethene	U		0.000400	0.00100
Trichlorofluoromethane	U		0.000500	0.00250
1,2,3-Trichloropropane	U		0.00510	0.0125
1,2,3-Trimethylbenzene	U		0.00115	0.00500
1,2,4-Trimethylbenzene	U		0.00116	0.00500
1,3,5-Trimethylbenzene	U		0.00108	0.00500
Vinyl acetate	U		0.00352	0.0125
Vinyl chloride	U		0.000683	0.00250
Xylenes, Total	U		0.00478	0.00650
(S) Toluene-d8	*95.5*			*75.0-131*
(S) 4-Bromofluorobenzene	*106*			*67.0-138*
(S) 1,2-Dichloroethane-d4	*121*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461055-1 10/14/19 11:00 • (LCSD) R3461055-2 10/14/19 11:20

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCSD Result mg/kg	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.625	0.752	0.897	120	144	10.0-160			17.6	31
Acrylonitrile	0.625	0.708	0.723	113	116	45.0-153			2.10	22
Benzene	0.125	0.119	0.123	95.2	98.4	70.0-123			3.31	20
Bromobenzene	0.125	0.115	0.121	92.0	96.8	73.0-121			5.08	20
Bromodichloromethane	0.125	0.131	0.127	105	102	73.0-121			3.10	20
Bromochloromethane	0.125	0.131	0.125	105	100	77.0-128			4.69	20
Bromoform	0.125	0.124	0.119	99.2	95.2	64.0-132			4.12	20
Bromomethane	0.125	0.134	0.113	107	90.4	56.0-147			17.0	20
n-Butylbenzene	0.125	0.124	0.131	99.2	105	68.0-135			5.49	20
sec-Butylbenzene	0.125	0.122	0.129	97.6	103	74.0-130			5.58	20
tert-Butylbenzene	0.125	0.126	0.125	101	100	75.0-127			0.797	20
Carbon disulfide	0.125	0.121	0.124	96.8	99.2	56.0-133			2.45	20
Carbon tetrachloride	0.125	0.136	0.128	109	102	66.0-128			6.06	20
Chlorobenzene	0.125	0.123	0.126	98.4	101	76.0-128			2.41	20
Chlorodibromomethane	0.125	0.109	0.111	87.2	88.8	74.0-127			1.82	20
Chloroethane	0.125	0.141	0.121	113	96.8	61.0-134			15.3	20
Chloroform	0.125	0.126	0.126	101	101	72.0-123			0.000	20
Chloromethane	0.125	0.152	0.129	122	103	51.0-138			16.4	20
2-Chlorotoluene	0.125	0.119	0.125	95.2	100	75.0-124			4.92	20
4-Chlorotoluene	0.125	0.122	0.125	97.6	100	75.0-124			2.43	20
1,2-Dibromo-3-Chloropropane	0.125	0.112	0.109	89.6	87.2	59.0-130			2.71	20
1,2-Dibromoethane	0.125	0.124	0.124	99.2	99.2	74.0-128			0.000	20
Dibromomethane	0.125	0.136	0.133	109	106	75.0-122			2.23	20
1,2-Dichlorobenzene	0.125	0.124	0.125	99.2	100	76.0-124			0.803	20
1,3-Dichlorobenzene	0.125	0.121	0.120	96.8	96.0	76.0-125			0.830	20
1,4-Dichlorobenzene	0.125	0.123	0.122	98.4	97.6	77.0-121			0.816	20
trans-1,4-Dichloro-2-butene	0.125	0.109	0.118	87.2	94.4	45.0-143			7.93	20
Dichlorodifluoromethane	0.125	0.143	0.123	114	98.4	43.0-156			15.0	20
1,1-Dichloroethane	0.125	0.133	0.132	106	106	70.0-127			0.755	20
1,2-Dichloroethane	0.125	0.130	0.125	104	100	65.0-131			3.92	20
1,1-Dichloroethene	0.125	0.127	0.130	102	104	65.0-131			2.33	20
cis-1,2-Dichloroethene	0.125	0.127	0.126	102	101	73.0-125			0.791	20
trans-1,2-Dichloroethene	0.125	0.121	0.122	96.8	97.6	71.0-125			0.823	20
1,2-Dichloropropane	0.125	0.128	0.131	102	105	74.0-125			2.32	20
1,1-Dichloropropene	0.125	0.124	0.129	99.2	103	73.0-125			3.95	20
1,3-Dichloropropane	0.125	0.122	0.126	97.6	101	80.0-125			3.23	20
cis-1,3-Dichloropropene	0.125	0.126	0.124	101	99.2	76.0-127			1.60	20
trans-1,3-Dichloropropene	0.125	0.123	0.125	98.4	100	73.0-127			1.61	20
2,2-Dichloropropane	0.125	0.133	0.126	106	101	59.0-135			5.41	20
Di-isopropyl ether	0.125	0.136	0.146	109	117	60.0-136			7.09	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461055-1 10/14/19 11:00 • (LCSD) R3461055-2 10/14/19 11:20

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCSD Result mg/kg	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.125	0.120	0.120	96.0	96.0	74.0-126			0.000	20
Hexachloro-1,3-butadiene	0.125	0.129	0.128	103	102	57.0-150			0.778	20
2-Hexanone	0.625	0.695	0.723	111	116	54.0-147			3.95	20
n-Hexane	0.125	0.143	0.140	114	112	55.0-137			2.12	20
Iodomethane	0.625	0.641	0.619	103	99.0	74.0-134			3.49	20
Isopropylbenzene	0.125	0.121	0.122	96.8	97.6	72.0-127			0.823	20
p-Isopropyltoluene	0.125	0.124	0.128	99.2	102	72.0-133			3.17	20
2-Butanone (MEK)	0.625	0.756	0.817	121	131	30.0-160			7.76	24
Methylene Chloride	0.125	0.124	0.129	99.2	103	68.0-123			3.95	20
4-Methyl-2-pentanone (MIBK)	0.625	0.685	0.754	110	121	56.0-143			9.59	20
Methyl tert-butyl ether	0.125	0.132	0.128	106	102	66.0-132			3.08	20
Naphthalene	0.125	0.115	0.110	92.0	88.0	59.0-130			4.44	20
n-Propylbenzene	0.125	0.119	0.125	95.2	100	74.0-126			4.92	20
Styrene	0.125	0.124	0.122	99.2	97.6	72.0-127			1.63	20
1,1,1,2-Tetrachloroethane	0.125	0.127	0.125	102	100	74.0-129			1.59	20
1,1,2,2-Tetrachloroethane	0.125	0.124	0.132	99.2	106	68.0-128			6.25	20
Tetrachloroethene	0.125	0.127	0.122	102	97.6	70.0-136			4.02	20
Toluene	0.125	0.121	0.124	96.8	99.2	75.0-121			2.45	20
1,1,2-Trichlorotrifluoroethane	0.125	0.122	0.124	97.6	99.2	61.0-139			1.63	20
1,2,3-Trichlorobenzene	0.125	0.125	0.122	100	97.6	59.0-139			2.43	20
1,2,4-Trichlorobenzene	0.125	0.126	0.126	101	101	62.0-137			0.000	20
1,1,1-Trichloroethane	0.125	0.133	0.129	106	103	69.0-126			3.05	20
1,1,2-Trichloroethane	0.125	0.127	0.123	102	98.4	78.0-123			3.20	20
Trichloroethene	0.125	0.128	0.127	102	102	76.0-126			0.784	20
Trichlorofluoromethane	0.125	0.144	0.126	115	101	61.0-142			13.3	20
1,2,3-Trichloropropane	0.125	0.123	0.128	98.4	102	67.0-129			3.98	20
1,2,3-Trimethylbenzene	0.125	0.121	0.122	96.8	97.6	74.0-124			0.823	20
1,2,4-Trimethylbenzene	0.125	0.116	0.116	92.8	92.8	70.0-126			0.000	20
1,3,5-Trimethylbenzene	0.125	0.118	0.122	94.4	97.6	73.0-127			3.33	20
Vinyl acetate	0.625	0.756	0.737	121	118	43.0-159			2.55	20
Vinyl chloride	0.125	0.140	0.118	112	94.4	63.0-134			17.1	20
Xylenes, Total	0.375	0.364	0.369	97.1	98.4	72.0-127			1.36	20
(S) Toluene-d8				*103*	*103*	*75.0-131*				
(S) 4-Bromofluorobenzene				*104*	*103*	*67.0-138*				
(S) 1,2-Dichloroethane-d4				*106*	*101*	*70.0-130*				

Method Blank (MB)

(MB) R3461081-3 10/14/19 18:56

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Acetone	U		0.0137	0.0250
Acrylonitrile	U		0.00190	0.0125
Benzene	U		0.000400	0.00100
Bromobenzene	U		0.00105	0.0125
Bromodichloromethane	U		0.000788	0.00250
Bromochloromethane	U		0.00113	0.00500
Bromoform	U		0.00598	0.0250
Bromomethane	U		0.00370	0.0125
n-Butylbenzene	U		0.00384	0.0125
sec-Butylbenzene	U		0.00253	0.0125
tert-Butylbenzene	U		0.00155	0.00500
Carbon disulfide	U		0.00406	0.0125
Carbon tetrachloride	U		0.00108	0.00500
Chlorobenzene	U		0.000573	0.00250
Chlorodibromomethane	U		0.000450	0.00250
Chloroethane	U		0.00108	0.00500
Chloroform	U		0.000415	0.00250
Chloromethane	U		0.00139	0.0125
2-Chlorotoluene	U		0.000920	0.00250
4-Chlorotoluene	U		0.00113	0.00500
1,2-Dibromo-3-Chloropropane	U		0.00510	0.0250
1,2-Dibromoethane	U		0.000525	0.00250
Dibromomethane	U		0.00100	0.00500
1,2-Dichlorobenzene	U		0.00145	0.00500
1,3-Dichlorobenzene	U		0.00170	0.00500
1,4-Dichlorobenzene	U		0.00197	0.00500
trans-1,4-Dichloro-2-butene	U		0.00140	0.00500
Dichlorodifluoromethane	U		0.000818	0.00250
1,1-Dichloroethane	U		0.000575	0.00250
1,2-Dichloroethane	U		0.000475	0.00250
1,1-Dichloroethene	U		0.000500	0.00250
cis-1,2-Dichloroethene	U		0.000690	0.00250
trans-1,2-Dichloroethene	U		0.00143	0.00500
1,2-Dichloropropane	U		0.00127	0.00500
1,1-Dichloropropene	U		0.000700	0.00250
1,3-Dichloropropane	U		0.00175	0.00500
cis-1,3-Dichloropropene	U		0.000678	0.00250
trans-1,3-Dichloropropene	U		0.00153	0.00500
2,2-Dichloropropane	U		0.000793	0.00250
Di-isopropyl ether	U		0.000350	0.00100

Method Blank (MB)

(MB) R3461081-3 10/14/19 18:56

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Ethylbenzene	U		0.000530	0.00250
Hexachloro-1,3-butadiene	U		0.0127	0.0250
n-Hexane	U		0.00106	0.00500
2-Hexanone	U		0.0100	0.0250
Iodomethane	U		0.00605	0.0125
Isopropylbenzene	U		0.000863	0.00250
p-Isopropyltoluene	U		0.00233	0.00500
2-Butanone (MEK)	0.0125	J	0.0125	0.0250
Methylene Chloride	0.00696	J	0.00664	0.0250
4-Methyl-2-pentanone (MIBK)	U		0.0100	0.0250
Methyl tert-butyl ether	U		0.000295	0.00100
Naphthalene	U		0.00312	0.0125
n-Propylbenzene	U		0.00118	0.00500
Styrene	U		0.00273	0.0125
1,1,1,2-Tetrachloroethane	U		0.000500	0.00250
1,1,2,2-Tetrachloroethane	U		0.000390	0.00250
Tetrachloroethene	U		0.000700	0.00250
Toluene	U		0.00125	0.00500
1,1,2-Trichlorotrifluoroethane	U		0.000675	0.00250
1,2,3-Trichlorobenzene	U		0.000625	0.00250
1,2,4-Trichlorobenzene	U		0.00482	0.0125
1,1,1-Trichloroethane	U		0.000275	0.00250
1,1,2-Trichloroethane	U		0.000883	0.00250
Trichloroethene	U		0.000400	0.00100
Trichlorofluoromethane	U		0.000500	0.00250
1,2,3-Trichloropropane	U		0.00510	0.0125
1,2,3-Trimethylbenzene	U		0.00115	0.00500
1,2,4-Trimethylbenzene	0.00194	J	0.00116	0.00500
1,3,5-Trimethylbenzene	U		0.00108	0.00500
Vinyl acetate	U		0.00352	0.0125
Vinyl chloride	U		0.000683	0.00250
Xylenes, Total	U		0.00478	0.00650
(S) Toluene-d8	*107*			*75.0-131*
(S) 4-Bromofluorobenzene	*98.1*			*67.0-138*
(S) 1,2-Dichloroethane-d4	*92.9*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461081-1 10/14/19 15:52 • (LCSD) R3461081-2 10/14/19 16:14

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCSD Result mg/kg	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.625	0.457	0.412	73.1	65.9	10.0-160			10.4	31
Acrylonitrile	0.625	0.590	0.575	94.4	92.0	45.0-153			2.58	22
Benzene	0.125	0.115	0.115	92.0	92.0	70.0-123			0.000	20
Bromobenzene	0.125	0.114	0.114	91.2	91.2	73.0-121			0.000	20
Bromodichloromethane	0.125	0.106	0.108	84.8	86.4	73.0-121			1.87	20
Bromochloromethane	0.125	0.114	0.112	91.2	89.6	77.0-128			1.77	20
Bromoform	0.125	0.104	0.107	83.2	85.6	64.0-132			2.84	20
Bromomethane	0.125	0.108	0.108	86.4	86.4	56.0-147			0.000	20
n-Butylbenzene	0.125	0.123	0.123	98.4	98.4	68.0-135			0.000	20
sec-Butylbenzene	0.125	0.124	0.126	99.2	101	74.0-130			1.60	20
tert-Butylbenzene	0.125	0.123	0.125	98.4	100	75.0-127			1.61	20
Carbon disulfide	0.125	0.107	0.108	85.6	86.4	56.0-133			0.930	20
Carbon tetrachloride	0.125	0.0956	0.109	76.5	87.2	66.0-128			13.1	20
Chlorobenzene	0.125	0.115	0.119	92.0	95.2	76.0-128			3.42	20
Chlorodibromomethane	0.125	0.111	0.113	88.8	90.4	74.0-127			1.79	20
Chloroethane	0.125	0.110	0.111	88.0	88.8	61.0-134			0.905	20
Chloroform	0.125	0.111	0.111	88.8	88.8	72.0-123			0.000	20
Chloromethane	0.125	0.113	0.109	90.4	87.2	51.0-138			3.60	20
2-Chlorotoluene	0.125	0.121	0.122	96.8	97.6	75.0-124			0.823	20
4-Chlorotoluene	0.125	0.115	0.115	92.0	92.0	75.0-124			0.000	20
1,2-Dibromo-3-Chloropropane	0.125	0.104	0.101	83.2	80.8	59.0-130			2.93	20
1,2-Dibromoethane	0.125	0.125	0.126	100	101	74.0-128			0.797	20
Dibromomethane	0.125	0.113	0.113	90.4	90.4	75.0-122			0.000	20
1,2-Dichlorobenzene	0.125	0.125	0.126	100	101	76.0-124			0.797	20
1,3-Dichlorobenzene	0.125	0.125	0.125	100	100	76.0-125			0.000	20
1,4-Dichlorobenzene	0.125	0.121	0.121	96.8	96.8	77.0-121			0.000	20
trans-1,4-Dichloro-2-butene	0.125	0.128	0.126	102	101	45.0-143			1.57	20
Dichlorodifluoromethane	0.125	0.105	0.103	84.0	82.4	43.0-156			1.92	20
1,1-Dichloroethane	0.125	0.115	0.115	92.0	92.0	70.0-127			0.000	20
1,2-Dichloroethane	0.125	0.105	0.104	84.0	83.2	65.0-131			0.957	20
1,1-Dichloroethene	0.125	0.111	0.113	88.8	90.4	65.0-131			1.79	20
cis-1,2-Dichloroethene	0.125	0.112	0.114	89.6	91.2	73.0-125			1.77	20
trans-1,2-Dichloroethene	0.125	0.118	0.117	94.4	93.6	71.0-125			0.851	20
1,2-Dichloropropane	0.125	0.123	0.127	98.4	102	74.0-125			3.20	20
1,1-Dichloropropene	0.125	0.116	0.113	92.8	90.4	73.0-125			2.62	20
1,3-Dichloropropane	0.125	0.124	0.124	99.2	99.2	80.0-125			0.000	20
cis-1,3-Dichloropropene	0.125	0.121	0.119	96.8	95.2	76.0-127			1.67	20
trans-1,3-Dichloropropene	0.125	0.116	0.118	92.8	94.4	73.0-127			1.71	20
2,2-Dichloropropane	0.125	0.112	0.111	89.6	88.8	59.0-135			0.897	20
Di-isopropyl ether	0.125	0.119	0.119	95.2	95.2	60.0-136			0.000	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461081-1 10/14/19 15:52 • (LCSD) R3461081-2 10/14/19 16:14

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCSD Result mg/kg	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.125	0.119	0.122	95.2	97.6	74.0-126			2.49	20
Hexachloro-1,3-butadiene	0.125	0.132	0.135	106	108	57.0-150			2.25	20
2-Hexanone	0.625	0.617	0.619	98.7	99.0	54.0-147			0.324	20
n-Hexane	0.125	0.123	0.118	98.4	94.4	55.0-137			4.15	20
Iodomethane	0.625	0.605	0.456	96.8	73.0	74.0-134		J3 J4	28.1	20
Isopropylbenzene	0.125	0.119	0.122	95.2	97.6	72.0-127			2.49	20
p-Isopropyltoluene	0.125	0.127	0.128	102	102	72.0-133			0.784	20
2-Butanone (MEK)	0.625	0.575	0.560	92.0	89.6	30.0-160			2.64	24
Methylene Chloride	0.125	0.114	0.113	91.2	90.4	68.0-123			0.881	20
4-Methyl-2-pentanone (MIBK)	0.625	0.585	0.610	93.6	97.6	56.0-143			4.18	20
Methyl tert-butyl ether	0.125	0.117	0.117	93.6	93.6	66.0-132			0.000	20
Naphthalene	0.125	0.107	0.113	85.6	90.4	59.0-130			5.45	20
n-Propylbenzene	0.125	0.119	0.119	95.2	95.2	74.0-126			0.000	20
Styrene	0.125	0.119	0.120	95.2	96.0	72.0-127			0.837	20
1,1,1,2-Tetrachloroethane	0.125	0.117	0.120	93.6	96.0	74.0-129			2.53	20
1,1,2,2-Tetrachloroethane	0.125	0.113	0.112	90.4	89.6	68.0-128			0.889	20
Tetrachloroethene	0.125	0.125	0.124	100	99.2	70.0-136			0.803	20
Toluene	0.125	0.114	0.116	91.2	92.8	75.0-121			1.74	20
1,1,2-Trichlorotrifluoroethane	0.125	0.115	0.113	92.0	90.4	61.0-139			1.75	20
1,2,3-Trichlorobenzene	0.125	0.106	0.115	84.8	92.0	59.0-139			8.14	20
1,2,4-Trichlorobenzene	0.125	0.119	0.127	95.2	102	62.0-137			6.50	20
1,1,1-Trichloroethane	0.125	0.108	0.109	86.4	87.2	69.0-126			0.922	20
1,1,2-Trichloroethane	0.125	0.120	0.120	96.0	96.0	78.0-123			0.000	20
Trichloroethene	0.125	0.126	0.124	101	99.2	76.0-126			1.60	20
Trichlorofluoromethane	0.125	0.106	0.106	84.8	84.8	61.0-142			0.000	20
1,2,3-Trichloropropane	0.125	0.122	0.122	97.6	97.6	67.0-129			0.000	20
1,2,3-Trimethylbenzene	0.125	0.119	0.120	95.2	96.0	74.0-124			0.837	20
1,2,4-Trimethylbenzene	0.125	0.124	0.122	99.2	97.6	70.0-126			1.63	20
1,3,5-Trimethylbenzene	0.125	0.124	0.122	99.2	97.6	73.0-127			1.63	20
Vinyl acetate	0.625	0.496	0.525	79.4	84.0	43.0-159			5.68	20
Vinyl chloride	0.125	0.101	0.102	80.8	81.6	63.0-134			0.985	20
Xylenes, Total	0.375	0.367	0.370	97.9	98.7	72.0-127			0.814	20
(S) Toluene-d8				*104*	*106*	*75.0-131*				
(S) 4-Bromofluorobenzene				*96.6*	*97.4*	*67.0-138*				
(S) 1,2-Dichloroethane-d4				*96.5*	*95.0*	*70.0-130*				

Method Blank (MB)

(MB) R3461600-1 10/15/19 12:48

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Acetone	U		0.0137	0.0250
Acrylonitrile	U		0.00190	0.0125
Benzene	U		0.000400	0.00100
Bromobenzene	U		0.00105	0.0125
Bromodichloromethane	U		0.000788	0.00250
Bromochloromethane	U		0.00113	0.00500
Bromoform	U		0.00598	0.0250
Bromomethane	U		0.00370	0.0125
n-Butylbenzene	U		0.00384	0.0125
sec-Butylbenzene	U		0.00253	0.0125
tert-Butylbenzene	U		0.00155	0.00500
Carbon disulfide	U		0.00406	0.0125
Carbon tetrachloride	U		0.00108	0.00500
Chlorobenzene	U		0.000573	0.00250
Chlorodibromomethane	U		0.000450	0.00250
Chloroethane	U		0.00108	0.00500
Chloroform	0.00182	J	0.000415	0.00250
Chloromethane	U		0.00139	0.0125
2-Chlorotoluene	U		0.000920	0.00250
4-Chlorotoluene	U		0.00113	0.00500
1,2-Dibromo-3-Chloropropane	U		0.00510	0.0250
1,2-Dibromoethane	U		0.000525	0.00250
Dibromomethane	U		0.00100	0.00500
1,2-Dichlorobenzene	U		0.00145	0.00500
1,3-Dichlorobenzene	U		0.00170	0.00500
1,4-Dichlorobenzene	U		0.00197	0.00500
trans-1,4-Dichloro-2-butene	U		0.00140	0.00500
Dichlorodifluoromethane	U		0.000818	0.00250
1,1-Dichloroethane	U		0.000575	0.00250
1,2-Dichloroethane	U		0.000475	0.00250
1,1-Dichloroethene	U		0.000500	0.00250
cis-1,2-Dichloroethene	U		0.000690	0.00250
trans-1,2-Dichloroethene	U		0.00143	0.00500
1,2-Dichloropropane	U		0.00127	0.00500
1,1-Dichloropropene	U		0.000700	0.00250
1,3-Dichloropropane	U		0.00175	0.00500
cis-1,3-Dichloropropene	U		0.000678	0.00250
trans-1,3-Dichloropropene	U		0.00153	0.00500
2,2-Dichloropropane	U		0.000793	0.00250
Di-isopropyl ether	U		0.000350	0.00100

Method Blank (MB)

(MB) R3461600-1 10/15/19 12:48

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Ethylbenzene	U		0.000530	0.00250
Hexachloro-1,3-butadiene	U		0.0127	0.0250
n-Hexane	U		0.00106	0.00500
2-Hexanone	U		0.0100	0.0250
Iodomethane	U		0.00605	0.0125
Isopropylbenzene	U		0.000863	0.00250
p-Isopropyltoluene	U		0.00233	0.00500
2-Butanone (MEK)	0.0353		0.0125	0.0250
Methylene Chloride	0.00937	J	0.00664	0.0250
4-Methyl-2-pentanone (MIBK)	U		0.0100	0.0250
Methyl tert-butyl ether	U		0.000295	0.00100
Naphthalene	U		0.00312	0.0125
n-Propylbenzene	U		0.00118	0.00500
Styrene	U		0.00273	0.0125
1,1,1,2-Tetrachloroethane	U		0.000500	0.00250
1,1,2,2-Tetrachloroethane	U		0.000390	0.00250
Tetrachloroethene	U		0.000700	0.00250
Toluene	U		0.00125	0.00500
1,1,2-Trichlorotrifluoroethane	U		0.000675	0.00250
1,2,3-Trichlorobenzene	U		0.000625	0.00250
1,2,4-Trichlorobenzene	U		0.00482	0.0125
1,1,1-Trichloroethane	U		0.000275	0.00250
1,1,2-Trichloroethane	U		0.000883	0.00250
Trichloroethene	U		0.000400	0.00100
Trichlorofluoromethane	U		0.000500	0.00250
1,2,3-Trichloropropane	U		0.00510	0.0125
1,2,3-Trimethylbenzene	U		0.00115	0.00500
1,2,4-Trimethylbenzene	U		0.00116	0.00500
1,3,5-Trimethylbenzene	U		0.00108	0.00500
Vinyl acetate	U		0.00352	0.0125
Vinyl chloride	U		0.000683	0.00250
Xylenes, Total	U		0.00478	0.00650
(S) Toluene-d8	*102*			*75.0-131*
(S) 4-Bromofluorobenzene	*100*			*67.0-138*
(S) 1,2-Dichloroethane-d4	*98.4*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3461600-2 10/15/19 14:30

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.625	0.690	110	10.0-160	
Acrylonitrile	0.625	0.701	112	45.0-153	
Benzene	0.125	0.123	98.4	70.0-123	
Bromobenzene	0.125	0.118	94.4	73.0-121	
Bromodichloromethane	0.125	0.138	110	73.0-121	
Bromochloromethane	0.125	0.128	102	77.0-128	
Bromoform	0.125	0.129	103	64.0-132	
Bromomethane	0.125	0.157	126	56.0-147	
n-Butylbenzene	0.125	0.120	96.0	68.0-135	
sec-Butylbenzene	0.125	0.115	92.0	74.0-130	
tert-Butylbenzene	0.125	0.117	93.6	75.0-127	
Carbon disulfide	0.125	0.134	107	56.0-133	
Carbon tetrachloride	0.125	0.144	115	66.0-128	
Chlorobenzene	0.125	0.126	101	76.0-128	
Chlorodibromomethane	0.125	0.115	92.0	74.0-127	
Chloroethane	0.125	0.158	126	61.0-134	
Chloroform	0.125	0.131	105	72.0-123	
Chloromethane	0.125	0.178	142	51.0-138	J4
2-Chlorotoluene	0.125	0.121	96.8	75.0-124	
4-Chlorotoluene	0.125	0.119	95.2	75.0-124	
1,2-Dibromo-3-Chloropropane	0.125	0.110	88.0	59.0-130	
1,2-Dibromoethane	0.125	0.126	101	74.0-128	
Dibromomethane	0.125	0.146	117	75.0-122	
1,2-Dichlorobenzene	0.125	0.122	97.6	76.0-124	
1,3-Dichlorobenzene	0.125	0.119	95.2	76.0-125	
1,4-Dichlorobenzene	0.125	0.123	98.4	77.0-121	
trans-1,4-Dichloro-2-butene	0.125	0.119	95.2	45.0-143	
Dichlorodifluoromethane	0.125	0.172	138	43.0-156	
1,1-Dichloroethane	0.125	0.137	110	70.0-127	
1,2-Dichloroethane	0.125	0.137	110	65.0-131	
1,1-Dichloroethene	0.125	0.134	107	65.0-131	
cis-1,2-Dichloroethene	0.125	0.131	105	73.0-125	
trans-1,2-Dichloroethene	0.125	0.123	98.4	71.0-125	
1,2-Dichloropropane	0.125	0.130	104	74.0-125	
1,1-Dichloropropene	0.125	0.134	107	73.0-125	
1,3-Dichloropropane	0.125	0.121	96.8	80.0-125	
cis-1,3-Dichloropropene	0.125	0.133	106	76.0-127	
trans-1,3-Dichloropropene	0.125	0.130	104	73.0-127	
2,2-Dichloropropane	0.125	0.130	104	59.0-135	
Di-isopropyl ether	0.125	0.145	116	60.0-136	

Laboratory Control Sample (LCS)

(LCS) R3461600-2 10/15/19 14:30

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	0.125	0.120	96.0	74.0-126	
Hexachloro-1,3-butadiene	0.125	0.110	88.0	57.0-150	
2-Hexanone	0.625	0.679	109	54.0-147	
n-Hexane	0.125	0.136	109	55.0-137	
Iodomethane	0.625	0.689	110	74.0-134	
Isopropylbenzene	0.125	0.122	97.6	72.0-127	
p-Isopropyltoluene	0.125	0.117	93.6	72.0-133	
2-Butanone (MEK)	0.625	0.734	117	30.0-160	
Methylene Chloride	0.125	0.129	103	68.0-123	
4-Methyl-2-pentanone (MIBK)	0.625	0.709	113	56.0-143	
Methyl tert-butyl ether	0.125	0.132	106	66.0-132	
Naphthalene	0.125	0.0936	74.9	59.0-130	
n-Propylbenzene	0.125	0.118	94.4	74.0-126	
Styrene	0.125	0.125	100	72.0-127	
1,1,1,2-Tetrachloroethane	0.125	0.134	107	74.0-129	
1,1,2,2-Tetrachloroethane	0.125	0.126	101	68.0-128	
Tetrachloroethene	0.125	0.127	102	70.0-136	
Toluene	0.125	0.122	97.6	75.0-121	
1,1,2-Trichlorotrifluoroethane	0.125	0.127	102	61.0-139	
1,2,3-Trichlorobenzene	0.125	0.105	84.0	59.0-139	
1,2,4-Trichlorobenzene	0.125	0.109	87.2	62.0-137	
1,1,1-Trichloroethane	0.125	0.141	113	69.0-126	
1,1,2-Trichloroethane	0.125	0.123	98.4	78.0-123	
Trichloroethene	0.125	0.137	110	76.0-126	
Trichlorofluoromethane	0.125	0.156	125	61.0-142	
1,2,3-Trichloropropane	0.125	0.124	99.2	67.0-129	
1,2,3-Trimethylbenzene	0.125	0.119	95.2	74.0-124	
1,2,4-Trimethylbenzene	0.125	0.112	89.6	70.0-126	
1,3,5-Trimethylbenzene	0.125	0.119	95.2	73.0-127	
Vinyl acetate	0.625	0.669	107	43.0-159	
Vinyl chloride	0.125	0.168	134	63.0-134	
Xylenes, Total	0.375	0.374	99.7	72.0-127	
(S) Toluene-d8			*101*	*75.0-131*	
(S) 4-Bromofluorobenzene			*102*	*67.0-138*	
(S) 1,2-Dichloroethane-d4			*109*	*70.0-130*	

Method Blank (MB)

(MB) R3461125-3 10/15/19 00:15

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3461125-3 10/15/19 00:15

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*102*			*80.0-120*
(S) 4-Bromofluorobenzene	*102*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*104*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461125-1 10/14/19 22:32 • (LCSD) R3461125-2 10/14/19 22:52

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	125	159	154	127	123	19.0-160			3.19	27
Acrylonitrile	125	139	138	111	110	55.0-149			0.722	20
Benzene	25.0	24.1	24.1	96.4	96.4	70.0-123			0.000	20
Bromobenzene	25.0	23.9	23.9	95.6	95.6	73.0-121			0.000	20
Bromodichloromethane	25.0	27.3	27.2	109	109	75.0-120			0.367	20
Bromochloromethane	25.0	26.0	26.0	104	104	76.0-122			0.000	20
Bromoform	25.0	25.7	25.7	103	103	68.0-132			0.000	20
Bromomethane	25.0	25.0	24.3	100	97.2	10.0-160			2.84	25
n-Butylbenzene	25.0	25.7	26.8	103	107	73.0-125			4.19	20
sec-Butylbenzene	25.0	25.0	25.2	100	101	75.0-125			0.797	20
tert-Butylbenzene	25.0	25.6	25.5	102	102	76.0-124			0.391	20
Carbon disulfide	25.0	21.6	21.4	86.4	85.6	61.0-128			0.930	20
Carbon tetrachloride	25.0	28.4	28.7	114	115	68.0-126			1.05	20
Chlorobenzene	25.0	24.2	24.1	96.8	96.4	80.0-121			0.414	20
Chlorodibromomethane	25.0	22.8	22.5	91.2	90.0	77.0-125			1.32	20
Chloroethane	25.0	25.1	25.3	100	101	47.0-150			0.794	20
Chloroform	25.0	25.7	25.5	103	102	73.0-120			0.781	20
Chloromethane	25.0	29.0	28.0	116	112	41.0-142			3.51	20
2-Chlorotoluene	25.0	24.6	24.3	98.4	97.2	76.0-123			1.23	20
4-Chlorotoluene	25.0	24.9	24.7	99.6	98.8	75.0-122			0.806	20
1,2-Dibromo-3-Chloropropane	25.0	24.0	24.7	96.0	98.8	58.0-134			2.87	20
1,2-Dibromoethane	25.0	24.7	24.1	98.8	96.4	80.0-122			2.46	20
Dibromomethane	25.0	27.8	27.4	111	110	80.0-120			1.45	20
1,2-Dichlorobenzene	25.0	25.6	25.4	102	102	79.0-121			0.784	20
1,3-Dichlorobenzene	25.0	25.0	24.8	100	99.2	79.0-120			0.803	20
1,4-Dichlorobenzene	25.0	25.0	24.7	100	98.8	79.0-120			1.21	20
Dichlorodifluoromethane	25.0	30.2	28.3	121	113	51.0-149			6.50	20
1,1-Dichloroethane	25.0	26.3	26.3	105	105	70.0-126			0.000	20
1,2-Dichloroethane	25.0	26.1	25.9	104	104	70.0-128			0.769	20
1,1-Dichloroethene	25.0	25.1	25.1	100	100	71.0-124			0.000	20
cis-1,2-Dichloroethene	25.0	24.9	25.2	99.6	101	73.0-120			1.20	20
trans-1,2-Dichloroethene	25.0	23.4	23.4	93.6	93.6	73.0-120			0.000	20
1,2-Dichloropropane	25.0	26.5	26.7	106	107	77.0-125			0.752	20
1,1-Dichloropropene	25.0	26.4	26.1	106	104	74.0-126			1.14	20
1,3-Dichloropropane	25.0	23.6	23.4	94.4	93.6	80.0-120			0.851	20
cis-1,3-Dichloropropene	25.0	27.3	27.1	109	108	80.0-123			0.735	20
trans-1,3-Dichloropropene	25.0	25.3	25.3	101	101	78.0-124			0.000	20
trans-1,4-Dichloro-2-butene	25.0	25.3	24.9	101	99.6	33.0-144			1.59	20
2,2-Dichloropropane	25.0	25.4	24.8	102	99.2	58.0-130			2.39	20
Di-isopropyl ether	25.0	27.7	27.5	111	110	58.0-138			0.725	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461125-1 10/14/19 22:32 • (LCSD) R3461125-2 10/14/19 22:52

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	25.0	23.8	23.6	95.2	94.4	79.0-123			0.844	20
Hexachloro-1,3-butadiene	25.0	24.2	27.4	96.8	110	54.0-138			12.4	20
2-Hexanone	125	133	130	106	104	67.0-149			2.28	20
n-Hexane	25.0	25.9	25.6	104	102	57.0-133			1.17	20
Iodomethane	125	125	124	100	99.2	33.0-147			0.803	26
Isopropylbenzene	25.0	25.2	24.7	101	98.8	76.0-127			2.00	20
p-Isopropyltoluene	25.0	26.0	26.3	104	105	76.0-125			1.15	20
2-Butanone (MEK)	125	153	151	122	121	44.0-160			1.32	20
Methylene Chloride	25.0	23.6	24.0	94.4	96.0	67.0-120			1.68	20
4-Methyl-2-pentanone (MIBK)	125	136	134	109	107	68.0-142			1.48	20
Methyl tert-butyl ether	25.0	26.0	25.6	104	102	68.0-125			1.55	20
Naphthalene	25.0	23.8	26.4	95.2	106	54.0-135			10.4	20
n-Propylbenzene	25.0	24.2	24.1	96.8	96.4	77.0-124			0.414	20
Styrene	25.0	26.2	25.7	105	103	73.0-130			1.93	20
1,1,1,2-Tetrachloroethane	25.0	25.3	25.1	101	100	75.0-125			0.794	20
1,1,2,2-Tetrachloroethane	25.0	23.4	23.1	93.6	92.4	65.0-130			1.29	20
1,1,2-Trichlorotrifluoroethane	25.0	25.2	24.7	101	98.8	69.0-132			2.00	20
Tetrachloroethene	25.0	24.7	24.5	98.8	98.0	72.0-132			0.813	20
Toluene	25.0	23.2	23.0	92.8	92.0	79.0-120			0.866	20
1,2,3-Trichlorobenzene	25.0	25.8	28.8	103	115	50.0-138			11.0	20
1,2,4-Trichlorobenzene	25.0	25.3	27.3	101	109	57.0-137			7.60	20
1,1,1-Trichloroethane	25.0	28.0	27.5	112	110	73.0-124			1.80	20
1,1,2-Trichloroethane	25.0	23.9	23.9	95.6	95.6	80.0-120			0.000	20
Trichloroethene	25.0	27.4	27.6	110	110	78.0-124			0.727	20
Trichlorofluoromethane	25.0	30.7	29.7	123	119	59.0-147			3.31	20
1,2,3-Trichloropropane	25.0	25.1	23.9	100	95.6	73.0-130			4.90	20
1,2,4-Trimethylbenzene	25.0	24.0	23.4	96.0	93.6	76.0-121			2.53	20
1,2,3-Trimethylbenzene	25.0	24.5	24.4	98.0	97.6	77.0-120			0.409	20
1,3,5-Trimethylbenzene	25.0	25.0	24.9	100	99.6	76.0-122			0.401	20
Vinyl acetate	125	124	118	99.2	94.4	11.0-160			4.96	20
Vinyl chloride	25.0	27.8	27.5	111	110	67.0-131			1.08	20
Xylenes, Total	75.0	72.2	71.3	96.3	95.1	79.0-123			1.25	20
(S) Toluene-d8				*96.2*	*96.7*	*80.0-120*				
(S) 4-Bromofluorobenzene				*101*	*101*	*77.0-126*				
(S) 1,2-Dichloroethane-d4				*112*	*113*	*70.0-130*				

L1148487-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148487-01 10/15/19 07:24 • (MS) R3461125-4 10/15/19 09:50 • (MSD) R3461125-5 10/15/19 10:11

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Acetone	125	7.11	156	159	119	122	1	10.0-160			1.90	35
Acrylonitrile	125	U	144	140	115	112	1	21.0-160			2.82	32
Benzene	25.0	U	24.7	22.9	98.8	91.6	1	17.0-158			7.56	27
Bromobenzene	25.0	U	23.1	22.5	92.4	90.0	1	30.0-149			2.63	28
Bromodichloromethane	25.0	U	28.2	26.5	113	106	1	31.0-150			6.22	27
Bromochloromethane	25.0	U	26.7	25.3	107	101	1	38.0-142			5.38	26
Bromoform	25.0	U	27.5	26.6	110	106	1	29.0-150			3.33	29
Bromomethane	25.0	U	25.0	22.4	100	89.6	1	10.0-160			11.0	38
n-Butylbenzene	25.0	U	26.3	26.3	105	105	1	31.0-150			0.000	30
sec-Butylbenzene	25.0	U	25.7	25.1	103	100	1	33.0-155			2.36	29
tert-Butylbenzene	25.0	U	26.1	25.2	104	101	1	34.0-153			3.51	28
Carbon disulfide	25.0	U	23.3	20.7	93.2	82.8	1	10.0-156			11.8	28
Carbon tetrachloride	25.0	U	31.0	28.0	124	112	1	23.0-159			10.2	28
Chlorobenzene	25.0	U	25.6	24.2	102	96.8	1	33.0-152			5.62	27
Chlorodibromomethane	25.0	U	24.3	23.3	97.2	93.2	1	37.0-149			4.20	27
Chloroethane	25.0	U	25.9	23.6	104	94.4	1	10.0-160			9.29	30
Chloroform	25.0	1.01	27.4	25.2	106	96.8	1	29.0-154			8.37	28
Chloromethane	25.0	U	27.1	24.2	108	96.8	1	10.0-160			11.3	29
2-Chlorotoluene	25.0	U	24.3	23.4	97.2	93.6	1	32.0-153			3.77	28
4-Chlorotoluene	25.0	U	24.3	23.5	97.2	94.0	1	32.0-150			3.35	28
1,2-Dibromo-3-Chloropropane	25.0	U	24.5	25.5	98.0	102	1	22.0-151			4.00	34
1,2-Dibromoethane	25.0	U	25.4	24.3	102	97.2	1	34.0-147			4.43	27
Dibromomethane	25.0	U	28.0	27.4	112	110	1	30.0-151			2.17	27
1,2-Dichlorobenzene	25.0	U	25.4	25.1	102	100	1	34.0-149			1.19	28
1,3-Dichlorobenzene	25.0	U	24.5	24.0	98.0	96.0	1	36.0-146			2.06	27
1,4-Dichlorobenzene	25.0	U	25.3	24.4	101	97.6	1	35.0-142			3.62	27
Dichlorodifluoromethane	25.0	U	32.0	26.6	128	106	1	10.0-160			18.4	29
1,1-Dichloroethane	25.0	U	27.6	25.3	110	101	1	25.0-158			8.70	27
1,2-Dichloroethane	25.0	U	27.0	25.4	108	102	1	29.0-151			6.11	27
1,1-Dichloroethene	25.0	U	27.0	24.0	108	96.0	1	11.0-160			11.8	29
cis-1,2-Dichloroethene	25.0	0.302	26.2	24.2	104	95.6	1	10.0-160			7.94	27
trans-1,2-Dichloroethene	25.0	U	24.6	22.2	98.4	88.8	1	17.0-153			10.3	27
1,2-Dichloropropane	25.0	0.512	27.4	25.7	108	101	1	30.0-156			6.40	27
1,1-Dichloropropene	25.0	U	28.3	25.6	113	102	1	25.0-158			10.0	27
1,3-Dichloropropane	25.0	U	24.2	24.2	96.8	96.8	1	38.0-147			0.000	27
cis-1,3-Dichloropropene	25.0	U	27.2	25.6	109	102	1	34.0-149			6.06	28
trans-1,3-Dichloropropene	25.0	U	26.7	25.5	107	102	1	32.0-149			4.60	28
trans-1,4-Dichloro-2-butene	25.0	U	23.6	23.9	94.4	95.6	1	10.0-157			1.26	37
2,2-Dichloropropane	25.0	U	26.0	23.0	104	92.0	1	24.0-152			12.2	29
Di-isopropyl ether	25.0	U	28.5	27.1	114	108	1	21.0-160			5.04	28

L1148487-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148487-01 10/15/19 07:24 • (MS) R3461125-4 10/15/19 09:50 • (MSD) R3461125-5 10/15/19 10:11

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	25.0	U	25.2	23.7	101	94.8	1	30.0-155			6.13	27
Hexachloro-1,3-butadiene	25.0	U	25.4	27.4	102	110	1	20.0-154			7.58	34
2-Hexanone	125	U	138	133	110	106	1	21.0-160			3.69	29
n-Hexane	25.0	U	27.8	25.9	111	104	1	10.0-153			7.08	28
Iodomethane	125	U	130	118	104	94.4	1	10.0-160			9.68	40
Isopropylbenzene	25.0	U	27.3	25.7	109	103	1	28.0-157			6.04	27
p-Isopropyltoluene	25.0	U	26.3	25.8	105	103	1	30.0-154			1.92	29
2-Butanone (MEK)	125	U	158	154	126	123	1	10.0-160			2.56	32
Methylene Chloride	25.0	U	24.3	22.5	97.2	90.0	1	23.0-144			7.69	28
4-Methyl-2-pentanone (MIBK)	125	U	141	138	113	110	1	29.0-160			2.15	29
Methyl tert-butyl ether	25.0	U	26.1	25.3	104	101	1	28.0-150			3.11	29
Naphthalene	25.0	U	24.5	26.7	98.0	107	1	12.0-156			8.59	35
n-Propylbenzene	25.0	U	24.2	23.1	96.8	92.4	1	31.0-154			4.65	28
Styrene	25.0	U	27.3	25.8	109	103	1	33.0-155			5.65	28
1,1,1,2-Tetrachloroethane	25.0	U	27.2	25.9	109	104	1	36.0-151			4.90	29
1,1,2,2-Tetrachloroethane	25.0	U	24.4	24.7	97.6	98.8	1	33.0-150			1.22	28
1,1,2-Trichlorotrifluoroethane	25.0	U	27.2	24.5	109	98.0	1	23.0-160			10.4	30
Tetrachloroethene	25.0	U	27.1	24.8	108	99.2	1	10.0-160			8.86	27
Toluene	25.0	U	24.7	22.9	98.8	91.6	1	26.0-154			7.56	28
1,2,3-Trichlorobenzene	25.0	U	26.4	28.6	106	114	1	17.0-150			8.00	36
1,2,4-Trichlorobenzene	25.0	U	25.5	26.6	102	106	1	24.0-150			4.22	33
1,1,1-Trichloroethane	25.0	0.232	30.3	27.2	120	108	1	23.0-160			10.8	28
1,1,2-Trichloroethane	25.0	U	25.2	24.1	101	96.4	1	35.0-147			4.46	27
Trichloroethene	25.0	2.14	29.6	27.2	110	100	1	10.0-160			8.45	25
Trichlorofluoromethane	25.0	U	33.7	30.2	135	121	1	17.0-160			11.0	31
1,2,3-Trichloropropane	25.0	U	24.0	23.5	96.0	94.0	1	34.0-151			2.11	29
1,2,4-Trimethylbenzene	25.0	U	23.8	23.1	95.2	92.4	1	26.0-154			2.99	27
1,2,3-Trimethylbenzene	25.0	U	24.7	23.9	98.8	95.6	1	32.0-149			3.29	28
1,3,5-Trimethylbenzene	25.0	U	24.7	24.1	98.8	96.4	1	28.0-153			2.46	27
Vinyl acetate	125	U	163	157	130	126	1	12.0-160			3.75	31
Vinyl chloride	25.0	0.139	28.8	25.4	115	101	1	10.0-160			12.5	27
Xylenes, Total	75.0	U	76.4	71.4	102	95.2	1	29.0-154			6.77	28
(S) Toluene-d8					*100*	*99.9*		*80.0-120*				
(S) 4-Bromofluorobenzene					*105*	*105*		*77.0-126*				
(S) 1,2-Dichloroethane-d4					*118*	*114*		*70.0-130*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

(dry)	Results are reported based on the dry weight of the sample. [this will only be present on a dry report basis for soils].
MDL	Method Detection Limit.
MDL (dry)	Method Detection Limit.
RDL	Reported Detection Limit.
RDL (dry)	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
J	The identification of the analyte is acceptable; the reported value is an estimate.
J0	J0: The identification of the analyte is acceptable, but the reported concentration is an estimate. The calibration met method criteria.
J3	The associated batch QC was outside the established quality control range for precision.
J4	The associated batch QC was outside the established quality control range for accuracy.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

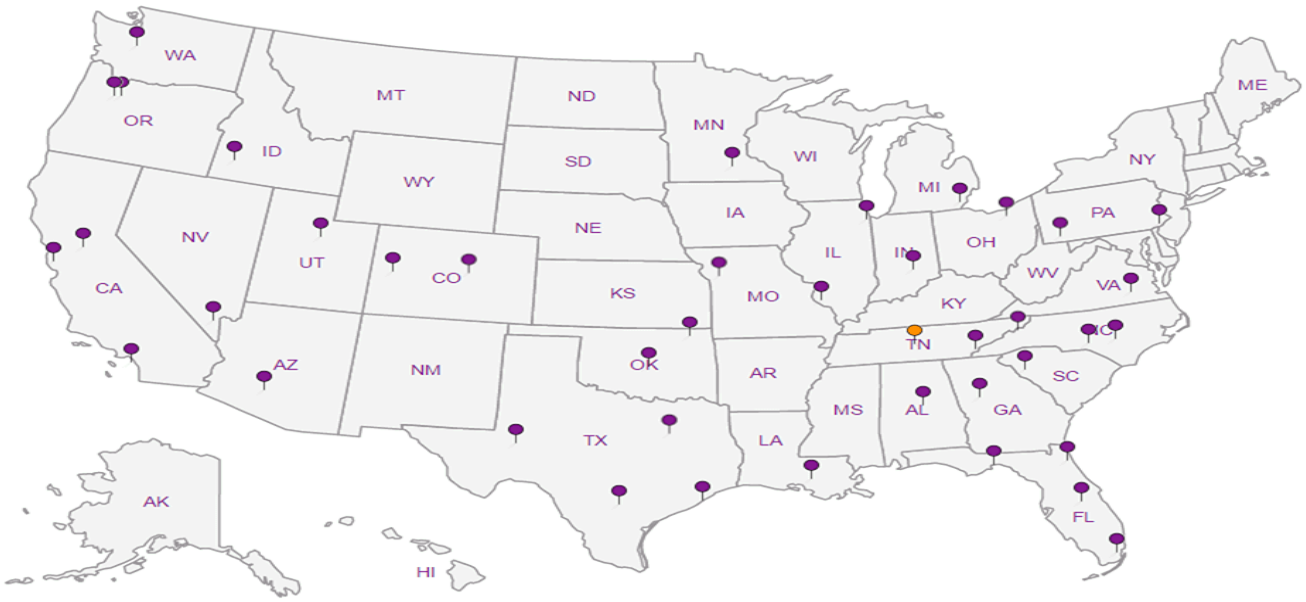
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



PES Environmental, Inc.- WA

1215 Fourth Ave., Suite 1350
Seattle, WA 98161

Billing Information:
Attn: Accounts Payable
1215 Fourth Ave., Ste. 1350
Seattle, WA 98161

Report to: Brian O'Neal/Bill Haldeman

Email To: boneal@pesenv.com; bhaldeman@pesenv.com;

Project Description: AMERICAN LINEN

City/State Collected: SEATTLE WA.

Please Circle: PT MT CT ET

Phone: 206-529-3980
Fax: 206-529-3985

Client Project # 1413.001.05.601

Lab Project # PESENVSWA-ALP

Collected by (print): H.W. SMALL

Site/Facility ID # SEATTLE WA, 700 DEXTER AVE N.

P.O. #

Collected by (signature): H.W. Small
Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Analysis / Container / Preservative

Chain of Custody Page 1 of 3

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

SDG # L1147020
E113

Acctnum: PESENVSWA
Template: T134174
Prelogin: P731162
PM: 110 - Brian Ford
PB: 9-23-19 6m
Shipped Via: FedEX Ground

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	V8260C VOCs 40ml/NaHS04/Syr/MeOH	dry wt,voc screen 2ozClr-NoPres	Remarks	Sample # (lab only)
MW-304-5	GRAB	SS	5	10/1/19	1000	2	X	X		-01
MW-304-10		SS	10		1005	2	X	X		-02
MW-304-15		SS	15		1010	2	X	X		-03
MW-304-20		SS	20		1015	2	X	X	SAMPLE MW-304-30 OK. RUN ANALYSIS -HWS	-04
MW-304-25		SS	25		1020	2	X	X		-05
~~MW-304-30~~		~~SS~~	~~30~~		~~1025~~	~~2~~	X	X	-HWS	-06
~~MW-304-35~~		~~SS~~	~~35~~		~~1027~~	~~2~~	X	X	HWS DO NO SAMPLE MW-304-35	
MW-304-40		SS	40		1030	2	X	X		-07
MW-304-45		SS	45		1035	2	X	X		-08
MW-304-50		SS	50		1040	2	X	X		-09

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____
Flow _____ Other _____

Samples returned via: __ UPS ✓ FedEx __ Courier _____

Tracking # 7765 0452 3350

Sample Receipt Checklist

COC Seal Present/Intact:	NP	✓Y __N
COC Signed/Accurate:		✓Y __N
Bottles arrive intact:		✓Y __N
Correct bottles used:		✓Y __N
Sufficient volume sent:		✓Y __N
If Applicable		
VOA Zero Headspace:		✓Y __N
Preservation Correct/Checked:		__Y __N
RAD Screen <0.5 mR/hr:		✓Y __N

Relinquished by: (Signature) H.W. Small	Date: 10/4/19	Time: 1100	Received by: (Signature)	Trip Blank Received: (Yes) / No (HCl) / MeoH TBR 1
Relinquished by: (Signature)	Date:	Time:	Received by: (Signature)	Temp: 3.3 °C 0.3+2=0.1 Bottles Received: 36
Relinquished by: (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10-5-19 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / OK

PES Environmental, Inc.- WA

1215 Fourth Ave., Suite 1350
Seattle, WA 98161

Billing Information:
Attn: Accounts Payable
1215 Fourth Ave., Ste. 1350
Seattle, WA 98161

Pres Chk

Report to: Brian O'Neal/Bill Haldeman

Email To: boneal@pesenv.com; bhaldeman@pesenv.com;

Project Description: AMERICAN LINEN

City/State Collected: SEATTLE WA.

Please Circle: PT MT CT ET

Phone: 206-529-3980
Fax: 206-529-3985

Client Project # 1413.001.05.601

Lab Project # PESENVSWA-ALP

Collected by (print): H.W. SMALL

Site/Facility ID # SEATTLE WA. 700 DEXTER AVE N.

P.O. #

Collected by (signature): H.W. Small
Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Analysis / Container / Preservative

Chain of Custody Page 1 of 3

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

SDG # L1147020
E113

Acctnum: PESENVSWA
Template: T134174
Prelogin: P731162
PM: 110 - Brian Ford
PB: 9-23 19Gm
Shipped Via: FedEx Ground

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	V8260C VOCs 40ml/NaHS04/Syr/MeOH	dry wt,voc screen 2ozClr-NoPres	Remarks	Sample # (lab only)
MW-304-5	GRAB	SS	5	10/1/19	1000	2	X	X		-01
MW-304-10		SS	10		1005	2	X	X		-02
MW-304-15		SS	15		1010	2	X	X		-03
MW-304-20		SS	20		1015	2	X	X	SAMPLE MW-304-30 OK. RUN ANALYSIS	-04
MW-304-25		SS	25		1020	2	X	X		-05
~~MW-304-30~~		~~SS~~	~~30~~		1025	2	X	X	HWS	-06
~~MW-304-35~~		~~SS~~	~~35~~		1027	2	X	X	HWS DO NOT SAMPLE MW-304-35	
MW-304-40		SS	40		1030	2	X	X		-07
MW-304-45		SS	45		1035	2	X	X		-08
MW-304-50		SS	50		1040	2	X	X		-09

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____
Flow _____ Other _____

Samples returned via:
__ UPS ✓ FedEx __ Courier _____

Tracking # 7765 0452 3328

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: __Y __N
RAD Screen <0.5 mR/hr: ✓Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No (HCl) / MeoH TBR	If preservation required by Login: Date/Time
H.W. Small	10/4/19	1100		1	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 4.3 °C 0.3+2=0.1 Bottles Received: 36	
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10-5-19 Time: 8:45	Hold: / Condition: NCF / OK

PES Environmental, Inc.- WA

1215 Fourth Ave., Suite 1350
Seattle, WA 98161

Billing Information:
Attn: Accounts Payable
1215 Fourth Ave., Ste. 1350
Seattle, WA 98161

Pres Chk

Report to: Brian O'Neal/Bill Haldeman

Email To: boneal@pesenv.com; bhaldeman@pesenv.com;

Project Description: AMERICAN LINEN

City/State Collected: SEATTLE WA

Please Circle: PT MT CT ET

Phone: 206-529-3980
Fax: 206-529-3985

Client Project #

Lab Project #
PESENVSWA-ALP

Collected by (print): H W Small

Site/Facility ID #
700 DEXTER AVE N.

P.O. #

Collected by (signature): H W Small

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Analysis / Container / Preservative

Chain of Custody Page 2 of 3

Pace Analytical® National Center for Testing & Innovation

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Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

SDG # L1147820

Table #

Acctnum: PESENVSWA
Template: T154694
Prelogin: P725383
PM: 110 - Brian Ford
PB: 8/21/19 mrb

Shipped Via: FedEX Ground

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOCs 8260C 40mlAmb/MeOH5ml/Syr	dry weight 2ozClr-NoPres	Remarks	Sample # (lab only)
MW-304-55	GRAB	SS	55	10/1/19	1045	2	X	X		-10
MW-304-60		SS	60		1050	2	X	X		-11
MW-304-65		SS	65		1130	2	X	X		-12
MW-304-70		SS	70		1135	2	X	X		-13
MW-304-75		SS	75		1140	2	X	X		-14
MW-304-80		SS	80		1145	2	X	X		-15
MW-304-85		SS	85		1330	2	X	X		-16
MW-304-90		SS	90		1335	2	X	X		-17
MW-304-95		SS	95	10/2/19	1015	2	X	X		-18
MW-304-100	↓	SS	100	11	1030	2	X	X		-19

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____
Flow _____ Other _____

Samples returned via:
__ UPS ✓ FedEx __ Courier _____

Tracking # Same

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: __Y __N
RAD Screen <0.5 mR/hr: ✓Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No (HCl / MeoH TBR)	If preservation required by Login: Date/Time
H W Small	10/4/19	1100		1	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 13 °C 0.3-1.2=0.1 Bottles Received: 36	
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10519 Time: 8:45	Hold: / Condition: NCF / OK

Chain of Custody Page 3 of 3

PES Environmental, Inc.- WA

1215 Fourth Ave., Suite 1350
Seattle, WA 98161

Billing Information:
Attn: Accounts Payable
1215 Fourth Ave., Ste. 1350
Seattle, WA 98161

Report to: Brian O'Neal/Bill Haldeman

Email To: boneal@pesenv.com; bhaldeman@pesenv.com;

Project Description: AMERICAN LINEN

City/State Collected: SEATTLE WA

Please Circle: PT MT CT ET

Phone: 206-529-3980
Fax: 206-529-3985

Client Project #

Lab Project # PESENVSWA-ALP

Collected by (print): H.W Small

Site/Facility ID # 700 DEXTER AVE N.

P.O. #

Collected by (signature): H.W Small

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Pace Analytical®
National Center for Testing & Innovation
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Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

SDG # L1147026

Table #

Acctnum: PESENVSWA
Template: T154694
Prelogin: P725383
PM: 110 - Brian Ford
PB: 8/21/19 mm

Shipped Via: FedEX Ground

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	Pres Chk	VOCs 8260C 40mlAmb/MeOH5ml/Syr	dry weight 2ozClr-NoPres	Remarks	Sample # (lab only)
MW-304-105	GRAB	SS	105	10/2/19	1045	2		X	X		-20
MW-304-110		SS	110		1100	2		X	X		-21
MW-304-115		SS	115		1110	2		X	X		-22
MW-2009-95		SS	—			2		X	X		-23
TB-100219		W	—			1		X			-24

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ___

Remarks:

pH ___ Temp ___

Flow ___ Other ___

Samples returned via: __ UPS ✓ FedEx __ Courier ___

Tracking # Same

Sample Receipt Checklist

COC Seal Present/Intact:	NP	✓Y N
COC Signed/Accurate:		✓Y N
Bottles arrive intact:		✓Y N
Correct bottles used:		✓Y N
Sufficient volume sent:		✓Y N
If Applicable		
VOA Zero Headspace:		✓Y N
Preservation Correct/Checked:		✓Y N
RAD Screen <0.5 mR/hr:		✓Y N

Relinquished by: (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCl / MeOH TBR	If preservation required by Login: Date/Time
H.W Small	10/4/19	1100		✓	
Relinquished by: (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.3+0.2=1.5 °C Bottles Received: 36	
Relinquished by: (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10-5-19 Time: 8:45	Hold: / Condition: NCF / OK

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 18, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1147037
Samples Received:	10/05/2019
Project Number:	1413-001-02-501B
Description:	
Site:	AMERICAN LINEN
Report To:	Brian O'Neal/Bill Haldeman 1215 Fourth Ave., Suite 1350 Seattle, WA 98161

Entire Report Reviewed By:

Brian Ford

Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

TABLE OF CONTENTS

Cp: Cover Page 1

Tc: Table of Contents 2

Ss: Sample Summary 3

Cn: Case Narrative 6

Sr: Sample Results 7

MW-307-6 L1147037-01 7

MW-307-10 L1147037-02 9

MW-307-15 L1147037-03 11

MW-307-20 L1147037-04 13

MW-307-25 L1147037-05 15

MW-307-30 L1147037-06 17

MW-307-35 L1147037-07 19

MW-307-40 L1147037-08 21

MW-307-45 L1147037-09 23

MW-307-50 L1147037-10 25

MW-307-55 L1147037-11 27

MW-307-60 L1147037-12 29

MW-307-65 L1147037-13 31

MW-307-70 L1147037-14 33

MW-307-75 L1147037-15 35

MW-307-80 L1147037-16 37

MW-307-85 L1147037-17 39

MW-2016-85 L1147037-18 41

TB-100319 L1147037-19 43

Qc: Quality Control Summary 45

Total Solids by Method 2540 G-2011 45

Volatile Organic Compounds (GC/MS) by Method 8260C 48

Gl: Glossary of Terms 62

Al: Accreditations & Locations 63

Sc: Sample Chain of Custody 64

MW-307-6 L1147037-01 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 09:35 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361909	1	10/12/19 16:53	10/12/19 17:05	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361818	1	10/03/19 09:35	10/12/19 13:15	ACG	Mt. Juliet, TN

MW-307-10 L1147037-02 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 09:37 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361909	1	10/12/19 16:53	10/12/19 17:05	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361818	1.06	10/03/19 09:37	10/12/19 13:35	ACG	Mt. Juliet, TN

MW-307-15 L1147037-03 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 09:50 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361909	1	10/12/19 16:53	10/12/19 17:05	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361818	1	10/03/19 09:50	10/12/19 13:56	ACG	Mt. Juliet, TN

MW-307-20 L1147037-04 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 09:52 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361912	1	10/12/19 16:39	10/12/19 16:51	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361818	1	10/03/19 09:52	10/12/19 14:17	ACG	Mt. Juliet, TN

MW-307-25 L1147037-05 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 10:07 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361912	1	10/12/19 16:39	10/12/19 16:51	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361818	1	10/03/19 10:07	10/12/19 14:38	ACG	Mt. Juliet, TN

MW-307-30 L1147037-06 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 10:10 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361912	1	10/12/19 16:39	10/12/19 16:51	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361818	1.33	10/03/19 10:10	10/12/19 14:59	ACG	Mt. Juliet, TN

MW-307-35 L1147037-07 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 10:48 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361912	1	10/12/19 16:39	10/12/19 16:51	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361818	1	10/03/19 10:48	10/12/19 15:20	ACG	Mt. Juliet, TN

MW-307-40 L1147037-08 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 10:50 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361912	1	10/12/19 16:39	10/12/19 16:51	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361818	1	10/03/19 10:50	10/12/19 15:40	ACG	Mt. Juliet, TN

MW-307-45 L1147037-09 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 10:52 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361912	1	10/12/19 16:39	10/12/19 16:51	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361818	1	10/03/19 10:52	10/12/19 16:01	ACG	Mt. Juliet, TN

MW-307-50 L1147037-10 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 10:55 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361912	1	10/12/19 16:39	10/12/19 16:51	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361818	1	10/03/19 10:55	10/12/19 16:22	ACG	Mt. Juliet, TN

MW-307-55 L1147037-11 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 11:37 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361912	1	10/12/19 16:39	10/12/19 16:51	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1361818	1	10/03/19 11:37	10/12/19 16:43	ACG	Mt. Juliet, TN

MW-307-60 L1147037-12 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 11:40 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361912	1	10/12/19 16:39	10/12/19 16:51	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362726	1	10/03/19 11:40	10/15/19 00:09	ACG	Mt. Juliet, TN

MW-307-65 L1147037-13 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 12:00 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361912	1	10/12/19 16:39	10/12/19 16:51	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362726	2.14	10/03/19 12:00	10/15/19 00:30	ACG	Mt. Juliet, TN

MW-307-70 L1147037-14 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 12:05 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361913	1	10/12/19 16:05	10/12/19 16:15	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362726	10.4	10/03/19 12:05	10/15/19 00:52	ACG	Mt. Juliet, TN

MW-307-75 L1147037-15 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 12:28 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361913	1	10/12/19 16:05	10/12/19 16:15	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362726	1	10/03/19 12:28	10/15/19 01:13	ACG	Mt. Juliet, TN

MW-307-80 L1147037-16 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 12:30 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361913	1	10/12/19 16:05	10/12/19 16:15	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362726	1.03	10/03/19 12:30	10/15/19 01:35	ACG	Mt. Juliet, TN

MW-307-85 L1147037-17 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 13:00 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361913	1	10/12/19 16:05	10/12/19 16:15	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362726	1	10/03/19 13:00	10/15/19 01:56	ACG	Mt. Juliet, TN

MW-2016-85 L1147037-18 Solid

Collected by: R. McLaughlin | Collected date/time: 10/03/19 15:00 | Received date/time: 10/05/19 08:45

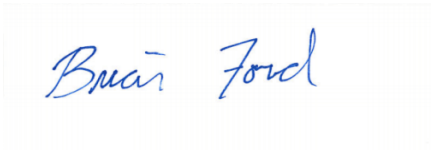
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Total Solids by Method 2540 G-2011	WG1361913	1	10/12/19 16:05	10/12/19 16:15	KBC	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362726	1	10/03/19 15:00	10/15/19 02:18	ACG	Mt. Juliet, TN

TB-100319 L1147037-19 GW

Collected by: R. McLaughlin | Collected date/time: 10/03/19 16:00 | Received date/time: 10/05/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1364657	1	10/17/19 13:00	10/17/19 13:00	BMB	Mt. Juliet, TN

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	89.4		1	10/12/2019 17:05	WG1361909

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0153	0.0279	1	10/12/2019 13:15	WG1361818
Acrylonitrile	U		0.00212	0.0140	1	10/12/2019 13:15	WG1361818
Benzene	U		0.000447	0.00112	1	10/12/2019 13:15	WG1361818
Bromobenzene	U		0.00117	0.0140	1	10/12/2019 13:15	WG1361818
Bromodichloromethane	U		0.000881	0.00279	1	10/12/2019 13:15	WG1361818
Bromochloromethane	U		0.00126	0.00559	1	10/12/2019 13:15	WG1361818
Bromoform	U		0.00669	0.0279	1	10/12/2019 13:15	WG1361818
Bromomethane	U		0.00414	0.0140	1	10/12/2019 13:15	WG1361818
n-Butylbenzene	U		0.00429	0.0140	1	10/12/2019 13:15	WG1361818
sec-Butylbenzene	U		0.00283	0.0140	1	10/12/2019 13:15	WG1361818
tert-Butylbenzene	U		0.00173	0.00559	1	10/12/2019 13:15	WG1361818
Carbon disulfide	U		0.00454	0.0140	1	10/12/2019 13:15	WG1361818
Carbon tetrachloride	U		0.00121	0.00559	1	10/12/2019 13:15	WG1361818
Chlorobenzene	U		0.000641	0.00279	1	10/12/2019 13:15	WG1361818
Chlorodibromomethane	U		0.000503	0.00279	1	10/12/2019 13:15	WG1361818
Chloroethane	U		0.00121	0.00559	1	10/12/2019 13:15	WG1361818
Chloroform	U		0.000464	0.00279	1	10/12/2019 13:15	WG1361818
Chloromethane	U		0.00155	0.0140	1	10/12/2019 13:15	WG1361818
2-Chlorotoluene	U		0.00103	0.00279	1	10/12/2019 13:15	WG1361818
4-Chlorotoluene	U		0.00126	0.00559	1	10/12/2019 13:15	WG1361818
1,2-Dibromo-3-Chloropropane	U		0.00570	0.0279	1	10/12/2019 13:15	WG1361818
1,2-Dibromoethane	U		0.000587	0.00279	1	10/12/2019 13:15	WG1361818
Dibromomethane	U		0.00112	0.00559	1	10/12/2019 13:15	WG1361818
1,2-Dichlorobenzene	U		0.00162	0.00559	1	10/12/2019 13:15	WG1361818
1,3-Dichlorobenzene	U		0.00190	0.00559	1	10/12/2019 13:15	WG1361818
1,4-Dichlorobenzene	U		0.00220	0.00559	1	10/12/2019 13:15	WG1361818
Dichlorodifluoromethane	U		0.000914	0.00279	1	10/12/2019 13:15	WG1361818
1,1-Dichloroethane	U		0.000643	0.00279	1	10/12/2019 13:15	WG1361818
1,2-Dichloroethane	U		0.000531	0.00279	1	10/12/2019 13:15	WG1361818
1,1-Dichloroethene	U		0.000559	0.00279	1	10/12/2019 13:15	WG1361818
cis-1,2-Dichloroethene	U		0.000771	0.00279	1	10/12/2019 13:15	WG1361818
trans-1,2-Dichloroethene	U		0.00160	0.00559	1	10/12/2019 13:15	WG1361818
1,2-Dichloropropane	U		0.00142	0.00559	1	10/12/2019 13:15	WG1361818
1,1-Dichloropropene	U		0.000783	0.00279	1	10/12/2019 13:15	WG1361818
1,3-Dichloropropane	U		0.00196	0.00559	1	10/12/2019 13:15	WG1361818
cis-1,3-Dichloropropene	U		0.000758	0.00279	1	10/12/2019 13:15	WG1361818
trans-1,3-Dichloropropene	U		0.00171	0.00559	1	10/12/2019 13:15	WG1361818
trans-1,4-Dichloro-2-butene	U		0.00157	0.00559	1	10/12/2019 13:15	WG1361818
2,2-Dichloropropane	U		0.000887	0.00279	1	10/12/2019 13:15	WG1361818
Di-isopropyl ether	U		0.000391	0.00112	1	10/12/2019 13:15	WG1361818
Ethylbenzene	0.000603	J	0.000593	0.00279	1	10/12/2019 13:15	WG1361818
Hexachloro-1,3-butadiene	U		0.0142	0.0279	1	10/12/2019 13:15	WG1361818
2-Hexanone	U		0.0112	0.0279	1	10/12/2019 13:15	WG1361818
n-Hexane	U		0.00119	0.00559	1	10/12/2019 13:15	WG1361818
Iodomethane	U		0.00676	0.0140	1	10/12/2019 13:15	WG1361818
Isopropylbenzene	U		0.000965	0.00279	1	10/12/2019 13:15	WG1361818
p-Isopropyltoluene	U		0.00260	0.00559	1	10/12/2019 13:15	WG1361818
2-Butanone (MEK)	0.0171	B J	0.0140	0.0279	1	10/12/2019 13:15	WG1361818
Methylene Chloride	U		0.00742	0.0279	1	10/12/2019 13:15	WG1361818
4-Methyl-2-pentanone (MIBK)	U		0.0112	0.0279	1	10/12/2019 13:15	WG1361818

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000330	0.00112	1	10/12/2019 13:15	WG1361818
Naphthalene	U		0.00349	0.0140	1	10/12/2019 13:15	WG1361818
n-Propylbenzene	U		0.00132	0.00559	1	10/12/2019 13:15	WG1361818
Styrene	U		0.00305	0.0140	1	10/12/2019 13:15	WG1361818
1,1,1,2-Tetrachloroethane	U		0.000559	0.00279	1	10/12/2019 13:15	WG1361818
1,1,2,2-Tetrachloroethane	U		0.000436	0.00279	1	10/12/2019 13:15	WG1361818
1,1,2-Trichlorotrifluoroethane	U		0.000755	0.00279	1	10/12/2019 13:15	WG1361818
Tetrachloroethene	U		0.000783	0.00279	1	10/12/2019 13:15	WG1361818
Toluene	0.0131		0.00140	0.00559	1	10/12/2019 13:15	WG1361818
1,2,3-Trichlorobenzene	U		0.000699	0.00279	1	10/12/2019 13:15	WG1361818
1,2,4-Trichlorobenzene	U		0.00539	0.0140	1	10/12/2019 13:15	WG1361818
1,1,1-Trichloroethane	U		0.000307	0.00279	1	10/12/2019 13:15	WG1361818
1,1,2-Trichloroethane	U		0.000987	0.00279	1	10/12/2019 13:15	WG1361818
Trichloroethene	U		0.000447	0.00112	1	10/12/2019 13:15	WG1361818
Trichlorofluoromethane	U		0.000559	0.00279	1	10/12/2019 13:15	WG1361818
1,2,3-Trichloropropane	U		0.00570	0.0140	1	10/12/2019 13:15	WG1361818
1,2,4-Trimethylbenzene	U		0.00130	0.00559	1	10/12/2019 13:15	WG1361818
1,2,3-Trimethylbenzene	U		0.00129	0.00559	1	10/12/2019 13:15	WG1361818
1,3,5-Trimethylbenzene	U		0.00121	0.00559	1	10/12/2019 13:15	WG1361818
Vinyl acetate	U		0.00394	0.0140	1	10/12/2019 13:15	WG1361818
Vinyl chloride	U		0.000764	0.00279	1	10/12/2019 13:15	WG1361818
Xylenes, Total	U		0.00534	0.00727	1	10/12/2019 13:15	WG1361818
(S) Toluene-d8	*105*			*75.0-131*		*10/12/2019 13:15*	WG1361818
(S) 4-Bromofluorobenzene	*99.2*			*67.0-138*		*10/12/2019 13:15*	WG1361818
(S) 1,2-Dichloroethane-d4	*99.2*			*70.0-130*		*10/12/2019 13:15*	WG1361818

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	92.1		1	10/12/2019 17:05	WG1361909

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0253	J	0.0157	0.0288	1.06	10/12/2019 13:35	WG1361818
Acrylonitrile	U		0.00218	0.0144	1.06	10/12/2019 13:35	WG1361818
Benzene	0.000462	J	0.000460	0.00115	1.06	10/12/2019 13:35	WG1361818
Bromobenzene	U		0.00121	0.0144	1.06	10/12/2019 13:35	WG1361818
Bromodichloromethane	U		0.000907	0.00288	1.06	10/12/2019 13:35	WG1361818
Bromochloromethane	U		0.00130	0.00576	1.06	10/12/2019 13:35	WG1361818
Bromoform	U		0.00689	0.0288	1.06	10/12/2019 13:35	WG1361818
Bromomethane	U		0.00426	0.0144	1.06	10/12/2019 13:35	WG1361818
n-Butylbenzene	U		0.00442	0.0144	1.06	10/12/2019 13:35	WG1361818
sec-Butylbenzene	U		0.00291	0.0144	1.06	10/12/2019 13:35	WG1361818
tert-Butylbenzene	U		0.00178	0.00576	1.06	10/12/2019 13:35	WG1361818
Carbon disulfide	U		0.00467	0.0144	1.06	10/12/2019 13:35	WG1361818
Carbon tetrachloride	U		0.00124	0.00576	1.06	10/12/2019 13:35	WG1361818
Chlorobenzene	U		0.000659	0.00288	1.06	10/12/2019 13:35	WG1361818
Chlorodibromomethane	U		0.000518	0.00288	1.06	10/12/2019 13:35	WG1361818
Chloroethane	U		0.00124	0.00576	1.06	10/12/2019 13:35	WG1361818
Chloroform	0.000843	B J	0.000478	0.00288	1.06	10/12/2019 13:35	WG1361818
Chloromethane	U		0.00160	0.0144	1.06	10/12/2019 13:35	WG1361818
2-Chlorotoluene	U		0.00106	0.00288	1.06	10/12/2019 13:35	WG1361818
4-Chlorotoluene	U		0.00130	0.00576	1.06	10/12/2019 13:35	WG1361818
1,2-Dibromo-3-Chloropropane	U		0.00588	0.0288	1.06	10/12/2019 13:35	WG1361818
1,2-Dibromoethane	U		0.000604	0.00288	1.06	10/12/2019 13:35	WG1361818
Dibromomethane	U		0.00115	0.00576	1.06	10/12/2019 13:35	WG1361818
1,2-Dichlorobenzene	U		0.00167	0.00576	1.06	10/12/2019 13:35	WG1361818
1,3-Dichlorobenzene	U		0.00195	0.00576	1.06	10/12/2019 13:35	WG1361818
1,4-Dichlorobenzene	U		0.00227	0.00576	1.06	10/12/2019 13:35	WG1361818
Dichlorodifluoromethane	U		0.000942	0.00288	1.06	10/12/2019 13:35	WG1361818
1,1-Dichloroethane	U		0.000661	0.00288	1.06	10/12/2019 13:35	WG1361818
1,2-Dichloroethane	U		0.000547	0.00288	1.06	10/12/2019 13:35	WG1361818
1,1-Dichloroethene	U		0.000576	0.00288	1.06	10/12/2019 13:35	WG1361818
cis-1,2-Dichloroethene	U		0.000794	0.00288	1.06	10/12/2019 13:35	WG1361818
trans-1,2-Dichloroethene	U		0.00165	0.00576	1.06	10/12/2019 13:35	WG1361818
1,2-Dichloropropane	U		0.00147	0.00576	1.06	10/12/2019 13:35	WG1361818
1,1-Dichloropropene	U		0.000806	0.00288	1.06	10/12/2019 13:35	WG1361818
1,3-Dichloropropane	U		0.00202	0.00576	1.06	10/12/2019 13:35	WG1361818
cis-1,3-Dichloropropene	U		0.000781	0.00288	1.06	10/12/2019 13:35	WG1361818
trans-1,3-Dichloropropene	U		0.00176	0.00576	1.06	10/12/2019 13:35	WG1361818
trans-1,4-Dichloro-2-butene	U		0.00161	0.00576	1.06	10/12/2019 13:35	WG1361818
2,2-Dichloropropane	U		0.000913	0.00288	1.06	10/12/2019 13:35	WG1361818
Di-isopropyl ether	U		0.000403	0.00115	1.06	10/12/2019 13:35	WG1361818
Ethylbenzene	0.000971	J	0.000610	0.00288	1.06	10/12/2019 13:35	WG1361818
Hexachloro-1,3-butadiene	U		0.0147	0.0288	1.06	10/12/2019 13:35	WG1361818
2-Hexanone	U		0.0115	0.0288	1.06	10/12/2019 13:35	WG1361818
n-Hexane	U		0.00122	0.00576	1.06	10/12/2019 13:35	WG1361818
Iodomethane	U		0.00696	0.0144	1.06	10/12/2019 13:35	WG1361818
Isopropylbenzene	U		0.000994	0.00288	1.06	10/12/2019 13:35	WG1361818
p-Isopropyltoluene	U		0.00268	0.00576	1.06	10/12/2019 13:35	WG1361818
2-Butanone (MEK)	0.0262	B J	0.0144	0.0288	1.06	10/12/2019 13:35	WG1361818
Methylene Chloride	U		0.00765	0.0288	1.06	10/12/2019 13:35	WG1361818
4-Methyl-2-pentanone (MIBK)	U		0.0115	0.0288	1.06	10/12/2019 13:35	WG1361818

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	0.000604	J	0.000340	0.00115	1.06	10/12/2019 13:35	WG1361818
Naphthalene	U		0.00359	0.0144	1.06	10/12/2019 13:35	WG1361818
n-Propylbenzene	U		0.00136	0.00576	1.06	10/12/2019 13:35	WG1361818
Styrene	U		0.00314	0.0144	1.06	10/12/2019 13:35	WG1361818
1,1,1,2-Tetrachloroethane	U		0.000576	0.00288	1.06	10/12/2019 13:35	WG1361818
1,1,2,2-Tetrachloroethane	U		0.000449	0.00288	1.06	10/12/2019 13:35	WG1361818
1,1,2-Trichlorotrifluoroethane	U		0.000778	0.00288	1.06	10/12/2019 13:35	WG1361818
Tetrachloroethene	U		0.000806	0.00288	1.06	10/12/2019 13:35	WG1361818
Toluene	0.0260		0.00144	0.00576	1.06	10/12/2019 13:35	WG1361818
1,2,3-Trichlorobenzene	U		0.000720	0.00288	1.06	10/12/2019 13:35	WG1361818
1,2,4-Trichlorobenzene	U		0.00555	0.0144	1.06	10/12/2019 13:35	WG1361818
1,1,1-Trichloroethane	U		0.000317	0.00288	1.06	10/12/2019 13:35	WG1361818
1,1,2-Trichloroethane	U		0.00102	0.00288	1.06	10/12/2019 13:35	WG1361818
Trichloroethene	U		0.000460	0.00115	1.06	10/12/2019 13:35	WG1361818
Trichlorofluoromethane	U		0.000576	0.00288	1.06	10/12/2019 13:35	WG1361818
1,2,3-Trichloropropane	U		0.00588	0.0144	1.06	10/12/2019 13:35	WG1361818
1,2,4-Trimethylbenzene	U		0.00134	0.00576	1.06	10/12/2019 13:35	WG1361818
1,2,3-Trimethylbenzene	U		0.00132	0.00576	1.06	10/12/2019 13:35	WG1361818
1,3,5-Trimethylbenzene	U		0.00124	0.00576	1.06	10/12/2019 13:35	WG1361818
Vinyl acetate	U		0.00405	0.0144	1.06	10/12/2019 13:35	WG1361818
Vinyl chloride	U		0.000786	0.00288	1.06	10/12/2019 13:35	WG1361818
Xylenes, Total	U		0.00551	0.00748	1.06	10/12/2019 13:35	WG1361818
(S) Toluene-d8	*103*			*75.0-131*		*10/12/2019 13:35*	WG1361818
(S) 4-Bromofluorobenzene	*101*			*67.0-138*		*10/12/2019 13:35*	WG1361818
(S) 1,2-Dichloroethane-d4	*97.5*			*70.0-130*		*10/12/2019 13:35*	WG1361818

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	92.8		1	10/12/2019 17:05	WG1361909

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0148	0.0269	1	10/12/2019 13:56	WG1361818
Acrylonitrile	U		0.00205	0.0135	1	10/12/2019 13:56	WG1361818
Benzene	U		0.000431	0.00108	1	10/12/2019 13:56	WG1361818
Bromobenzene	U		0.00113	0.0135	1	10/12/2019 13:56	WG1361818
Bromodichloromethane	U		0.000849	0.00269	1	10/12/2019 13:56	WG1361818
Bromochloromethane	U		0.00122	0.00539	1	10/12/2019 13:56	WG1361818
Bromoform	U		0.00644	0.0269	1	10/12/2019 13:56	WG1361818
Bromomethane	U		0.00399	0.0135	1	10/12/2019 13:56	WG1361818
n-Butylbenzene	U		0.00414	0.0135	1	10/12/2019 13:56	WG1361818
sec-Butylbenzene	U		0.00273	0.0135	1	10/12/2019 13:56	WG1361818
tert-Butylbenzene	U		0.00167	0.00539	1	10/12/2019 13:56	WG1361818
Carbon disulfide	U		0.00437	0.0135	1	10/12/2019 13:56	WG1361818
Carbon tetrachloride	U		0.00116	0.00539	1	10/12/2019 13:56	WG1361818
Chlorobenzene	U		0.000617	0.00269	1	10/12/2019 13:56	WG1361818
Chlorodibromomethane	U		0.000485	0.00269	1	10/12/2019 13:56	WG1361818
Chloroethane	U		0.00116	0.00539	1	10/12/2019 13:56	WG1361818
Chloroform	0.000511	B J	0.000447	0.00269	1	10/12/2019 13:56	WG1361818
Chloromethane	U		0.00150	0.0135	1	10/12/2019 13:56	WG1361818
2-Chlorotoluene	U		0.000991	0.00269	1	10/12/2019 13:56	WG1361818
4-Chlorotoluene	U		0.00122	0.00539	1	10/12/2019 13:56	WG1361818
1,2-Dibromo-3-Chloropropane	U		0.00549	0.0269	1	10/12/2019 13:56	WG1361818
1,2-Dibromoethane	U		0.000566	0.00269	1	10/12/2019 13:56	WG1361818
Dibromomethane	U		0.00108	0.00539	1	10/12/2019 13:56	WG1361818
1,2-Dichlorobenzene	U		0.00156	0.00539	1	10/12/2019 13:56	WG1361818
1,3-Dichlorobenzene	U		0.00183	0.00539	1	10/12/2019 13:56	WG1361818
1,4-Dichlorobenzene	U		0.00212	0.00539	1	10/12/2019 13:56	WG1361818
Dichlorodifluoromethane	U		0.000881	0.00269	1	10/12/2019 13:56	WG1361818
1,1-Dichloroethane	U		0.000620	0.00269	1	10/12/2019 13:56	WG1361818
1,2-Dichloroethane	U		0.000512	0.00269	1	10/12/2019 13:56	WG1361818
1,1-Dichloroethene	U		0.000539	0.00269	1	10/12/2019 13:56	WG1361818
cis-1,2-Dichloroethene	U		0.000743	0.00269	1	10/12/2019 13:56	WG1361818
trans-1,2-Dichloroethene	U		0.00154	0.00539	1	10/12/2019 13:56	WG1361818
1,2-Dichloropropane	U		0.00137	0.00539	1	10/12/2019 13:56	WG1361818
1,1-Dichloropropene	U		0.000754	0.00269	1	10/12/2019 13:56	WG1361818
1,3-Dichloropropane	U		0.00189	0.00539	1	10/12/2019 13:56	WG1361818
cis-1,3-Dichloropropene	U		0.000731	0.00269	1	10/12/2019 13:56	WG1361818
trans-1,3-Dichloropropene	U		0.00165	0.00539	1	10/12/2019 13:56	WG1361818
trans-1,4-Dichloro-2-butene	U		0.00151	0.00539	1	10/12/2019 13:56	WG1361818
2,2-Dichloropropane	U		0.000854	0.00269	1	10/12/2019 13:56	WG1361818
Di-isopropyl ether	U		0.000377	0.00108	1	10/12/2019 13:56	WG1361818
Ethylbenzene	U		0.000571	0.00269	1	10/12/2019 13:56	WG1361818
Hexachloro-1,3-butadiene	U		0.0137	0.0269	1	10/12/2019 13:56	WG1361818
2-Hexanone	U		0.0108	0.0269	1	10/12/2019 13:56	WG1361818
n-Hexane	0.0147		0.00114	0.00539	1	10/12/2019 13:56	WG1361818
Iodomethane	U		0.00652	0.0135	1	10/12/2019 13:56	WG1361818
Isopropylbenzene	U		0.000930	0.00269	1	10/12/2019 13:56	WG1361818
p-Isopropyltoluene	U		0.00251	0.00539	1	10/12/2019 13:56	WG1361818
2-Butanone (MEK)	U		0.0135	0.0269	1	10/12/2019 13:56	WG1361818
Methylene Chloride	U		0.00715	0.0269	1	10/12/2019 13:56	WG1361818
4-Methyl-2-pentanone (MIBK)	U		0.0108	0.0269	1	10/12/2019 13:56	WG1361818

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000318	0.00108	1	10/12/2019 13:56	WG1361818
Naphthalene	U		0.00336	0.0135	1	10/12/2019 13:56	WG1361818
n-Propylbenzene	U		0.00127	0.00539	1	10/12/2019 13:56	WG1361818
Styrene	U		0.00294	0.0135	1	10/12/2019 13:56	WG1361818
1,1,1,2-Tetrachloroethane	U		0.000539	0.00269	1	10/12/2019 13:56	WG1361818
1,1,2,2-Tetrachloroethane	U		0.000420	0.00269	1	10/12/2019 13:56	WG1361818
1,1,2-Trichlorotrifluoroethane	U		0.000727	0.00269	1	10/12/2019 13:56	WG1361818
Tetrachloroethene	U		0.000754	0.00269	1	10/12/2019 13:56	WG1361818
Toluene	0.00403	J	0.00135	0.00539	1	10/12/2019 13:56	WG1361818
1,2,3-Trichlorobenzene	U		0.000673	0.00269	1	10/12/2019 13:56	WG1361818
1,2,4-Trichlorobenzene	U		0.00519	0.0135	1	10/12/2019 13:56	WG1361818
1,1,1-Trichloroethane	U		0.000296	0.00269	1	10/12/2019 13:56	WG1361818
1,1,2-Trichloroethane	U		0.000951	0.00269	1	10/12/2019 13:56	WG1361818
Trichloroethene	U		0.000431	0.00108	1	10/12/2019 13:56	WG1361818
Trichlorofluoromethane	U		0.000539	0.00269	1	10/12/2019 13:56	WG1361818
1,2,3-Trichloropropane	U		0.00549	0.0135	1	10/12/2019 13:56	WG1361818
1,2,4-Trimethylbenzene	U		0.00125	0.00539	1	10/12/2019 13:56	WG1361818
1,2,3-Trimethylbenzene	U		0.00124	0.00539	1	10/12/2019 13:56	WG1361818
1,3,5-Trimethylbenzene	U		0.00116	0.00539	1	10/12/2019 13:56	WG1361818
Vinyl acetate	U		0.00379	0.0135	1	10/12/2019 13:56	WG1361818
Vinyl chloride	U		0.000736	0.00269	1	10/12/2019 13:56	WG1361818
Xylenes, Total	U		0.00515	0.00700	1	10/12/2019 13:56	WG1361818
(S) Toluene-d8	*103*			*75.0-131*		*10/12/2019 13:56*	WG1361818
(S) 4-Bromofluorobenzene	*104*			*67.0-138*		*10/12/2019 13:56*	WG1361818
(S) 1,2-Dichloroethane-d4	*97.5*			*70.0-130*		*10/12/2019 13:56*	WG1361818

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	93.5		1	10/12/2019 16:51	WG1361912

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0146	0.0267	1	10/12/2019 14:17	WG1361818
Acrylonitrile	U		0.00203	0.0134	1	10/12/2019 14:17	WG1361818
Benzene	U		0.000428	0.00107	1	10/12/2019 14:17	WG1361818
Bromobenzene	U		0.00112	0.0134	1	10/12/2019 14:17	WG1361818
Bromodichloromethane	U		0.000843	0.00267	1	10/12/2019 14:17	WG1361818
Bromochloromethane	U		0.00121	0.00535	1	10/12/2019 14:17	WG1361818
Bromoform	U		0.00639	0.0267	1	10/12/2019 14:17	WG1361818
Bromomethane	U		0.00396	0.0134	1	10/12/2019 14:17	WG1361818
n-Butylbenzene	U		0.00411	0.0134	1	10/12/2019 14:17	WG1361818
sec-Butylbenzene	U		0.00271	0.0134	1	10/12/2019 14:17	WG1361818
tert-Butylbenzene	U		0.00166	0.00535	1	10/12/2019 14:17	WG1361818
Carbon disulfide	U		0.00434	0.0134	1	10/12/2019 14:17	WG1361818
Carbon tetrachloride	U		0.00115	0.00535	1	10/12/2019 14:17	WG1361818
Chlorobenzene	U		0.000613	0.00267	1	10/12/2019 14:17	WG1361818
Chlorodibromomethane	U		0.000481	0.00267	1	10/12/2019 14:17	WG1361818
Chloroethane	U		0.00115	0.00535	1	10/12/2019 14:17	WG1361818
Chloroform	0.000716	B J	0.000444	0.00267	1	10/12/2019 14:17	WG1361818
Chloromethane	U		0.00149	0.0134	1	10/12/2019 14:17	WG1361818
2-Chlorotoluene	U		0.000984	0.00267	1	10/12/2019 14:17	WG1361818
4-Chlorotoluene	U		0.00121	0.00535	1	10/12/2019 14:17	WG1361818
1,2-Dibromo-3-Chloropropane	U		0.00545	0.0267	1	10/12/2019 14:17	WG1361818
1,2-Dibromoethane	U		0.000561	0.00267	1	10/12/2019 14:17	WG1361818
Dibromomethane	U		0.00107	0.00535	1	10/12/2019 14:17	WG1361818
1,2-Dichlorobenzene	U		0.00155	0.00535	1	10/12/2019 14:17	WG1361818
1,3-Dichlorobenzene	U		0.00182	0.00535	1	10/12/2019 14:17	WG1361818
1,4-Dichlorobenzene	U		0.00211	0.00535	1	10/12/2019 14:17	WG1361818
Dichlorodifluoromethane	U		0.000875	0.00267	1	10/12/2019 14:17	WG1361818
1,1-Dichloroethane	U		0.000615	0.00267	1	10/12/2019 14:17	WG1361818
1,2-Dichloroethane	U		0.000508	0.00267	1	10/12/2019 14:17	WG1361818
1,1-Dichloroethene	U		0.000535	0.00267	1	10/12/2019 14:17	WG1361818
cis-1,2-Dichloroethene	U		0.000738	0.00267	1	10/12/2019 14:17	WG1361818
trans-1,2-Dichloroethene	U		0.00153	0.00535	1	10/12/2019 14:17	WG1361818
1,2-Dichloropropane	U		0.00136	0.00535	1	10/12/2019 14:17	WG1361818
1,1-Dichloropropene	U		0.000749	0.00267	1	10/12/2019 14:17	WG1361818
1,3-Dichloropropane	U		0.00187	0.00535	1	10/12/2019 14:17	WG1361818
cis-1,3-Dichloropropene	U		0.000725	0.00267	1	10/12/2019 14:17	WG1361818
trans-1,3-Dichloropropene	U		0.00164	0.00535	1	10/12/2019 14:17	WG1361818
trans-1,4-Dichloro-2-butene	U		0.00150	0.00535	1	10/12/2019 14:17	WG1361818
2,2-Dichloropropane	U		0.000848	0.00267	1	10/12/2019 14:17	WG1361818
Di-isopropyl ether	U		0.000374	0.00107	1	10/12/2019 14:17	WG1361818
Ethylbenzene	U		0.000567	0.00267	1	10/12/2019 14:17	WG1361818
Hexachloro-1,3-butadiene	U		0.0136	0.0267	1	10/12/2019 14:17	WG1361818
2-Hexanone	U		0.0107	0.0267	1	10/12/2019 14:17	WG1361818
n-Hexane	U		0.00113	0.00535	1	10/12/2019 14:17	WG1361818
Iodomethane	U		0.00647	0.0134	1	10/12/2019 14:17	WG1361818
Isopropylbenzene	U		0.000923	0.00267	1	10/12/2019 14:17	WG1361818
p-Isopropyltoluene	U		0.00249	0.00535	1	10/12/2019 14:17	WG1361818
2-Butanone (MEK)	0.0139	B J	0.0134	0.0267	1	10/12/2019 14:17	WG1361818
Methylene Chloride	U		0.00710	0.0267	1	10/12/2019 14:17	WG1361818
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0267	1	10/12/2019 14:17	WG1361818

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	0.000366	J	0.000315	0.00107	1	10/12/2019 14:17	WG1361818
Naphthalene	U		0.00334	0.0134	1	10/12/2019 14:17	WG1361818
n-Propylbenzene	U		0.00126	0.00535	1	10/12/2019 14:17	WG1361818
Styrene	U		0.00292	0.0134	1	10/12/2019 14:17	WG1361818
1,1,1,2-Tetrachloroethane	U		0.000535	0.00267	1	10/12/2019 14:17	WG1361818
1,1,2,2-Tetrachloroethane	U		0.000417	0.00267	1	10/12/2019 14:17	WG1361818
1,1,2-Trichlorotrifluoroethane	U		0.000722	0.00267	1	10/12/2019 14:17	WG1361818
Tetrachloroethene	U		0.000749	0.00267	1	10/12/2019 14:17	WG1361818
Toluene	0.00602		0.00134	0.00535	1	10/12/2019 14:17	WG1361818
1,2,3-Trichlorobenzene	U		0.000668	0.00267	1	10/12/2019 14:17	WG1361818
1,2,4-Trichlorobenzene	U		0.00515	0.0134	1	10/12/2019 14:17	WG1361818
1,1,1-Trichloroethane	U		0.000294	0.00267	1	10/12/2019 14:17	WG1361818
1,1,2-Trichloroethane	U		0.000944	0.00267	1	10/12/2019 14:17	WG1361818
Trichloroethene	U		0.000428	0.00107	1	10/12/2019 14:17	WG1361818
Trichlorofluoromethane	U		0.000535	0.00267	1	10/12/2019 14:17	WG1361818
1,2,3-Trichloropropane	U		0.00545	0.0134	1	10/12/2019 14:17	WG1361818
1,2,4-Trimethylbenzene	U		0.00124	0.00535	1	10/12/2019 14:17	WG1361818
1,2,3-Trimethylbenzene	U		0.00123	0.00535	1	10/12/2019 14:17	WG1361818
1,3,5-Trimethylbenzene	U		0.00115	0.00535	1	10/12/2019 14:17	WG1361818
Vinyl acetate	U		0.00376	0.0134	1	10/12/2019 14:17	WG1361818
Vinyl chloride	U		0.000730	0.00267	1	10/12/2019 14:17	WG1361818
Xylenes, Total	U		0.00511	0.00695	1	10/12/2019 14:17	WG1361818
(S) Toluene-d8	*104*			*75.0-131*		*10/12/2019 14:17*	WG1361818
(S) 4-Bromofluorobenzene	*102*			*67.0-138*		*10/12/2019 14:17*	WG1361818
(S) 1,2-Dichloroethane-d4	*96.9*			*70.0-130*		*10/12/2019 14:17*	WG1361818

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	91.2		1	10/12/2019 16:51	WG1361912

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0150	0.0274	1	10/12/2019 14:38	WG1361818
Acrylonitrile	U		0.00208	0.0137	1	10/12/2019 14:38	WG1361818
Benzene	U		0.000439	0.00110	1	10/12/2019 14:38	WG1361818
Bromobenzene	U		0.00115	0.0137	1	10/12/2019 14:38	WG1361818
Bromodichloromethane	U		0.000864	0.00274	1	10/12/2019 14:38	WG1361818
Bromochloromethane	U		0.00124	0.00549	1	10/12/2019 14:38	WG1361818
Bromoform	U		0.00656	0.0274	1	10/12/2019 14:38	WG1361818
Bromomethane	U		0.00406	0.0137	1	10/12/2019 14:38	WG1361818
n-Butylbenzene	U		0.00421	0.0137	1	10/12/2019 14:38	WG1361818
sec-Butylbenzene	U		0.00278	0.0137	1	10/12/2019 14:38	WG1361818
tert-Butylbenzene	U		0.00170	0.00549	1	10/12/2019 14:38	WG1361818
Carbon disulfide	U		0.00445	0.0137	1	10/12/2019 14:38	WG1361818
Carbon tetrachloride	U		0.00118	0.00549	1	10/12/2019 14:38	WG1361818
Chlorobenzene	U		0.000629	0.00274	1	10/12/2019 14:38	WG1361818
Chlorodibromomethane	U		0.000494	0.00274	1	10/12/2019 14:38	WG1361818
Chloroethane	U		0.00118	0.00549	1	10/12/2019 14:38	WG1361818
Chloroform	0.000593	B J	0.000455	0.00274	1	10/12/2019 14:38	WG1361818
Chloromethane	U		0.00152	0.0137	1	10/12/2019 14:38	WG1361818
2-Chlorotoluene	U		0.00101	0.00274	1	10/12/2019 14:38	WG1361818
4-Chlorotoluene	U		0.00124	0.00549	1	10/12/2019 14:38	WG1361818
1,2-Dibromo-3-Chloropropane	U		0.00559	0.0274	1	10/12/2019 14:38	WG1361818
1,2-Dibromoethane	U		0.000576	0.00274	1	10/12/2019 14:38	WG1361818
Dibromomethane	U		0.00110	0.00549	1	10/12/2019 14:38	WG1361818
1,2-Dichlorobenzene	U		0.00159	0.00549	1	10/12/2019 14:38	WG1361818
1,3-Dichlorobenzene	U		0.00186	0.00549	1	10/12/2019 14:38	WG1361818
1,4-Dichlorobenzene	U		0.00216	0.00549	1	10/12/2019 14:38	WG1361818
Dichlorodifluoromethane	U		0.000897	0.00274	1	10/12/2019 14:38	WG1361818
1,1-Dichloroethane	U		0.000631	0.00274	1	10/12/2019 14:38	WG1361818
1,2-Dichloroethane	U		0.000521	0.00274	1	10/12/2019 14:38	WG1361818
1,1-Dichloroethene	U		0.000549	0.00274	1	10/12/2019 14:38	WG1361818
cis-1,2-Dichloroethene	U		0.000757	0.00274	1	10/12/2019 14:38	WG1361818
trans-1,2-Dichloroethene	U		0.00157	0.00549	1	10/12/2019 14:38	WG1361818
1,2-Dichloropropane	U		0.00139	0.00549	1	10/12/2019 14:38	WG1361818
1,1-Dichloropropene	U		0.000768	0.00274	1	10/12/2019 14:38	WG1361818
1,3-Dichloropropane	U		0.00192	0.00549	1	10/12/2019 14:38	WG1361818
cis-1,3-Dichloropropene	U		0.000744	0.00274	1	10/12/2019 14:38	WG1361818
trans-1,3-Dichloropropene	U		0.00168	0.00549	1	10/12/2019 14:38	WG1361818
trans-1,4-Dichloro-2-butene	U		0.00154	0.00549	1	10/12/2019 14:38	WG1361818
2,2-Dichloropropane	U		0.000870	0.00274	1	10/12/2019 14:38	WG1361818
Di-isopropyl ether	U		0.000384	0.00110	1	10/12/2019 14:38	WG1361818
Ethylbenzene	U		0.000581	0.00274	1	10/12/2019 14:38	WG1361818
Hexachloro-1,3-butadiene	U		0.0139	0.0274	1	10/12/2019 14:38	WG1361818
2-Hexanone	U		0.0110	0.0274	1	10/12/2019 14:38	WG1361818
n-Hexane	0.0218		0.00116	0.00549	1	10/12/2019 14:38	WG1361818
Iodomethane	U		0.00664	0.0137	1	10/12/2019 14:38	WG1361818
Isopropylbenzene	U		0.000947	0.00274	1	10/12/2019 14:38	WG1361818
p-Isopropyltoluene	U		0.00256	0.00549	1	10/12/2019 14:38	WG1361818
2-Butanone (MEK)	U		0.0137	0.0274	1	10/12/2019 14:38	WG1361818
Methylene Chloride	U		0.00728	0.0274	1	10/12/2019 14:38	WG1361818
4-Methyl-2-pentanone (MIBK)	U		0.0110	0.0274	1	10/12/2019 14:38	WG1361818

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000324	0.00110	1	10/12/2019 14:38	WG1361818
Naphthalene	U		0.00342	0.0137	1	10/12/2019 14:38	WG1361818
n-Propylbenzene	U		0.00129	0.00549	1	10/12/2019 14:38	WG1361818
Styrene	U		0.00299	0.0137	1	10/12/2019 14:38	WG1361818
1,1,1,2-Tetrachloroethane	U		0.000549	0.00274	1	10/12/2019 14:38	WG1361818
1,1,2,2-Tetrachloroethane	U		0.000428	0.00274	1	10/12/2019 14:38	WG1361818
1,1,2-Trichlorotrifluoroethane	U		0.000740	0.00274	1	10/12/2019 14:38	WG1361818
Tetrachloroethene	U		0.000768	0.00274	1	10/12/2019 14:38	WG1361818
Toluene	0.00675		0.00137	0.00549	1	10/12/2019 14:38	WG1361818
1,2,3-Trichlorobenzene	U		0.000686	0.00274	1	10/12/2019 14:38	WG1361818
1,2,4-Trichlorobenzene	U		0.00529	0.0137	1	10/12/2019 14:38	WG1361818
1,1,1-Trichloroethane	U		0.000302	0.00274	1	10/12/2019 14:38	WG1361818
1,1,2-Trichloroethane	U		0.000969	0.00274	1	10/12/2019 14:38	WG1361818
Trichloroethene	U		0.000439	0.00110	1	10/12/2019 14:38	WG1361818
Trichlorofluoromethane	U		0.000549	0.00274	1	10/12/2019 14:38	WG1361818
1,2,3-Trichloropropane	U		0.00559	0.0137	1	10/12/2019 14:38	WG1361818
1,2,4-Trimethylbenzene	U		0.00127	0.00549	1	10/12/2019 14:38	WG1361818
1,2,3-Trimethylbenzene	U		0.00126	0.00549	1	10/12/2019 14:38	WG1361818
1,3,5-Trimethylbenzene	U		0.00118	0.00549	1	10/12/2019 14:38	WG1361818
Vinyl acetate	U		0.00386	0.0137	1	10/12/2019 14:38	WG1361818
Vinyl chloride	U		0.000749	0.00274	1	10/12/2019 14:38	WG1361818
Xylenes, Total	U		0.00524	0.00713	1	10/12/2019 14:38	WG1361818
(S) Toluene-d8	*105*			*75.0-131*		*10/12/2019 14:38*	WG1361818
(S) 4-Bromofluorobenzene	*103*			*67.0-138*		*10/12/2019 14:38*	WG1361818
(S) 1,2-Dichloroethane-d4	*98.6*			*70.0-130*		*10/12/2019 14:38*	WG1361818

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	90.2		1	10/12/2019 16:51	WG1361912

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0202	0.0369	1.33	10/12/2019 14:59	WG1361818
Acrylonitrile	U		0.00280	0.0184	1.33	10/12/2019 14:59	WG1361818
Benzene	U		0.000589	0.00147	1.33	10/12/2019 14:59	WG1361818
Bromobenzene	U		0.00155	0.0184	1.33	10/12/2019 14:59	WG1361818
Bromodichloromethane	U		0.00116	0.00369	1.33	10/12/2019 14:59	WG1361818
Bromochloromethane	U		0.00166	0.00737	1.33	10/12/2019 14:59	WG1361818
Bromoform	U		0.00881	0.0369	1.33	10/12/2019 14:59	WG1361818
Bromomethane	U		0.00545	0.0184	1.33	10/12/2019 14:59	WG1361818
n-Butylbenzene	U		0.00566	0.0184	1.33	10/12/2019 14:59	WG1361818
sec-Butylbenzene	U		0.00372	0.0184	1.33	10/12/2019 14:59	WG1361818
tert-Butylbenzene	U		0.00228	0.00737	1.33	10/12/2019 14:59	WG1361818
Carbon disulfide	U		0.00598	0.0184	1.33	10/12/2019 14:59	WG1361818
Carbon tetrachloride	U		0.00160	0.00737	1.33	10/12/2019 14:59	WG1361818
Chlorobenzene	U		0.000844	0.00369	1.33	10/12/2019 14:59	WG1361818
Chlorodibromomethane	U		0.000664	0.00369	1.33	10/12/2019 14:59	WG1361818
Chloroethane	U		0.00160	0.00737	1.33	10/12/2019 14:59	WG1361818
Chloroform	0.000776	B J	0.000612	0.00369	1.33	10/12/2019 14:59	WG1361818
Chloromethane	U		0.00205	0.0184	1.33	10/12/2019 14:59	WG1361818
2-Chlorotoluene	U		0.00135	0.00369	1.33	10/12/2019 14:59	WG1361818
4-Chlorotoluene	U		0.00166	0.00737	1.33	10/12/2019 14:59	WG1361818
1,2-Dibromo-3-Chloropropane	U		0.00751	0.0369	1.33	10/12/2019 14:59	WG1361818
1,2-Dibromoethane	U		0.000773	0.00369	1.33	10/12/2019 14:59	WG1361818
Dibromomethane	U		0.00147	0.00737	1.33	10/12/2019 14:59	WG1361818
1,2-Dichlorobenzene	U		0.00214	0.00737	1.33	10/12/2019 14:59	WG1361818
1,3-Dichlorobenzene	U		0.00250	0.00737	1.33	10/12/2019 14:59	WG1361818
1,4-Dichlorobenzene	U		0.00290	0.00737	1.33	10/12/2019 14:59	WG1361818
Dichlorodifluoromethane	U		0.00121	0.00369	1.33	10/12/2019 14:59	WG1361818
1,1-Dichloroethane	U		0.000848	0.00369	1.33	10/12/2019 14:59	WG1361818
1,2-Dichloroethane	U		0.000700	0.00369	1.33	10/12/2019 14:59	WG1361818
1,1-Dichloroethene	U		0.000737	0.00369	1.33	10/12/2019 14:59	WG1361818
cis-1,2-Dichloroethene	U		0.00102	0.00369	1.33	10/12/2019 14:59	WG1361818
trans-1,2-Dichloroethene	U		0.00211	0.00737	1.33	10/12/2019 14:59	WG1361818
1,2-Dichloropropane	U		0.00187	0.00737	1.33	10/12/2019 14:59	WG1361818
1,1-Dichloropropene	U		0.00103	0.00369	1.33	10/12/2019 14:59	WG1361818
1,3-Dichloropropane	U		0.00258	0.00737	1.33	10/12/2019 14:59	WG1361818
cis-1,3-Dichloropropene	U		0.000999	0.00369	1.33	10/12/2019 14:59	WG1361818
trans-1,3-Dichloropropene	U		0.00225	0.00737	1.33	10/12/2019 14:59	WG1361818
trans-1,4-Dichloro-2-butene	U		0.00206	0.00737	1.33	10/12/2019 14:59	WG1361818
2,2-Dichloropropane	U		0.00116	0.00369	1.33	10/12/2019 14:59	WG1361818
Di-isopropyl ether	U		0.000516	0.00147	1.33	10/12/2019 14:59	WG1361818
Ethylbenzene	U		0.000781	0.00369	1.33	10/12/2019 14:59	WG1361818
Hexachloro-1,3-butadiene	U		0.0187	0.0369	1.33	10/12/2019 14:59	WG1361818
2-Hexanone	U		0.0147	0.0369	1.33	10/12/2019 14:59	WG1361818
n-Hexane	0.0151		0.00156	0.00737	1.33	10/12/2019 14:59	WG1361818
Iodomethane	U		0.00892	0.0184	1.33	10/12/2019 14:59	WG1361818
Isopropylbenzene	U		0.00127	0.00369	1.33	10/12/2019 14:59	WG1361818
p-Isopropyltoluene	U		0.00344	0.00737	1.33	10/12/2019 14:59	WG1361818
2-Butanone (MEK)	U		0.0184	0.0369	1.33	10/12/2019 14:59	WG1361818
Methylene Chloride	U		0.00978	0.0369	1.33	10/12/2019 14:59	WG1361818
4-Methyl-2-pentanone (MIBK)	U		0.0147	0.0369	1.33	10/12/2019 14:59	WG1361818

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	0.000483	J	0.000434	0.00147	1.33	10/12/2019 14:59	WG1361818
Naphthalene	U		0.00460	0.0184	1.33	10/12/2019 14:59	WG1361818
n-Propylbenzene	U		0.00174	0.00737	1.33	10/12/2019 14:59	WG1361818
Styrene	U		0.00402	0.0184	1.33	10/12/2019 14:59	WG1361818
1,1,1,2-Tetrachloroethane	U		0.000737	0.00369	1.33	10/12/2019 14:59	WG1361818
1,1,2,2-Tetrachloroethane	U		0.000575	0.00369	1.33	10/12/2019 14:59	WG1361818
1,1,2-Trichlorotrifluoroethane	U		0.000995	0.00369	1.33	10/12/2019 14:59	WG1361818
Tetrachloroethene	U		0.00103	0.00369	1.33	10/12/2019 14:59	WG1361818
Toluene	0.0148		0.00184	0.00737	1.33	10/12/2019 14:59	WG1361818
1,2,3-Trichlorobenzene	U		0.000921	0.00369	1.33	10/12/2019 14:59	WG1361818
1,2,4-Trichlorobenzene	U		0.00710	0.0184	1.33	10/12/2019 14:59	WG1361818
1,1,1-Trichloroethane	U		0.000406	0.00369	1.33	10/12/2019 14:59	WG1361818
1,1,2-Trichloroethane	U		0.00130	0.00369	1.33	10/12/2019 14:59	WG1361818
Trichloroethene	U		0.000589	0.00147	1.33	10/12/2019 14:59	WG1361818
Trichlorofluoromethane	U		0.000737	0.00369	1.33	10/12/2019 14:59	WG1361818
1,2,3-Trichloropropane	U		0.00751	0.0184	1.33	10/12/2019 14:59	WG1361818
1,2,4-Trimethylbenzene	U		0.00171	0.00737	1.33	10/12/2019 14:59	WG1361818
1,2,3-Trimethylbenzene	U		0.00170	0.00737	1.33	10/12/2019 14:59	WG1361818
1,3,5-Trimethylbenzene	U		0.00160	0.00737	1.33	10/12/2019 14:59	WG1361818
Vinyl acetate	U		0.00519	0.0184	1.33	10/12/2019 14:59	WG1361818
Vinyl chloride	U		0.00101	0.00369	1.33	10/12/2019 14:59	WG1361818
Xylenes, Total	U		0.00705	0.00958	1.33	10/12/2019 14:59	WG1361818
(S) Toluene-d8	*104*			*75.0-131*		*10/12/2019 14:59*	WG1361818
(S) 4-Bromofluorobenzene	*103*			*67.0-138*		*10/12/2019 14:59*	WG1361818
(S) 1,2-Dichloroethane-d4	*100*			*70.0-130*		*10/12/2019 14:59*	WG1361818

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	93.5		1	10/12/2019 16:51	WG1361912

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0147	0.0267	1	10/12/2019 15:20	WG1361818
Acrylonitrile	U		0.00203	0.0134	1	10/12/2019 15:20	WG1361818
Benzene	U		0.000428	0.00107	1	10/12/2019 15:20	WG1361818
Bromobenzene	U		0.00112	0.0134	1	10/12/2019 15:20	WG1361818
Bromodichloromethane	U		0.000843	0.00267	1	10/12/2019 15:20	WG1361818
Bromochloromethane	U		0.00121	0.00535	1	10/12/2019 15:20	WG1361818
Bromoform	U		0.00640	0.0267	1	10/12/2019 15:20	WG1361818
Bromomethane	U		0.00396	0.0134	1	10/12/2019 15:20	WG1361818
n-Butylbenzene	U		0.00411	0.0134	1	10/12/2019 15:20	WG1361818
sec-Butylbenzene	U		0.00271	0.0134	1	10/12/2019 15:20	WG1361818
tert-Butylbenzene	U		0.00166	0.00535	1	10/12/2019 15:20	WG1361818
Carbon disulfide	U		0.00434	0.0134	1	10/12/2019 15:20	WG1361818
Carbon tetrachloride	U		0.00116	0.00535	1	10/12/2019 15:20	WG1361818
Chlorobenzene	U		0.000613	0.00267	1	10/12/2019 15:20	WG1361818
Chlorodibromomethane	U		0.000481	0.00267	1	10/12/2019 15:20	WG1361818
Chloroethane	U		0.00116	0.00535	1	10/12/2019 15:20	WG1361818
Chloroform	0.000452	B J	0.000444	0.00267	1	10/12/2019 15:20	WG1361818
Chloromethane	U		0.00149	0.0134	1	10/12/2019 15:20	WG1361818
2-Chlorotoluene	U		0.000984	0.00267	1	10/12/2019 15:20	WG1361818
4-Chlorotoluene	U		0.00121	0.00535	1	10/12/2019 15:20	WG1361818
1,2-Dibromo-3-Chloropropane	U		0.00546	0.0267	1	10/12/2019 15:20	WG1361818
1,2-Dibromoethane	U		0.000562	0.00267	1	10/12/2019 15:20	WG1361818
Dibromomethane	U		0.00107	0.00535	1	10/12/2019 15:20	WG1361818
1,2-Dichlorobenzene	U		0.00155	0.00535	1	10/12/2019 15:20	WG1361818
1,3-Dichlorobenzene	U		0.00182	0.00535	1	10/12/2019 15:20	WG1361818
1,4-Dichlorobenzene	U		0.00211	0.00535	1	10/12/2019 15:20	WG1361818
Dichlorodifluoromethane	U		0.000875	0.00267	1	10/12/2019 15:20	WG1361818
1,1-Dichloroethane	U		0.000615	0.00267	1	10/12/2019 15:20	WG1361818
1,2-Dichloroethane	U		0.000508	0.00267	1	10/12/2019 15:20	WG1361818
1,1-Dichloroethene	U		0.000535	0.00267	1	10/12/2019 15:20	WG1361818
cis-1,2-Dichloroethene	U		0.000738	0.00267	1	10/12/2019 15:20	WG1361818
trans-1,2-Dichloroethene	U		0.00153	0.00535	1	10/12/2019 15:20	WG1361818
1,2-Dichloropropane	U		0.00136	0.00535	1	10/12/2019 15:20	WG1361818
1,1-Dichloropropene	U		0.000749	0.00267	1	10/12/2019 15:20	WG1361818
1,3-Dichloropropane	U		0.00187	0.00535	1	10/12/2019 15:20	WG1361818
cis-1,3-Dichloropropene	U		0.000725	0.00267	1	10/12/2019 15:20	WG1361818
trans-1,3-Dichloropropene	U		0.00164	0.00535	1	10/12/2019 15:20	WG1361818
trans-1,4-Dichloro-2-butene	U		0.00150	0.00535	1	10/12/2019 15:20	WG1361818
2,2-Dichloropropane	U		0.000849	0.00267	1	10/12/2019 15:20	WG1361818
Di-isopropyl ether	U		0.000374	0.00107	1	10/12/2019 15:20	WG1361818
Ethylbenzene	U		0.000567	0.00267	1	10/12/2019 15:20	WG1361818
Hexachloro-1,3-butadiene	U		0.0136	0.0267	1	10/12/2019 15:20	WG1361818
2-Hexanone	U		0.0107	0.0267	1	10/12/2019 15:20	WG1361818
n-Hexane	0.0162		0.00113	0.00535	1	10/12/2019 15:20	WG1361818
Iodomethane	U		0.00647	0.0134	1	10/12/2019 15:20	WG1361818
Isopropylbenzene	U		0.000923	0.00267	1	10/12/2019 15:20	WG1361818
p-Isopropyltoluene	U		0.00249	0.00535	1	10/12/2019 15:20	WG1361818
2-Butanone (MEK)	0.0154	B J	0.0134	0.0267	1	10/12/2019 15:20	WG1361818
Methylene Chloride	U		0.00710	0.0267	1	10/12/2019 15:20	WG1361818
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0267	1	10/12/2019 15:20	WG1361818

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000316	0.00107	1	10/12/2019 15:20	WG1361818
Naphthalene	U		0.00334	0.0134	1	10/12/2019 15:20	WG1361818
n-Propylbenzene	U		0.00126	0.00535	1	10/12/2019 15:20	WG1361818
Styrene	U		0.00292	0.0134	1	10/12/2019 15:20	WG1361818
1,1,1,2-Tetrachloroethane	U		0.000535	0.00267	1	10/12/2019 15:20	WG1361818
1,1,2,2-Tetrachloroethane	U		0.000417	0.00267	1	10/12/2019 15:20	WG1361818
1,1,2-Trichlorotrifluoroethane	U		0.000722	0.00267	1	10/12/2019 15:20	WG1361818
Tetrachloroethene	U		0.000749	0.00267	1	10/12/2019 15:20	WG1361818
Toluene	0.0111		0.00134	0.00535	1	10/12/2019 15:20	WG1361818
1,2,3-Trichlorobenzene	U		0.000669	0.00267	1	10/12/2019 15:20	WG1361818
1,2,4-Trichlorobenzene	U		0.00516	0.0134	1	10/12/2019 15:20	WG1361818
1,1,1-Trichloroethane	U		0.000294	0.00267	1	10/12/2019 15:20	WG1361818
1,1,2-Trichloroethane	U		0.000945	0.00267	1	10/12/2019 15:20	WG1361818
Trichloroethene	U		0.000428	0.00107	1	10/12/2019 15:20	WG1361818
Trichlorofluoromethane	U		0.000535	0.00267	1	10/12/2019 15:20	WG1361818
1,2,3-Trichloropropane	U		0.00546	0.0134	1	10/12/2019 15:20	WG1361818
1,2,4-Trimethylbenzene	U		0.00124	0.00535	1	10/12/2019 15:20	WG1361818
1,2,3-Trimethylbenzene	U		0.00123	0.00535	1	10/12/2019 15:20	WG1361818
1,3,5-Trimethylbenzene	U		0.00116	0.00535	1	10/12/2019 15:20	WG1361818
Vinyl acetate	U		0.00377	0.0134	1	10/12/2019 15:20	WG1361818
Vinyl chloride	U		0.000731	0.00267	1	10/12/2019 15:20	WG1361818
Xylenes, Total	U		0.00511	0.00695	1	10/12/2019 15:20	WG1361818
(S) Toluene-d8	*104*			*75.0-131*		*10/12/2019 15:20*	WG1361818
(S) 4-Bromofluorobenzene	*103*			*67.0-138*		*10/12/2019 15:20*	WG1361818
(S) 1,2-Dichloroethane-d4	*99.4*			*70.0-130*		*10/12/2019 15:20*	WG1361818

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	87.6		1	10/12/2019 16:51	WG1361912

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0164	J	0.0156	0.0285	1	10/12/2019 15:40	WG1361818
Acrylonitrile	U		0.00217	0.0143	1	10/12/2019 15:40	WG1361818
Benzene	U		0.000457	0.00114	1	10/12/2019 15:40	WG1361818
Bromobenzene	U		0.00120	0.0143	1	10/12/2019 15:40	WG1361818
Bromodichloromethane	U		0.000900	0.00285	1	10/12/2019 15:40	WG1361818
Bromochloromethane	U		0.00129	0.00571	1	10/12/2019 15:40	WG1361818
Bromoform	U		0.00683	0.0285	1	10/12/2019 15:40	WG1361818
Bromomethane	U		0.00422	0.0143	1	10/12/2019 15:40	WG1361818
n-Butylbenzene	U		0.00438	0.0143	1	10/12/2019 15:40	WG1361818
sec-Butylbenzene	U		0.00289	0.0143	1	10/12/2019 15:40	WG1361818
tert-Butylbenzene	U		0.00177	0.00571	1	10/12/2019 15:40	WG1361818
Carbon disulfide	U		0.00464	0.0143	1	10/12/2019 15:40	WG1361818
Carbon tetrachloride	U		0.00123	0.00571	1	10/12/2019 15:40	WG1361818
Chlorobenzene	U		0.000654	0.00285	1	10/12/2019 15:40	WG1361818
Chlorodibromomethane	U		0.000514	0.00285	1	10/12/2019 15:40	WG1361818
Chloroethane	U		0.00123	0.00571	1	10/12/2019 15:40	WG1361818
Chloroform	0.000730	B J	0.000474	0.00285	1	10/12/2019 15:40	WG1361818
Chloromethane	U		0.00159	0.0143	1	10/12/2019 15:40	WG1361818
2-Chlorotoluene	U		0.00105	0.00285	1	10/12/2019 15:40	WG1361818
4-Chlorotoluene	U		0.00129	0.00571	1	10/12/2019 15:40	WG1361818
1,2-Dibromo-3-Chloropropane	U		0.00582	0.0285	1	10/12/2019 15:40	WG1361818
1,2-Dibromoethane	U		0.000599	0.00285	1	10/12/2019 15:40	WG1361818
Dibromomethane	U		0.00114	0.00571	1	10/12/2019 15:40	WG1361818
1,2-Dichlorobenzene	U		0.00166	0.00571	1	10/12/2019 15:40	WG1361818
1,3-Dichlorobenzene	U		0.00194	0.00571	1	10/12/2019 15:40	WG1361818
1,4-Dichlorobenzene	U		0.00225	0.00571	1	10/12/2019 15:40	WG1361818
Dichlorodifluoromethane	U		0.000934	0.00285	1	10/12/2019 15:40	WG1361818
1,1-Dichloroethane	U		0.000657	0.00285	1	10/12/2019 15:40	WG1361818
1,2-Dichloroethane	U		0.000542	0.00285	1	10/12/2019 15:40	WG1361818
1,1-Dichloroethene	U		0.000571	0.00285	1	10/12/2019 15:40	WG1361818
cis-1,2-Dichloroethene	U		0.000788	0.00285	1	10/12/2019 15:40	WG1361818
trans-1,2-Dichloroethene	U		0.00163	0.00571	1	10/12/2019 15:40	WG1361818
1,2-Dichloropropane	U		0.00145	0.00571	1	10/12/2019 15:40	WG1361818
1,1-Dichloropropene	U		0.000799	0.00285	1	10/12/2019 15:40	WG1361818
1,3-Dichloropropane	U		0.00200	0.00571	1	10/12/2019 15:40	WG1361818
cis-1,3-Dichloropropene	U		0.000774	0.00285	1	10/12/2019 15:40	WG1361818
trans-1,3-Dichloropropene	U		0.00175	0.00571	1	10/12/2019 15:40	WG1361818
trans-1,4-Dichloro-2-butene	U		0.00160	0.00571	1	10/12/2019 15:40	WG1361818
2,2-Dichloropropane	U		0.000905	0.00285	1	10/12/2019 15:40	WG1361818
Di-isopropyl ether	U		0.000400	0.00114	1	10/12/2019 15:40	WG1361818
Ethylbenzene	U		0.000605	0.00285	1	10/12/2019 15:40	WG1361818
Hexachloro-1,3-butadiene	U		0.0145	0.0285	1	10/12/2019 15:40	WG1361818
2-Hexanone	U		0.0114	0.0285	1	10/12/2019 15:40	WG1361818
n-Hexane	U		0.00121	0.00571	1	10/12/2019 15:40	WG1361818
Iodomethane	U		0.00691	0.0143	1	10/12/2019 15:40	WG1361818
Isopropylbenzene	U		0.000985	0.00285	1	10/12/2019 15:40	WG1361818
p-Isopropyltoluene	U		0.00266	0.00571	1	10/12/2019 15:40	WG1361818
2-Butanone (MEK)	U		0.0143	0.0285	1	10/12/2019 15:40	WG1361818
Methylene Chloride	U		0.00758	0.0285	1	10/12/2019 15:40	WG1361818
4-Methyl-2-pentanone (MIBK)	U		0.0114	0.0285	1	10/12/2019 15:40	WG1361818

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000337	0.00114	1	10/12/2019 15:40	WG1361818
Naphthalene	U		0.00356	0.0143	1	10/12/2019 15:40	WG1361818
n-Propylbenzene	U		0.00135	0.00571	1	10/12/2019 15:40	WG1361818
Styrene	U		0.00312	0.0143	1	10/12/2019 15:40	WG1361818
1,1,1,2-Tetrachloroethane	U		0.000571	0.00285	1	10/12/2019 15:40	WG1361818
1,1,2,2-Tetrachloroethane	U		0.000445	0.00285	1	10/12/2019 15:40	WG1361818
1,1,2-Trichlorotrifluoroethane	U		0.000771	0.00285	1	10/12/2019 15:40	WG1361818
Tetrachloroethene	U		0.000799	0.00285	1	10/12/2019 15:40	WG1361818
Toluene	0.00815		0.00143	0.00571	1	10/12/2019 15:40	WG1361818
1,2,3-Trichlorobenzene	U		0.000714	0.00285	1	10/12/2019 15:40	WG1361818
1,2,4-Trichlorobenzene	U		0.00550	0.0143	1	10/12/2019 15:40	WG1361818
1,1,1-Trichloroethane	U		0.000314	0.00285	1	10/12/2019 15:40	WG1361818
1,1,2-Trichloroethane	U		0.00101	0.00285	1	10/12/2019 15:40	WG1361818
Trichloroethene	U		0.000457	0.00114	1	10/12/2019 15:40	WG1361818
Trichlorofluoromethane	U		0.000571	0.00285	1	10/12/2019 15:40	WG1361818
1,2,3-Trichloropropane	U		0.00582	0.0143	1	10/12/2019 15:40	WG1361818
1,2,4-Trimethylbenzene	U		0.00132	0.00571	1	10/12/2019 15:40	WG1361818
1,2,3-Trimethylbenzene	U		0.00131	0.00571	1	10/12/2019 15:40	WG1361818
1,3,5-Trimethylbenzene	U		0.00123	0.00571	1	10/12/2019 15:40	WG1361818
Vinyl acetate	U		0.00402	0.0143	1	10/12/2019 15:40	WG1361818
Vinyl chloride	U		0.000780	0.00285	1	10/12/2019 15:40	WG1361818
Xylenes, Total	U		0.00546	0.00742	1	10/12/2019 15:40	WG1361818
(S) Toluene-d8	*104*			*75.0-131*		*10/12/2019 15:40*	WG1361818
(S) 4-Bromofluorobenzene	*103*			*67.0-138*		*10/12/2019 15:40*	WG1361818
(S) 1,2-Dichloroethane-d4	*98.9*			*70.0-130*		*10/12/2019 15:40*	WG1361818

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	90.7		1	10/12/2019 16:51	WG1361912

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0151	0.0276	1	10/12/2019 16:01	WG1361818
Acrylonitrile	U		0.00210	0.0138	1	10/12/2019 16:01	WG1361818
Benzene	U		0.000441	0.00110	1	10/12/2019 16:01	WG1361818
Bromobenzene	U		0.00116	0.0138	1	10/12/2019 16:01	WG1361818
Bromodichloromethane	U		0.000869	0.00276	1	10/12/2019 16:01	WG1361818
Bromochloromethane	U		0.00125	0.00551	1	10/12/2019 16:01	WG1361818
Bromoform	U		0.00660	0.0276	1	10/12/2019 16:01	WG1361818
Bromomethane	U		0.00408	0.0138	1	10/12/2019 16:01	WG1361818
n-Butylbenzene	U		0.00424	0.0138	1	10/12/2019 16:01	WG1361818
sec-Butylbenzene	U		0.00279	0.0138	1	10/12/2019 16:01	WG1361818
tert-Butylbenzene	U		0.00171	0.00551	1	10/12/2019 16:01	WG1361818
Carbon disulfide	U		0.00448	0.0138	1	10/12/2019 16:01	WG1361818
Carbon tetrachloride	U		0.00119	0.00551	1	10/12/2019 16:01	WG1361818
Chlorobenzene	U		0.000632	0.00276	1	10/12/2019 16:01	WG1361818
Chlorodibromomethane	U		0.000496	0.00276	1	10/12/2019 16:01	WG1361818
Chloroethane	U		0.00119	0.00551	1	10/12/2019 16:01	WG1361818
Chloroform	0.000699	B J	0.000458	0.00276	1	10/12/2019 16:01	WG1361818
Chloromethane	U		0.00153	0.0138	1	10/12/2019 16:01	WG1361818
2-Chlorotoluene	U		0.00101	0.00276	1	10/12/2019 16:01	WG1361818
4-Chlorotoluene	U		0.00125	0.00551	1	10/12/2019 16:01	WG1361818
1,2-Dibromo-3-Chloropropane	U		0.00563	0.0276	1	10/12/2019 16:01	WG1361818
1,2-Dibromoethane	U		0.000579	0.00276	1	10/12/2019 16:01	WG1361818
Dibromomethane	U		0.00110	0.00551	1	10/12/2019 16:01	WG1361818
1,2-Dichlorobenzene	U		0.00160	0.00551	1	10/12/2019 16:01	WG1361818
1,3-Dichlorobenzene	U		0.00188	0.00551	1	10/12/2019 16:01	WG1361818
1,4-Dichlorobenzene	U		0.00217	0.00551	1	10/12/2019 16:01	WG1361818
Dichlorodifluoromethane	U		0.000902	0.00276	1	10/12/2019 16:01	WG1361818
1,1-Dichloroethane	U		0.000634	0.00276	1	10/12/2019 16:01	WG1361818
1,2-Dichloroethane	U		0.000524	0.00276	1	10/12/2019 16:01	WG1361818
1,1-Dichloroethene	U		0.000551	0.00276	1	10/12/2019 16:01	WG1361818
cis-1,2-Dichloroethene	U		0.000761	0.00276	1	10/12/2019 16:01	WG1361818
trans-1,2-Dichloroethene	U		0.00158	0.00551	1	10/12/2019 16:01	WG1361818
1,2-Dichloropropane	U		0.00140	0.00551	1	10/12/2019 16:01	WG1361818
1,1-Dichloropropene	U		0.000772	0.00276	1	10/12/2019 16:01	WG1361818
1,3-Dichloropropane	U		0.00193	0.00551	1	10/12/2019 16:01	WG1361818
cis-1,3-Dichloropropene	U		0.000748	0.00276	1	10/12/2019 16:01	WG1361818
trans-1,3-Dichloropropene	U		0.00169	0.00551	1	10/12/2019 16:01	WG1361818
trans-1,4-Dichloro-2-butene	U		0.00154	0.00551	1	10/12/2019 16:01	WG1361818
2,2-Dichloropropane	U		0.000875	0.00276	1	10/12/2019 16:01	WG1361818
Di-isopropyl ether	U		0.000386	0.00110	1	10/12/2019 16:01	WG1361818
Ethylbenzene	U		0.000585	0.00276	1	10/12/2019 16:01	WG1361818
Hexachloro-1,3-butadiene	U		0.0140	0.0276	1	10/12/2019 16:01	WG1361818
2-Hexanone	U		0.0110	0.0276	1	10/12/2019 16:01	WG1361818
n-Hexane	0.00990		0.00117	0.00551	1	10/12/2019 16:01	WG1361818
Iodomethane	U		0.00667	0.0138	1	10/12/2019 16:01	WG1361818
Isopropylbenzene	U		0.000952	0.00276	1	10/12/2019 16:01	WG1361818
p-Isopropyltoluene	U		0.00257	0.00551	1	10/12/2019 16:01	WG1361818
2-Butanone (MEK)	0.0160	B J	0.0138	0.0276	1	10/12/2019 16:01	WG1361818
Methylene Chloride	U		0.00732	0.0276	1	10/12/2019 16:01	WG1361818
4-Methyl-2-pentanone (MIBK)	U		0.0110	0.0276	1	10/12/2019 16:01	WG1361818

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000325	0.00110	1	10/12/2019 16:01	WG1361818
Naphthalene	U		0.00344	0.0138	1	10/12/2019 16:01	WG1361818
n-Propylbenzene	U		0.00130	0.00551	1	10/12/2019 16:01	WG1361818
Styrene	U		0.00301	0.0138	1	10/12/2019 16:01	WG1361818
1,1,1,2-Tetrachloroethane	U		0.000551	0.00276	1	10/12/2019 16:01	WG1361818
1,1,2,2-Tetrachloroethane	U		0.000430	0.00276	1	10/12/2019 16:01	WG1361818
1,1,2-Trichlorotrifluoroethane	U		0.000744	0.00276	1	10/12/2019 16:01	WG1361818
Tetrachloroethene	U		0.000772	0.00276	1	10/12/2019 16:01	WG1361818
Toluene	0.00846		0.00138	0.00551	1	10/12/2019 16:01	WG1361818
1,2,3-Trichlorobenzene	U		0.000689	0.00276	1	10/12/2019 16:01	WG1361818
1,2,4-Trichlorobenzene	U		0.00532	0.0138	1	10/12/2019 16:01	WG1361818
1,1,1-Trichloroethane	U		0.000303	0.00276	1	10/12/2019 16:01	WG1361818
1,1,2-Trichloroethane	U		0.000974	0.00276	1	10/12/2019 16:01	WG1361818
Trichloroethene	U		0.000441	0.00110	1	10/12/2019 16:01	WG1361818
Trichlorofluoromethane	U		0.000551	0.00276	1	10/12/2019 16:01	WG1361818
1,2,3-Trichloropropane	U		0.00563	0.0138	1	10/12/2019 16:01	WG1361818
1,2,4-Trimethylbenzene	U		0.00128	0.00551	1	10/12/2019 16:01	WG1361818
1,2,3-Trimethylbenzene	U		0.00127	0.00551	1	10/12/2019 16:01	WG1361818
1,3,5-Trimethylbenzene	U		0.00119	0.00551	1	10/12/2019 16:01	WG1361818
Vinyl acetate	U		0.00388	0.0138	1	10/12/2019 16:01	WG1361818
Vinyl chloride	U		0.000753	0.00276	1	10/12/2019 16:01	WG1361818
Xylenes, Total	U		0.00527	0.00717	1	10/12/2019 16:01	WG1361818
(S) Toluene-d8	*105*			*75.0-131*		*10/12/2019 16:01*	WG1361818
(S) 4-Bromofluorobenzene	*101*			*67.0-138*		*10/12/2019 16:01*	WG1361818
(S) 1,2-Dichloroethane-d4	*97.2*			*70.0-130*		*10/12/2019 16:01*	WG1361818

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	89.9		1	10/12/2019 16:51	WG1361912

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0152	0.0278	1	10/12/2019 16:22	WG1361818
Acrylonitrile	U		0.00211	0.0139	1	10/12/2019 16:22	WG1361818
Benzene	U		0.000445	0.00111	1	10/12/2019 16:22	WG1361818
Bromobenzene	U		0.00117	0.0139	1	10/12/2019 16:22	WG1361818
Bromodichloromethane	U		0.000876	0.00278	1	10/12/2019 16:22	WG1361818
Bromochloromethane	U		0.00126	0.00556	1	10/12/2019 16:22	WG1361818
Bromoform	U		0.00665	0.0278	1	10/12/2019 16:22	WG1361818
Bromomethane	U		0.00411	0.0139	1	10/12/2019 16:22	WG1361818
n-Butylbenzene	U		0.00427	0.0139	1	10/12/2019 16:22	WG1361818
sec-Butylbenzene	U		0.00281	0.0139	1	10/12/2019 16:22	WG1361818
tert-Butylbenzene	U		0.00172	0.00556	1	10/12/2019 16:22	WG1361818
Carbon disulfide	U		0.00451	0.0139	1	10/12/2019 16:22	WG1361818
Carbon tetrachloride	U		0.00120	0.00556	1	10/12/2019 16:22	WG1361818
Chlorobenzene	U		0.000637	0.00278	1	10/12/2019 16:22	WG1361818
Chlorodibromomethane	U		0.000500	0.00278	1	10/12/2019 16:22	WG1361818
Chloroethane	U		0.00120	0.00556	1	10/12/2019 16:22	WG1361818
Chloroform	0.000736	B J	0.000461	0.00278	1	10/12/2019 16:22	WG1361818
Chloromethane	U		0.00155	0.0139	1	10/12/2019 16:22	WG1361818
2-Chlorotoluene	U		0.00102	0.00278	1	10/12/2019 16:22	WG1361818
4-Chlorotoluene	U		0.00126	0.00556	1	10/12/2019 16:22	WG1361818
1,2-Dibromo-3-Chloropropane	U		0.00567	0.0278	1	10/12/2019 16:22	WG1361818
1,2-Dibromoethane	U		0.000584	0.00278	1	10/12/2019 16:22	WG1361818
Dibromomethane	U		0.00111	0.00556	1	10/12/2019 16:22	WG1361818
1,2-Dichlorobenzene	U		0.00161	0.00556	1	10/12/2019 16:22	WG1361818
1,3-Dichlorobenzene	U		0.00189	0.00556	1	10/12/2019 16:22	WG1361818
1,4-Dichlorobenzene	U		0.00219	0.00556	1	10/12/2019 16:22	WG1361818
Dichlorodifluoromethane	U		0.000910	0.00278	1	10/12/2019 16:22	WG1361818
1,1-Dichloroethane	U		0.000639	0.00278	1	10/12/2019 16:22	WG1361818
1,2-Dichloroethane	U		0.000528	0.00278	1	10/12/2019 16:22	WG1361818
1,1-Dichloroethene	U		0.000556	0.00278	1	10/12/2019 16:22	WG1361818
cis-1,2-Dichloroethene	U		0.000767	0.00278	1	10/12/2019 16:22	WG1361818
trans-1,2-Dichloroethene	U		0.00159	0.00556	1	10/12/2019 16:22	WG1361818
1,2-Dichloropropane	U		0.00141	0.00556	1	10/12/2019 16:22	WG1361818
1,1-Dichloropropene	U		0.000778	0.00278	1	10/12/2019 16:22	WG1361818
1,3-Dichloropropane	U		0.00195	0.00556	1	10/12/2019 16:22	WG1361818
cis-1,3-Dichloropropene	U		0.000754	0.00278	1	10/12/2019 16:22	WG1361818
trans-1,3-Dichloropropene	U		0.00170	0.00556	1	10/12/2019 16:22	WG1361818
trans-1,4-Dichloro-2-butene	U		0.00156	0.00556	1	10/12/2019 16:22	WG1361818
2,2-Dichloropropane	U		0.000882	0.00278	1	10/12/2019 16:22	WG1361818
Di-isopropyl ether	U		0.000389	0.00111	1	10/12/2019 16:22	WG1361818
Ethylbenzene	U		0.000589	0.00278	1	10/12/2019 16:22	WG1361818
Hexachloro-1,3-butadiene	U		0.0141	0.0278	1	10/12/2019 16:22	WG1361818
2-Hexanone	U		0.0111	0.0278	1	10/12/2019 16:22	WG1361818
n-Hexane	U		0.00118	0.00556	1	10/12/2019 16:22	WG1361818
Iodomethane	U		0.00673	0.0139	1	10/12/2019 16:22	WG1361818
Isopropylbenzene	U		0.000960	0.00278	1	10/12/2019 16:22	WG1361818
p-Isopropyltoluene	U		0.00259	0.00556	1	10/12/2019 16:22	WG1361818
2-Butanone (MEK)	0.0181	B J	0.0139	0.0278	1	10/12/2019 16:22	WG1361818
Methylene Chloride	U		0.00738	0.0278	1	10/12/2019 16:22	WG1361818
4-Methyl-2-pentanone (MIBK)	U		0.0111	0.0278	1	10/12/2019 16:22	WG1361818

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000328	0.00111	1	10/12/2019 16:22	WG1361818
Naphthalene	U		0.00347	0.0139	1	10/12/2019 16:22	WG1361818
n-Propylbenzene	U		0.00131	0.00556	1	10/12/2019 16:22	WG1361818
Styrene	U		0.00304	0.0139	1	10/12/2019 16:22	WG1361818
1,1,1,2-Tetrachloroethane	U		0.000556	0.00278	1	10/12/2019 16:22	WG1361818
1,1,2,2-Tetrachloroethane	U		0.000434	0.00278	1	10/12/2019 16:22	WG1361818
1,1,2-Trichlorotrifluoroethane	U		0.000751	0.00278	1	10/12/2019 16:22	WG1361818
Tetrachloroethene	U		0.000778	0.00278	1	10/12/2019 16:22	WG1361818
Toluene	0.0157		0.00139	0.00556	1	10/12/2019 16:22	WG1361818
1,2,3-Trichlorobenzene	U		0.000695	0.00278	1	10/12/2019 16:22	WG1361818
1,2,4-Trichlorobenzene	U		0.00536	0.0139	1	10/12/2019 16:22	WG1361818
1,1,1-Trichloroethane	U		0.000306	0.00278	1	10/12/2019 16:22	WG1361818
1,1,2-Trichloroethane	U		0.000982	0.00278	1	10/12/2019 16:22	WG1361818
Trichloroethene	U		0.000445	0.00111	1	10/12/2019 16:22	WG1361818
Trichlorofluoromethane	U		0.000556	0.00278	1	10/12/2019 16:22	WG1361818
1,2,3-Trichloropropane	U		0.00567	0.0139	1	10/12/2019 16:22	WG1361818
1,2,4-Trimethylbenzene	U		0.00129	0.00556	1	10/12/2019 16:22	WG1361818
1,2,3-Trimethylbenzene	U		0.00128	0.00556	1	10/12/2019 16:22	WG1361818
1,3,5-Trimethylbenzene	U		0.00120	0.00556	1	10/12/2019 16:22	WG1361818
Vinyl acetate	U		0.00391	0.0139	1	10/12/2019 16:22	WG1361818
Vinyl chloride	U		0.000759	0.00278	1	10/12/2019 16:22	WG1361818
Xylenes, Total	U		0.00532	0.00723	1	10/12/2019 16:22	WG1361818
(S) Toluene-d8	*107*			*75.0-131*		*10/12/2019 16:22*	WG1361818
(S) 4-Bromofluorobenzene	*103*			*67.0-138*		*10/12/2019 16:22*	WG1361818
(S) 1,2-Dichloroethane-d4	*98.1*			*70.0-130*		*10/12/2019 16:22*	WG1361818

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	92.1		1	10/12/2019 16:51	WG1361912

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	U		0.0149	0.0271	1	10/12/2019 16:43	WG1361818
Acrylonitrile	U		0.00206	0.0136	1	10/12/2019 16:43	WG1361818
Benzene	U		0.000434	0.00109	1	10/12/2019 16:43	WG1361818
Bromobenzene	U		0.00114	0.0136	1	10/12/2019 16:43	WG1361818
Bromodichloromethane	U		0.000856	0.00271	1	10/12/2019 16:43	WG1361818
Bromochloromethane	U		0.00123	0.00543	1	10/12/2019 16:43	WG1361818
Bromoform	U		0.00649	0.0271	1	10/12/2019 16:43	WG1361818
Bromomethane	U		0.00402	0.0136	1	10/12/2019 16:43	WG1361818
n-Butylbenzene	U		0.00417	0.0136	1	10/12/2019 16:43	WG1361818
sec-Butylbenzene	U		0.00275	0.0136	1	10/12/2019 16:43	WG1361818
tert-Butylbenzene	U		0.00168	0.00543	1	10/12/2019 16:43	WG1361818
Carbon disulfide	U		0.00441	0.0136	1	10/12/2019 16:43	WG1361818
Carbon tetrachloride	U		0.00117	0.00543	1	10/12/2019 16:43	WG1361818
Chlorobenzene	U		0.000622	0.00271	1	10/12/2019 16:43	WG1361818
Chlorodibromomethane	U		0.000489	0.00271	1	10/12/2019 16:43	WG1361818
Chloroethane	U		0.00117	0.00543	1	10/12/2019 16:43	WG1361818
Chloroform	U		0.000451	0.00271	1	10/12/2019 16:43	WG1361818
Chloromethane	U		0.00151	0.0136	1	10/12/2019 16:43	WG1361818
2-Chlorotoluene	U		0.000999	0.00271	1	10/12/2019 16:43	WG1361818
4-Chlorotoluene	U		0.00123	0.00543	1	10/12/2019 16:43	WG1361818
1,2-Dibromo-3-Chloropropane	U		0.00554	0.0271	1	10/12/2019 16:43	WG1361818
1,2-Dibromoethane	U		0.000570	0.00271	1	10/12/2019 16:43	WG1361818
Dibromomethane	U		0.00109	0.00543	1	10/12/2019 16:43	WG1361818
1,2-Dichlorobenzene	U		0.00157	0.00543	1	10/12/2019 16:43	WG1361818
1,3-Dichlorobenzene	U		0.00185	0.00543	1	10/12/2019 16:43	WG1361818
1,4-Dichlorobenzene	U		0.00214	0.00543	1	10/12/2019 16:43	WG1361818
Dichlorodifluoromethane	U		0.000888	0.00271	1	10/12/2019 16:43	WG1361818
1,1-Dichloroethane	U		0.000624	0.00271	1	10/12/2019 16:43	WG1361818
1,2-Dichloroethane	U		0.000516	0.00271	1	10/12/2019 16:43	WG1361818
1,1-Dichloroethene	U		0.000543	0.00271	1	10/12/2019 16:43	WG1361818
cis-1,2-Dichloroethene	U		0.000749	0.00271	1	10/12/2019 16:43	WG1361818
trans-1,2-Dichloroethene	U		0.00155	0.00543	1	10/12/2019 16:43	WG1361818
1,2-Dichloropropane	U		0.00138	0.00543	1	10/12/2019 16:43	WG1361818
1,1-Dichloropropene	U		0.000760	0.00271	1	10/12/2019 16:43	WG1361818
1,3-Dichloropropane	U		0.00190	0.00543	1	10/12/2019 16:43	WG1361818
cis-1,3-Dichloropropene	U		0.000736	0.00271	1	10/12/2019 16:43	WG1361818
trans-1,3-Dichloropropene	U		0.00166	0.00543	1	10/12/2019 16:43	WG1361818
trans-1,4-Dichloro-2-butene	U		0.00152	0.00543	1	10/12/2019 16:43	WG1361818
2,2-Dichloropropane	U		0.000861	0.00271	1	10/12/2019 16:43	WG1361818
Di-isopropyl ether	U		0.000380	0.00109	1	10/12/2019 16:43	WG1361818
Ethylbenzene	U		0.000575	0.00271	1	10/12/2019 16:43	WG1361818
Hexachloro-1,3-butadiene	U		0.0138	0.0271	1	10/12/2019 16:43	WG1361818
2-Hexanone	U		0.0109	0.0271	1	10/12/2019 16:43	WG1361818
n-Hexane	U		0.00115	0.00543	1	10/12/2019 16:43	WG1361818
Iodomethane	U		0.00657	0.0136	1	10/12/2019 16:43	WG1361818
Isopropylbenzene	U		0.000937	0.00271	1	10/12/2019 16:43	WG1361818
p-Isopropyltoluene	U		0.00253	0.00543	1	10/12/2019 16:43	WG1361818
2-Butanone (MEK)	0.0201	B J	0.0136	0.0271	1	10/12/2019 16:43	WG1361818
Methylene Chloride	U		0.00721	0.0271	1	10/12/2019 16:43	WG1361818
4-Methyl-2-pentanone (MIBK)	U		0.0109	0.0271	1	10/12/2019 16:43	WG1361818

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000320	0.00109	1	10/12/2019 16:43	WG1361818
Naphthalene	U		0.00339	0.0136	1	10/12/2019 16:43	WG1361818
n-Propylbenzene	U		0.00128	0.00543	1	10/12/2019 16:43	WG1361818
Styrene	U		0.00296	0.0136	1	10/12/2019 16:43	WG1361818
1,1,1,2-Tetrachloroethane	U		0.000543	0.00271	1	10/12/2019 16:43	WG1361818
1,1,2,2-Tetrachloroethane	U		0.000423	0.00271	1	10/12/2019 16:43	WG1361818
1,1,2-Trichlorotrifluoroethane	U		0.000733	0.00271	1	10/12/2019 16:43	WG1361818
Tetrachloroethene	U		0.000760	0.00271	1	10/12/2019 16:43	WG1361818
Toluene	0.0104		0.00136	0.00543	1	10/12/2019 16:43	WG1361818
1,2,3-Trichlorobenzene	U		0.000679	0.00271	1	10/12/2019 16:43	WG1361818
1,2,4-Trichlorobenzene	U		0.00523	0.0136	1	10/12/2019 16:43	WG1361818
1,1,1-Trichloroethane	U		0.000299	0.00271	1	10/12/2019 16:43	WG1361818
1,1,2-Trichloroethane	U		0.000959	0.00271	1	10/12/2019 16:43	WG1361818
Trichloroethene	U		0.000434	0.00109	1	10/12/2019 16:43	WG1361818
Trichlorofluoromethane	U		0.000543	0.00271	1	10/12/2019 16:43	WG1361818
1,2,3-Trichloropropane	U		0.00554	0.0136	1	10/12/2019 16:43	WG1361818
1,2,4-Trimethylbenzene	U		0.00126	0.00543	1	10/12/2019 16:43	WG1361818
1,2,3-Trimethylbenzene	U		0.00125	0.00543	1	10/12/2019 16:43	WG1361818
1,3,5-Trimethylbenzene	U		0.00117	0.00543	1	10/12/2019 16:43	WG1361818
Vinyl acetate	U		0.00382	0.0136	1	10/12/2019 16:43	WG1361818
Vinyl chloride	U		0.000742	0.00271	1	10/12/2019 16:43	WG1361818
Xylenes, Total	U		0.00519	0.00706	1	10/12/2019 16:43	WG1361818
(S) Toluene-d8	*104*			*75.0-131*		*10/12/2019 16:43*	WG1361818
(S) 4-Bromofluorobenzene	*103*			*67.0-138*		*10/12/2019 16:43*	WG1361818
(S) 1,2-Dichloroethane-d4	*98.2*			*70.0-130*		*10/12/2019 16:43*	WG1361818

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	88.6		1	10/12/2019 16:51	WG1361912

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0209	J J0	0.0155	0.0282	1	10/15/2019 00:09	WG1362726
Acrylonitrile	U		0.00215	0.0141	1	10/15/2019 00:09	WG1362726
Benzene	U		0.000452	0.00113	1	10/15/2019 00:09	WG1362726
Bromobenzene	U		0.00119	0.0141	1	10/15/2019 00:09	WG1362726
Bromodichloromethane	U		0.000890	0.00282	1	10/15/2019 00:09	WG1362726
Bromochloromethane	U		0.00128	0.00565	1	10/15/2019 00:09	WG1362726
Bromoform	U		0.00675	0.0282	1	10/15/2019 00:09	WG1362726
Bromomethane	U		0.00418	0.0141	1	10/15/2019 00:09	WG1362726
n-Butylbenzene	U		0.00434	0.0141	1	10/15/2019 00:09	WG1362726
sec-Butylbenzene	U		0.00286	0.0141	1	10/15/2019 00:09	WG1362726
tert-Butylbenzene	U		0.00175	0.00565	1	10/15/2019 00:09	WG1362726
Carbon disulfide	U		0.00458	0.0141	1	10/15/2019 00:09	WG1362726
Carbon tetrachloride	U	J0	0.00122	0.00565	1	10/15/2019 00:09	WG1362726
Chlorobenzene	U		0.000647	0.00282	1	10/15/2019 00:09	WG1362726
Chlorodibromomethane	U		0.000508	0.00282	1	10/15/2019 00:09	WG1362726
Chloroethane	U		0.00122	0.00565	1	10/15/2019 00:09	WG1362726
Chloroform	U		0.000469	0.00282	1	10/15/2019 00:09	WG1362726
Chloromethane	U		0.00157	0.0141	1	10/15/2019 00:09	WG1362726
2-Chlorotoluene	U		0.00104	0.00282	1	10/15/2019 00:09	WG1362726
4-Chlorotoluene	U		0.00128	0.00565	1	10/15/2019 00:09	WG1362726
1,2-Dibromo-3-Chloropropane	U		0.00576	0.0282	1	10/15/2019 00:09	WG1362726
1,2-Dibromoethane	U		0.000593	0.00282	1	10/15/2019 00:09	WG1362726
Dibromomethane	U		0.00113	0.00565	1	10/15/2019 00:09	WG1362726
1,2-Dichlorobenzene	U		0.00164	0.00565	1	10/15/2019 00:09	WG1362726
1,3-Dichlorobenzene	U		0.00192	0.00565	1	10/15/2019 00:09	WG1362726
1,4-Dichlorobenzene	U		0.00222	0.00565	1	10/15/2019 00:09	WG1362726
Dichlorodifluoromethane	U		0.000924	0.00282	1	10/15/2019 00:09	WG1362726
1,1-Dichloroethane	U		0.000649	0.00282	1	10/15/2019 00:09	WG1362726
1,2-Dichloroethane	U		0.000536	0.00282	1	10/15/2019 00:09	WG1362726
1,1-Dichloroethene	U		0.000565	0.00282	1	10/15/2019 00:09	WG1362726
cis-1,2-Dichloroethene	U		0.000779	0.00282	1	10/15/2019 00:09	WG1362726
trans-1,2-Dichloroethene	U		0.00161	0.00565	1	10/15/2019 00:09	WG1362726
1,2-Dichloropropane	U		0.00143	0.00565	1	10/15/2019 00:09	WG1362726
1,1-Dichloropropene	U		0.000790	0.00282	1	10/15/2019 00:09	WG1362726
1,3-Dichloropropane	U		0.00198	0.00565	1	10/15/2019 00:09	WG1362726
cis-1,3-Dichloropropene	U		0.000766	0.00282	1	10/15/2019 00:09	WG1362726
trans-1,3-Dichloropropene	U		0.00173	0.00565	1	10/15/2019 00:09	WG1362726
trans-1,4-Dichloro-2-butene	U		0.00158	0.00565	1	10/15/2019 00:09	WG1362726
2,2-Dichloropropane	U		0.000896	0.00282	1	10/15/2019 00:09	WG1362726
Di-isopropyl ether	U		0.000395	0.00113	1	10/15/2019 00:09	WG1362726
Ethylbenzene	U		0.000599	0.00282	1	10/15/2019 00:09	WG1362726
Hexachloro-1,3-butadiene	U		0.0143	0.0282	1	10/15/2019 00:09	WG1362726
2-Hexanone	U		0.0113	0.0282	1	10/15/2019 00:09	WG1362726
n-Hexane	U		0.00120	0.00565	1	10/15/2019 00:09	WG1362726
Iodomethane	U	J3 J4	0.00683	0.0141	1	10/15/2019 00:09	WG1362726
Isopropylbenzene	U		0.000975	0.00282	1	10/15/2019 00:09	WG1362726
p-Isopropyltoluene	U		0.00263	0.00565	1	10/15/2019 00:09	WG1362726
2-Butanone (MEK)	U		0.0141	0.0282	1	10/15/2019 00:09	WG1362726
Methylene Chloride	U		0.00750	0.0282	1	10/15/2019 00:09	WG1362726
4-Methyl-2-pentanone (MIBK)	U		0.0113	0.0282	1	10/15/2019 00:09	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000333	0.00113	1	10/15/2019 00:09	WG1362726
Naphthalene	U		0.00352	0.0141	1	10/15/2019 00:09	WG1362726
n-Propylbenzene	U		0.00133	0.00565	1	10/15/2019 00:09	WG1362726
Styrene	U		0.00308	0.0141	1	10/15/2019 00:09	WG1362726
1,1,1,2-Tetrachloroethane	U		0.000565	0.00282	1	10/15/2019 00:09	WG1362726
1,1,2,2-Tetrachloroethane	U		0.000440	0.00282	1	10/15/2019 00:09	WG1362726
1,1,2-Trichlorotrifluoroethane	U		0.000762	0.00282	1	10/15/2019 00:09	WG1362726
Tetrachloroethene	U		0.000790	0.00282	1	10/15/2019 00:09	WG1362726
Toluene	0.00583		0.00141	0.00565	1	10/15/2019 00:09	WG1362726
1,2,3-Trichlorobenzene	U		0.000706	0.00282	1	10/15/2019 00:09	WG1362726
1,2,4-Trichlorobenzene	U		0.00544	0.0141	1	10/15/2019 00:09	WG1362726
1,1,1-Trichloroethane	U		0.000311	0.00282	1	10/15/2019 00:09	WG1362726
1,1,2-Trichloroethane	U		0.000997	0.00282	1	10/15/2019 00:09	WG1362726
Trichloroethene	U		0.000452	0.00113	1	10/15/2019 00:09	WG1362726
Trichlorofluoromethane	U		0.000565	0.00282	1	10/15/2019 00:09	WG1362726
1,2,3-Trichloropropane	U		0.00576	0.0141	1	10/15/2019 00:09	WG1362726
1,2,4-Trimethylbenzene	0.00217	B J	0.00131	0.00565	1	10/15/2019 00:09	WG1362726
1,2,3-Trimethylbenzene	U		0.00130	0.00565	1	10/15/2019 00:09	WG1362726
1,3,5-Trimethylbenzene	U		0.00122	0.00565	1	10/15/2019 00:09	WG1362726
Vinyl acetate	U	J0	0.00397	0.0141	1	10/15/2019 00:09	WG1362726
Vinyl chloride	U		0.000771	0.00282	1	10/15/2019 00:09	WG1362726
Xylenes, Total	U		0.00540	0.00734	1	10/15/2019 00:09	WG1362726
(S) Toluene-d8	*108*			*75.0-131*		*10/15/2019 00:09*	WG1362726
(S) 4-Bromofluorobenzene	*97.3*			*67.0-138*		*10/15/2019 00:09*	WG1362726
(S) 1,2-Dichloroethane-d4	*93.4*			*70.0-130*		*10/15/2019 00:09*	WG1362726

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	93.0		1	10/12/2019 16:51	WG1361912

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0867	J0	0.0315	0.0575	2.14	10/15/2019 00:30	WG1362726
Acrylonitrile	U		0.00438	0.0288	2.14	10/15/2019 00:30	WG1362726
Benzene	U		0.000921	0.00230	2.14	10/15/2019 00:30	WG1362726
Bromobenzene	U		0.00242	0.0288	2.14	10/15/2019 00:30	WG1362726
Bromodichloromethane	U		0.00182	0.00575	2.14	10/15/2019 00:30	WG1362726
Bromochloromethane	U		0.00260	0.0115	2.14	10/15/2019 00:30	WG1362726
Bromoform	U		0.0138	0.0575	2.14	10/15/2019 00:30	WG1362726
Bromomethane	U		0.00852	0.0288	2.14	10/15/2019 00:30	WG1362726
n-Butylbenzene	U		0.00884	0.0288	2.14	10/15/2019 00:30	WG1362726
sec-Butylbenzene	U		0.00582	0.0288	2.14	10/15/2019 00:30	WG1362726
tert-Butylbenzene	U		0.00357	0.0115	2.14	10/15/2019 00:30	WG1362726
Carbon disulfide	U		0.00935	0.0288	2.14	10/15/2019 00:30	WG1362726
Carbon tetrachloride	U	J0	0.00248	0.0115	2.14	10/15/2019 00:30	WG1362726
Chlorobenzene	U		0.00132	0.00575	2.14	10/15/2019 00:30	WG1362726
Chlorodibromomethane	U		0.00104	0.00575	2.14	10/15/2019 00:30	WG1362726
Chloroethane	U		0.00248	0.0115	2.14	10/15/2019 00:30	WG1362726
Chloroform	U		0.000955	0.00575	2.14	10/15/2019 00:30	WG1362726
Chloromethane	U		0.00319	0.0288	2.14	10/15/2019 00:30	WG1362726
2-Chlorotoluene	U		0.00212	0.00575	2.14	10/15/2019 00:30	WG1362726
4-Chlorotoluene	U		0.00260	0.0115	2.14	10/15/2019 00:30	WG1362726
1,2-Dibromo-3-Chloropropane	U		0.0117	0.0575	2.14	10/15/2019 00:30	WG1362726
1,2-Dibromoethane	U		0.00120	0.00575	2.14	10/15/2019 00:30	WG1362726
Dibromomethane	U		0.00230	0.0115	2.14	10/15/2019 00:30	WG1362726
1,2-Dichlorobenzene	U		0.00333	0.0115	2.14	10/15/2019 00:30	WG1362726
1,3-Dichlorobenzene	U		0.00392	0.0115	2.14	10/15/2019 00:30	WG1362726
1,4-Dichlorobenzene	U		0.00454	0.0115	2.14	10/15/2019 00:30	WG1362726
Dichlorodifluoromethane	U		0.00188	0.00575	2.14	10/15/2019 00:30	WG1362726
1,1-Dichloroethane	U		0.00132	0.00575	2.14	10/15/2019 00:30	WG1362726
1,2-Dichloroethane	U		0.00110	0.00575	2.14	10/15/2019 00:30	WG1362726
1,1-Dichloroethene	U		0.00115	0.00575	2.14	10/15/2019 00:30	WG1362726
cis-1,2-Dichloroethene	U		0.00159	0.00575	2.14	10/15/2019 00:30	WG1362726
trans-1,2-Dichloroethene	U		0.00329	0.0115	2.14	10/15/2019 00:30	WG1362726
1,2-Dichloropropane	U		0.00293	0.0115	2.14	10/15/2019 00:30	WG1362726
1,1-Dichloropropene	U		0.00161	0.00575	2.14	10/15/2019 00:30	WG1362726
1,3-Dichloropropane	U		0.00403	0.0115	2.14	10/15/2019 00:30	WG1362726
cis-1,3-Dichloropropene	U		0.00156	0.00575	2.14	10/15/2019 00:30	WG1362726
trans-1,3-Dichloropropene	U		0.00352	0.0115	2.14	10/15/2019 00:30	WG1362726
trans-1,4-Dichloro-2-butene	U		0.00323	0.0115	2.14	10/15/2019 00:30	WG1362726
2,2-Dichloropropane	U		0.00183	0.00575	2.14	10/15/2019 00:30	WG1362726
Di-isopropyl ether	U		0.000806	0.00230	2.14	10/15/2019 00:30	WG1362726
Ethylbenzene	0.00148	J	0.00122	0.00575	2.14	10/15/2019 00:30	WG1362726
Hexachloro-1,3-butadiene	U		0.0293	0.0575	2.14	10/15/2019 00:30	WG1362726
2-Hexanone	U		0.0230	0.0575	2.14	10/15/2019 00:30	WG1362726
n-Hexane	0.0272		0.00244	0.0115	2.14	10/15/2019 00:30	WG1362726
Iodomethane	U	J3 J4	0.0139	0.0288	2.14	10/15/2019 00:30	WG1362726
Isopropylbenzene	U		0.00199	0.00575	2.14	10/15/2019 00:30	WG1362726
p-Isopropyltoluene	U		0.00537	0.0115	2.14	10/15/2019 00:30	WG1362726
2-Butanone (MEK)	U		0.0288	0.0575	2.14	10/15/2019 00:30	WG1362726
Methylene Chloride	U		0.0153	0.0575	2.14	10/15/2019 00:30	WG1362726
4-Methyl-2-pentanone (MIBK)	U		0.0230	0.0575	2.14	10/15/2019 00:30	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000679	0.00230	2.14	10/15/2019 00:30	WG1362726
Naphthalene	U		0.00719	0.0288	2.14	10/15/2019 00:30	WG1362726
n-Propylbenzene	U		0.00272	0.0115	2.14	10/15/2019 00:30	WG1362726
Styrene	U		0.00628	0.0288	2.14	10/15/2019 00:30	WG1362726
1,1,1,2-Tetrachloroethane	U		0.00115	0.00575	2.14	10/15/2019 00:30	WG1362726
1,1,2,2-Tetrachloroethane	U		0.000898	0.00575	2.14	10/15/2019 00:30	WG1362726
1,1,2-Trichlorotrifluoroethane	U		0.00155	0.00575	2.14	10/15/2019 00:30	WG1362726
Tetrachloroethene	U		0.00161	0.00575	2.14	10/15/2019 00:30	WG1362726
Toluene	0.0687		0.00288	0.0115	2.14	10/15/2019 00:30	WG1362726
1,2,3-Trichlorobenzene	U		0.00144	0.00575	2.14	10/15/2019 00:30	WG1362726
1,2,4-Trichlorobenzene	U		0.0111	0.0288	2.14	10/15/2019 00:30	WG1362726
1,1,1-Trichloroethane	U		0.000634	0.00575	2.14	10/15/2019 00:30	WG1362726
1,1,2-Trichloroethane	U		0.00203	0.00575	2.14	10/15/2019 00:30	WG1362726
Trichloroethene	U		0.000921	0.00230	2.14	10/15/2019 00:30	WG1362726
Trichlorofluoromethane	U		0.00115	0.00575	2.14	10/15/2019 00:30	WG1362726
1,2,3-Trichloropropane	U		0.0117	0.0288	2.14	10/15/2019 00:30	WG1362726
1,2,4-Trimethylbenzene	0.00355	B J	0.00267	0.0115	2.14	10/15/2019 00:30	WG1362726
1,2,3-Trimethylbenzene	U		0.00265	0.0115	2.14	10/15/2019 00:30	WG1362726
1,3,5-Trimethylbenzene	U		0.00248	0.0115	2.14	10/15/2019 00:30	WG1362726
Vinyl acetate	U	J0	0.00810	0.0288	2.14	10/15/2019 00:30	WG1362726
Vinyl chloride	U		0.00157	0.00575	2.14	10/15/2019 00:30	WG1362726
Xylenes, Total	U		0.0110	0.0150	2.14	10/15/2019 00:30	WG1362726
(S) Toluene-d8	*107*			*75.0-131*		*10/15/2019 00:30*	WG1362726
(S) 4-Bromofluorobenzene	*96.3*			*67.0-138*		*10/15/2019 00:30*	WG1362726
(S) 1,2-Dichloroethane-d4	*95.4*			*70.0-130*		*10/15/2019 00:30*	WG1362726

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	90.8		1	10/12/2019 16:15	WG1361913

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.242	J J0	0.156	0.286	10.4	10/15/2019 00:52	WG1362726
Acrylonitrile	U		0.0218	0.143	10.4	10/15/2019 00:52	WG1362726
Benzene	U		0.00458	0.0115	10.4	10/15/2019 00:52	WG1362726
Bromobenzene	U		0.0120	0.143	10.4	10/15/2019 00:52	WG1362726
Bromodichloromethane	U		0.00903	0.0286	10.4	10/15/2019 00:52	WG1362726
Bromochloromethane	U		0.0130	0.0573	10.4	10/15/2019 00:52	WG1362726
Bromoform	U		0.0685	0.286	10.4	10/15/2019 00:52	WG1362726
Bromomethane	U		0.0424	0.143	10.4	10/15/2019 00:52	WG1362726
n-Butylbenzene	U		0.0440	0.143	10.4	10/15/2019 00:52	WG1362726
sec-Butylbenzene	U		0.0290	0.143	10.4	10/15/2019 00:52	WG1362726
tert-Butylbenzene	U		0.0177	0.0573	10.4	10/15/2019 00:52	WG1362726
Carbon disulfide	U		0.0465	0.143	10.4	10/15/2019 00:52	WG1362726
Carbon tetrachloride	U	J0	0.0123	0.0573	10.4	10/15/2019 00:52	WG1362726
Chlorobenzene	U		0.00657	0.0286	10.4	10/15/2019 00:52	WG1362726
Chlorodibromomethane	U		0.00516	0.0286	10.4	10/15/2019 00:52	WG1362726
Chloroethane	U		0.0123	0.0573	10.4	10/15/2019 00:52	WG1362726
Chloroform	U		0.00476	0.0286	10.4	10/15/2019 00:52	WG1362726
Chloromethane	U		0.0160	0.143	10.4	10/15/2019 00:52	WG1362726
2-Chlorotoluene	U		0.0105	0.0286	10.4	10/15/2019 00:52	WG1362726
4-Chlorotoluene	U		0.0130	0.0573	10.4	10/15/2019 00:52	WG1362726
1,2-Dibromo-3-Chloropropane	U		0.0584	0.286	10.4	10/15/2019 00:52	WG1362726
1,2-Dibromoethane	U		0.00601	0.0286	10.4	10/15/2019 00:52	WG1362726
Dibromomethane	U		0.0115	0.0573	10.4	10/15/2019 00:52	WG1362726
1,2-Dichlorobenzene	U		0.0166	0.0573	10.4	10/15/2019 00:52	WG1362726
1,3-Dichlorobenzene	U		0.0195	0.0573	10.4	10/15/2019 00:52	WG1362726
1,4-Dichlorobenzene	U		0.0226	0.0573	10.4	10/15/2019 00:52	WG1362726
Dichlorodifluoromethane	U		0.00937	0.0286	10.4	10/15/2019 00:52	WG1362726
1,1-Dichloroethane	U		0.00659	0.0286	10.4	10/15/2019 00:52	WG1362726
1,2-Dichloroethane	U		0.00544	0.0286	10.4	10/15/2019 00:52	WG1362726
1,1-Dichloroethene	U		0.00573	0.0286	10.4	10/15/2019 00:52	WG1362726
cis-1,2-Dichloroethene	U		0.00791	0.0286	10.4	10/15/2019 00:52	WG1362726
trans-1,2-Dichloroethene	U		0.0164	0.0573	10.4	10/15/2019 00:52	WG1362726
1,2-Dichloropropane	U		0.0145	0.0573	10.4	10/15/2019 00:52	WG1362726
1,1-Dichloropropene	U		0.00802	0.0286	10.4	10/15/2019 00:52	WG1362726
1,3-Dichloropropane	U		0.0200	0.0573	10.4	10/15/2019 00:52	WG1362726
cis-1,3-Dichloropropene	U		0.00777	0.0286	10.4	10/15/2019 00:52	WG1362726
trans-1,3-Dichloropropene	U		0.0175	0.0573	10.4	10/15/2019 00:52	WG1362726
trans-1,4-Dichloro-2-butene	U		0.0161	0.0573	10.4	10/15/2019 00:52	WG1362726
2,2-Dichloropropane	U		0.00909	0.0286	10.4	10/15/2019 00:52	WG1362726
Di-isopropyl ether	U		0.00401	0.0115	10.4	10/15/2019 00:52	WG1362726
Ethylbenzene	U		0.00607	0.0286	10.4	10/15/2019 00:52	WG1362726
Hexachloro-1,3-butadiene	U		0.145	0.286	10.4	10/15/2019 00:52	WG1362726
2-Hexanone	U		0.115	0.286	10.4	10/15/2019 00:52	WG1362726
n-Hexane	U		0.0121	0.0573	10.4	10/15/2019 00:52	WG1362726
Iodomethane	U	J3 J4	0.0693	0.143	10.4	10/15/2019 00:52	WG1362726
Isopropylbenzene	U		0.00989	0.0286	10.4	10/15/2019 00:52	WG1362726
p-Isopropyltoluene	U		0.0267	0.0573	10.4	10/15/2019 00:52	WG1362726
2-Butanone (MEK)	U		0.143	0.286	10.4	10/15/2019 00:52	WG1362726
Methylene Chloride	U		0.0761	0.286	10.4	10/15/2019 00:52	WG1362726
4-Methyl-2-pentanone (MIBK)	U		0.115	0.286	10.4	10/15/2019 00:52	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.00338	0.0115	10.4	10/15/2019 00:52	WG1362726
Naphthalene	U		0.0357	0.143	10.4	10/15/2019 00:52	WG1362726
n-Propylbenzene	U		0.0135	0.0573	10.4	10/15/2019 00:52	WG1362726
Styrene	U		0.0313	0.143	10.4	10/15/2019 00:52	WG1362726
1,1,1,2-Tetrachloroethane	U		0.00573	0.0286	10.4	10/15/2019 00:52	WG1362726
1,1,2,2-Tetrachloroethane	U		0.00447	0.0286	10.4	10/15/2019 00:52	WG1362726
1,1,2-Trichlorotrifluoroethane	U		0.00773	0.0286	10.4	10/15/2019 00:52	WG1362726
Tetrachloroethene	U		0.00802	0.0286	10.4	10/15/2019 00:52	WG1362726
Toluene	0.0561	J	0.0143	0.0573	10.4	10/15/2019 00:52	WG1362726
1,2,3-Trichlorobenzene	U		0.00716	0.0286	10.4	10/15/2019 00:52	WG1362726
1,2,4-Trichlorobenzene	U		0.0552	0.143	10.4	10/15/2019 00:52	WG1362726
1,1,1-Trichloroethane	U		0.00315	0.0286	10.4	10/15/2019 00:52	WG1362726
1,1,2-Trichloroethane	U		0.0101	0.0286	10.4	10/15/2019 00:52	WG1362726
Trichloroethene	U		0.00458	0.0115	10.4	10/15/2019 00:52	WG1362726
Trichlorofluoromethane	U		0.00573	0.0286	10.4	10/15/2019 00:52	WG1362726
1,2,3-Trichloropropane	U		0.0584	0.143	10.4	10/15/2019 00:52	WG1362726
1,2,4-Trimethylbenzene	U		0.0133	0.0573	10.4	10/15/2019 00:52	WG1362726
1,2,3-Trimethylbenzene	U		0.0132	0.0573	10.4	10/15/2019 00:52	WG1362726
1,3,5-Trimethylbenzene	U		0.0123	0.0573	10.4	10/15/2019 00:52	WG1362726
Vinyl acetate	U	J0	0.0403	0.143	10.4	10/15/2019 00:52	WG1362726
Vinyl chloride	U		0.00782	0.0286	10.4	10/15/2019 00:52	WG1362726
Xylenes, Total	U		0.0547	0.0745	10.4	10/15/2019 00:52	WG1362726
(S) Toluene-d8	*108*			*75.0-131*		*10/15/2019 00:52*	WG1362726
(S) 4-Bromofluorobenzene	*99.1*			*67.0-138*		*10/15/2019 00:52*	WG1362726
(S) 1,2-Dichloroethane-d4	*98.1*			*70.0-130*		*10/15/2019 00:52*	WG1362726

Sample Narrative:

L1147037-14 WG1362726: Dilution due to limited sample volume.

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	90.7		1	10/12/2019 16:15	WG1361913

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0351	J0	0.0151	0.0276	1	10/15/2019 01:13	WG1362726
Acrylonitrile	U		0.00210	0.0138	1	10/15/2019 01:13	WG1362726
Benzene	U		0.000441	0.00110	1	10/15/2019 01:13	WG1362726
Bromobenzene	U		0.00116	0.0138	1	10/15/2019 01:13	WG1362726
Bromodichloromethane	U		0.000869	0.00276	1	10/15/2019 01:13	WG1362726
Bromochloromethane	U		0.00125	0.00551	1	10/15/2019 01:13	WG1362726
Bromoform	U		0.00659	0.0276	1	10/15/2019 01:13	WG1362726
Bromomethane	U		0.00408	0.0138	1	10/15/2019 01:13	WG1362726
n-Butylbenzene	U		0.00423	0.0138	1	10/15/2019 01:13	WG1362726
sec-Butylbenzene	U		0.00279	0.0138	1	10/15/2019 01:13	WG1362726
tert-Butylbenzene	U		0.00171	0.00551	1	10/15/2019 01:13	WG1362726
Carbon disulfide	U		0.00448	0.0138	1	10/15/2019 01:13	WG1362726
Carbon tetrachloride	U	J0	0.00119	0.00551	1	10/15/2019 01:13	WG1362726
Chlorobenzene	U		0.000632	0.00276	1	10/15/2019 01:13	WG1362726
Chlorodibromomethane	U		0.000496	0.00276	1	10/15/2019 01:13	WG1362726
Chloroethane	U		0.00119	0.00551	1	10/15/2019 01:13	WG1362726
Chloroform	U		0.000458	0.00276	1	10/15/2019 01:13	WG1362726
Chloromethane	U		0.00153	0.0138	1	10/15/2019 01:13	WG1362726
2-Chlorotoluene	U		0.00101	0.00276	1	10/15/2019 01:13	WG1362726
4-Chlorotoluene	U		0.00125	0.00551	1	10/15/2019 01:13	WG1362726
1,2-Dibromo-3-Chloropropane	U		0.00562	0.0276	1	10/15/2019 01:13	WG1362726
1,2-Dibromoethane	U		0.000579	0.00276	1	10/15/2019 01:13	WG1362726
Dibromomethane	U		0.00110	0.00551	1	10/15/2019 01:13	WG1362726
1,2-Dichlorobenzene	U		0.00160	0.00551	1	10/15/2019 01:13	WG1362726
1,3-Dichlorobenzene	U		0.00187	0.00551	1	10/15/2019 01:13	WG1362726
1,4-Dichlorobenzene	U		0.00217	0.00551	1	10/15/2019 01:13	WG1362726
Dichlorodifluoromethane	U		0.000902	0.00276	1	10/15/2019 01:13	WG1362726
1,1-Dichloroethane	U		0.000634	0.00276	1	10/15/2019 01:13	WG1362726
1,2-Dichloroethane	U		0.000524	0.00276	1	10/15/2019 01:13	WG1362726
1,1-Dichloroethene	U		0.000551	0.00276	1	10/15/2019 01:13	WG1362726
cis-1,2-Dichloroethene	U		0.000761	0.00276	1	10/15/2019 01:13	WG1362726
trans-1,2-Dichloroethene	U		0.00158	0.00551	1	10/15/2019 01:13	WG1362726
1,2-Dichloropropane	U		0.00140	0.00551	1	10/15/2019 01:13	WG1362726
1,1-Dichloropropene	U		0.000772	0.00276	1	10/15/2019 01:13	WG1362726
1,3-Dichloropropane	U		0.00193	0.00551	1	10/15/2019 01:13	WG1362726
cis-1,3-Dichloropropene	U		0.000748	0.00276	1	10/15/2019 01:13	WG1362726
trans-1,3-Dichloropropene	U		0.00169	0.00551	1	10/15/2019 01:13	WG1362726
trans-1,4-Dichloro-2-butene	U		0.00154	0.00551	1	10/15/2019 01:13	WG1362726
2,2-Dichloropropane	U		0.000875	0.00276	1	10/15/2019 01:13	WG1362726
Di-isopropyl ether	U		0.000386	0.00110	1	10/15/2019 01:13	WG1362726
Ethylbenzene	U		0.000584	0.00276	1	10/15/2019 01:13	WG1362726
Hexachloro-1,3-butadiene	U		0.0140	0.0276	1	10/15/2019 01:13	WG1362726
2-Hexanone	U		0.0110	0.0276	1	10/15/2019 01:13	WG1362726
n-Hexane	0.0176		0.00117	0.00551	1	10/15/2019 01:13	WG1362726
Iodomethane	U	J3 J4	0.00667	0.0138	1	10/15/2019 01:13	WG1362726
Isopropylbenzene	U		0.000952	0.00276	1	10/15/2019 01:13	WG1362726
p-Isopropyltoluene	U		0.00257	0.00551	1	10/15/2019 01:13	WG1362726
2-Butanone (MEK)	0.0174	B J	0.0138	0.0276	1	10/15/2019 01:13	WG1362726
Methylene Chloride	U		0.00732	0.0276	1	10/15/2019 01:13	WG1362726
4-Methyl-2-pentanone (MIBK)	U		0.0110	0.0276	1	10/15/2019 01:13	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000325	0.00110	1	10/15/2019 01:13	WG1362726
Naphthalene	U		0.00344	0.0138	1	10/15/2019 01:13	WG1362726
n-Propylbenzene	U		0.00130	0.00551	1	10/15/2019 01:13	WG1362726
Styrene	U		0.00301	0.0138	1	10/15/2019 01:13	WG1362726
1,1,1,2-Tetrachloroethane	U		0.000551	0.00276	1	10/15/2019 01:13	WG1362726
1,1,2,2-Tetrachloroethane	U		0.000430	0.00276	1	10/15/2019 01:13	WG1362726
1,1,2-Trichlorotrifluoroethane	U		0.000744	0.00276	1	10/15/2019 01:13	WG1362726
Tetrachloroethene	U		0.000772	0.00276	1	10/15/2019 01:13	WG1362726
Toluene	0.0160		0.00138	0.00551	1	10/15/2019 01:13	WG1362726
1,2,3-Trichlorobenzene	U		0.000689	0.00276	1	10/15/2019 01:13	WG1362726
1,2,4-Trichlorobenzene	U		0.00532	0.0138	1	10/15/2019 01:13	WG1362726
1,1,1-Trichloroethane	U		0.000303	0.00276	1	10/15/2019 01:13	WG1362726
1,1,2-Trichloroethane	U		0.000974	0.00276	1	10/15/2019 01:13	WG1362726
Trichloroethene	U		0.000441	0.00110	1	10/15/2019 01:13	WG1362726
Trichlorofluoromethane	U		0.000551	0.00276	1	10/15/2019 01:13	WG1362726
1,2,3-Trichloropropane	U		0.00562	0.0138	1	10/15/2019 01:13	WG1362726
1,2,4-Trimethylbenzene	U		0.00128	0.00551	1	10/15/2019 01:13	WG1362726
1,2,3-Trimethylbenzene	U		0.00127	0.00551	1	10/15/2019 01:13	WG1362726
1,3,5-Trimethylbenzene	U		0.00119	0.00551	1	10/15/2019 01:13	WG1362726
Vinyl acetate	U	J0	0.00388	0.0138	1	10/15/2019 01:13	WG1362726
Vinyl chloride	U		0.000753	0.00276	1	10/15/2019 01:13	WG1362726
Xylenes, Total	U		0.00527	0.00717	1	10/15/2019 01:13	WG1362726
(S) Toluene-d8	*104*			*75.0-131*		*10/15/2019 01:13*	WG1362726
(S) 4-Bromofluorobenzene	*96.2*			*67.0-138*		*10/15/2019 01:13*	WG1362726
(S) 1,2-Dichloroethane-d4	*93.8*			*70.0-130*		*10/15/2019 01:13*	WG1362726

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	88.1		1	10/12/2019 16:15	WG1361913

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0731	J0	0.0160	0.0293	1.03	10/15/2019 01:35	WG1362726
Acrylonitrile	U		0.00222	0.0146	1.03	10/15/2019 01:35	WG1362726
Benzene	U		0.000467	0.00117	1.03	10/15/2019 01:35	WG1362726
Bromobenzene	U		0.00123	0.0146	1.03	10/15/2019 01:35	WG1362726
Bromodichloromethane	U		0.000921	0.00293	1.03	10/15/2019 01:35	WG1362726
Bromochloromethane	U		0.00132	0.00584	1.03	10/15/2019 01:35	WG1362726
Bromoform	U		0.00699	0.0293	1.03	10/15/2019 01:35	WG1362726
Bromomethane	U		0.00432	0.0146	1.03	10/15/2019 01:35	WG1362726
n-Butylbenzene	U		0.00449	0.0146	1.03	10/15/2019 01:35	WG1362726
sec-Butylbenzene	U		0.00296	0.0146	1.03	10/15/2019 01:35	WG1362726
tert-Butylbenzene	U		0.00182	0.00584	1.03	10/15/2019 01:35	WG1362726
Carbon disulfide	U		0.00474	0.0146	1.03	10/15/2019 01:35	WG1362726
Carbon tetrachloride	U	J0	0.00126	0.00584	1.03	10/15/2019 01:35	WG1362726
Chlorobenzene	U		0.000669	0.00293	1.03	10/15/2019 01:35	WG1362726
Chlorodibromomethane	U		0.000526	0.00293	1.03	10/15/2019 01:35	WG1362726
Chloroethane	U		0.00126	0.00584	1.03	10/15/2019 01:35	WG1362726
Chloroform	U		0.000484	0.00293	1.03	10/15/2019 01:35	WG1362726
Chloromethane	U		0.00162	0.0146	1.03	10/15/2019 01:35	WG1362726
2-Chlorotoluene	U		0.00108	0.00293	1.03	10/15/2019 01:35	WG1362726
4-Chlorotoluene	U		0.00132	0.00584	1.03	10/15/2019 01:35	WG1362726
1,2-Dibromo-3-Chloropropane	U		0.00596	0.0293	1.03	10/15/2019 01:35	WG1362726
1,2-Dibromoethane	U		0.000614	0.00293	1.03	10/15/2019 01:35	WG1362726
Dibromomethane	U		0.00117	0.00584	1.03	10/15/2019 01:35	WG1362726
1,2-Dichlorobenzene	U		0.00169	0.00584	1.03	10/15/2019 01:35	WG1362726
1,3-Dichlorobenzene	U		0.00199	0.00584	1.03	10/15/2019 01:35	WG1362726
1,4-Dichlorobenzene	U		0.00230	0.00584	1.03	10/15/2019 01:35	WG1362726
Dichlorodifluoromethane	U		0.000956	0.00293	1.03	10/15/2019 01:35	WG1362726
1,1-Dichloroethane	U		0.000672	0.00293	1.03	10/15/2019 01:35	WG1362726
1,2-Dichloroethane	U		0.000555	0.00293	1.03	10/15/2019 01:35	WG1362726
1,1-Dichloroethene	U		0.000584	0.00293	1.03	10/15/2019 01:35	WG1362726
cis-1,2-Dichloroethene	U		0.000807	0.00293	1.03	10/15/2019 01:35	WG1362726
trans-1,2-Dichloroethene	U		0.00167	0.00584	1.03	10/15/2019 01:35	WG1362726
1,2-Dichloropropane	U		0.00149	0.00584	1.03	10/15/2019 01:35	WG1362726
1,1-Dichloropropene	U		0.000818	0.00293	1.03	10/15/2019 01:35	WG1362726
1,3-Dichloropropane	U		0.00204	0.00584	1.03	10/15/2019 01:35	WG1362726
cis-1,3-Dichloropropene	U		0.000792	0.00293	1.03	10/15/2019 01:35	WG1362726
trans-1,3-Dichloropropene	U		0.00179	0.00584	1.03	10/15/2019 01:35	WG1362726
trans-1,4-Dichloro-2-butene	U		0.00163	0.00584	1.03	10/15/2019 01:35	WG1362726
2,2-Dichloropropane	U		0.000927	0.00293	1.03	10/15/2019 01:35	WG1362726
Di-isopropyl ether	U		0.000410	0.00117	1.03	10/15/2019 01:35	WG1362726
Ethylbenzene	U		0.000619	0.00293	1.03	10/15/2019 01:35	WG1362726
Hexachloro-1,3-butadiene	U		0.0149	0.0293	1.03	10/15/2019 01:35	WG1362726
2-Hexanone	U		0.0117	0.0293	1.03	10/15/2019 01:35	WG1362726
n-Hexane	0.0315		0.00124	0.00584	1.03	10/15/2019 01:35	WG1362726
Iodomethane	U	J3 J4	0.00707	0.0146	1.03	10/15/2019 01:35	WG1362726
Isopropylbenzene	U		0.00101	0.00293	1.03	10/15/2019 01:35	WG1362726
p-Isopropyltoluene	U		0.00272	0.00584	1.03	10/15/2019 01:35	WG1362726
2-Butanone (MEK)	0.0201	B J	0.0146	0.0293	1.03	10/15/2019 01:35	WG1362726
Methylene Chloride	U		0.00776	0.0293	1.03	10/15/2019 01:35	WG1362726
4-Methyl-2-pentanone (MIBK)	U		0.0117	0.0293	1.03	10/15/2019 01:35	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000345	0.00117	1.03	10/15/2019 01:35	WG1362726
Naphthalene	U		0.00364	0.0146	1.03	10/15/2019 01:35	WG1362726
n-Propylbenzene	U		0.00138	0.00584	1.03	10/15/2019 01:35	WG1362726
Styrene	U		0.00319	0.0146	1.03	10/15/2019 01:35	WG1362726
1,1,1,2-Tetrachloroethane	U		0.000584	0.00293	1.03	10/15/2019 01:35	WG1362726
1,1,2,2-Tetrachloroethane	U		0.000456	0.00293	1.03	10/15/2019 01:35	WG1362726
1,1,2-Trichlorotrifluoroethane	U		0.000788	0.00293	1.03	10/15/2019 01:35	WG1362726
Tetrachloroethene	U		0.000818	0.00293	1.03	10/15/2019 01:35	WG1362726
Toluene	0.0261		0.00146	0.00584	1.03	10/15/2019 01:35	WG1362726
1,2,3-Trichlorobenzene	U		0.000731	0.00293	1.03	10/15/2019 01:35	WG1362726
1,2,4-Trichlorobenzene	U		0.00563	0.0146	1.03	10/15/2019 01:35	WG1362726
1,1,1-Trichloroethane	U		0.000321	0.00293	1.03	10/15/2019 01:35	WG1362726
1,1,2-Trichloroethane	U		0.00103	0.00293	1.03	10/15/2019 01:35	WG1362726
Trichloroethene	U		0.000467	0.00117	1.03	10/15/2019 01:35	WG1362726
Trichlorofluoromethane	U		0.000584	0.00293	1.03	10/15/2019 01:35	WG1362726
1,2,3-Trichloropropane	U		0.00596	0.0146	1.03	10/15/2019 01:35	WG1362726
1,2,4-Trimethylbenzene	0.00186	B J	0.00135	0.00584	1.03	10/15/2019 01:35	WG1362726
1,2,3-Trimethylbenzene	U		0.00134	0.00584	1.03	10/15/2019 01:35	WG1362726
1,3,5-Trimethylbenzene	U		0.00126	0.00584	1.03	10/15/2019 01:35	WG1362726
Vinyl acetate	U	J0	0.00412	0.0146	1.03	10/15/2019 01:35	WG1362726
Vinyl chloride	U		0.000798	0.00293	1.03	10/15/2019 01:35	WG1362726
Xylenes, Total	U		0.00558	0.00760	1.03	10/15/2019 01:35	WG1362726
(S) Toluene-d8	*104*			*75.0-131*		*10/15/2019 01:35*	WG1362726
(S) 4-Bromofluorobenzene	*97.2*			*67.0-138*		*10/15/2019 01:35*	WG1362726
(S) 1,2-Dichloroethane-d4	*93.3*			*70.0-130*		*10/15/2019 01:35*	WG1362726

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	87.3		1	10/12/2019 16:15	WG1361913

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0667	J0	0.0157	0.0286	1	10/15/2019 01:56	WG1362726
Acrylonitrile	U		0.00218	0.0143	1	10/15/2019 01:56	WG1362726
Benzene	0.000836	J	0.000458	0.00115	1	10/15/2019 01:56	WG1362726
Bromobenzene	U		0.00120	0.0143	1	10/15/2019 01:56	WG1362726
Bromodichloromethane	U		0.000903	0.00286	1	10/15/2019 01:56	WG1362726
Bromochloromethane	U		0.00129	0.00573	1	10/15/2019 01:56	WG1362726
Bromoform	U		0.00685	0.0286	1	10/15/2019 01:56	WG1362726
Bromomethane	U		0.00424	0.0143	1	10/15/2019 01:56	WG1362726
n-Butylbenzene	U		0.00440	0.0143	1	10/15/2019 01:56	WG1362726
sec-Butylbenzene	U		0.00290	0.0143	1	10/15/2019 01:56	WG1362726
tert-Butylbenzene	U		0.00178	0.00573	1	10/15/2019 01:56	WG1362726
Carbon disulfide	0.00864	J	0.00465	0.0143	1	10/15/2019 01:56	WG1362726
Carbon tetrachloride	U	J0	0.00124	0.00573	1	10/15/2019 01:56	WG1362726
Chlorobenzene	U		0.000656	0.00286	1	10/15/2019 01:56	WG1362726
Chlorodibromomethane	U		0.000516	0.00286	1	10/15/2019 01:56	WG1362726
Chloroethane	U		0.00124	0.00573	1	10/15/2019 01:56	WG1362726
Chloroform	U		0.000475	0.00286	1	10/15/2019 01:56	WG1362726
Chloromethane	U		0.00159	0.0143	1	10/15/2019 01:56	WG1362726
2-Chlorotoluene	U		0.00105	0.00286	1	10/15/2019 01:56	WG1362726
4-Chlorotoluene	U		0.00129	0.00573	1	10/15/2019 01:56	WG1362726
1,2-Dibromo-3-Chloropropane	U		0.00584	0.0286	1	10/15/2019 01:56	WG1362726
1,2-Dibromoethane	U		0.000601	0.00286	1	10/15/2019 01:56	WG1362726
Dibromomethane	U		0.00115	0.00573	1	10/15/2019 01:56	WG1362726
1,2-Dichlorobenzene	U		0.00166	0.00573	1	10/15/2019 01:56	WG1362726
1,3-Dichlorobenzene	U		0.00195	0.00573	1	10/15/2019 01:56	WG1362726
1,4-Dichlorobenzene	U		0.00226	0.00573	1	10/15/2019 01:56	WG1362726
Dichlorodifluoromethane	U		0.000937	0.00286	1	10/15/2019 01:56	WG1362726
1,1-Dichloroethane	U		0.000659	0.00286	1	10/15/2019 01:56	WG1362726
1,2-Dichloroethane	U		0.000544	0.00286	1	10/15/2019 01:56	WG1362726
1,1-Dichloroethene	U		0.000573	0.00286	1	10/15/2019 01:56	WG1362726
cis-1,2-Dichloroethene	U		0.000790	0.00286	1	10/15/2019 01:56	WG1362726
trans-1,2-Dichloroethene	U		0.00164	0.00573	1	10/15/2019 01:56	WG1362726
1,2-Dichloropropane	U		0.00145	0.00573	1	10/15/2019 01:56	WG1362726
1,1-Dichloropropene	U		0.000802	0.00286	1	10/15/2019 01:56	WG1362726
1,3-Dichloropropane	U		0.00200	0.00573	1	10/15/2019 01:56	WG1362726
cis-1,3-Dichloropropene	U		0.000777	0.00286	1	10/15/2019 01:56	WG1362726
trans-1,3-Dichloropropene	U		0.00175	0.00573	1	10/15/2019 01:56	WG1362726
trans-1,4-Dichloro-2-butene	U		0.00160	0.00573	1	10/15/2019 01:56	WG1362726
2,2-Dichloropropane	U		0.000908	0.00286	1	10/15/2019 01:56	WG1362726
Di-isopropyl ether	U		0.000401	0.00115	1	10/15/2019 01:56	WG1362726
Ethylbenzene	0.000962	J	0.000607	0.00286	1	10/15/2019 01:56	WG1362726
Hexachloro-1,3-butadiene	U		0.0145	0.0286	1	10/15/2019 01:56	WG1362726
2-Hexanone	U		0.0115	0.0286	1	10/15/2019 01:56	WG1362726
n-Hexane	U		0.00121	0.00573	1	10/15/2019 01:56	WG1362726
Iodomethane	U	J3 J4	0.00693	0.0143	1	10/15/2019 01:56	WG1362726
Isopropylbenzene	U		0.000989	0.00286	1	10/15/2019 01:56	WG1362726
p-Isopropyltoluene	U		0.00267	0.00573	1	10/15/2019 01:56	WG1362726
2-Butanone (MEK)	0.0314	B	0.0143	0.0286	1	10/15/2019 01:56	WG1362726
Methylene Chloride	U		0.00761	0.0286	1	10/15/2019 01:56	WG1362726
4-Methyl-2-pentanone (MIBK)	U		0.0115	0.0286	1	10/15/2019 01:56	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000338	0.00115	1	10/15/2019 01:56	WG1362726
Naphthalene	U		0.00357	0.0143	1	10/15/2019 01:56	WG1362726
n-Propylbenzene	U		0.00135	0.00573	1	10/15/2019 01:56	WG1362726
Styrene	U		0.00313	0.0143	1	10/15/2019 01:56	WG1362726
1,1,1,2-Tetrachloroethane	U		0.000573	0.00286	1	10/15/2019 01:56	WG1362726
1,1,2,2-Tetrachloroethane	U		0.000447	0.00286	1	10/15/2019 01:56	WG1362726
1,1,2-Trichlorotrifluoroethane	U		0.000773	0.00286	1	10/15/2019 01:56	WG1362726
Tetrachloroethene	U		0.000802	0.00286	1	10/15/2019 01:56	WG1362726
Toluene	0.0293		0.00143	0.00573	1	10/15/2019 01:56	WG1362726
1,2,3-Trichlorobenzene	U		0.000716	0.00286	1	10/15/2019 01:56	WG1362726
1,2,4-Trichlorobenzene	U		0.00552	0.0143	1	10/15/2019 01:56	WG1362726
1,1,1-Trichloroethane	U		0.000315	0.00286	1	10/15/2019 01:56	WG1362726
1,1,2-Trichloroethane	U		0.00101	0.00286	1	10/15/2019 01:56	WG1362726
Trichloroethene	U		0.000458	0.00115	1	10/15/2019 01:56	WG1362726
Trichlorofluoromethane	U		0.000573	0.00286	1	10/15/2019 01:56	WG1362726
1,2,3-Trichloropropane	U		0.00584	0.0143	1	10/15/2019 01:56	WG1362726
1,2,4-Trimethylbenzene	0.00182	B J	0.00133	0.00573	1	10/15/2019 01:56	WG1362726
1,2,3-Trimethylbenzene	U		0.00132	0.00573	1	10/15/2019 01:56	WG1362726
1,3,5-Trimethylbenzene	U		0.00124	0.00573	1	10/15/2019 01:56	WG1362726
Vinyl acetate	U	J0	0.00403	0.0143	1	10/15/2019 01:56	WG1362726
Vinyl chloride	U		0.000782	0.00286	1	10/15/2019 01:56	WG1362726
Xylenes, Total	U		0.00548	0.00745	1	10/15/2019 01:56	WG1362726
(S) Toluene-d8	*105*			*75.0-131*		*10/15/2019 01:56*	WG1362726
(S) 4-Bromofluorobenzene	*96.1*			*67.0-138*		*10/15/2019 01:56*	WG1362726
(S) 1,2-Dichloroethane-d4	*92.3*			*70.0-130*		*10/15/2019 01:56*	WG1362726

Total Solids by Method 2540 G-2011

Analyte	Result	Qualifier	Dilution	Analysis	Batch
	%			date / time	
Total Solids	92.6		1	10/12/2019 16:15	WG1361913

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry)	Qualifier	MDL (dry)	RDL (dry)	Dilution	Analysis	Batch
	mg/kg		mg/kg	mg/kg		date / time	
Acetone	0.0650	J0	0.0148	0.0270	1	10/15/2019 02:18	WG1362726
Acrylonitrile	U		0.00205	0.0135	1	10/15/2019 02:18	WG1362726
Benzene	0.000722	J	0.000432	0.00108	1	10/15/2019 02:18	WG1362726
Bromobenzene	U		0.00113	0.0135	1	10/15/2019 02:18	WG1362726
Bromodichloromethane	U		0.000851	0.00270	1	10/15/2019 02:18	WG1362726
Bromochloromethane	U		0.00122	0.00540	1	10/15/2019 02:18	WG1362726
Bromoform	U		0.00646	0.0270	1	10/15/2019 02:18	WG1362726
Bromomethane	U		0.00400	0.0135	1	10/15/2019 02:18	WG1362726
n-Butylbenzene	U		0.00415	0.0135	1	10/15/2019 02:18	WG1362726
sec-Butylbenzene	U		0.00273	0.0135	1	10/15/2019 02:18	WG1362726
tert-Butylbenzene	U		0.00167	0.00540	1	10/15/2019 02:18	WG1362726
Carbon disulfide	U		0.00439	0.0135	1	10/15/2019 02:18	WG1362726
Carbon tetrachloride	U	J0	0.00117	0.00540	1	10/15/2019 02:18	WG1362726
Chlorobenzene	U		0.000619	0.00270	1	10/15/2019 02:18	WG1362726
Chlorodibromomethane	U		0.000486	0.00270	1	10/15/2019 02:18	WG1362726
Chloroethane	U		0.00117	0.00540	1	10/15/2019 02:18	WG1362726
Chloroform	U		0.000448	0.00270	1	10/15/2019 02:18	WG1362726
Chloromethane	U		0.00150	0.0135	1	10/15/2019 02:18	WG1362726
2-Chlorotoluene	U		0.000994	0.00270	1	10/15/2019 02:18	WG1362726
4-Chlorotoluene	U		0.00122	0.00540	1	10/15/2019 02:18	WG1362726
1,2-Dibromo-3-Chloropropane	U		0.00551	0.0270	1	10/15/2019 02:18	WG1362726
1,2-Dibromoethane	U		0.000567	0.00270	1	10/15/2019 02:18	WG1362726
Dibromomethane	U		0.00108	0.00540	1	10/15/2019 02:18	WG1362726
1,2-Dichlorobenzene	U		0.00157	0.00540	1	10/15/2019 02:18	WG1362726
1,3-Dichlorobenzene	U		0.00184	0.00540	1	10/15/2019 02:18	WG1362726
1,4-Dichlorobenzene	U		0.00213	0.00540	1	10/15/2019 02:18	WG1362726
Dichlorodifluoromethane	U		0.000884	0.00270	1	10/15/2019 02:18	WG1362726
1,1-Dichloroethane	U		0.000621	0.00270	1	10/15/2019 02:18	WG1362726
1,2-Dichloroethane	U		0.000513	0.00270	1	10/15/2019 02:18	WG1362726
1,1-Dichloroethene	U		0.000540	0.00270	1	10/15/2019 02:18	WG1362726
cis-1,2-Dichloroethene	U		0.000745	0.00270	1	10/15/2019 02:18	WG1362726
trans-1,2-Dichloroethene	U		0.00154	0.00540	1	10/15/2019 02:18	WG1362726
1,2-Dichloropropane	U		0.00137	0.00540	1	10/15/2019 02:18	WG1362726
1,1-Dichloropropene	U		0.000756	0.00270	1	10/15/2019 02:18	WG1362726
1,3-Dichloropropane	U		0.00189	0.00540	1	10/15/2019 02:18	WG1362726
cis-1,3-Dichloropropene	U		0.000732	0.00270	1	10/15/2019 02:18	WG1362726
trans-1,3-Dichloropropene	U		0.00165	0.00540	1	10/15/2019 02:18	WG1362726
trans-1,4-Dichloro-2-butene	U		0.00151	0.00540	1	10/15/2019 02:18	WG1362726
2,2-Dichloropropane	U		0.000857	0.00270	1	10/15/2019 02:18	WG1362726
Di-isopropyl ether	U		0.000378	0.00108	1	10/15/2019 02:18	WG1362726
Ethylbenzene	0.000584	J	0.000573	0.00270	1	10/15/2019 02:18	WG1362726
Hexachloro-1,3-butadiene	U		0.0137	0.0270	1	10/15/2019 02:18	WG1362726
2-Hexanone	U		0.0108	0.0270	1	10/15/2019 02:18	WG1362726
n-Hexane	U		0.00115	0.00540	1	10/15/2019 02:18	WG1362726
Iodomethane	U	J3 J4	0.00654	0.0135	1	10/15/2019 02:18	WG1362726
Isopropylbenzene	U		0.000932	0.00270	1	10/15/2019 02:18	WG1362726
p-Isopropyltoluene	U		0.00252	0.00540	1	10/15/2019 02:18	WG1362726
2-Butanone (MEK)	0.0274	B	0.0135	0.0270	1	10/15/2019 02:18	WG1362726
Methylene Chloride	U		0.00717	0.0270	1	10/15/2019 02:18	WG1362726
4-Methyl-2-pentanone (MIBK)	U		0.0108	0.0270	1	10/15/2019 02:18	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result (dry) mg/kg	Qualifier	MDL (dry) mg/kg	RDL (dry) mg/kg	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000319	0.00108	1	10/15/2019 02:18	WG1362726
Naphthalene	U		0.00337	0.0135	1	10/15/2019 02:18	WG1362726
n-Propylbenzene	U		0.00127	0.00540	1	10/15/2019 02:18	WG1362726
Styrene	U		0.00295	0.0135	1	10/15/2019 02:18	WG1362726
1,1,1,2-Tetrachloroethane	U		0.000540	0.00270	1	10/15/2019 02:18	WG1362726
1,1,2,2-Tetrachloroethane	U		0.000421	0.00270	1	10/15/2019 02:18	WG1362726
1,1,2-Trichlorotrifluoroethane	U		0.000729	0.00270	1	10/15/2019 02:18	WG1362726
Tetrachloroethene	U		0.000756	0.00270	1	10/15/2019 02:18	WG1362726
Toluene	0.0113		0.00135	0.00540	1	10/15/2019 02:18	WG1362726
1,2,3-Trichlorobenzene	U		0.000675	0.00270	1	10/15/2019 02:18	WG1362726
1,2,4-Trichlorobenzene	U		0.00521	0.0135	1	10/15/2019 02:18	WG1362726
1,1,1-Trichloroethane	U		0.000297	0.00270	1	10/15/2019 02:18	WG1362726
1,1,2-Trichloroethane	U		0.000954	0.00270	1	10/15/2019 02:18	WG1362726
Trichloroethene	U		0.000432	0.00108	1	10/15/2019 02:18	WG1362726
Trichlorofluoromethane	U		0.000540	0.00270	1	10/15/2019 02:18	WG1362726
1,2,3-Trichloropropane	U		0.00551	0.0135	1	10/15/2019 02:18	WG1362726
1,2,4-Trimethylbenzene	0.00144	B J	0.00125	0.00540	1	10/15/2019 02:18	WG1362726
1,2,3-Trimethylbenzene	U		0.00124	0.00540	1	10/15/2019 02:18	WG1362726
1,3,5-Trimethylbenzene	U		0.00117	0.00540	1	10/15/2019 02:18	WG1362726
Vinyl acetate	U	J0	0.00380	0.0135	1	10/15/2019 02:18	WG1362726
Vinyl chloride	U		0.000738	0.00270	1	10/15/2019 02:18	WG1362726
Xylenes, Total	U		0.00516	0.00702	1	10/15/2019 02:18	WG1362726
(S) Toluene-d8	*105*			*75.0-131*		*10/15/2019 02:18*	WG1362726
(S) 4-Bromofluorobenzene	*97.6*			*67.0-138*		*10/15/2019 02:18*	WG1362726
(S) 1,2-Dichloroethane-d4	*93.5*			*70.0-130*		*10/15/2019 02:18*	WG1362726

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.14	J	1.05	25.0	1	10/17/2019 13:00	WG1364657
Acrylonitrile	U		0.873	5.00	1	10/17/2019 13:00	WG1364657
Benzene	U		0.0896	0.500	1	10/17/2019 13:00	WG1364657
Bromobenzene	U		0.133	0.500	1	10/17/2019 13:00	WG1364657
Bromodichloromethane	U		0.0800	0.500	1	10/17/2019 13:00	WG1364657
Bromochloromethane	U		0.145	0.500	1	10/17/2019 13:00	WG1364657
Bromoform	U		0.186	0.500	1	10/17/2019 13:00	WG1364657
Bromomethane	U		0.157	2.50	1	10/17/2019 13:00	WG1364657
n-Butylbenzene	U		0.143	0.500	1	10/17/2019 13:00	WG1364657
sec-Butylbenzene	U		0.134	0.500	1	10/17/2019 13:00	WG1364657
tert-Butylbenzene	U		0.183	0.500	1	10/17/2019 13:00	WG1364657
Carbon disulfide	U		0.101	0.500	1	10/17/2019 13:00	WG1364657
Carbon tetrachloride	U		0.159	0.500	1	10/17/2019 13:00	WG1364657
Chlorobenzene	U		0.140	0.500	1	10/17/2019 13:00	WG1364657
Chlorodibromomethane	U		0.128	0.500	1	10/17/2019 13:00	WG1364657
Chloroethane	U		0.141	2.50	1	10/17/2019 13:00	WG1364657
Chloroform	U		0.0860	0.500	1	10/17/2019 13:00	WG1364657
Chloromethane	U		0.153	1.25	1	10/17/2019 13:00	WG1364657
2-Chlorotoluene	U		0.111	0.500	1	10/17/2019 13:00	WG1364657
4-Chlorotoluene	U		0.0972	0.500	1	10/17/2019 13:00	WG1364657
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/17/2019 13:00	WG1364657
1,2-Dibromoethane	U		0.193	0.500	1	10/17/2019 13:00	WG1364657
Dibromomethane	U		0.117	0.500	1	10/17/2019 13:00	WG1364657
1,2-Dichlorobenzene	U		0.101	0.500	1	10/17/2019 13:00	WG1364657
1,3-Dichlorobenzene	U		0.130	0.500	1	10/17/2019 13:00	WG1364657
1,4-Dichlorobenzene	U		0.121	0.500	1	10/17/2019 13:00	WG1364657
Dichlorodifluoromethane	U		0.127	2.50	1	10/17/2019 13:00	WG1364657
1,1-Dichloroethane	U		0.114	0.500	1	10/17/2019 13:00	WG1364657
1,2-Dichloroethane	U		0.108	0.500	1	10/17/2019 13:00	WG1364657
1,1-Dichloroethene	U		0.188	0.500	1	10/17/2019 13:00	WG1364657
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/17/2019 13:00	WG1364657
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/17/2019 13:00	WG1364657
1,2-Dichloropropane	U		0.190	0.500	1	10/17/2019 13:00	WG1364657
1,1-Dichloropropene	U		0.128	0.500	1	10/17/2019 13:00	WG1364657
1,3-Dichloropropane	U		0.147	1.00	1	10/17/2019 13:00	WG1364657
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/17/2019 13:00	WG1364657
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/17/2019 13:00	WG1364657
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/17/2019 13:00	WG1364657
2,2-Dichloropropane	U		0.0929	0.500	1	10/17/2019 13:00	WG1364657
Di-isopropyl ether	U		0.0924	0.500	1	10/17/2019 13:00	WG1364657
Ethylbenzene	U		0.158	0.500	1	10/17/2019 13:00	WG1364657
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/17/2019 13:00	WG1364657
2-Hexanone	U		0.757	5.00	1	10/17/2019 13:00	WG1364657
n-Hexane	U		0.305	5.00	1	10/17/2019 13:00	WG1364657
Iodomethane	U		0.377	10.0	1	10/17/2019 13:00	WG1364657
Isopropylbenzene	U		0.126	0.500	1	10/17/2019 13:00	WG1364657
p-Isopropyltoluene	U		0.138	0.500	1	10/17/2019 13:00	WG1364657
2-Butanone (MEK)	U		1.28	5.00	1	10/17/2019 13:00	WG1364657
Methylene Chloride	U		1.07	2.50	1	10/17/2019 13:00	WG1364657
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/17/2019 13:00	WG1364657
Methyl tert-butyl ether	U		0.102	0.500	1	10/17/2019 13:00	WG1364657
Naphthalene	U		0.174	2.50	1	10/17/2019 13:00	WG1364657
n-Propylbenzene	U		0.162	0.500	1	10/17/2019 13:00	WG1364657
Styrene	U		0.117	0.500	1	10/17/2019 13:00	WG1364657
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/17/2019 13:00	WG1364657
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/17/2019 13:00	WG1364657

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/17/2019 13:00	WG1364657
Tetrachloroethene	U		0.199	0.500	1	10/17/2019 13:00	WG1364657
Toluene	U		0.412	0.500	1	10/17/2019 13:00	WG1364657
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/17/2019 13:00	WG1364657
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/17/2019 13:00	WG1364657
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/17/2019 13:00	WG1364657
1,1,2-Trichloroethane	U		0.186	0.500	1	10/17/2019 13:00	WG1364657
Trichloroethene	U		0.153	0.500	1	10/17/2019 13:00	WG1364657
Trichlorofluoromethane	U		0.130	2.50	1	10/17/2019 13:00	WG1364657
1,2,3-Trichloropropane	U		0.247	2.50	1	10/17/2019 13:00	WG1364657
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/17/2019 13:00	WG1364657
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/17/2019 13:00	WG1364657
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/17/2019 13:00	WG1364657
Vinyl acetate	U		0.645	5.00	1	10/17/2019 13:00	WG1364657
Vinyl chloride	U		0.118	0.500	1	10/17/2019 13:00	WG1364657
Xylenes, Total	U		0.316	1.50	1	10/17/2019 13:00	WG1364657
(S) Toluene-d8	*113*			*80.0-120*		*10/17/2019 13:00*	WG1364657
(S) 4-Bromofluorobenzene	*110*			*77.0-126*		*10/17/2019 13:00*	WG1364657
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*		*10/17/2019 13:00*	WG1364657

Method Blank (MB)

(MB) R3460841-1 10/12/19 17:05

Analyte	MB Result %	MB Qualifier	MB MDL %	MB RDL %
Total Solids	0.00200			

L1147028-08 Original Sample (OS) • Duplicate (DUP)

(OS) L1147028-08 10/12/19 17:05 • (DUP) R3460841-3 10/12/19 17:05

Analyte	Original Result %	DUP Result %	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Total Solids	54.0	51.7	1	4.36		10

Laboratory Control Sample (LCS)

(LCS) R3460841-2 10/12/19 17:05

Analyte	Spike Amount %	LCS Result %	LCS Rec. %	Rec. Limits %	LCS Qualifier
Total Solids	50.0	50.0	100	85.0-115	

Method Blank (MB)

(MB) R3460839-1 10/12/19 16:51

Analyte	MB Result %	MB Qualifier	MB MDL %	MB RDL %
Total Solids	0.000			

L1147037-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1147037-04 10/12/19 16:51 • (DUP) R3460839-3 10/12/19 16:51

Analyte	Original Result %	DUP Result %	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Total Solids	93.5	93.2	1	0.372		10

Laboratory Control Sample (LCS)

(LCS) R3460839-2 10/12/19 16:51

Analyte	Spike Amount %	LCS Result %	LCS Rec. %	Rec. Limits %	LCS Qualifier
Total Solids	50.0	50.0	100	85.0-115	

Method Blank (MB)

(MB) R3460830-1 10/12/19 16:15

Analyte	MB Result %	MB Qualifier	MB MDL %	MB RDL %
Total Solids	0.00100			

L1147037-14 Original Sample (OS) • Duplicate (DUP)

(OS) L1147037-14 10/12/19 16:15 • (DUP) R3460830-3 10/12/19 16:15

Analyte	Original Result %	DUP Result %	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Total Solids	90.8	91.2	1	0.463		10

Laboratory Control Sample (LCS)

(LCS) R3460830-2 10/12/19 16:15

Analyte	Spike Amount %	LCS Result %	LCS Rec. %	Rec. Limits %	LCS Qualifier
Total Solids	50.0	50.0	100	85.0-115	

Method Blank (MB)

(MB) R3460810-2 10/12/19 10:13

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Acetone	U		0.0137	0.0250
Acrylonitrile	U		0.00190	0.0125
Benzene	U		0.000400	0.00100
Bromobenzene	U		0.00105	0.0125
Bromodichloromethane	U		0.000788	0.00250
Bromochloromethane	U		0.00113	0.00500
Bromoform	U		0.00598	0.0250
Bromomethane	U		0.00370	0.0125
n-Butylbenzene	U		0.00384	0.0125
sec-Butylbenzene	U		0.00253	0.0125
tert-Butylbenzene	U		0.00155	0.00500
Carbon disulfide	U		0.00406	0.0125
Carbon tetrachloride	U		0.00108	0.00500
Chlorobenzene	U		0.000573	0.00250
Chlorodibromomethane	U		0.000450	0.00250
Chloroethane	U		0.00108	0.00500
Chloroform	0.00137	J	0.000415	0.00250
Chloromethane	U		0.00139	0.0125
2-Chlorotoluene	U		0.000920	0.00250
4-Chlorotoluene	U		0.00113	0.00500
1,2-Dibromo-3-Chloropropane	U		0.00510	0.0250
1,2-Dibromoethane	U		0.000525	0.00250
Dibromomethane	U		0.00100	0.00500
1,2-Dichlorobenzene	U		0.00145	0.00500
1,3-Dichlorobenzene	U		0.00170	0.00500
1,4-Dichlorobenzene	U		0.00197	0.00500
trans-1,4-Dichloro-2-butene	U		0.00140	0.00500
Dichlorodifluoromethane	U		0.000818	0.00250
1,1-Dichloroethane	U		0.000575	0.00250
1,2-Dichloroethane	U		0.000475	0.00250
1,1-Dichloroethene	U		0.000500	0.00250
cis-1,2-Dichloroethene	U		0.000690	0.00250
trans-1,2-Dichloroethene	0.00205	J	0.00143	0.00500
1,2-Dichloropropane	U		0.00127	0.00500
1,1-Dichloropropene	U		0.000700	0.00250
1,3-Dichloropropane	U		0.00175	0.00500
cis-1,3-Dichloropropene	U		0.000678	0.00250
trans-1,3-Dichloropropene	U		0.00153	0.00500
2,2-Dichloropropane	U		0.000793	0.00250
Di-isopropyl ether	U		0.000350	0.00100

Method Blank (MB)

(MB) R3460810-2 10/12/19 10:13

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Ethylbenzene	U		0.000530	0.00250
Hexachloro-1,3-butadiene	U		0.0127	0.0250
n-Hexane	U		0.00106	0.00500
2-Hexanone	U		0.0100	0.0250
Iodomethane	U		0.00605	0.0125
Isopropylbenzene	U		0.000863	0.00250
p-Isopropyltoluene	U		0.00233	0.00500
2-Butanone (MEK)	0.0195	J	0.0125	0.0250
Methylene Chloride	0.00830	J	0.00664	0.0250
4-Methyl-2-pentanone (MIBK)	U		0.0100	0.0250
Methyl tert-butyl ether	U		0.000295	0.00100
Naphthalene	U		0.00312	0.0125
n-Propylbenzene	U		0.00118	0.00500
Styrene	U		0.00273	0.0125
1,1,1,2-Tetrachloroethane	U		0.000500	0.00250
1,1,2,2-Tetrachloroethane	U		0.000390	0.00250
Tetrachloroethene	U		0.000700	0.00250
Toluene	U		0.00125	0.00500
1,1,2-Trichlorotrifluoroethane	U		0.000675	0.00250
1,2,3-Trichlorobenzene	U		0.000625	0.00250
1,2,4-Trichlorobenzene	U		0.00482	0.0125
1,1,1-Trichloroethane	U		0.000275	0.00250
1,1,2-Trichloroethane	U		0.000883	0.00250
Trichloroethene	U		0.000400	0.00100
Trichlorofluoromethane	U		0.000500	0.00250
1,2,3-Trichloropropane	U		0.00510	0.0125
1,2,3-Trimethylbenzene	U		0.00115	0.00500
1,2,4-Trimethylbenzene	U		0.00116	0.00500
1,3,5-Trimethylbenzene	U		0.00108	0.00500
Vinyl acetate	U		0.00352	0.0125
Vinyl chloride	U		0.000683	0.00250
Xylenes, Total	U		0.00478	0.00650
(S) Toluene-d8	*105*			*75.0-131*
(S) 4-Bromofluorobenzene	*99.6*			*67.0-138*
(S) 1,2-Dichloroethane-d4	*99.2*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3460810-1 10/12/19 07:52

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.625	0.696	111	10.0-160	
Acrylonitrile	0.625	0.672	108	45.0-153	
Benzene	0.125	0.122	97.6	70.0-123	
Bromobenzene	0.125	0.122	97.6	73.0-121	
Bromodichloromethane	0.125	0.128	102	73.0-121	
Bromochloromethane	0.125	0.132	106	77.0-128	
Bromoform	0.125	0.125	100	64.0-132	
Bromomethane	0.125	0.130	104	56.0-147	
n-Butylbenzene	0.125	0.121	96.8	68.0-135	
sec-Butylbenzene	0.125	0.125	100	74.0-130	
tert-Butylbenzene	0.125	0.128	102	75.0-127	
Carbon disulfide	0.125	0.129	103	56.0-133	
Carbon tetrachloride	0.125	0.135	108	66.0-128	
Chlorobenzene	0.125	0.125	100	76.0-128	
Chlorodibromomethane	0.125	0.112	89.6	74.0-127	
Chloroethane	0.125	0.127	102	61.0-134	
Chloroform	0.125	0.126	101	72.0-123	
Chloromethane	0.125	0.142	114	51.0-138	
2-Chlorotoluene	0.125	0.120	96.0	75.0-124	
4-Chlorotoluene	0.125	0.122	97.6	75.0-124	
1,2-Dibromo-3-Chloropropane	0.125	0.114	91.2	59.0-130	
1,2-Dibromoethane	0.125	0.124	99.2	74.0-128	
Dibromomethane	0.125	0.134	107	75.0-122	
1,2-Dichlorobenzene	0.125	0.120	96.0	76.0-124	
1,3-Dichlorobenzene	0.125	0.122	97.6	76.0-125	
1,4-Dichlorobenzene	0.125	0.121	96.8	77.0-121	
trans-1,4-Dichloro-2-butene	0.125	0.122	97.6	45.0-143	
Dichlorodifluoromethane	0.125	0.153	122	43.0-156	
1,1-Dichloroethane	0.125	0.134	107	70.0-127	
1,2-Dichloroethane	0.125	0.123	98.4	65.0-131	
1,1-Dichloroethene	0.125	0.132	106	65.0-131	
cis-1,2-Dichloroethene	0.125	0.129	103	73.0-125	
trans-1,2-Dichloroethene	0.125	0.129	103	71.0-125	
1,2-Dichloropropane	0.125	0.126	101	74.0-125	
1,1-Dichloropropene	0.125	0.134	107	73.0-125	
1,3-Dichloropropane	0.125	0.122	97.6	80.0-125	
cis-1,3-Dichloropropene	0.125	0.128	102	76.0-127	
trans-1,3-Dichloropropene	0.125	0.125	100	73.0-127	
2,2-Dichloropropane	0.125	0.141	113	59.0-135	
Di-isopropyl ether	0.125	0.131	105	60.0-136	

Laboratory Control Sample (LCS)

(LCS) R3460810-1 10/12/19 07:52

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	0.125	0.125	100	74.0-126	
Hexachloro-1,3-butadiene	0.125	0.128	102	57.0-150	
2-Hexanone	0.625	0.665	106	54.0-147	
n-Hexane	0.125	0.140	112	55.0-137	
Iodomethane	0.625	0.671	107	74.0-134	
Isopropylbenzene	0.125	0.128	102	72.0-127	
p-Isopropyltoluene	0.125	0.128	102	72.0-133	
2-Butanone (MEK)	0.625	0.680	109	30.0-160	
Methylene Chloride	0.125	0.123	98.4	68.0-123	
4-Methyl-2-pentanone (MIBK)	0.625	0.657	105	56.0-143	
Methyl tert-butyl ether	0.125	0.129	103	66.0-132	
Naphthalene	0.125	0.105	84.0	59.0-130	
n-Propylbenzene	0.125	0.123	98.4	74.0-126	
Styrene	0.125	0.126	101	72.0-127	
1,1,1,2-Tetrachloroethane	0.125	0.128	102	74.0-129	
1,1,2,2-Tetrachloroethane	0.125	0.122	97.6	68.0-128	
Tetrachloroethene	0.125	0.131	105	70.0-136	
Toluene	0.125	0.126	101	75.0-121	
1,1,2-Trichlorotrifluoroethane	0.125	0.130	104	61.0-139	
1,2,3-Trichlorobenzene	0.125	0.117	93.6	59.0-139	
1,2,4-Trichlorobenzene	0.125	0.115	92.0	62.0-137	
1,1,1-Trichloroethane	0.125	0.136	109	69.0-126	
1,1,2-Trichloroethane	0.125	0.120	96.0	78.0-123	
Trichloroethene	0.125	0.134	107	76.0-126	
Trichlorofluoromethane	0.125	0.147	118	61.0-142	
1,2,3-Trichloropropane	0.125	0.122	97.6	67.0-129	
1,2,3-Trimethylbenzene	0.125	0.121	96.8	74.0-124	
1,2,4-Trimethylbenzene	0.125	0.117	93.6	70.0-126	
1,3,5-Trimethylbenzene	0.125	0.121	96.8	73.0-127	
Vinyl acetate	0.625	0.752	120	43.0-159	
Vinyl chloride	0.125	0.137	110	63.0-134	
Xylenes, Total	0.375	0.381	102	72.0-127	
(S) Toluene-d8			*103*	*75.0-131*	
(S) 4-Bromofluorobenzene			*104*	*67.0-138*	
(S) 1,2-Dichloroethane-d4			*103*	*70.0-130*	

L1147028-08 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1147028-08 10/12/19 17:24 • (MS) R3460810-3 10/12/19 17:45 • (MSD) R3460810-4 10/12/19 18:06

Analyte	Spike Amount (dry) mg/kg	Original Result (dry) mg/kg	MS Result (dry) mg/kg	MSD Result (dry) mg/kg	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Acetone	9.44	0.361	13.1	13.9	135	144	8.16	10.0-160			6.17	40
Acrylonitrile	9.44	U	11.2	11.2	119	119	8.16	10.0-160			0.165	40
Benzene	1.89	U	1.02	1.18	53.8	62.6	8.16	10.0-149			15.2	37
Bromobenzene	1.89	U	1.16	1.30	61.4	69.0	8.16	10.0-156			11.7	38
Bromodichloromethane	1.89	U	1.31	1.42	69.4	75.0	8.16	10.0-143			7.74	37
Bromochloromethane	1.89	U	1.50	1.54	79.6	81.7	8.16	10.0-155			2.55	33
Bromoform	1.89	U	1.68	1.78	88.9	94.2	8.16	10.0-146			5.78	36
Bromomethane	1.89	U	0.831	0.968	44.0	51.3	8.16	10.0-149			15.2	38
n-Butylbenzene	1.89	0.154	1.31	1.54	61.1	73.2	8.16	10.0-160			16.1	40
sec-Butylbenzene	1.89	0.119	1.19	1.40	56.6	67.7	8.16	10.0-159			16.2	39
tert-Butylbenzene	1.89	U	1.11	1.30	58.6	68.8	8.16	10.0-156			16.0	39
Carbon disulfide	1.89	U	0.863	1.07	45.7	56.5	8.16	10.0-145			21.1	39
Carbon tetrachloride	1.89	U	0.937	1.18	49.6	62.6	8.16	10.0-145			23.2	37
Chlorobenzene	1.89	U	1.22	1.32	64.4	69.9	8.16	10.0-152			8.18	39
Chlorodibromomethane	1.89	U	1.37	1.37	72.6	72.6	8.16	10.0-146			0.000	37
Chloroethane	1.89	U	0.870	1.03	46.1	54.4	8.16	10.0-146			16.6	40
Chloroform	1.89	0.00685	1.11	1.29	58.3	68.2	8.16	10.0-146			15.6	37
Chloromethane	1.89	U	0.952	1.15	50.4	61.1	8.16	10.0-159			19.2	37
2-Chlorotoluene	1.89	U	1.06	1.27	56.0	67.5	8.16	10.0-159			18.6	38
4-Chlorotoluene	1.89	U	1.11	1.29	58.8	68.4	8.16	10.0-155			15.1	39
1,2-Dibromo-3-Chloropropane	1.89	U	1.94	1.98	103	105	8.16	10.0-151			1.89	39
1,2-Dibromoethane	1.89	U	1.65	1.74	87.5	92.2	8.16	10.0-148			5.24	34
Dibromomethane	1.89	U	1.73	1.75	91.4	92.6	8.16	10.0-147			1.39	35
1,2-Dichlorobenzene	1.89	U	1.44	1.53	76.4	81.0	8.16	10.0-155			5.86	37
1,3-Dichlorobenzene	1.89	U	1.23	1.36	65.3	72.3	8.16	10.0-153			10.1	38
1,4-Dichlorobenzene	1.89	U	1.27	1.44	67.5	76.3	8.16	10.0-151			12.3	38
trans-1,4-Dichloro-2-butene	1.89	0.365	1.93	1.98	82.6	85.6	8.16	10.0-152			2.84	36
Dichlorodifluoromethane	1.89	U	0.922	1.15	48.8	60.8	8.16	10.0-160			21.8	35
1,1-Dichloroethane	1.89	U	1.07	1.29	56.7	68.3	8.16	10.0-147			18.7	37
1,2-Dichloroethane	1.89	U	1.51	1.55	79.7	82.2	8.16	10.0-148			3.03	35
1,1-Dichloroethene	1.89	U	0.928	1.13	49.1	59.7	8.16	10.0-155			19.5	37
cis-1,2-Dichloroethene	1.89	U	1.15	1.28	60.8	68.0	8.16	10.0-149			11.3	37
trans-1,2-Dichloroethene	1.89	U	0.942	1.06	49.9	56.3	8.16	10.0-150			12.0	37
1,2-Dichloropropane	1.89	U	1.23	1.38	65.1	72.8	8.16	10.0-148			11.2	37
1,1-Dichloropropene	1.89	U	0.933	1.12	49.4	59.5	8.16	10.0-153			18.5	35
1,3-Dichloropropane	1.89	U	1.56	1.61	82.4	85.5	8.16	10.0-154			3.74	35
cis-1,3-Dichloropropene	1.89	U	1.38	1.50	73.0	79.4	8.16	10.0-151			8.36	37
trans-1,3-Dichloropropene	1.89	U	1.51	1.57	80.0	83.2	8.16	10.0-148			3.96	37
2,2-Dichloropropane	1.89	U	0.970	1.20	51.4	63.4	8.16	10.0-138			21.0	36

L1147028-08 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1147028-08 10/12/19 17:24 • (MS) R3460810-3 10/12/19 17:45 • (MSD) R3460810-4 10/12/19 18:06

Analyte	Spike Amount (dry) mg/kg	Original Result (dry) mg/kg	MS Result (dry) mg/kg	MSD Result (dry) mg/kg	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Di-isopropyl ether	1.89	U	1.41	1.57	74.9	82.9	8.16	10.0-147			10.2	36
Ethylbenzene	1.89	U	1.06	1.23	56.4	65.2	8.16	10.0-160			14.5	38
Hexachloro-1,3-butadiene	1.89	U	1.45	1.68	77.0	89.2	8.16	10.0-160			14.7	40
2-Hexanone	9.44	U	11.5	11.5	121	121	8.16	10.0-160			0.000	36
n-Hexane	1.89	U	1.21	1.38	63.8	73.3	8.16	10.0-157			13.9	37
Iodomethane	9.44	U	5.33	6.24	56.5	66.1	8.16	10.0-160			15.7	38
Isopropylbenzene	1.89	U	1.07	1.24	56.9	65.9	8.16	10.0-155			14.7	38
p-Isopropyltoluene	1.89	U	1.15	1.37	61.0	72.5	8.16	10.0-160			17.3	40
2-Butanone (MEK)	9.44	0.211	12.6	12.7	131	132	8.16	10.0-160			1.03	40
Methylene Chloride	1.89	U	1.26	1.39	66.5	73.4	8.16	10.0-141			9.95	37
4-Methyl-2-pentanone (MIBK)	9.44	U	11.1	11.1	117	117	8.16	10.0-160			0.000	35
Methyl tert-butyl ether	1.89	U	1.79	1.74	94.8	92.3	8.16	11.0-147			2.73	35
Naphthalene	1.89	0.396	2.54	2.74	113	124	8.16	10.0-160			7.72	36
n-Propylbenzene	1.89	U	1.02	1.22	53.9	64.5	8.16	10.0-158			17.9	38
Styrene	1.89	U	1.27	1.38	67.2	73.3	8.16	10.0-160			8.79	40
1,1,1,2-Tetrachloroethane	1.89	U	1.29	1.38	68.4	73.3	8.16	10.0-149			6.92	39
1,1,2,2-Tetrachloroethane	1.89	U	1.91	2.02	101	107	8.16	10.0-160			5.66	35
Tetrachloroethene	1.89	U	0.974	1.16	51.6	61.7	8.16	10.0-156			17.8	39
Toluene	1.89	U	1.03	1.17	54.5	62.2	8.16	10.0-156			13.1	38
1,1,2-Trichlorotrifluoroethane	1.89	U	0.939	1.12	49.7	59.5	8.16	10.0-160			18.0	36
1,2,3-Trichlorobenzene	1.89	U	1.85	2.09	98.0	111	8.16	10.0-160			12.2	40
1,2,4-Trichlorobenzene	1.89	U	1.64	1.91	86.8	101	8.16	10.0-160			15.1	40
1,1,1-Trichloroethane	1.89	U	0.963	1.21	51.0	64.1	8.16	10.0-144			22.8	35
1,1,2-Trichloroethane	1.89	U	1.66	1.71	87.6	90.5	8.16	10.0-160			3.19	35
Trichloroethene	1.89	U	1.06	1.27	56.2	67.1	8.16	10.0-156			17.7	38
Trichlorofluoromethane	1.89	U	0.918	1.16	48.6	61.7	8.16	10.0-160			23.6	40
1,2,3-Trichloropropane	1.89	U	1.93	1.96	102	104	8.16	10.0-156			1.90	35
1,2,3-Trimethylbenzene	1.89	0.0563	1.26	1.44	63.8	73.2	8.16	10.0-160			13.2	36
1,2,4-Trimethylbenzene	1.89	U	1.08	1.28	57.4	67.9	8.16	10.0-160			16.9	36
1,3,5-Trimethylbenzene	1.89	U	1.09	1.26	57.5	66.6	8.16	10.0-160			14.5	38
Vinyl acetate	9.44	U	10.4	10.9	110	115	8.16	10.0-128			4.88	40
Vinyl chloride	1.89	U	0.904	1.07	47.8	56.9	8.16	10.0-160			17.2	37
Xylenes, Total	5.67	U	3.30	3.72	58.2	65.7	8.16	10.0-160			12.1	38
(S) Toluene-d8					*99.8*	*99.5*		*75.0-131*				
(S) 4-Bromofluorobenzene					*112*	*112*		*67.0-138*				
(S) 1,2-Dichloroethane-d4					*101*	*102*		*70.0-130*				

Method Blank (MB)

(MB) R3461081-3 10/14/19 18:56

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Acetone	U		0.0137	0.0250
Acrylonitrile	U		0.00190	0.0125
Benzene	U		0.000400	0.00100
Bromobenzene	U		0.00105	0.0125
Bromodichloromethane	U		0.000788	0.00250
Bromochloromethane	U		0.00113	0.00500
Bromoform	U		0.00598	0.0250
Bromomethane	U		0.00370	0.0125
n-Butylbenzene	U		0.00384	0.0125
sec-Butylbenzene	U		0.00253	0.0125
tert-Butylbenzene	U		0.00155	0.00500
Carbon disulfide	U		0.00406	0.0125
Carbon tetrachloride	U		0.00108	0.00500
Chlorobenzene	U		0.000573	0.00250
Chlorodibromomethane	U		0.000450	0.00250
Chloroethane	U		0.00108	0.00500
Chloroform	U		0.000415	0.00250
Chloromethane	U		0.00139	0.0125
2-Chlorotoluene	U		0.000920	0.00250
4-Chlorotoluene	U		0.00113	0.00500
1,2-Dibromo-3-Chloropropane	U		0.00510	0.0250
1,2-Dibromoethane	U		0.000525	0.00250
Dibromomethane	U		0.00100	0.00500
1,2-Dichlorobenzene	U		0.00145	0.00500
1,3-Dichlorobenzene	U		0.00170	0.00500
1,4-Dichlorobenzene	U		0.00197	0.00500
trans-1,4-Dichloro-2-butene	U		0.00140	0.00500
Dichlorodifluoromethane	U		0.000818	0.00250
1,1-Dichloroethane	U		0.000575	0.00250
1,2-Dichloroethane	U		0.000475	0.00250
1,1-Dichloroethene	U		0.000500	0.00250
cis-1,2-Dichloroethene	U		0.000690	0.00250
trans-1,2-Dichloroethene	U		0.00143	0.00500
1,2-Dichloropropane	U		0.00127	0.00500
1,1-Dichloropropene	U		0.000700	0.00250
1,3-Dichloropropane	U		0.00175	0.00500
cis-1,3-Dichloropropene	U		0.000678	0.00250
trans-1,3-Dichloropropene	U		0.00153	0.00500
2,2-Dichloropropane	U		0.000793	0.00250
Di-isopropyl ether	U		0.000350	0.00100

Method Blank (MB)

(MB) R3461081-3 10/14/19 18:56

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Ethylbenzene	U		0.000530	0.00250
Hexachloro-1,3-butadiene	U		0.0127	0.0250
n-Hexane	U		0.00106	0.00500
2-Hexanone	U		0.0100	0.0250
Iodomethane	U		0.00605	0.0125
Isopropylbenzene	U		0.000863	0.00250
p-Isopropyltoluene	U		0.00233	0.00500
2-Butanone (MEK)	0.0125	J	0.0125	0.0250
Methylene Chloride	0.00696	J	0.00664	0.0250
4-Methyl-2-pentanone (MIBK)	U		0.0100	0.0250
Methyl tert-butyl ether	U		0.000295	0.00100
Naphthalene	U		0.00312	0.0125
n-Propylbenzene	U		0.00118	0.00500
Styrene	U		0.00273	0.0125
1,1,1,2-Tetrachloroethane	U		0.000500	0.00250
1,1,2,2-Tetrachloroethane	U		0.000390	0.00250
Tetrachloroethene	U		0.000700	0.00250
Toluene	U		0.00125	0.00500
1,1,2-Trichlorotrifluoroethane	U		0.000675	0.00250
1,2,3-Trichlorobenzene	U		0.000625	0.00250
1,2,4-Trichlorobenzene	U		0.00482	0.0125
1,1,1-Trichloroethane	U		0.000275	0.00250
1,1,2-Trichloroethane	U		0.000883	0.00250
Trichloroethene	U		0.000400	0.00100
Trichlorofluoromethane	U		0.000500	0.00250
1,2,3-Trichloropropane	U		0.00510	0.0125
1,2,3-Trimethylbenzene	U		0.00115	0.00500
1,2,4-Trimethylbenzene	0.00194	J	0.00116	0.00500
1,3,5-Trimethylbenzene	U		0.00108	0.00500
Vinyl acetate	U		0.00352	0.0125
Vinyl chloride	U		0.000683	0.00250
Xylenes, Total	U		0.00478	0.00650
(S) Toluene-d8	*107*			*75.0-131*
(S) 4-Bromofluorobenzene	*98.1*			*67.0-138*
(S) 1,2-Dichloroethane-d4	*92.9*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461081-1 10/14/19 15:52 • (LCSD) R3461081-2 10/14/19 16:14

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCSD Result mg/kg	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.625	0.457	0.412	73.1	65.9	10.0-160			10.4	31
Acrylonitrile	0.625	0.590	0.575	94.4	92.0	45.0-153			2.58	22
Benzene	0.125	0.115	0.115	92.0	92.0	70.0-123			0.000	20
Bromobenzene	0.125	0.114	0.114	91.2	91.2	73.0-121			0.000	20
Bromodichloromethane	0.125	0.106	0.108	84.8	86.4	73.0-121			1.87	20
Bromochloromethane	0.125	0.114	0.112	91.2	89.6	77.0-128			1.77	20
Bromoform	0.125	0.104	0.107	83.2	85.6	64.0-132			2.84	20
Bromomethane	0.125	0.108	0.108	86.4	86.4	56.0-147			0.000	20
n-Butylbenzene	0.125	0.123	0.123	98.4	98.4	68.0-135			0.000	20
sec-Butylbenzene	0.125	0.124	0.126	99.2	101	74.0-130			1.60	20
tert-Butylbenzene	0.125	0.123	0.125	98.4	100	75.0-127			1.61	20
Carbon disulfide	0.125	0.107	0.108	85.6	86.4	56.0-133			0.930	20
Carbon tetrachloride	0.125	0.0956	0.109	76.5	87.2	66.0-128			13.1	20
Chlorobenzene	0.125	0.115	0.119	92.0	95.2	76.0-128			3.42	20
Chlorodibromomethane	0.125	0.111	0.113	88.8	90.4	74.0-127			1.79	20
Chloroethane	0.125	0.110	0.111	88.0	88.8	61.0-134			0.905	20
Chloroform	0.125	0.111	0.111	88.8	88.8	72.0-123			0.000	20
Chloromethane	0.125	0.113	0.109	90.4	87.2	51.0-138			3.60	20
2-Chlorotoluene	0.125	0.121	0.122	96.8	97.6	75.0-124			0.823	20
4-Chlorotoluene	0.125	0.115	0.115	92.0	92.0	75.0-124			0.000	20
1,2-Dibromo-3-Chloropropane	0.125	0.104	0.101	83.2	80.8	59.0-130			2.93	20
1,2-Dibromoethane	0.125	0.125	0.126	100	101	74.0-128			0.797	20
Dibromomethane	0.125	0.113	0.113	90.4	90.4	75.0-122			0.000	20
1,2-Dichlorobenzene	0.125	0.125	0.126	100	101	76.0-124			0.797	20
1,3-Dichlorobenzene	0.125	0.125	0.125	100	100	76.0-125			0.000	20
1,4-Dichlorobenzene	0.125	0.121	0.121	96.8	96.8	77.0-121			0.000	20
trans-1,4-Dichloro-2-butene	0.125	0.128	0.126	102	101	45.0-143			1.57	20
Dichlorodifluoromethane	0.125	0.105	0.103	84.0	82.4	43.0-156			1.92	20
1,1-Dichloroethane	0.125	0.115	0.115	92.0	92.0	70.0-127			0.000	20
1,2-Dichloroethane	0.125	0.105	0.104	84.0	83.2	65.0-131			0.957	20
1,1-Dichloroethene	0.125	0.111	0.113	88.8	90.4	65.0-131			1.79	20
cis-1,2-Dichloroethene	0.125	0.112	0.114	89.6	91.2	73.0-125			1.77	20
trans-1,2-Dichloroethene	0.125	0.118	0.117	94.4	93.6	71.0-125			0.851	20
1,2-Dichloropropane	0.125	0.123	0.127	98.4	102	74.0-125			3.20	20
1,1-Dichloropropene	0.125	0.116	0.113	92.8	90.4	73.0-125			2.62	20
1,3-Dichloropropane	0.125	0.124	0.124	99.2	99.2	80.0-125			0.000	20
cis-1,3-Dichloropropene	0.125	0.121	0.119	96.8	95.2	76.0-127			1.67	20
trans-1,3-Dichloropropene	0.125	0.116	0.118	92.8	94.4	73.0-127			1.71	20
2,2-Dichloropropane	0.125	0.112	0.111	89.6	88.8	59.0-135			0.897	20
Di-isopropyl ether	0.125	0.119	0.119	95.2	95.2	60.0-136			0.000	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461081-1 10/14/19 15:52 • (LCSD) R3461081-2 10/14/19 16:14

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCSD Result mg/kg	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.125	0.119	0.122	95.2	97.6	74.0-126			2.49	20
Hexachloro-1,3-butadiene	0.125	0.132	0.135	106	108	57.0-150			2.25	20
2-Hexanone	0.625	0.617	0.619	98.7	99.0	54.0-147			0.324	20
n-Hexane	0.125	0.123	0.118	98.4	94.4	55.0-137			4.15	20
Iodomethane	0.625	0.605	0.456	96.8	73.0	74.0-134		J3 J4	28.1	20
Isopropylbenzene	0.125	0.119	0.122	95.2	97.6	72.0-127			2.49	20
p-Isopropyltoluene	0.125	0.127	0.128	102	102	72.0-133			0.784	20
2-Butanone (MEK)	0.625	0.575	0.560	92.0	89.6	30.0-160			2.64	24
Methylene Chloride	0.125	0.114	0.113	91.2	90.4	68.0-123			0.881	20
4-Methyl-2-pentanone (MIBK)	0.625	0.585	0.610	93.6	97.6	56.0-143			4.18	20
Methyl tert-butyl ether	0.125	0.117	0.117	93.6	93.6	66.0-132			0.000	20
Naphthalene	0.125	0.107	0.113	85.6	90.4	59.0-130			5.45	20
n-Propylbenzene	0.125	0.119	0.119	95.2	95.2	74.0-126			0.000	20
Styrene	0.125	0.119	0.120	95.2	96.0	72.0-127			0.837	20
1,1,1,2-Tetrachloroethane	0.125	0.117	0.120	93.6	96.0	74.0-129			2.53	20
1,1,2,2-Tetrachloroethane	0.125	0.113	0.112	90.4	89.6	68.0-128			0.889	20
Tetrachloroethene	0.125	0.125	0.124	100	99.2	70.0-136			0.803	20
Toluene	0.125	0.114	0.116	91.2	92.8	75.0-121			1.74	20
1,1,2-Trichlorotrifluoroethane	0.125	0.115	0.113	92.0	90.4	61.0-139			1.75	20
1,2,3-Trichlorobenzene	0.125	0.106	0.115	84.8	92.0	59.0-139			8.14	20
1,2,4-Trichlorobenzene	0.125	0.119	0.127	95.2	102	62.0-137			6.50	20
1,1,1-Trichloroethane	0.125	0.108	0.109	86.4	87.2	69.0-126			0.922	20
1,1,2-Trichloroethane	0.125	0.120	0.120	96.0	96.0	78.0-123			0.000	20
Trichloroethene	0.125	0.126	0.124	101	99.2	76.0-126			1.60	20
Trichlorofluoromethane	0.125	0.106	0.106	84.8	84.8	61.0-142			0.000	20
1,2,3-Trichloropropane	0.125	0.122	0.122	97.6	97.6	67.0-129			0.000	20
1,2,3-Trimethylbenzene	0.125	0.119	0.120	95.2	96.0	74.0-124			0.837	20
1,2,4-Trimethylbenzene	0.125	0.124	0.122	99.2	97.6	70.0-126			1.63	20
1,3,5-Trimethylbenzene	0.125	0.124	0.122	99.2	97.6	73.0-127			1.63	20
Vinyl acetate	0.625	0.496	0.525	79.4	84.0	43.0-159			5.68	20
Vinyl chloride	0.125	0.101	0.102	80.8	81.6	63.0-134			0.985	20
Xylenes, Total	0.375	0.367	0.370	97.9	98.7	72.0-127			0.814	20
(S) Toluene-d8				*104*	*106*	*75.0-131*				
(S) 4-Bromofluorobenzene				*96.6*	*97.4*	*67.0-138*				
(S) 1,2-Dichloroethane-d4				*96.5*	*95.0*	*70.0-130*				

Method Blank (MB)

(MB) R3462245-3 10/17/19 12:06

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3462245-3 10/17/19 12:06

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*113*			*80.0-120*
(S) 4-Bromofluorobenzene	*108*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3462245-1 10/17/19 11:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	159	127	19.0-160	
Acrylonitrile	125	136	109	55.0-149	
Benzene	25.0	21.8	87.2	70.0-123	
Bromobenzene	25.0	21.6	86.4	73.0-121	
Bromodichloromethane	25.0	22.7	90.8	75.0-120	
Bromochloromethane	25.0	25.5	102	76.0-122	
Bromoform	25.0	29.0	116	68.0-132	
Bromomethane	25.0	22.7	90.8	10.0-160	
n-Butylbenzene	25.0	22.8	91.2	73.0-125	
sec-Butylbenzene	25.0	23.2	92.8	75.0-125	
tert-Butylbenzene	25.0	25.3	101	76.0-124	
Carbon disulfide	25.0	21.1	84.4	61.0-128	
Carbon tetrachloride	25.0	25.6	102	68.0-126	
Chlorobenzene	25.0	24.7	98.8	80.0-121	
Chlorodibromomethane	25.0	27.7	111	77.0-125	
Chloroethane	25.0	23.8	95.2	47.0-150	
Chloroform	25.0	21.1	84.4	73.0-120	
Chloromethane	25.0	22.2	88.8	41.0-142	
2-Chlorotoluene	25.0	22.5	90.0	76.0-123	
4-Chlorotoluene	25.0	22.5	90.0	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	26.4	106	58.0-134	
1,2-Dibromoethane	25.0	24.1	96.4	80.0-122	
Dibromomethane	25.0	25.3	101	80.0-120	
1,2-Dichlorobenzene	25.0	25.3	101	79.0-121	
1,3-Dichlorobenzene	25.0	24.3	97.2	79.0-120	
1,4-Dichlorobenzene	25.0	22.9	91.6	79.0-120	
Dichlorodifluoromethane	25.0	20.9	83.6	51.0-149	
1,1-Dichloroethane	25.0	22.7	90.8	70.0-126	
1,2-Dichloroethane	25.0	22.6	90.4	70.0-128	
1,1-Dichloroethene	25.0	23.3	93.2	71.0-124	
cis-1,2-Dichloroethene	25.0	23.0	92.0	73.0-120	
trans-1,2-Dichloroethene	25.0	22.3	89.2	73.0-120	
1,2-Dichloropropane	25.0	23.7	94.8	77.0-125	
1,1-Dichloropropene	25.0	22.2	88.8	74.0-126	
1,3-Dichloropropane	25.0	23.9	95.6	80.0-120	
cis-1,3-Dichloropropene	25.0	23.7	94.8	80.0-123	
trans-1,3-Dichloropropene	25.0	24.6	98.4	78.0-124	
trans-1,4-Dichloro-2-butene	25.0	25.5	102	33.0-144	
2,2-Dichloropropane	25.0	23.8	95.2	58.0-130	
Di-isopropyl ether	25.0	25.2	101	58.0-138	

Laboratory Control Sample (LCS)

(LCS) R3462245-1 10/17/19 11:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	23.9	95.6	79.0-123	
Hexachloro-1,3-butadiene	25.0	24.2	96.8	54.0-138	
2-Hexanone	125	138	110	67.0-149	
n-Hexane	25.0	23.0	92.0	57.0-133	
Iodomethane	125	125	100	33.0-147	
Isopropylbenzene	25.0	26.4	106	76.0-127	
p-Isopropyltoluene	25.0	24.4	97.6	76.0-125	
2-Butanone (MEK)	125	140	112	44.0-160	
Methylene Chloride	25.0	21.5	86.0	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	144	115	68.0-142	
Methyl tert-butyl ether	25.0	24.4	97.6	68.0-125	
Naphthalene	25.0	25.6	102	54.0-135	
n-Propylbenzene	25.0	23.1	92.4	77.0-124	
Styrene	25.0	25.9	104	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	27.4	110	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	23.2	92.8	65.0-130	
1,1,2-Trichlorotrifluoroethane	25.0	24.0	96.0	69.0-132	
Tetrachloroethene	25.0	25.4	102	72.0-132	
Toluene	25.0	23.4	93.6	79.0-120	
1,2,3-Trichlorobenzene	25.0	26.6	106	50.0-138	
1,2,4-Trichlorobenzene	25.0	25.6	102	57.0-137	
1,1,1-Trichloroethane	25.0	24.2	96.8	73.0-124	
1,1,2-Trichloroethane	25.0	24.7	98.8	80.0-120	
Trichloroethene	25.0	24.1	96.4	78.0-124	
Trichlorofluoromethane	25.0	23.8	95.2	59.0-147	
1,2,3-Trichloropropane	25.0	23.7	94.8	73.0-130	
1,2,4-Trimethylbenzene	25.0	22.8	91.2	76.0-121	
1,2,3-Trimethylbenzene	25.0	22.7	90.8	77.0-120	
1,3,5-Trimethylbenzene	25.0	23.5	94.0	76.0-122	
Vinyl acetate	125	140	112	11.0-160	
Vinyl chloride	25.0	23.1	92.4	67.0-131	
Xylenes, Total	75.0	74.6	99.5	79.0-123	
(S) Toluene-d8			*110*	*80.0-120*	
(S) 4-Bromofluorobenzene			*113*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*108*	*70.0-130*	

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

(dry)	Results are reported based on the dry weight of the sample. [this will only be present on a dry report basis for soils].
MDL	Method Detection Limit.
MDL (dry)	Method Detection Limit.
RDL	Reported Detection Limit.
RDL (dry)	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
J	The identification of the analyte is acceptable; the reported value is an estimate.
J0	J0: The identification of the analyte is acceptable, but the reported concentration is an estimate. The calibration met method criteria.
J3	The associated batch QC was outside the established quality control range for precision.
J4	The associated batch QC was outside the established quality control range for accuracy.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

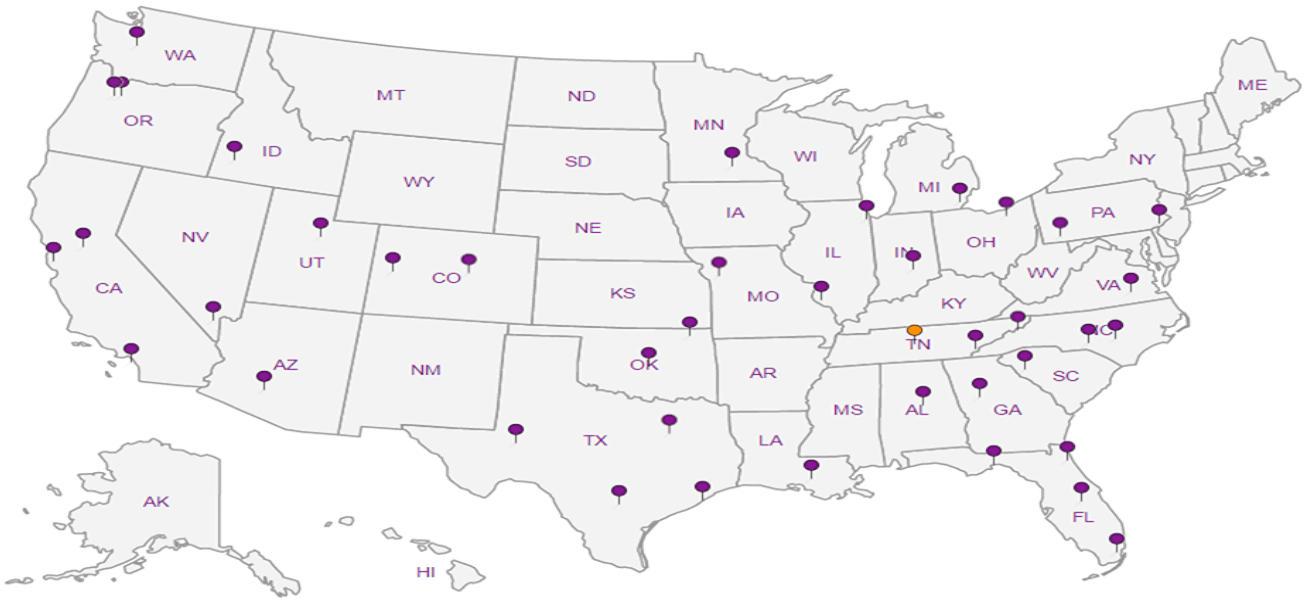
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



PES Environmental, Inc.- WA

1215 Fourth Ave., Suite 1350
Seattle, WA 98161

Billing Information:

Attn: Accounts Payable
1215 Fourth Ave., Ste. 1350
Seattle, WA 98161

Report to: Brian O'Neal/Bill Haldeman

Email To: boneal@pesenv.com; bhaldeman@pesenv.com;

Project Description:

City/State Collected: SEATTLE WA

Please Circle: PT MT CT ET

Phone: 206-529-3980
Fax: 206-529-3985

Client Project # 1413-001-02-SoiB

Lab Project # PESENVSWA-ALP

Collected by (print): R. McLAUGHLIN

Site/Facility ID # AMERICAN LINEN

P.O. #

Collected by (signature): R. McLaughlin

Immediately Packed on Ice N ___ Y X

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Analysis / Container / Preservative

Chain of Custody Page 1 of 2

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

SDG # L1147037

B171

Acctnum: PESENVSWA

Template: T154694

Prelogin: P725383

PM: 110 - Brian Ford

PB: 8/21/19 MM

Shipped Via: FedEX Ground

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOCs 8260C 40mlAmb/MeOH5ml/Syr	dry weight 2ozClr-NoPres	Remarks	Sample # (lab only)
MW-307-6	GRAB	SS	6	10/3/19	0935	2	X	X		-01
MW-307-10			10		0937					02
MW-307-15			15		0950					03
MW-307-20			20		0952					04
MW-307-25			25		1007					05
MW-307-30			30		1010					06
MW-307-35			35		1048					07
MW-307-40			40		1050					08
MW-307-45			45		1052					09
MW-307-50	↓	SS	50	X	1055	2	X	X		10

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____

Flow _____ Other _____

Samples returned via:
__ UPS __ FedEx __ Courier _____

Tracking # 1145 2227 4255

Sample Receipt Checklist
COC Seal Present/Intact: NP Y N
COC Signed/Accurate: Y N
Bottles arrive intact: Y N
Correct bottles used: Y N
Sufficient volume sent: Y N
If Applicable
VOA Zero Headspace: Y N
Preservation Correct/Checked: Y N
RAD Screen <0.5 mR/hr: Y N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
R. McLaughlin	10-4-19	1100	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature) Hailey Hill

Trip Blank Received: Yes / No HCL / MeoH TBR

Temp: 3.5+.1=3.6 °C AA AS

Bottles Received: 36

Date: 10/5/19 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / OK

PES Environmental, Inc.- WA

1215 Fourth Ave., Suite 1350
Seattle, WA 98161

Billing Information:
Attn: Accounts Payable
1215 Fourth Ave., Ste. 1350
Seattle, WA 98161

Report to: Brian O'Neal/Bill Haldeman

Email To: boneal@pesenv.com; bhaldeman@pesenv.com;

Project Description:

City/State Collected: SEATTLE WA

Please Circle: PT MT CT ET

Phone: 206-529-3980
Fax: 206-529-3985

Client Project # 1413-001-02-501B

Lab Project # PESENVSWA-ALP

Collected by (print): R. McLAUGHLIN

Site/Facility ID #

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y X

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Analysis / Container / Preservative

Pres Chk

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOCs 8260C 40mlAmb/MeOH5ml/Syr	dry weight 2ozClr-NoPres	Remarks	Sample # (lab only)
MW-307-55	GRAB	SS	55	10/03/19	1137	2	X	X		-11
MW-307-60			60		1140					12
MW-307-65			65		1200					13
MW-307-70			70		1205					14
MW-307-75			75		1228					15
MW-307-80			80		1230					16
MW-307-85			85		1300					17
MW-2016-85	X	X	85	X	1500	2		X		18
TB-100319	—	—	—	10/3/19	1600	1	X			19

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other

Remarks:

pH ____ Temp ____
Flow ____ Other ____

Samples returned via: __ UPS __ FedEx __ Courier ____

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP X Y __N
COC Signed/Accurate: X Y __N
Bottles arrive intact: X Y __N
Correct bottles used: X Y __N
Sufficient volume sent: X Y __N
If Applicable
VOA Zero Headspace: __Y __N
Preservation Correct/Checked: __Y __N
RAD Screen <0.5 mR/hr: X Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
R T McLaughlin	10-4-19	1100	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)
			Harley Mn

Trip Blank Received: Yes / No
HCL / MeoH
TBR

Temp: °C 3.5+1-3.6 AA AS

Bottles Received: 36

Date: 10/5/19 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / OK

Chain of Custody Page 2 of 2

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

SDG # L1147037

Table #

Acctnum: PESENVSWA
Template: T154694
Prelogin: P725383
PM: 110 - Brian Ford
PB: 8/21/19 mm
Shipped Via: FedEX Ground

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 16, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1147264
Samples Received:	10/08/2019
Project Number:	AMERICAN LINEN
Description:	Amerian Linen
Site:	1413.001.02.501E
Report To:	Brian O'Neal/Bill Haldeman 1215 Fourth Ave., Suite 1350 Seattle, WA 98161

Entire Report Reviewed By:

Brian Ford

Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

TABLE OF CONTENTS

Cp: Cover Page 1

Tc: Table of Contents 2

Ss: Sample Summary 3

Cn: Case Narrative 4

Sr: Sample Results 5

MW-320-100719 L1147264-01 5

MW-322-100719 L1147264-02 7

TRIP-100719 L1147264-03 10

Qc: Quality Control Summary 12

Wet Chemistry by Method 2320 B-2011 12

Wet Chemistry by Method 9056A 13

Wet Chemistry by Method 9060A 15

Metals (ICPMS) by Method 6020B 16

Volatile Organic Compounds (GC) by Method RSK175 17

Volatile Organic Compounds (GC/MS) by Method 8260C 18

Gl: Glossary of Terms 25

Al: Accreditations & Locations 26

Sc: Sample Chain of Custody 27

MW-320-100719 L1147264-01 GW

Collected by: Ben Hecht | Collected date/time: 10/07/19 12:22 | Received date/time: 10/08/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362246	5	10/13/19 16:21	10/13/19 16:21	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1359094	1	10/08/19 13:48	10/08/19 13:48	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1361291	1	10/12/19 12:37	10/12/19 12:37	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1360463	1	10/11/19 09:20	10/11/19 17:01	JPD	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1360463	20	10/11/19 09:20	10/11/19 18:28	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1359638	1	10/09/19 15:54	10/09/19 15:54	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 06:42	10/15/19 06:42	JHH	Mt. Juliet, TN

MW-322-100719 L1147264-02 GW

Collected by: Ben Hecht | Collected date/time: 10/07/19 13:50 | Received date/time: 10/08/19 08:30

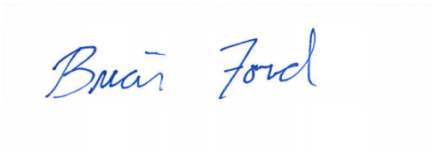
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362246	1	10/13/19 16:28	10/13/19 16:28	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1359094	1	10/08/19 14:32	10/08/19 14:32	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1361291	1	10/12/19 13:02	10/12/19 13:02	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1360463	50	10/11/19 09:20	10/11/19 18:32	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1359638	1	10/09/19 16:02	10/09/19 16:02	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 07:03	10/15/19 07:03	JHH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1363245	20	10/15/19 17:47	10/15/19 17:47	JHH	Mt. Juliet, TN

TRIP-100719 L1147264-03 GW

Collected by: Ben Hecht | Collected date/time: 10/07/19 15:30 | Received date/time: 10/08/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1362918	1	10/15/19 02:13	10/15/19 02:13	JHH	Mt. Juliet, TN

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	1780000		13600	100000	5	10/13/2019 16:21	WG1362246

Sample Narrative:
L1147264-01 WG1362246: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	12700		51.9	1000	1	10/08/2019 13:48	WG1359094
Nitrate	U		22.7	100	1	10/08/2019 13:48	WG1359094
Sulfate	5080		77.4	5000	1	10/08/2019 13:48	WG1359094

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	8510		102	1000	1	10/12/2019 12:37	WG1361291

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	1600		15.0	100	1	10/11/2019 17:01	WG1360463
Manganese	2370		5.00	100	20	10/11/2019 18:28	WG1360463

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	264		0.287	0.678	1	10/09/2019 15:54	WG1359638
Ethane	U		0.296	1.29	1	10/09/2019 15:54	WG1359638
Ethene	U		0.422	1.27	1	10/09/2019 15:54	WG1359638

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	2.81	J J0	1.05	25.0	1	10/15/2019 06:42	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 06:42	WG1362918
Benzene	U		0.0896	0.500	1	10/15/2019 06:42	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 06:42	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 06:42	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 06:42	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 06:42	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 06:42	WG1362918
n-Butylbenzene	0.200	J	0.143	0.500	1	10/15/2019 06:42	WG1362918
sec-Butylbenzene	2.82		0.134	0.500	1	10/15/2019 06:42	WG1362918
tert-Butylbenzene	1.89		0.183	0.500	1	10/15/2019 06:42	WG1362918
Carbon disulfide	U		0.101	0.500	1	10/15/2019 06:42	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 06:42	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 06:42	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 06:42	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 06:42	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 06:42	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 06:42	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 06:42	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 06:42	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 06:42	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 06:42	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 06:42	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 06:42	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 06:42	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 06:42	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 06:42	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 06:42	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 06:42	WG1362918
1,1-Dichloroethene	U		0.188	0.500	1	10/15/2019 06:42	WG1362918
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/15/2019 06:42	WG1362918
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/15/2019 06:42	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 06:42	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 06:42	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 06:42	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 06:42	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 06:42	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 06:42	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 06:42	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 06:42	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 06:42	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 06:42	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 06:42	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 06:42	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 06:42	WG1362918
Isopropylbenzene	2.62		0.126	0.500	1	10/15/2019 06:42	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 06:42	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 06:42	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 06:42	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 06:42	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 06:42	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 06:42	WG1362918
n-Propylbenzene	3.22		0.162	0.500	1	10/15/2019 06:42	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 06:42	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 06:42	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 06:42	WG1362918
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 06:42	WG1362918
Tetrachloroethene	U		0.199	0.500	1	10/15/2019 06:42	WG1362918
Toluene	0.459	J	0.412	0.500	1	10/15/2019 06:42	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 06:42	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 06:42	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 06:42	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 06:42	WG1362918
Trichloroethene	U		0.153	0.500	1	10/15/2019 06:42	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 06:42	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 06:42	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 06:42	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 06:42	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 06:42	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 06:42	WG1362918
Vinyl chloride	U		0.118	0.500	1	10/15/2019 06:42	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 06:42	WG1362918
(S) Toluene-d8	*80.5*			*80.0-120*		*10/15/2019 06:42*	WG1362918
(S) 4-Bromofluorobenzene	*89.1*			*77.0-126*		*10/15/2019 06:42*	WG1362918
(S) 1,2-Dichloroethane-d4	*109*			*70.0-130*		*10/15/2019 06:42*	WG1362918

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	841000		2710	20000	1	10/13/2019 16:28	WG1362246

Sample Narrative:
L1147264-02 WG1362246: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	30400		51.9	1000	1	10/08/2019 14:32	WG1359094
Nitrate	U		22.7	100	1	10/08/2019 14:32	WG1359094
Sulfate	21100		77.4	5000	1	10/08/2019 14:32	WG1359094

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	19400		102	1000	1	10/12/2019 13:02	WG1361291

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	43900		750	5000	50	10/11/2019 18:32	WG1360463
Manganese	4260		12.5	250	50	10/11/2019 18:32	WG1360463

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	3090		0.287	0.678	1	10/09/2019 16:02	WG1359638
Ethane	59.1		0.296	1.29	1	10/09/2019 16:02	WG1359638
Ethene	20.8		0.422	1.27	1	10/09/2019 16:02	WG1359638

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	3.40	J J0	1.05	25.0	1	10/15/2019 07:03	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 07:03	WG1362918
Benzene	7.12		0.0896	0.500	1	10/15/2019 07:03	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 07:03	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 07:03	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 07:03	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 07:03	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 07:03	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 07:03	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 07:03	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 07:03	WG1362918
Carbon disulfide	U		0.101	0.500	1	10/15/2019 07:03	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 07:03	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 07:03	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 07:03	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 07:03	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 07:03	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 07:03	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 07:03	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 07:03	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 07:03	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 07:03	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 07:03	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 07:03	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 07:03	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 07:03	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 07:03	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 07:03	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 07:03	WG1362918
1,1-Dichloroethene	1.23		0.188	0.500	1	10/15/2019 07:03	WG1362918
cis-1,2-Dichloroethene	497		1.87	10.0	20	10/15/2019 17:47	WG1363245
trans-1,2-Dichloroethene	1.17		0.152	0.500	1	10/15/2019 07:03	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 07:03	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 07:03	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 07:03	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 07:03	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 07:03	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 07:03	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 07:03	WG1362918
Di-isopropyl ether	0.112	J	0.0924	0.500	1	10/15/2019 07:03	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 07:03	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 07:03	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 07:03	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 07:03	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 07:03	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 07:03	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 07:03	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 07:03	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 07:03	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 07:03	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 07:03	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 07:03	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 07:03	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 07:03	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 07:03	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 07:03	WG1362918
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 07:03	WG1362918
Tetrachloroethene	0.699		0.199	0.500	1	10/15/2019 07:03	WG1362918
Toluene	0.612		0.412	0.500	1	10/15/2019 07:03	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 07:03	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 07:03	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 07:03	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 07:03	WG1362918
Trichloroethene	21.0		0.153	0.500	1	10/15/2019 07:03	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 07:03	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 07:03	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 07:03	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 07:03	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 07:03	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 07:03	WG1362918
Vinyl chloride	268		2.36	10.0	20	10/15/2019 17:47	WG1363245
Xylenes, Total	U		0.316	1.50	1	10/15/2019 07:03	WG1362918
(S) Toluene-d8	*103*			*80.0-120*		*10/15/2019 07:03*	WG1362918
(S) Toluene-d8	*96.5*			*80.0-120*		*10/15/2019 17:47*	WG1363245
(S) 4-Bromofluorobenzene	*105*			*77.0-126*		*10/15/2019 07:03*	WG1362918
(S) 4-Bromofluorobenzene	*94.9*			*77.0-126*		*10/15/2019 17:47*	WG1363245

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*107*			*70.0-130*		*10/15/2019 07:03*	WG1362918
(S) 1,2-Dichloroethane-d4	*86.3*			*70.0-130*		*10/15/2019 17:47*	WG1363245

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.31	J J0	1.05	25.0	1	10/15/2019 02:13	WG1362918
Acrylonitrile	U		0.873	5.00	1	10/15/2019 02:13	WG1362918
Benzene	U		0.0896	0.500	1	10/15/2019 02:13	WG1362918
Bromobenzene	U		0.133	0.500	1	10/15/2019 02:13	WG1362918
Bromodichloromethane	U		0.0800	0.500	1	10/15/2019 02:13	WG1362918
Bromochloromethane	U		0.145	0.500	1	10/15/2019 02:13	WG1362918
Bromoform	U		0.186	0.500	1	10/15/2019 02:13	WG1362918
Bromomethane	U		0.157	2.50	1	10/15/2019 02:13	WG1362918
n-Butylbenzene	U		0.143	0.500	1	10/15/2019 02:13	WG1362918
sec-Butylbenzene	U		0.134	0.500	1	10/15/2019 02:13	WG1362918
tert-Butylbenzene	U		0.183	0.500	1	10/15/2019 02:13	WG1362918
Carbon disulfide	U		0.101	0.500	1	10/15/2019 02:13	WG1362918
Carbon tetrachloride	U		0.159	0.500	1	10/15/2019 02:13	WG1362918
Chlorobenzene	U		0.140	0.500	1	10/15/2019 02:13	WG1362918
Chlorodibromomethane	U		0.128	0.500	1	10/15/2019 02:13	WG1362918
Chloroethane	U		0.141	2.50	1	10/15/2019 02:13	WG1362918
Chloroform	U		0.0860	0.500	1	10/15/2019 02:13	WG1362918
Chloromethane	U		0.153	1.25	1	10/15/2019 02:13	WG1362918
2-Chlorotoluene	U		0.111	0.500	1	10/15/2019 02:13	WG1362918
4-Chlorotoluene	U		0.0972	0.500	1	10/15/2019 02:13	WG1362918
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/15/2019 02:13	WG1362918
1,2-Dibromoethane	U		0.193	0.500	1	10/15/2019 02:13	WG1362918
Dibromomethane	U		0.117	0.500	1	10/15/2019 02:13	WG1362918
1,2-Dichlorobenzene	U		0.101	0.500	1	10/15/2019 02:13	WG1362918
1,3-Dichlorobenzene	U		0.130	0.500	1	10/15/2019 02:13	WG1362918
1,4-Dichlorobenzene	U		0.121	0.500	1	10/15/2019 02:13	WG1362918
Dichlorodifluoromethane	U		0.127	2.50	1	10/15/2019 02:13	WG1362918
1,1-Dichloroethane	U		0.114	0.500	1	10/15/2019 02:13	WG1362918
1,2-Dichloroethane	U		0.108	0.500	1	10/15/2019 02:13	WG1362918
1,1-Dichloroethene	U		0.188	0.500	1	10/15/2019 02:13	WG1362918
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/15/2019 02:13	WG1362918
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/15/2019 02:13	WG1362918
1,2-Dichloropropane	U		0.190	0.500	1	10/15/2019 02:13	WG1362918
1,1-Dichloropropene	U		0.128	0.500	1	10/15/2019 02:13	WG1362918
1,3-Dichloropropane	U		0.147	1.00	1	10/15/2019 02:13	WG1362918
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/15/2019 02:13	WG1362918
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/15/2019 02:13	WG1362918
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/15/2019 02:13	WG1362918
2,2-Dichloropropane	U		0.0929	0.500	1	10/15/2019 02:13	WG1362918
Di-isopropyl ether	U		0.0924	0.500	1	10/15/2019 02:13	WG1362918
Ethylbenzene	U		0.158	0.500	1	10/15/2019 02:13	WG1362918
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/15/2019 02:13	WG1362918
2-Hexanone	U		0.757	5.00	1	10/15/2019 02:13	WG1362918
n-Hexane	U		0.305	5.00	1	10/15/2019 02:13	WG1362918
Iodomethane	U		0.377	10.0	1	10/15/2019 02:13	WG1362918
Isopropylbenzene	U		0.126	0.500	1	10/15/2019 02:13	WG1362918
p-Isopropyltoluene	U		0.138	0.500	1	10/15/2019 02:13	WG1362918
2-Butanone (MEK)	U		1.28	5.00	1	10/15/2019 02:13	WG1362918
Methylene Chloride	U		1.07	2.50	1	10/15/2019 02:13	WG1362918
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/15/2019 02:13	WG1362918
Methyl tert-butyl ether	U		0.102	0.500	1	10/15/2019 02:13	WG1362918
Naphthalene	U		0.174	2.50	1	10/15/2019 02:13	WG1362918
n-Propylbenzene	U		0.162	0.500	1	10/15/2019 02:13	WG1362918
Styrene	U		0.117	0.500	1	10/15/2019 02:13	WG1362918
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/15/2019 02:13	WG1362918
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/15/2019 02:13	WG1362918

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/15/2019 02:13	WG1362918
Tetrachloroethene	U		0.199	0.500	1	10/15/2019 02:13	WG1362918
Toluene	U		0.412	0.500	1	10/15/2019 02:13	WG1362918
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/15/2019 02:13	WG1362918
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/15/2019 02:13	WG1362918
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/15/2019 02:13	WG1362918
1,1,2-Trichloroethane	U		0.186	0.500	1	10/15/2019 02:13	WG1362918
Trichloroethene	U		0.153	0.500	1	10/15/2019 02:13	WG1362918
Trichlorofluoromethane	U		0.130	2.50	1	10/15/2019 02:13	WG1362918
1,2,3-Trichloropropane	U		0.247	2.50	1	10/15/2019 02:13	WG1362918
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/15/2019 02:13	WG1362918
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/15/2019 02:13	WG1362918
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/15/2019 02:13	WG1362918
Vinyl acetate	U		0.645	5.00	1	10/15/2019 02:13	WG1362918
Vinyl chloride	U		0.118	0.500	1	10/15/2019 02:13	WG1362918
Xylenes, Total	U		0.316	1.50	1	10/15/2019 02:13	WG1362918
(S) Toluene-d8	*102*			*80.0-120*		*10/15/2019 02:13*	WG1362918
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/15/2019 02:13*	WG1362918
(S) 1,2-Dichloroethane-d4	*107*			*70.0-130*		*10/15/2019 02:13*	WG1362918

Method Blank (MB)

(MB) R3460555-1 10/13/19 14:18

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Alkalinity	3920	J	2710	20000

Sample Narrative:

BLANK: Endpoint pH 4.5

L1148858-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1148858-01 10/13/19 14:37 • (DUP) R3460555-2 10/13/19 14:46

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	107000	102000	1	5.08		20

Sample Narrative:

OS: Endpoint pH 4.5 HEADSPACE

DUP: Endpoint pH 4.5

L1146788-10 Original Sample (OS) • Duplicate (DUP)

(OS) L1146788-10 10/13/19 16:07 • (DUP) R3460555-4 10/13/19 16:14

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	581000	583000	1	0.486		20

Sample Narrative:

OS: Endpoint pH 4.5

DUP: Endpoint pH 4.5

Laboratory Control Sample (LCS)

(LCS) R3460555-3 10/13/19 15:45

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Alkalinity	100000	114000	114	85.0-115	

Sample Narrative:

LCS: Endpoint pH 4.5

Method Blank (MB)

(MB) R3459114-1 10/08/19 09:15

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	U		51.9	1000
Nitrate	U		22.7	100
Sulfate	U		77.4	5000

L1147264-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1147264-01 10/08/19 13:48 • (DUP) R3459114-3 10/08/19 14:21

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	12700	12300	1	3.18		15
Nitrate	U	0.000	1	0.000		15
Sulfate	5080	4870	1	4.22	J	15

L1147305-12 Original Sample (OS) • Duplicate (DUP)

(OS) L1147305-12 10/08/19 17:26 • (DUP) R3459114-6 10/08/19 17:36

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	95900	99300	1	3.49		15
Nitrate	U	0.000	1	0.000		15
Sulfate	2160	2170	1	0.509	J	15

Laboratory Control Sample (LCS)

(LCS) R3459114-2 10/08/19 09:26

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	40000	100	80.0-120	
Nitrate	8000	8000	100	80.0-120	
Sulfate	40000	40600	101	80.0-120	

L1147268-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1147268-01 10/08/19 14:43 • (MS) R3459114-4 10/08/19 14:53 • (MSD) R3459114-5 10/08/19 15:04

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	95800	144000	144000	96.4	97.0	1	80.0-120	E	E	0.232	15
Nitrate	5000	1690	7170	7180	110	110	1	80.0-120			0.192	15
Sulfate	50000	26100	78800	79000	105	106	1	80.0-120			0.280	15

L1147305-14 Original Sample (OS) • Matrix Spike (MS)

(OS) L1147305-14 10/08/19 17:47 • (MS) R3459114-7 10/08/19 17:58

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	200000	237000	73.6	1	80.0-120	E V
Nitrate	5000	87.8	4770	93.6	1	80.0-120	
Sulfate	50000	23000	71900	97.9	1	80.0-120	

Method Blank (MB)

(MB) R3460404-1 10/11/19 11:54

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
TOC (Total Organic Carbon)	726	J	102	1000

L1146788-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1146788-04 10/11/19 14:25 • (DUP) R3460404-3 10/11/19 14:49

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	4410	4470	1	1.31		20

L1146896-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1146896-01 10/11/19 20:21 • (DUP) R3460404-6 10/11/19 20:46

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	62700	62900	2	0.318		20

Laboratory Control Sample (LCS)

(LCS) R3460404-2 10/11/19 12:41

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TOC (Total Organic Carbon)	75000	76900	103	85.0-115	

L1146788-10 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1146788-10 10/11/19 18:16 • (MS) R3460404-4 10/11/19 18:40 • (MSD) R3460404-5 10/11/19 19:08

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	4820	54600	55200	99.6	101	1	80.0-120			1.09	20

L1146896-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1146896-07 10/12/19 10:18 • (MS) R3460404-7 10/12/19 10:41 • (MSD) R3460404-8 10/12/19 11:03

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	1340000	2280000	2270000	94.2	92.3	20	80.0-120	E	E	0.835	20

Method Blank (MB)

(MB) R3460292-1 10/11/19 15:29

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Iron	U		15.0	100
Manganese	1.03	J	0.250	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3460292-2 10/11/19 15:34 • (LCSD) R3460292-3 10/11/19 15:38

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Iron	5000	4860	4870	97.2	97.3	80.0-120			0.156	20
Manganese	50.0	48.7	49.4	97.3	98.9	80.0-120			1.60	20

L1146807-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1146807-01 10/11/19 15:43 • (MS) R3460292-5 10/11/19 15:52 • (MSD) R3460292-6 10/11/19 15:57

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	ug/l	%	%		%			%	%
Iron	5000	642	5350	5330	94.1	93.7	1	75.0-125			0.372	20
Manganese	50.0	91.2	141	139	99.0	96.5	1	75.0-125			0.885	20

Method Blank (MB)

(MB) R3459385-1 10/09/19 14:23

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1146813-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1146813-05 10/09/19 14:32 • (DUP) R3459385-2 10/09/19 15:06

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	4070	3940	1	3.27		20
Ethane	14.0	12.7	1	10.1		20
Ethene	4890	4710	1	3.59		20

L1146813-21 Original Sample (OS) • Duplicate (DUP)

(OS) L1146813-21 10/09/19 15:13 • (DUP) R3459385-3 10/09/19 16:07

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	U	0.000	1	0.000		20
Ethane	U	0.000	1	0.000		20
Ethene	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3459385-4 10/09/19 16:10 • (LCSD) R3459385-5 10/09/19 16:14

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	73.5	73.3	108	108	85.0-115			0.213	20
Ethane	129	132	131	102	102	85.0-115			0.687	20
Ethene	127	138	137	108	108	85.0-115			0.369	20

Method Blank (MB)

(MB) R3461125-3 10/15/19 00:15

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3461125-3 10/15/19 00:15

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*102*			*80.0-120*
(S) 4-Bromofluorobenzene	*102*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*104*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461125-1 10/14/19 22:32 • (LCSD) R3461125-2 10/14/19 22:52

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	125	159	154	127	123	19.0-160			3.19	27
Acrylonitrile	125	139	138	111	110	55.0-149			0.722	20
Benzene	25.0	24.1	24.1	96.4	96.4	70.0-123			0.000	20
Bromobenzene	25.0	23.9	23.9	95.6	95.6	73.0-121			0.000	20
Bromodichloromethane	25.0	27.3	27.2	109	109	75.0-120			0.367	20
Bromochloromethane	25.0	26.0	26.0	104	104	76.0-122			0.000	20
Bromoform	25.0	25.7	25.7	103	103	68.0-132			0.000	20
Bromomethane	25.0	25.0	24.3	100	97.2	10.0-160			2.84	25
n-Butylbenzene	25.0	25.7	26.8	103	107	73.0-125			4.19	20
sec-Butylbenzene	25.0	25.0	25.2	100	101	75.0-125			0.797	20
tert-Butylbenzene	25.0	25.6	25.5	102	102	76.0-124			0.391	20
Carbon disulfide	25.0	21.6	21.4	86.4	85.6	61.0-128			0.930	20
Carbon tetrachloride	25.0	28.4	28.7	114	115	68.0-126			1.05	20
Chlorobenzene	25.0	24.2	24.1	96.8	96.4	80.0-121			0.414	20
Chlorodibromomethane	25.0	22.8	22.5	91.2	90.0	77.0-125			1.32	20
Chloroethane	25.0	25.1	25.3	100	101	47.0-150			0.794	20
Chloroform	25.0	25.7	25.5	103	102	73.0-120			0.781	20
Chloromethane	25.0	29.0	28.0	116	112	41.0-142			3.51	20
2-Chlorotoluene	25.0	24.6	24.3	98.4	97.2	76.0-123			1.23	20
4-Chlorotoluene	25.0	24.9	24.7	99.6	98.8	75.0-122			0.806	20
1,2-Dibromo-3-Chloropropane	25.0	24.0	24.7	96.0	98.8	58.0-134			2.87	20
1,2-Dibromoethane	25.0	24.7	24.1	98.8	96.4	80.0-122			2.46	20
Dibromomethane	25.0	27.8	27.4	111	110	80.0-120			1.45	20
1,2-Dichlorobenzene	25.0	25.6	25.4	102	102	79.0-121			0.784	20
1,3-Dichlorobenzene	25.0	25.0	24.8	100	99.2	79.0-120			0.803	20
1,4-Dichlorobenzene	25.0	25.0	24.7	100	98.8	79.0-120			1.21	20
Dichlorodifluoromethane	25.0	30.2	28.3	121	113	51.0-149			6.50	20
1,1-Dichloroethane	25.0	26.3	26.3	105	105	70.0-126			0.000	20
1,2-Dichloroethane	25.0	26.1	25.9	104	104	70.0-128			0.769	20
1,1-Dichloroethene	25.0	25.1	25.1	100	100	71.0-124			0.000	20
cis-1,2-Dichloroethene	25.0	24.9	25.2	99.6	101	73.0-120			1.20	20
trans-1,2-Dichloroethene	25.0	23.4	23.4	93.6	93.6	73.0-120			0.000	20
1,2-Dichloropropane	25.0	26.5	26.7	106	107	77.0-125			0.752	20
1,1-Dichloropropene	25.0	26.4	26.1	106	104	74.0-126			1.14	20
1,3-Dichloropropane	25.0	23.6	23.4	94.4	93.6	80.0-120			0.851	20
cis-1,3-Dichloropropene	25.0	27.3	27.1	109	108	80.0-123			0.735	20
trans-1,3-Dichloropropene	25.0	25.3	25.3	101	101	78.0-124			0.000	20
trans-1,4-Dichloro-2-butene	25.0	25.3	24.9	101	99.6	33.0-144			1.59	20
2,2-Dichloropropane	25.0	25.4	24.8	102	99.2	58.0-130			2.39	20
Di-isopropyl ether	25.0	27.7	27.5	111	110	58.0-138			0.725	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461125-1 10/14/19 22:32 • (LCSD) R3461125-2 10/14/19 22:52

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	25.0	23.8	23.6	95.2	94.4	79.0-123			0.844	20
Hexachloro-1,3-butadiene	25.0	24.2	27.4	96.8	110	54.0-138			12.4	20
2-Hexanone	125	133	130	106	104	67.0-149			2.28	20
n-Hexane	25.0	25.9	25.6	104	102	57.0-133			1.17	20
Iodomethane	125	125	124	100	99.2	33.0-147			0.803	26
Isopropylbenzene	25.0	25.2	24.7	101	98.8	76.0-127			2.00	20
p-Isopropyltoluene	25.0	26.0	26.3	104	105	76.0-125			1.15	20
2-Butanone (MEK)	125	153	151	122	121	44.0-160			1.32	20
Methylene Chloride	25.0	23.6	24.0	94.4	96.0	67.0-120			1.68	20
4-Methyl-2-pentanone (MIBK)	125	136	134	109	107	68.0-142			1.48	20
Methyl tert-butyl ether	25.0	26.0	25.6	104	102	68.0-125			1.55	20
Naphthalene	25.0	23.8	26.4	95.2	106	54.0-135			10.4	20
n-Propylbenzene	25.0	24.2	24.1	96.8	96.4	77.0-124			0.414	20
Styrene	25.0	26.2	25.7	105	103	73.0-130			1.93	20
1,1,1,2-Tetrachloroethane	25.0	25.3	25.1	101	100	75.0-125			0.794	20
1,1,2,2-Tetrachloroethane	25.0	23.4	23.1	93.6	92.4	65.0-130			1.29	20
1,1,2-Trichlorotrifluoroethane	25.0	25.2	24.7	101	98.8	69.0-132			2.00	20
Tetrachloroethene	25.0	24.7	24.5	98.8	98.0	72.0-132			0.813	20
Toluene	25.0	23.2	23.0	92.8	92.0	79.0-120			0.866	20
1,2,3-Trichlorobenzene	25.0	25.8	28.8	103	115	50.0-138			11.0	20
1,2,4-Trichlorobenzene	25.0	25.3	27.3	101	109	57.0-137			7.60	20
1,1,1-Trichloroethane	25.0	28.0	27.5	112	110	73.0-124			1.80	20
1,1,2-Trichloroethane	25.0	23.9	23.9	95.6	95.6	80.0-120			0.000	20
Trichloroethene	25.0	27.4	27.6	110	110	78.0-124			0.727	20
Trichlorofluoromethane	25.0	30.7	29.7	123	119	59.0-147			3.31	20
1,2,3-Trichloropropane	25.0	25.1	23.9	100	95.6	73.0-130			4.90	20
1,2,4-Trimethylbenzene	25.0	24.0	23.4	96.0	93.6	76.0-121			2.53	20
1,2,3-Trimethylbenzene	25.0	24.5	24.4	98.0	97.6	77.0-120			0.409	20
1,3,5-Trimethylbenzene	25.0	25.0	24.9	100	99.6	76.0-122			0.401	20
Vinyl acetate	125	124	118	99.2	94.4	11.0-160			4.96	20
Vinyl chloride	25.0	27.8	27.5	111	110	67.0-131			1.08	20
Xylenes, Total	75.0	72.2	71.3	96.3	95.1	79.0-123			1.25	20
(S) Toluene-d8				*96.2*	*96.7*	*80.0-120*				
(S) 4-Bromofluorobenzene				*101*	*101*	*77.0-126*				
(S) 1,2-Dichloroethane-d4				*112*	*113*	*70.0-130*				

L1148487-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148487-01 10/15/19 07:24 • (MS) R3461125-4 10/15/19 09:50 • (MSD) R3461125-5 10/15/19 10:11

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Acetone	125	7.11	156	159	119	122	1	10.0-160			1.90	35
Acrylonitrile	125	U	144	140	115	112	1	21.0-160			2.82	32
Benzene	25.0	U	24.7	22.9	98.8	91.6	1	17.0-158			7.56	27
Bromobenzene	25.0	U	23.1	22.5	92.4	90.0	1	30.0-149			2.63	28
Bromodichloromethane	25.0	U	28.2	26.5	113	106	1	31.0-150			6.22	27
Bromochloromethane	25.0	U	26.7	25.3	107	101	1	38.0-142			5.38	26
Bromoform	25.0	U	27.5	26.6	110	106	1	29.0-150			3.33	29
Bromomethane	25.0	U	25.0	22.4	100	89.6	1	10.0-160			11.0	38
n-Butylbenzene	25.0	U	26.3	26.3	105	105	1	31.0-150			0.000	30
sec-Butylbenzene	25.0	U	25.7	25.1	103	100	1	33.0-155			2.36	29
tert-Butylbenzene	25.0	U	26.1	25.2	104	101	1	34.0-153			3.51	28
Carbon disulfide	25.0	U	23.3	20.7	93.2	82.8	1	10.0-156			11.8	28
Carbon tetrachloride	25.0	U	31.0	28.0	124	112	1	23.0-159			10.2	28
Chlorobenzene	25.0	U	25.6	24.2	102	96.8	1	33.0-152			5.62	27
Chlorodibromomethane	25.0	U	24.3	23.3	97.2	93.2	1	37.0-149			4.20	27
Chloroethane	25.0	U	25.9	23.6	104	94.4	1	10.0-160			9.29	30
Chloroform	25.0	1.01	27.4	25.2	106	96.8	1	29.0-154			8.37	28
Chloromethane	25.0	U	27.1	24.2	108	96.8	1	10.0-160			11.3	29
2-Chlorotoluene	25.0	U	24.3	23.4	97.2	93.6	1	32.0-153			3.77	28
4-Chlorotoluene	25.0	U	24.3	23.5	97.2	94.0	1	32.0-150			3.35	28
1,2-Dibromo-3-Chloropropane	25.0	U	24.5	25.5	98.0	102	1	22.0-151			4.00	34
1,2-Dibromoethane	25.0	U	25.4	24.3	102	97.2	1	34.0-147			4.43	27
Dibromomethane	25.0	U	28.0	27.4	112	110	1	30.0-151			2.17	27
1,2-Dichlorobenzene	25.0	U	25.4	25.1	102	100	1	34.0-149			1.19	28
1,3-Dichlorobenzene	25.0	U	24.5	24.0	98.0	96.0	1	36.0-146			2.06	27
1,4-Dichlorobenzene	25.0	U	25.3	24.4	101	97.6	1	35.0-142			3.62	27
Dichlorodifluoromethane	25.0	U	32.0	26.6	128	106	1	10.0-160			18.4	29
1,1-Dichloroethane	25.0	U	27.6	25.3	110	101	1	25.0-158			8.70	27
1,2-Dichloroethane	25.0	U	27.0	25.4	108	102	1	29.0-151			6.11	27
1,1-Dichloroethene	25.0	U	27.0	24.0	108	96.0	1	11.0-160			11.8	29
cis-1,2-Dichloroethene	25.0	0.302	26.2	24.2	104	95.6	1	10.0-160			7.94	27
trans-1,2-Dichloroethene	25.0	U	24.6	22.2	98.4	88.8	1	17.0-153			10.3	27
1,2-Dichloropropane	25.0	0.512	27.4	25.7	108	101	1	30.0-156			6.40	27
1,1-Dichloropropene	25.0	U	28.3	25.6	113	102	1	25.0-158			10.0	27
1,3-Dichloropropane	25.0	U	24.2	24.2	96.8	96.8	1	38.0-147			0.000	27
cis-1,3-Dichloropropene	25.0	U	27.2	25.6	109	102	1	34.0-149			6.06	28
trans-1,3-Dichloropropene	25.0	U	26.7	25.5	107	102	1	32.0-149			4.60	28
trans-1,4-Dichloro-2-butene	25.0	U	23.6	23.9	94.4	95.6	1	10.0-157			1.26	37
2,2-Dichloropropane	25.0	U	26.0	23.0	104	92.0	1	24.0-152			12.2	29
Di-isopropyl ether	25.0	U	28.5	27.1	114	108	1	21.0-160			5.04	28

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L1148487-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148487-01 10/15/19 07:24 • (MS) R3461125-4 10/15/19 09:50 • (MSD) R3461125-5 10/15/19 10:11

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	25.0	U	25.2	23.7	101	94.8	1	30.0-155			6.13	27
Hexachloro-1,3-butadiene	25.0	U	25.4	27.4	102	110	1	20.0-154			7.58	34
2-Hexanone	125	U	138	133	110	106	1	21.0-160			3.69	29
n-Hexane	25.0	U	27.8	25.9	111	104	1	10.0-153			7.08	28
Iodomethane	125	U	130	118	104	94.4	1	10.0-160			9.68	40
Isopropylbenzene	25.0	U	27.3	25.7	109	103	1	28.0-157			6.04	27
p-Isopropyltoluene	25.0	U	26.3	25.8	105	103	1	30.0-154			1.92	29
2-Butanone (MEK)	125	U	158	154	126	123	1	10.0-160			2.56	32
Methylene Chloride	25.0	U	24.3	22.5	97.2	90.0	1	23.0-144			7.69	28
4-Methyl-2-pentanone (MIBK)	125	U	141	138	113	110	1	29.0-160			2.15	29
Methyl tert-butyl ether	25.0	U	26.1	25.3	104	101	1	28.0-150			3.11	29
Naphthalene	25.0	U	24.5	26.7	98.0	107	1	12.0-156			8.59	35
n-Propylbenzene	25.0	U	24.2	23.1	96.8	92.4	1	31.0-154			4.65	28
Styrene	25.0	U	27.3	25.8	109	103	1	33.0-155			5.65	28
1,1,1,2-Tetrachloroethane	25.0	U	27.2	25.9	109	104	1	36.0-151			4.90	29
1,1,2,2-Tetrachloroethane	25.0	U	24.4	24.7	97.6	98.8	1	33.0-150			1.22	28
1,1,2-Trichlorotrifluoroethane	25.0	U	27.2	24.5	109	98.0	1	23.0-160			10.4	30
Tetrachloroethene	25.0	U	27.1	24.8	108	99.2	1	10.0-160			8.86	27
Toluene	25.0	U	24.7	22.9	98.8	91.6	1	26.0-154			7.56	28
1,2,3-Trichlorobenzene	25.0	U	26.4	28.6	106	114	1	17.0-150			8.00	36
1,2,4-Trichlorobenzene	25.0	U	25.5	26.6	102	106	1	24.0-150			4.22	33
1,1,1-Trichloroethane	25.0	0.232	30.3	27.2	120	108	1	23.0-160			10.8	28
1,1,2-Trichloroethane	25.0	U	25.2	24.1	101	96.4	1	35.0-147			4.46	27
Trichloroethene	25.0	2.14	29.6	27.2	110	100	1	10.0-160			8.45	25
Trichlorofluoromethane	25.0	U	33.7	30.2	135	121	1	17.0-160			11.0	31
1,2,3-Trichloropropane	25.0	U	24.0	23.5	96.0	94.0	1	34.0-151			2.11	29
1,2,4-Trimethylbenzene	25.0	U	23.8	23.1	95.2	92.4	1	26.0-154			2.99	27
1,2,3-Trimethylbenzene	25.0	U	24.7	23.9	98.8	95.6	1	32.0-149			3.29	28
1,3,5-Trimethylbenzene	25.0	U	24.7	24.1	98.8	96.4	1	28.0-153			2.46	27
Vinyl acetate	125	U	163	157	130	126	1	12.0-160			3.75	31
Vinyl chloride	25.0	0.139	28.8	25.4	115	101	1	10.0-160			12.5	27
Xylenes, Total	75.0	U	76.4	71.4	102	95.2	1	29.0-154			6.77	28
(S) Toluene-d8					*100*	*99.9*		*80.0-120*				
(S) 4-Bromofluorobenzene					*105*	*105*		*77.0-126*				
(S) 1,2-Dichloroethane-d4					*118*	*114*		*70.0-130*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3461296-3 10/15/19 10:02

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
cis-1,2-Dichloroethene	U		0.0933	0.500
Vinyl chloride	U		0.118	0.500
(S) Toluene-d8	*94.7*			*80.0-120*
(S) 4-Bromofluorobenzene	*93.1*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*85.2*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461296-1 10/15/19 09:03 • (LCSD) R3461296-2 10/15/19 09:23

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
cis-1,2-Dichloroethene	25.0	25.8	26.4	103	106	73.0-120			2.30	20
Vinyl chloride	25.0	26.0	27.6	104	110	67.0-131			5.97	20
(S) Toluene-d8				*93.5*	*93.1*	*80.0-120*				
(S) 4-Bromofluorobenzene				*95.6*	*94.6*	*77.0-126*				
(S) 1,2-Dichloroethane-d4				*85.9*	*81.0*	*70.0-130*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

MDL	Method Detection Limit.
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J0	J0: The identification of the analyte is acceptable, but the reported concentration is an estimate. The calibration met method criteria.
V	The sample concentration is too high to evaluate accurate spike recoveries.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

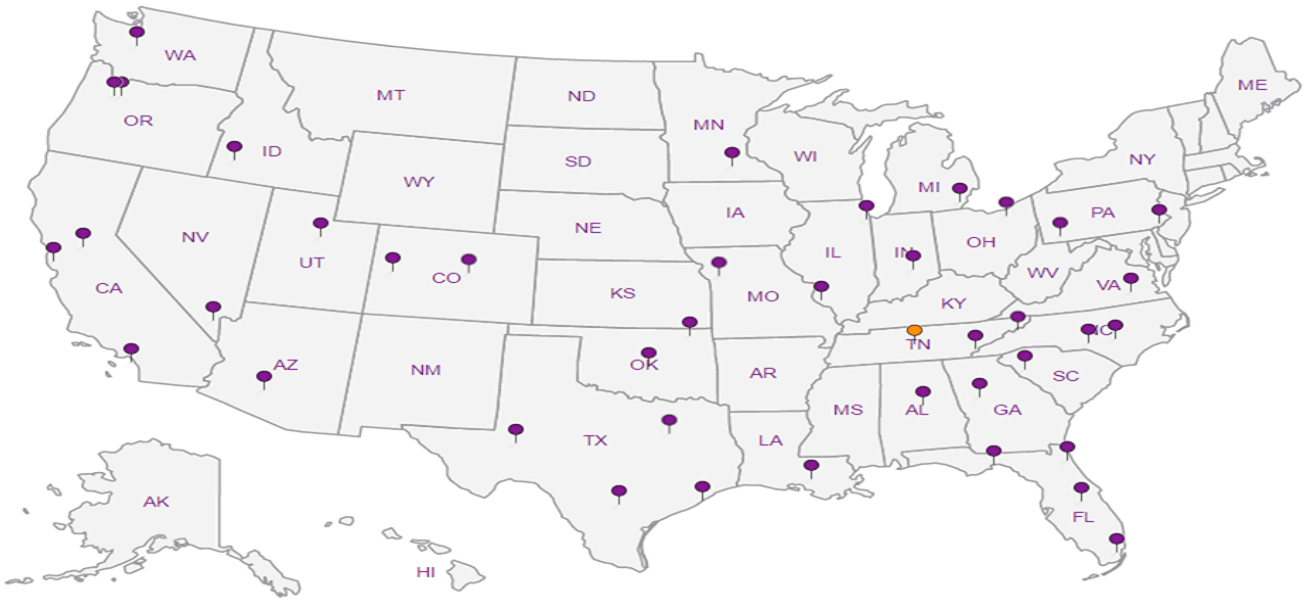
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



PES Environmental, Inc.- WA

1215 Fourth Ave., Suite 1350
Seattle, WA 98161

Billing Information:
Attn: Accounts Payable
1215 Fourth Ave., Ste. 1350
Seattle, WA 98161

Pres Chk

Report to: Brian O'Neal/Bill Haldeman

Email To: boneal@pesenv.com; bhaldeman@pesenv.com; KVIK@PESENV.com

Project Description: American Linen

City/State Collected: Seattle, WA

Please Circle: PT MT CT ET

Phone: 206-529-3980
Fax: 206-529-3985

Client Project #: American Linen

Lab Project #: PESENVSWA-ALP

Collected by (print): Ben Hecht

Site/Facility ID #: 1413.001.02.SOLE

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	*NO3,SO4,Cl* 125mlHDPE-NoPres	Alkalinity 125mlHDPE-NoPres	EEM RSK175LL 40mlAmb-HCl	TOC 250mlAmb-HCl	Total Fe, Mn 6020 250mlHDPE-HNO3	VOCs 8260LLC 40mlAmb-HCl	Remarks	Sample # (lab only)
MW-320-100719	Grab	GW	20	10-7-19	1222	9	X	X	X	X	X	X		-01
MW-322-100719	Grab	GW	59.5	" "	1350	9	X	X	X	X	X	X		-02
TRIP-100719	-	-	-	10-7-19	1530	1						X		-03

Chain of Custody Page ___ of ___

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

SDG # L1147264

B206

Acctnum: PESENVSWA

Template: T155685

Prelogin: P729671

PM: 110 - Brian Ford

PB: 9/12/19

Shipped Via: FedEX Ground

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks: No 250 Amb provided, No TOC

pH _____ Temp _____

Flow _____ Other _____

Samples returned via: __ UPS __ FedEx __ Courier _____

Tracking # 1703 5780 8718

Sample Receipt Checklist

COC Seal Present/Intact:	NP Y N
COC Signed/Accurate:	Y N
Bottles arrive intact:	Y N
Correct bottles used:	Y N
Sufficient volume sent:	Y N
If Applicable	
VOA Zero Headspace:	Y N
Preservation Correct/Checked:	Y N
RAD Screen <0.5 mR/hr:	Y N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
	10-7-19	1530	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)

Trip Blank Received: Yes / No
HCL / MeoH
TBR

Temp: 1.0-.2=0.8 °C AM AB3

Bottles Received: 18

Date: 10/8 Time: 0830

If preservation required by Login: Date/Time

Hold:

Condition: NCF / OK

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 18, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1147791
Samples Received:	10/09/2019
Project Number:	1413.001.02.501E
Description:	1413.001.02.501E
Site:	1431.001.02.501E
Report To:	Brian O'Neal/Bill Haldeman 1215 Fourth Ave., Suite 1350 Seattle, WA 98161

Entire Report Reviewed By:

Brian Ford

Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

TABLE OF CONTENTS

Cp: Cover Page 1

Tc: Table of Contents 2

Ss: Sample Summary 3

Cn: Case Narrative 4

Sr: Sample Results 5

MW-318-100819 L1147791-01 5

MW-319-100819 L1147791-02 7

TRIPBLANK-100919 L1147791-03 9

Qc: Quality Control Summary 11

Wet Chemistry by Method 2320 B-2011 11

Wet Chemistry by Method 9056A 12

Wet Chemistry by Method 9060A 16

Metals (ICPMS) by Method 6020B 18

Volatile Organic Compounds (GC) by Method RSK175 19

Volatile Organic Compounds (GC/MS) by Method 8260C 20

Gl: Glossary of Terms 24

Al: Accreditations & Locations 25

Sc: Sample Chain of Custody 26

MW-318-100819 L1147791-01 GW

Collected by: Ben Hecht | Collected date/time: 10/08/19 14:40 | Received date/time: 10/09/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362380	1	10/15/19 14:51	10/15/19 14:51	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1359667	1	10/09/19 17:14	10/09/19 17:14	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1359667	5	10/10/19 09:51	10/10/19 09:51	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1362294	1	10/13/19 18:41	10/13/19 18:41	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1360694	20	10/13/19 14:41	10/13/19 21:58	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1361751	1	10/12/19 07:37	10/12/19 07:37	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1364657	1	10/17/19 17:04	10/17/19 17:04	BMB	Mt. Juliet, TN

MW-319-100819 L1147791-02 GW

Collected by: Ben Hecht | Collected date/time: 10/08/19 12:50 | Received date/time: 10/09/19 08:30

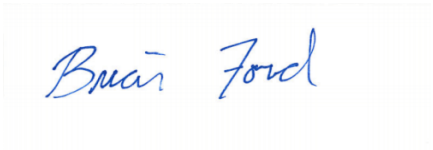
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1362380	1	10/15/19 14:58	10/15/19 14:58	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1359967	1	10/09/19 16:21	10/09/19 16:21	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1361408	1	10/12/19 14:04	10/12/19 14:04	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1360694	5	10/13/19 14:41	10/13/19 22:03	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1361751	1	10/12/19 07:40	10/12/19 07:40	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1364657	1	10/17/19 17:24	10/17/19 17:24	BMB	Mt. Juliet, TN

TRIPBLANK-100919 L1147791-03 GW

Collected by: Ben Hecht | Collected date/time: 10/08/19 15:00 | Received date/time: 10/09/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1364657	1	10/17/19 13:41	10/17/19 13:41	BMB	Mt. Juliet, TN

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	339000		2710	20000	1	10/15/2019 14:51	WG1362380

Sample Narrative:
L1147791-01 WG1362380: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	24100		51.9	1000	1	10/09/2019 17:14	WG1359667
Nitrate	U		22.7	100	1	10/09/2019 17:14	WG1359667
Sulfate	119000		387	25000	5	10/10/2019 09:51	WG1359667

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	6730		102	1000	1	10/13/2019 18:41	WG1362294

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	11700		300	2000	20	10/13/2019 21:58	WG1360694
Manganese	2330		5.00	100	20	10/13/2019 21:58	WG1360694

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	355		0.287	0.678	1	10/12/2019 07:37	WG1361751
Ethane	12.8		0.296	1.29	1	10/12/2019 07:37	WG1361751
Ethene	U		0.422	1.27	1	10/12/2019 07:37	WG1361751

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.15	J	1.05	25.0	1	10/17/2019 17:04	WG1364657
Acrylonitrile	U		0.873	5.00	1	10/17/2019 17:04	WG1364657
Benzene	5.75		0.0896	0.500	1	10/17/2019 17:04	WG1364657
Bromobenzene	U		0.133	0.500	1	10/17/2019 17:04	WG1364657
Bromodichloromethane	U		0.0800	0.500	1	10/17/2019 17:04	WG1364657
Bromochloromethane	U		0.145	0.500	1	10/17/2019 17:04	WG1364657
Bromoform	U		0.186	0.500	1	10/17/2019 17:04	WG1364657
Bromomethane	U		0.157	2.50	1	10/17/2019 17:04	WG1364657
n-Butylbenzene	U		0.143	0.500	1	10/17/2019 17:04	WG1364657
sec-Butylbenzene	U		0.134	0.500	1	10/17/2019 17:04	WG1364657
tert-Butylbenzene	U		0.183	0.500	1	10/17/2019 17:04	WG1364657
Carbon disulfide	U		0.101	0.500	1	10/17/2019 17:04	WG1364657
Carbon tetrachloride	U		0.159	0.500	1	10/17/2019 17:04	WG1364657
Chlorobenzene	U		0.140	0.500	1	10/17/2019 17:04	WG1364657
Chlorodibromomethane	U		0.128	0.500	1	10/17/2019 17:04	WG1364657
Chloroethane	U		0.141	2.50	1	10/17/2019 17:04	WG1364657
Chloroform	U		0.0860	0.500	1	10/17/2019 17:04	WG1364657
Chloromethane	U		0.153	1.25	1	10/17/2019 17:04	WG1364657
2-Chlorotoluene	U		0.111	0.500	1	10/17/2019 17:04	WG1364657
4-Chlorotoluene	U		0.0972	0.500	1	10/17/2019 17:04	WG1364657

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/17/2019 17:04	WG1364657
1,2-Dibromoethane	U		0.193	0.500	1	10/17/2019 17:04	WG1364657
Dibromomethane	U		0.117	0.500	1	10/17/2019 17:04	WG1364657
1,2-Dichlorobenzene	U		0.101	0.500	1	10/17/2019 17:04	WG1364657
1,3-Dichlorobenzene	U		0.130	0.500	1	10/17/2019 17:04	WG1364657
1,4-Dichlorobenzene	U		0.121	0.500	1	10/17/2019 17:04	WG1364657
Dichlorodifluoromethane	U		0.127	2.50	1	10/17/2019 17:04	WG1364657
1,1-Dichloroethane	0.490	J	0.114	0.500	1	10/17/2019 17:04	WG1364657
1,2-Dichloroethane	1.55		0.108	0.500	1	10/17/2019 17:04	WG1364657
1,1-Dichloroethene	U		0.188	0.500	1	10/17/2019 17:04	WG1364657
cis-1,2-Dichloroethene	6.52		0.0933	0.500	1	10/17/2019 17:04	WG1364657
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/17/2019 17:04	WG1364657
1,2-Dichloropropane	0.274	J	0.190	0.500	1	10/17/2019 17:04	WG1364657
1,1-Dichloropropene	U		0.128	0.500	1	10/17/2019 17:04	WG1364657
1,3-Dichloropropane	U		0.147	1.00	1	10/17/2019 17:04	WG1364657
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/17/2019 17:04	WG1364657
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/17/2019 17:04	WG1364657
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/17/2019 17:04	WG1364657
2,2-Dichloropropane	U		0.0929	0.500	1	10/17/2019 17:04	WG1364657
Di-isopropyl ether	U		0.0924	0.500	1	10/17/2019 17:04	WG1364657
Ethylbenzene	U		0.158	0.500	1	10/17/2019 17:04	WG1364657
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/17/2019 17:04	WG1364657
2-Hexanone	U		0.757	5.00	1	10/17/2019 17:04	WG1364657
n-Hexane	U		0.305	5.00	1	10/17/2019 17:04	WG1364657
Iodomethane	U		0.377	10.0	1	10/17/2019 17:04	WG1364657
Isopropylbenzene	U		0.126	0.500	1	10/17/2019 17:04	WG1364657
p-Isopropyltoluene	U		0.138	0.500	1	10/17/2019 17:04	WG1364657
2-Butanone (MEK)	U		1.28	5.00	1	10/17/2019 17:04	WG1364657
Methylene Chloride	U		1.07	2.50	1	10/17/2019 17:04	WG1364657
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/17/2019 17:04	WG1364657
Methyl tert-butyl ether	U		0.102	0.500	1	10/17/2019 17:04	WG1364657
Naphthalene	U		0.174	2.50	1	10/17/2019 17:04	WG1364657
n-Propylbenzene	U		0.162	0.500	1	10/17/2019 17:04	WG1364657
Styrene	U		0.117	0.500	1	10/17/2019 17:04	WG1364657
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/17/2019 17:04	WG1364657
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/17/2019 17:04	WG1364657
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/17/2019 17:04	WG1364657
Tetrachloroethene	U		0.199	0.500	1	10/17/2019 17:04	WG1364657
Toluene	0.495	J	0.412	0.500	1	10/17/2019 17:04	WG1364657
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/17/2019 17:04	WG1364657
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/17/2019 17:04	WG1364657
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/17/2019 17:04	WG1364657
1,1,2-Trichloroethane	U		0.186	0.500	1	10/17/2019 17:04	WG1364657
Trichloroethene	U		0.153	0.500	1	10/17/2019 17:04	WG1364657
Trichlorofluoromethane	U		0.130	2.50	1	10/17/2019 17:04	WG1364657
1,2,3-Trichloropropane	U		0.247	2.50	1	10/17/2019 17:04	WG1364657
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/17/2019 17:04	WG1364657
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/17/2019 17:04	WG1364657
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/17/2019 17:04	WG1364657
Vinyl acetate	U		0.645	5.00	1	10/17/2019 17:04	WG1364657
Vinyl chloride	8.65		0.118	0.500	1	10/17/2019 17:04	WG1364657
Xylenes, Total	U		0.316	1.50	1	10/17/2019 17:04	WG1364657
(S) Toluene-d8	*112*			*80.0-120*		*10/17/2019 17:04*	WG1364657
(S) 4-Bromofluorobenzene	*115*			*77.0-126*		*10/17/2019 17:04*	WG1364657
(S) 1,2-Dichloroethane-d4	*109*			*70.0-130*		*10/17/2019 17:04*	WG1364657

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	234000		2710	20000	1	10/15/2019 14:58	WG1362380

Sample Narrative:
L1147791-02 WG1362380: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	16500		51.9	1000	1	10/09/2019 16:21	WG1359967
Nitrate	U		22.7	100	1	10/09/2019 16:21	WG1359967
Sulfate	85000		77.4	5000	1	10/09/2019 16:21	WG1359967

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	1680	B	102	1000	1	10/12/2019 14:04	WG1361408

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	4300		75.0	500	5	10/13/2019 22:03	WG1360694
Manganese	854		1.25	25.0	5	10/13/2019 22:03	WG1360694

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	152		0.287	0.678	1	10/12/2019 07:40	WG1361751
Ethane	U		0.296	1.29	1	10/12/2019 07:40	WG1361751
Ethene	U		0.422	1.27	1	10/12/2019 07:40	WG1361751

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	U		1.05	25.0	1	10/17/2019 17:24	WG1364657
Acrylonitrile	U		0.873	5.00	1	10/17/2019 17:24	WG1364657
Benzene	U		0.0896	0.500	1	10/17/2019 17:24	WG1364657
Bromobenzene	U		0.133	0.500	1	10/17/2019 17:24	WG1364657
Bromodichloromethane	U		0.0800	0.500	1	10/17/2019 17:24	WG1364657
Bromochloromethane	U		0.145	0.500	1	10/17/2019 17:24	WG1364657
Bromoform	U		0.186	0.500	1	10/17/2019 17:24	WG1364657
Bromomethane	U		0.157	2.50	1	10/17/2019 17:24	WG1364657
n-Butylbenzene	U		0.143	0.500	1	10/17/2019 17:24	WG1364657
sec-Butylbenzene	U		0.134	0.500	1	10/17/2019 17:24	WG1364657
tert-Butylbenzene	U		0.183	0.500	1	10/17/2019 17:24	WG1364657
Carbon disulfide	0.505		0.101	0.500	1	10/17/2019 17:24	WG1364657
Carbon tetrachloride	U		0.159	0.500	1	10/17/2019 17:24	WG1364657
Chlorobenzene	U		0.140	0.500	1	10/17/2019 17:24	WG1364657
Chlorodibromomethane	U		0.128	0.500	1	10/17/2019 17:24	WG1364657
Chloroethane	U		0.141	2.50	1	10/17/2019 17:24	WG1364657
Chloroform	U		0.0860	0.500	1	10/17/2019 17:24	WG1364657
Chloromethane	U		0.153	1.25	1	10/17/2019 17:24	WG1364657
2-Chlorotoluene	U		0.111	0.500	1	10/17/2019 17:24	WG1364657
4-Chlorotoluene	U		0.0972	0.500	1	10/17/2019 17:24	WG1364657

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/17/2019 17:24	WG1364657
1,2-Dibromoethane	U		0.193	0.500	1	10/17/2019 17:24	WG1364657
Dibromomethane	U		0.117	0.500	1	10/17/2019 17:24	WG1364657
1,2-Dichlorobenzene	U		0.101	0.500	1	10/17/2019 17:24	WG1364657
1,3-Dichlorobenzene	U		0.130	0.500	1	10/17/2019 17:24	WG1364657
1,4-Dichlorobenzene	U		0.121	0.500	1	10/17/2019 17:24	WG1364657
Dichlorodifluoromethane	U		0.127	2.50	1	10/17/2019 17:24	WG1364657
1,1-Dichloroethane	0.641		0.114	0.500	1	10/17/2019 17:24	WG1364657
1,2-Dichloroethane	0.140	J	0.108	0.500	1	10/17/2019 17:24	WG1364657
1,1-Dichloroethene	0.292	J	0.188	0.500	1	10/17/2019 17:24	WG1364657
cis-1,2-Dichloroethene	53.4		0.0933	0.500	1	10/17/2019 17:24	WG1364657
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/17/2019 17:24	WG1364657
1,2-Dichloropropane	U		0.190	0.500	1	10/17/2019 17:24	WG1364657
1,1-Dichloropropene	U		0.128	0.500	1	10/17/2019 17:24	WG1364657
1,3-Dichloropropane	U		0.147	1.00	1	10/17/2019 17:24	WG1364657
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/17/2019 17:24	WG1364657
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/17/2019 17:24	WG1364657
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/17/2019 17:24	WG1364657
2,2-Dichloropropane	U		0.0929	0.500	1	10/17/2019 17:24	WG1364657
Di-isopropyl ether	U		0.0924	0.500	1	10/17/2019 17:24	WG1364657
Ethylbenzene	U		0.158	0.500	1	10/17/2019 17:24	WG1364657
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/17/2019 17:24	WG1364657
2-Hexanone	U		0.757	5.00	1	10/17/2019 17:24	WG1364657
n-Hexane	U		0.305	5.00	1	10/17/2019 17:24	WG1364657
Iodomethane	U		0.377	10.0	1	10/17/2019 17:24	WG1364657
Isopropylbenzene	U		0.126	0.500	1	10/17/2019 17:24	WG1364657
p-Isopropyltoluene	U		0.138	0.500	1	10/17/2019 17:24	WG1364657
2-Butanone (MEK)	U		1.28	5.00	1	10/17/2019 17:24	WG1364657
Methylene Chloride	U		1.07	2.50	1	10/17/2019 17:24	WG1364657
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/17/2019 17:24	WG1364657
Methyl tert-butyl ether	U		0.102	0.500	1	10/17/2019 17:24	WG1364657
Naphthalene	U		0.174	2.50	1	10/17/2019 17:24	WG1364657
n-Propylbenzene	U		0.162	0.500	1	10/17/2019 17:24	WG1364657
Styrene	U		0.117	0.500	1	10/17/2019 17:24	WG1364657
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/17/2019 17:24	WG1364657
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/17/2019 17:24	WG1364657
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/17/2019 17:24	WG1364657
Tetrachloroethene	0.609		0.199	0.500	1	10/17/2019 17:24	WG1364657
Toluene	U		0.412	0.500	1	10/17/2019 17:24	WG1364657
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/17/2019 17:24	WG1364657
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/17/2019 17:24	WG1364657
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/17/2019 17:24	WG1364657
1,1,2-Trichloroethane	U		0.186	0.500	1	10/17/2019 17:24	WG1364657
Trichloroethene	8.12		0.153	0.500	1	10/17/2019 17:24	WG1364657
Trichlorofluoromethane	U		0.130	2.50	1	10/17/2019 17:24	WG1364657
1,2,3-Trichloropropane	U		0.247	2.50	1	10/17/2019 17:24	WG1364657
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/17/2019 17:24	WG1364657
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/17/2019 17:24	WG1364657
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/17/2019 17:24	WG1364657
Vinyl acetate	U		0.645	5.00	1	10/17/2019 17:24	WG1364657
Vinyl chloride	5.76		0.118	0.500	1	10/17/2019 17:24	WG1364657
Xylenes, Total	U		0.316	1.50	1	10/17/2019 17:24	WG1364657
(S) Toluene-d8	*112*			*80.0-120*		*10/17/2019 17:24*	WG1364657
(S) 4-Bromofluorobenzene	*113*			*77.0-126*		*10/17/2019 17:24*	WG1364657
(S) 1,2-Dichloroethane-d4	*105*			*70.0-130*		*10/17/2019 17:24*	WG1364657

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.78	J	1.05	25.0	1	10/17/2019 13:41	WG1364657
Acrylonitrile	U		0.873	5.00	1	10/17/2019 13:41	WG1364657
Benzene	U		0.0896	0.500	1	10/17/2019 13:41	WG1364657
Bromobenzene	U		0.133	0.500	1	10/17/2019 13:41	WG1364657
Bromodichloromethane	U		0.0800	0.500	1	10/17/2019 13:41	WG1364657
Bromochloromethane	U		0.145	0.500	1	10/17/2019 13:41	WG1364657
Bromoform	U		0.186	0.500	1	10/17/2019 13:41	WG1364657
Bromomethane	U		0.157	2.50	1	10/17/2019 13:41	WG1364657
n-Butylbenzene	U		0.143	0.500	1	10/17/2019 13:41	WG1364657
sec-Butylbenzene	U		0.134	0.500	1	10/17/2019 13:41	WG1364657
tert-Butylbenzene	U		0.183	0.500	1	10/17/2019 13:41	WG1364657
Carbon disulfide	U		0.101	0.500	1	10/17/2019 13:41	WG1364657
Carbon tetrachloride	U		0.159	0.500	1	10/17/2019 13:41	WG1364657
Chlorobenzene	U		0.140	0.500	1	10/17/2019 13:41	WG1364657
Chlorodibromomethane	U		0.128	0.500	1	10/17/2019 13:41	WG1364657
Chloroethane	U		0.141	2.50	1	10/17/2019 13:41	WG1364657
Chloroform	U		0.0860	0.500	1	10/17/2019 13:41	WG1364657
Chloromethane	U		0.153	1.25	1	10/17/2019 13:41	WG1364657
2-Chlorotoluene	U		0.111	0.500	1	10/17/2019 13:41	WG1364657
4-Chlorotoluene	U		0.0972	0.500	1	10/17/2019 13:41	WG1364657
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/17/2019 13:41	WG1364657
1,2-Dibromoethane	U		0.193	0.500	1	10/17/2019 13:41	WG1364657
Dibromomethane	U		0.117	0.500	1	10/17/2019 13:41	WG1364657
1,2-Dichlorobenzene	U		0.101	0.500	1	10/17/2019 13:41	WG1364657
1,3-Dichlorobenzene	U		0.130	0.500	1	10/17/2019 13:41	WG1364657
1,4-Dichlorobenzene	U		0.121	0.500	1	10/17/2019 13:41	WG1364657
Dichlorodifluoromethane	U		0.127	2.50	1	10/17/2019 13:41	WG1364657
1,1-Dichloroethane	U		0.114	0.500	1	10/17/2019 13:41	WG1364657
1,2-Dichloroethane	U		0.108	0.500	1	10/17/2019 13:41	WG1364657
1,1-Dichloroethene	U		0.188	0.500	1	10/17/2019 13:41	WG1364657
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/17/2019 13:41	WG1364657
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/17/2019 13:41	WG1364657
1,2-Dichloropropane	U		0.190	0.500	1	10/17/2019 13:41	WG1364657
1,1-Dichloropropene	U		0.128	0.500	1	10/17/2019 13:41	WG1364657
1,3-Dichloropropane	U		0.147	1.00	1	10/17/2019 13:41	WG1364657
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/17/2019 13:41	WG1364657
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/17/2019 13:41	WG1364657
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/17/2019 13:41	WG1364657
2,2-Dichloropropane	U		0.0929	0.500	1	10/17/2019 13:41	WG1364657
Di-isopropyl ether	U		0.0924	0.500	1	10/17/2019 13:41	WG1364657
Ethylbenzene	U		0.158	0.500	1	10/17/2019 13:41	WG1364657
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/17/2019 13:41	WG1364657
2-Hexanone	U		0.757	5.00	1	10/17/2019 13:41	WG1364657
n-Hexane	U		0.305	5.00	1	10/17/2019 13:41	WG1364657
Iodomethane	U		0.377	10.0	1	10/17/2019 13:41	WG1364657
Isopropylbenzene	U		0.126	0.500	1	10/17/2019 13:41	WG1364657
p-Isopropyltoluene	U		0.138	0.500	1	10/17/2019 13:41	WG1364657
2-Butanone (MEK)	U		1.28	5.00	1	10/17/2019 13:41	WG1364657
Methylene Chloride	U		1.07	2.50	1	10/17/2019 13:41	WG1364657
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/17/2019 13:41	WG1364657
Methyl tert-butyl ether	U		0.102	0.500	1	10/17/2019 13:41	WG1364657
Naphthalene	U		0.174	2.50	1	10/17/2019 13:41	WG1364657
n-Propylbenzene	U		0.162	0.500	1	10/17/2019 13:41	WG1364657
Styrene	U		0.117	0.500	1	10/17/2019 13:41	WG1364657
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/17/2019 13:41	WG1364657
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/17/2019 13:41	WG1364657

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/17/2019 13:41	WG1364657
Tetrachloroethene	U		0.199	0.500	1	10/17/2019 13:41	WG1364657
Toluene	U		0.412	0.500	1	10/17/2019 13:41	WG1364657
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/17/2019 13:41	WG1364657
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/17/2019 13:41	WG1364657
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/17/2019 13:41	WG1364657
1,1,2-Trichloroethane	U		0.186	0.500	1	10/17/2019 13:41	WG1364657
Trichloroethene	U		0.153	0.500	1	10/17/2019 13:41	WG1364657
Trichlorofluoromethane	U		0.130	2.50	1	10/17/2019 13:41	WG1364657
1,2,3-Trichloropropane	U		0.247	2.50	1	10/17/2019 13:41	WG1364657
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/17/2019 13:41	WG1364657
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/17/2019 13:41	WG1364657
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/17/2019 13:41	WG1364657
Vinyl acetate	U		0.645	5.00	1	10/17/2019 13:41	WG1364657
Vinyl chloride	U		0.118	0.500	1	10/17/2019 13:41	WG1364657
Xylenes, Total	U		0.316	1.50	1	10/17/2019 13:41	WG1364657
(S) Toluene-d8	*112*			*80.0-120*		*10/17/2019 13:41*	WG1364657
(S) 4-Bromofluorobenzene	*114*			*77.0-126*		*10/17/2019 13:41*	WG1364657
(S) 1,2-Dichloroethane-d4	*104*			*70.0-130*		*10/17/2019 13:41*	WG1364657

Method Blank (MB)

(MB) R3461328-1 10/15/19 13:25

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Alkalinity	3660	J	2710	20000

Sample Narrative:

BLANK: Endpoint pH 4.5

L1147759-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1147759-01 10/15/19 13:42 • (DUP) R3461328-2 10/15/19 13:50

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	86100	87900	1	2.05		20

Sample Narrative:

OS: Endpoint pH 4.5 HEADSPACE

DUP: Endpoint pH 4.5

L1147836-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1147836-01 10/15/19 15:29 • (DUP) R3461328-4 10/15/19 15:37

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	29000	28800	1	0.445		20

Sample Narrative:

OS: Endpoint pH 4.5

DUP: Endpoint pH 4.5

Laboratory Control Sample (LCS)

(LCS) R3461328-3 10/15/19 14:42

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Alkalinity	100000	99500	99.5	85.0-115	

Sample Narrative:

LCS: Endpoint pH 4.5

Method Blank (MB)

(MB) R3459685-1 10/09/19 09:03

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	U		51.9	1000
Nitrate	26.7	J	22.7	100
Sulfate	U		77.4	5000

L1147506-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1147506-01 10/09/19 10:51 • (DUP) R3459685-3 10/09/19 11:06

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	47700	47200	1	1.15		15
Nitrate	ND	0.000	1	0.000		15
Sulfate	46700	46900	1	0.300		15

L1147759-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1147759-01 10/09/19 14:50 • (DUP) R3459685-6 10/09/19 15:04

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	10500	10600	1	1.51		15
Nitrate	451	507	1	11.8		15
Sulfate	5300	5550	1	4.63		15

L1147506-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1147506-01 10/09/19 10:51 • (DUP) R3459685-8 10/10/19 09:22

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	47700	47800	1	0.169		15
Nitrate	ND	0.000	1	0.000		15
Sulfate	46700	45100	1	3.59		15

Laboratory Control Sample (LCS)

(LCS) R3459685-2 10/09/19 10:16

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	38500	96.2	80.0-120	
Nitrate	8000	8000	100	80.0-120	
Sulfate	40000	39300	98.2	80.0-120	

L1147506-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1147506-01 10/09/19 10:51 • (MS) R3459685-4 10/09/19 11:20 • (MSD) R3459685-5 10/09/19 11:34

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	47700	95800	95600	96.1	95.8	1	80.0-120			0.160	15
Nitrate	5000	ND	5160	5100	103	102	1	80.0-120			1.12	15
Sulfate	50000	46700	94200	94200	94.9	94.9	1	80.0-120			0.00860	15

L1147759-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L1147759-01 10/09/19 14:50 • (MS) R3459685-7 10/09/19 15:18

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	10500	60200	99.5	1	80.0-120	
Nitrate	5000	451	5660	104	1	80.0-120	
Sulfate	50000	5300	56200	102	1	80.0-120	

Method Blank (MB)

(MB) R3459637-1 10/09/19 09:15

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Chloride	U		51.9	1000
Nitrate	U		22.7	100
Sulfate	U		77.4	5000

L1147783-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1147783-01 10/09/19 15:46 • (DUP) R3459637-3 10/09/19 16:03

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Chloride	375000	374000	1	0.112	E	15
Nitrate	5450	5430	1	0.357		15
Sulfate	320000	319000	1	0.196	E	15

L1147817-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1147817-05 10/09/19 21:21 • (DUP) R3459637-6 10/09/19 21:38

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Chloride	68600	68500	1	0.167		15
Nitrate	499	497	1	0.502		15

L1147817-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1147817-05 10/10/19 08:42 • (DUP) R3459637-8 10/10/19 08:59

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Sulfate	102000	101000	5	0.577		15

Laboratory Control Sample (LCS)

(LCS) R3459637-2 10/09/19 09:33

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
	ug/l	ug/l	%	%	
Chloride	40000	38700	96.8	80.0-120	
Nitrate	8000	7560	94.5	80.0-120	
Sulfate	40000	39500	98.8	80.0-120	

L1147791-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1147791-02 10/09/19 16:21 • (MS) R3459637-4 10/09/19 16:39 • (MSD) R3459637-5 10/09/19 17:31

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	16500	65700	65400	98.4	97.8	1	80.0-120			0.484	15
Nitrate	5000	U	4830	4950	96.7	99.0	1	80.0-120			2.39	15
Sulfate	50000	85000	129000	129000	87.2	87.8	1	80.0-120	E	E	0.263	15

L1147817-11 Original Sample (OS) • Matrix Spike (MS)

(OS) L1147817-11 10/09/19 23:24 • (MS) R3459637-7 10/09/19 23:42

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	40200	88200	96.0	1	80.0-120	
Nitrate	5000	U	4960	99.2	1	80.0-120	
Sulfate	50000	4820	54700	99.8	1	80.0-120	

Method Blank (MB)

(MB) R3460434-1 10/11/19 12:20

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
TOC (Total Organic Carbon)	268	J	102	1000

L1147504-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1147504-01 10/11/19 14:34 • (DUP) R3460434-3 10/11/19 14:48

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	14400	14500	1	0.346		20

L1147595-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1147595-04 10/12/19 11:21 • (DUP) R3460434-6 10/12/19 11:36

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	ND	319	1	6.60	J	20

Laboratory Control Sample (LCS)

(LCS) R3460434-2 10/11/19 12:51

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TOC (Total Organic Carbon)	75000	73100	97.4	85.0-115	

L1147591-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1147591-01 10/12/19 09:53 • (MS) R3460434-4 10/12/19 10:10 • (MSD) R3460434-5 10/12/19 10:29

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	2630	50700	50800	96.2	96.3	1	80.0-120			0.118	20

Method Blank (MB)

(MB) R3461010-1 10/13/19 17:37

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
TOC (Total Organic Carbon)	662	J	102	1000

L1148464-41 Original Sample (OS) • Duplicate (DUP)

(OS) L1148464-41 10/13/19 19:54 • (DUP) R3461010-3 10/13/19 20:12

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	ND	640	1	11.4	J	20

L1148844-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1148844-06 10/14/19 00:29 • (DUP) R3461010-6 10/14/19 00:50

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	27900	28400	1	1.67		20

Laboratory Control Sample (LCS)

(LCS) R3461010-2 10/13/19 18:20

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TOC (Total Organic Carbon)	75000	77100	103	85.0-115	

L1148844-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148844-04 10/13/19 23:08 • (MS) R3461010-4 10/13/19 23:29 • (MSD) R3461010-5 10/13/19 23:50

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	4760	56900	55100	104	101	1	80.0-120			3.30	20

L1148900-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148900-04 10/14/19 03:05 • (MS) R3461010-7 10/14/19 03:26 • (MSD) R3461010-8 10/14/19 03:49

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	5310	57700	57900	105	105	1	80.0-120			0.380	20

Method Blank (MB)

(MB) R3460588-1 10/13/19 19:20

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Iron	U		15.0	100
Manganese	U		0.250	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3460588-2 10/13/19 19:25 • (LCSD) R3460588-3 10/13/19 19:29

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Iron	5000	4810	4750	96.1	95.0	80.0-120			1.16	20
Manganese	50.0	48.3	47.7	96.7	95.3	80.0-120			1.39	20

L1147631-15 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1147631-15 10/13/19 19:34 • (MS) R3460588-5 10/13/19 19:43 • (MSD) R3460588-6 10/13/19 19:48

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	ug/l	%	%		%			%	%
Iron	5000	37.6	4920	4800	97.6	95.3	1	75.0-125			2.37	20
Manganese	50.0	3.17	51.5	50.4	96.6	94.5	1	75.0-125			2.04	20

Method Blank (MB)

(MB) R3460315-1 10/12/19 05:49

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1147409-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1147409-01 10/12/19 06:15 • (DUP) R3460315-2 10/12/19 07:17

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	169	179	1	5.68		20
Ethane	4.30	4.52	1	4.90		20
Ethene	U	0.000	1	0.000		20

L1148238-09 Original Sample (OS) • Duplicate (DUP)

(OS) L1148238-09 10/12/19 07:51 • (DUP) R3460315-3 10/12/19 07:53

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	573	586	1	2.21		20
Ethane	ND	7.66	1	0.0732		20
Ethene	23.1	24.2	1	4.51		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3460315-4 10/12/19 08:00 • (LCSD) R3460315-5 10/12/19 08:03

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	72.8	73.9	107	109	85.0-115			1.49	20
Ethane	129	128	130	99.0	101	85.0-115			1.69	20
Ethene	127	134	135	105	106	85.0-115			1.08	20

Method Blank (MB)

(MB) R3462245-3 10/17/19 12:06

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3462245-3 10/17/19 12:06

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*113*			*80.0-120*
(S) 4-Bromofluorobenzene	*108*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3462245-1 10/17/19 11:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	159	127	19.0-160	
Acrylonitrile	125	136	109	55.0-149	
Benzene	25.0	21.8	87.2	70.0-123	
Bromobenzene	25.0	21.6	86.4	73.0-121	
Bromodichloromethane	25.0	22.7	90.8	75.0-120	
Bromochloromethane	25.0	25.5	102	76.0-122	
Bromoform	25.0	29.0	116	68.0-132	
Bromomethane	25.0	22.7	90.8	10.0-160	
n-Butylbenzene	25.0	22.8	91.2	73.0-125	
sec-Butylbenzene	25.0	23.2	92.8	75.0-125	
tert-Butylbenzene	25.0	25.3	101	76.0-124	
Carbon disulfide	25.0	21.1	84.4	61.0-128	
Carbon tetrachloride	25.0	25.6	102	68.0-126	
Chlorobenzene	25.0	24.7	98.8	80.0-121	
Chlorodibromomethane	25.0	27.7	111	77.0-125	
Chloroethane	25.0	23.8	95.2	47.0-150	
Chloroform	25.0	21.1	84.4	73.0-120	
Chloromethane	25.0	22.2	88.8	41.0-142	
2-Chlorotoluene	25.0	22.5	90.0	76.0-123	
4-Chlorotoluene	25.0	22.5	90.0	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	26.4	106	58.0-134	
1,2-Dibromoethane	25.0	24.1	96.4	80.0-122	
Dibromomethane	25.0	25.3	101	80.0-120	
1,2-Dichlorobenzene	25.0	25.3	101	79.0-121	
1,3-Dichlorobenzene	25.0	24.3	97.2	79.0-120	
1,4-Dichlorobenzene	25.0	22.9	91.6	79.0-120	
Dichlorodifluoromethane	25.0	20.9	83.6	51.0-149	
1,1-Dichloroethane	25.0	22.7	90.8	70.0-126	
1,2-Dichloroethane	25.0	22.6	90.4	70.0-128	
1,1-Dichloroethene	25.0	23.3	93.2	71.0-124	
cis-1,2-Dichloroethene	25.0	23.0	92.0	73.0-120	
trans-1,2-Dichloroethene	25.0	22.3	89.2	73.0-120	
1,2-Dichloropropane	25.0	23.7	94.8	77.0-125	
1,1-Dichloropropene	25.0	22.2	88.8	74.0-126	
1,3-Dichloropropane	25.0	23.9	95.6	80.0-120	
cis-1,3-Dichloropropene	25.0	23.7	94.8	80.0-123	
trans-1,3-Dichloropropene	25.0	24.6	98.4	78.0-124	
trans-1,4-Dichloro-2-butene	25.0	25.5	102	33.0-144	
2,2-Dichloropropane	25.0	23.8	95.2	58.0-130	
Di-isopropyl ether	25.0	25.2	101	58.0-138	

Laboratory Control Sample (LCS)

(LCS) R3462245-1 10/17/19 11:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	23.9	95.6	79.0-123	
Hexachloro-1,3-butadiene	25.0	24.2	96.8	54.0-138	
2-Hexanone	125	138	110	67.0-149	
n-Hexane	25.0	23.0	92.0	57.0-133	
Iodomethane	125	125	100	33.0-147	
Isopropylbenzene	25.0	26.4	106	76.0-127	
p-Isopropyltoluene	25.0	24.4	97.6	76.0-125	
2-Butanone (MEK)	125	140	112	44.0-160	
Methylene Chloride	25.0	21.5	86.0	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	144	115	68.0-142	
Methyl tert-butyl ether	25.0	24.4	97.6	68.0-125	
Naphthalene	25.0	25.6	102	54.0-135	
n-Propylbenzene	25.0	23.1	92.4	77.0-124	
Styrene	25.0	25.9	104	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	27.4	110	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	23.2	92.8	65.0-130	
1,1,2-Trichlorotrifluoroethane	25.0	24.0	96.0	69.0-132	
Tetrachloroethene	25.0	25.4	102	72.0-132	
Toluene	25.0	23.4	93.6	79.0-120	
1,2,3-Trichlorobenzene	25.0	26.6	106	50.0-138	
1,2,4-Trichlorobenzene	25.0	25.6	102	57.0-137	
1,1,1-Trichloroethane	25.0	24.2	96.8	73.0-124	
1,1,2-Trichloroethane	25.0	24.7	98.8	80.0-120	
Trichloroethene	25.0	24.1	96.4	78.0-124	
Trichlorofluoromethane	25.0	23.8	95.2	59.0-147	
1,2,3-Trichloropropane	25.0	23.7	94.8	73.0-130	
1,2,4-Trimethylbenzene	25.0	22.8	91.2	76.0-121	
1,2,3-Trimethylbenzene	25.0	22.7	90.8	77.0-120	
1,3,5-Trimethylbenzene	25.0	23.5	94.0	76.0-122	
Vinyl acetate	125	140	112	11.0-160	
Vinyl chloride	25.0	23.1	92.4	67.0-131	
Xylenes, Total	75.0	74.6	99.5	79.0-123	
(S) Toluene-d8			*110*	*80.0-120*	
(S) 4-Bromofluorobenzene			*113*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*108*	*70.0-130*	

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

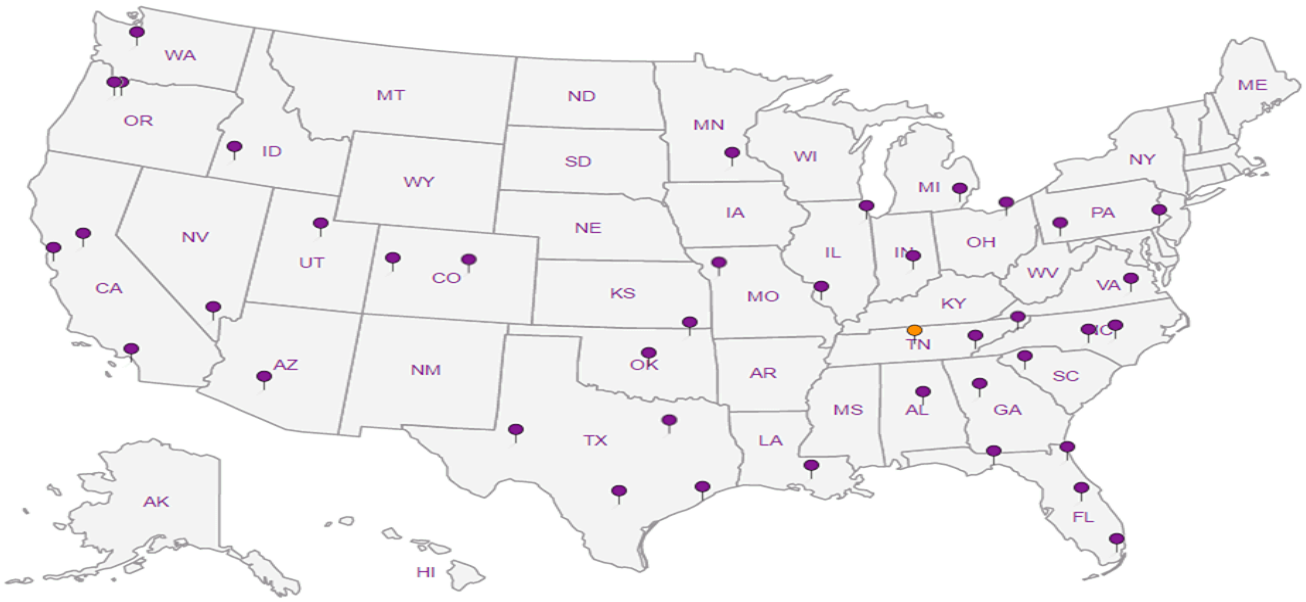
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



CHAIN-OF-CUSTODY Analytical Request Document

Pace Analytical®

Chain-of-Custody is a LEGAL DOCUMENT - Complete all relevent fields

LAB USE ONLY- Affix Workorder/Login Label Here or List Pace Workorder Number or MTJL Log-in Number Here

ALL SHADED AREAS are for LAB USE ONLY

Company: **PES Environmental, Inc.**	Billing Information: **Attn: Accounts Payable 1215 4th Ave STE 1350, Seattle, WA 98161**
Address: **1215 4th Ave STE 1350, Seattle, WA 98161**	
Report To: **Bill Haldeman/Brian O'Neal**	Email To: **bhaldeman@pesenv.com; boneal@pesenv.com**
Copy To: **Kim Vik, Shannon McKernan, Karsten Springstead**	Site Collection Info/Address: **700 Dexter Ave N**
Customer Project Name/Number: American Linen **1413.001.02.501E**	State: **WA** / County/City: **King/Seattle** Time Zone Collected: [x]PT [ ]MT [ ]CT [ ]ET
Phone: 206-529-3980 Email: **mjoiner@pesenv.com**	Site/Facility ID #: **1413.001.02.501E** Compliance Monitoring? [x] Yes [ ] No
Collected By (print): **Ben Hecht**	Purchase Order # : **1413.001.02.501E** Quote #: **PESENVSWA-ALP** DW PWS ID #: DW Location Code:
Collected By (signature):	Turnaround Date Required: Immediately Packed on Ice: [x] Yes [ ] No
Sample Disposal: [ ] Dispose as appropriate [ ] Return [ ] Archive: _____ [ ] Hold: _____	Rush: [ ] Same Day [ ] Next Day [ ] 2 Day [ ] 3 Day [ ] 4 Day [ ] 5 Day (Expedite Charges Apply) Field Filtered (if applicable): [ ] Yes [ ] No Analysis: _____

* Matrix Codes (Insert in Matrix box below): Drinking Water (DW), Ground Water (GW), Wastewater (WW), Product (P), Soil/Solid (SL), Oil (OL), Wipe (WP), Air (AR), Tissue (TS), Bioassay (B), Vapor (V), Other (OT)

Customer Sample ID	Matrix *	Comp / Grab	Collected (or Composite Start) Date	Collected (or Composite Start) Time	Composite End Date	Composite End Time	Res Cl	# of Ctns	*NO3, SO4, Cl* 125mlHDPE-NoPres	Alkalinity 125mlHDPE-NoPres	EEM RSK175LL 40mlAmb-HCl	TOC 250mlAmb-HCl or 250mlHDPE-HCl	Total Fe, Mn 6020 250mlHDPE-HNO3	VOCs 8260LLC 40mlAmb-HCl	Lab Profile/Line:
~~MW-317-100819~~	~~GW~~	~~Grab~~	~~10/08/19~~					~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	
MW-318-100819	GW	Grab	10/08/19	1440				9	X	X	X	X	X	X	-01
MW-319-100819	GW	Grab	10/08/19	1250				9	X	X	X	X	X	X	02
TripBlank-100919	AG	-	10/08/19	1500				1						X	03

13H 10-8-19

B018

Container Preservative Type **

Lab Project Manager:

** Preservative Types: (1) nitric acid, (2) sulfuric acid, (3) hydrochloric acid, (4) sodium hydroxide, (5) zinc acetate, (6) methanol, (7) sodium bisulfate, (8) sodium thiosulfate, (9) hexane, (A) ascorbic acid, (B) ammonium sulfate, (C) ammonium hydroxide, (D) TSP, (U) Unpreserved, (O) Other _____

Analyses

Lab Profile/Line:

Lab Sample Receipt Checklist:

Custody Seals Present/Intact	Y	N	~~NA~~
Custody Signatures Present	Y	N	~~NA~~
Collector Signature Present	~~Y~~	N	NA
Bottles Intact	~~Y~~	N	NA
Correct Bottles	~~Y~~	N	NA
Sufficient Volume	~~Y~~	N	NA
Samples Received on Ice	~~Y~~	N	NA
VOA - Headspace Acceptable	Y	N	~~NA~~
USDA Regulated Soils	Y	N	~~NA~~
Samples in Holding Time	~~Y~~	N	NA
Residual Chlorine Present	Y	N	~~NA~~
Cl Strips: _____			
Sample pH Acceptable	Y	N	~~NA~~
pH Strips: _____			
Sulfide Present	Y	N	~~NA~~
Lead Acetate Strips: _____			

LAB USE ONLY:
Lab Sample # / Comments:

1147791

Customer Remarks / Special Conditions / Possible Hazards:

Type of Ice Used: Wet Blue Dry None

Packing Material Used:

Radchem sample(s) screened (<500 cpm): Y N NA

SHORT HOLDS PRESENT (<72 hours): Y N N/A

Lab Tracking #: 1803 5774 6530

Samples received via: FEDEX UPS Client Courier Pace Courier

LAB Sample Temperature Info:
Temp Blank Received: Y N NA
Therm ID#: A3
Cooler 1 Temp Upon Receipt: 1.2 oC
Cooler 1 Therm Corr. Factor: -.1 oC
Cooler 1 Corrected Temp: 1.1 oC
Comments: AR

Relinquished by/Company: (Signature)	Date/Time: 10-8-19 @ 15:00	Received by/Company: (Signature)	Date/Time:	MTJL LAB USE ONLY Table #:	RAD SCREEN: <0.5 mR/hr
Relinquished by/Company: (Signature)	Date/Time:	Received by/Company: (Signature)	Date/Time:	Acctnum: Template: Prelogin:	Trip Blank Received: Y N NA HCL MeOH TSP Other
Relinquished by/Company: (Signature)	Date/Time:	Received by/Company: (Signature)	Date/Time: 10/9 0830	PM: PB:	Non Conformance(s): YES / NO Page: _____ of: _____

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 18, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1148422
Samples Received:	10/10/2019
Project Number:	1413.001.02.501E
Description:	American Linen
Site:	AMERICAN LINEN
Report To:	Brian O'Neal/Bill Haldeman
	1215 Fourth Ave., Suite 1350
	Seattle, WA 98161

Entire Report Reviewed By:

Brian Ford

Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

Cp: Cover Page 1

Tc: Table of Contents 2

Ss: Sample Summary 3

Cn: Case Narrative 4

Sr: Sample Results 5

MW-323-100919 L1148422-01 5

MW-317-100919 L1148422-02 7

SCL-MW101-100919 L1148422-03 9

Qc: Quality Control Summary 11

Wet Chemistry by Method 2320 B-2011 11

Wet Chemistry by Method 9056A 12

Wet Chemistry by Method 9060A 14

Metals (ICPMS) by Method 6020B 15

Volatile Organic Compounds (GC) by Method RSK175 16

Volatile Organic Compounds (GC/MS) by Method 8260C 18

Gl: Glossary of Terms 22

Al: Accreditations & Locations 23

Sc: Sample Chain of Custody 24

MW-323-100919 L1148422-01 GW

Collected by: Hannah Cohen | Collected date/time: 10/09/19 11:35 | Received date/time: 10/10/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1363488	1	10/16/19 00:31	10/16/19 00:31	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1360711	1	10/11/19 01:18	10/11/19 01:18	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1362106	1	10/12/19 20:56	10/12/19 20:56	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1362075	1	10/15/19 09:07	10/15/19 16:50	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1362474	1	10/14/19 15:10	10/14/19 15:10	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1364657	1	10/17/19 18:46	10/17/19 18:46	BMB	Mt. Juliet, TN

MW-317-100919 L1148422-02 GW

Collected by: Hannah Cohen | Collected date/time: 10/09/19 13:15 | Received date/time: 10/10/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1363488	1	10/16/19 00:39	10/16/19 00:39	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1360711	1	10/11/19 02:01	10/11/19 02:01	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1362106	1	10/12/19 21:11	10/12/19 21:11	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1362075	20	10/15/19 09:07	10/15/19 17:29	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1362474	1	10/14/19 15:12	10/14/19 15:12	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1362983	10	10/15/19 11:14	10/15/19 11:14	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1364657	1	10/17/19 19:06	10/17/19 19:06	BMB	Mt. Juliet, TN

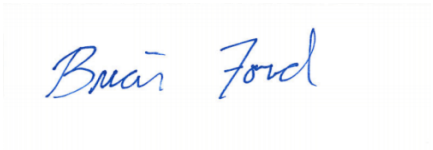
SCL-MW101-100919 L1148422-03 GW

Collected by: Hannah Cohen | Collected date/time: 10/09/19 15:50 | Received date/time: 10/10/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1364657	1	10/17/19 19:26	10/17/19 19:26	BMB	Mt. Juliet, TN

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	135000		2710	20000	1	10/16/2019 00:31	WG1363488

Sample Narrative:

L1148422-01 WG1363488: Endpoint pH 4.5 headspace

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	11500		51.9	1000	1	10/11/2019 01:18	WG1360711
Nitrate	1610		22.7	100	1	10/11/2019 01:18	WG1360711
Sulfate	13800		77.4	5000	1	10/11/2019 01:18	WG1360711

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	964	B J	102	1000	1	10/12/2019 20:56	WG1362106

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	273		15.0	100	1	10/15/2019 16:50	WG1362075
Manganese	160		0.250	5.00	1	10/15/2019 16:50	WG1362075

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	75.5		0.287	0.678	1	10/14/2019 15:10	WG1362474
Ethane	12.3		0.296	1.29	1	10/14/2019 15:10	WG1362474
Ethene	3.27		0.422	1.27	1	10/14/2019 15:10	WG1362474

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	2.67	J	1.05	25.0	1	10/17/2019 18:46	WG1364657
Acrylonitrile	U		0.873	5.00	1	10/17/2019 18:46	WG1364657
Benzene	U		0.0896	0.500	1	10/17/2019 18:46	WG1364657
Bromobenzene	U		0.133	0.500	1	10/17/2019 18:46	WG1364657
Bromodichloromethane	U		0.0800	0.500	1	10/17/2019 18:46	WG1364657
Bromochloromethane	U		0.145	0.500	1	10/17/2019 18:46	WG1364657
Bromoform	U		0.186	0.500	1	10/17/2019 18:46	WG1364657
Bromomethane	U		0.157	2.50	1	10/17/2019 18:46	WG1364657
n-Butylbenzene	U		0.143	0.500	1	10/17/2019 18:46	WG1364657
sec-Butylbenzene	U		0.134	0.500	1	10/17/2019 18:46	WG1364657
tert-Butylbenzene	U		0.183	0.500	1	10/17/2019 18:46	WG1364657
Carbon disulfide	U		0.101	0.500	1	10/17/2019 18:46	WG1364657
Carbon tetrachloride	U		0.159	0.500	1	10/17/2019 18:46	WG1364657
Chlorobenzene	U		0.140	0.500	1	10/17/2019 18:46	WG1364657
Chlorodibromomethane	U		0.128	0.500	1	10/17/2019 18:46	WG1364657
Chloroethane	U		0.141	2.50	1	10/17/2019 18:46	WG1364657
Chloroform	U		0.0860	0.500	1	10/17/2019 18:46	WG1364657
Chloromethane	U		0.153	1.25	1	10/17/2019 18:46	WG1364657
2-Chlorotoluene	U		0.111	0.500	1	10/17/2019 18:46	WG1364657
4-Chlorotoluene	U		0.0972	0.500	1	10/17/2019 18:46	WG1364657

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/17/2019 18:46	WG1364657
1,2-Dibromoethane	U		0.193	0.500	1	10/17/2019 18:46	WG1364657
Dibromomethane	U		0.117	0.500	1	10/17/2019 18:46	WG1364657
1,2-Dichlorobenzene	U		0.101	0.500	1	10/17/2019 18:46	WG1364657
1,3-Dichlorobenzene	U		0.130	0.500	1	10/17/2019 18:46	WG1364657
1,4-Dichlorobenzene	U		0.121	0.500	1	10/17/2019 18:46	WG1364657
Dichlorodifluoromethane	U		0.127	2.50	1	10/17/2019 18:46	WG1364657
1,1-Dichloroethane	U		0.114	0.500	1	10/17/2019 18:46	WG1364657
1,2-Dichloroethane	U		0.108	0.500	1	10/17/2019 18:46	WG1364657
1,1-Dichloroethene	0.276	J	0.188	0.500	1	10/17/2019 18:46	WG1364657
cis-1,2-Dichloroethene	66.5		0.0933	0.500	1	10/17/2019 18:46	WG1364657
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/17/2019 18:46	WG1364657
1,2-Dichloropropane	U		0.190	0.500	1	10/17/2019 18:46	WG1364657
1,1-Dichloropropene	U		0.128	0.500	1	10/17/2019 18:46	WG1364657
1,3-Dichloropropane	U		0.147	1.00	1	10/17/2019 18:46	WG1364657
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/17/2019 18:46	WG1364657
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/17/2019 18:46	WG1364657
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/17/2019 18:46	WG1364657
2,2-Dichloropropane	U		0.0929	0.500	1	10/17/2019 18:46	WG1364657
Di-isopropyl ether	U		0.0924	0.500	1	10/17/2019 18:46	WG1364657
Ethylbenzene	U		0.158	0.500	1	10/17/2019 18:46	WG1364657
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/17/2019 18:46	WG1364657
2-Hexanone	U		0.757	5.00	1	10/17/2019 18:46	WG1364657
n-Hexane	U		0.305	5.00	1	10/17/2019 18:46	WG1364657
Iodomethane	U		0.377	10.0	1	10/17/2019 18:46	WG1364657
Isopropylbenzene	0.308	J	0.126	0.500	1	10/17/2019 18:46	WG1364657
p-Isopropyltoluene	U		0.138	0.500	1	10/17/2019 18:46	WG1364657
2-Butanone (MEK)	U		1.28	5.00	1	10/17/2019 18:46	WG1364657
Methylene Chloride	U		1.07	2.50	1	10/17/2019 18:46	WG1364657
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/17/2019 18:46	WG1364657
Methyl tert-butyl ether	U		0.102	0.500	1	10/17/2019 18:46	WG1364657
Naphthalene	U		0.174	2.50	1	10/17/2019 18:46	WG1364657
n-Propylbenzene	U		0.162	0.500	1	10/17/2019 18:46	WG1364657
Styrene	U		0.117	0.500	1	10/17/2019 18:46	WG1364657
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/17/2019 18:46	WG1364657
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/17/2019 18:46	WG1364657
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/17/2019 18:46	WG1364657
Tetrachloroethene	U		0.199	0.500	1	10/17/2019 18:46	WG1364657
Toluene	4.97		0.412	0.500	1	10/17/2019 18:46	WG1364657
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/17/2019 18:46	WG1364657
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/17/2019 18:46	WG1364657
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/17/2019 18:46	WG1364657
1,1,2-Trichloroethane	U		0.186	0.500	1	10/17/2019 18:46	WG1364657
Trichloroethene	0.891		0.153	0.500	1	10/17/2019 18:46	WG1364657
Trichlorofluoromethane	U		0.130	2.50	1	10/17/2019 18:46	WG1364657
1,2,3-Trichloropropane	U		0.247	2.50	1	10/17/2019 18:46	WG1364657
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/17/2019 18:46	WG1364657
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/17/2019 18:46	WG1364657
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/17/2019 18:46	WG1364657
Vinyl acetate	U		0.645	5.00	1	10/17/2019 18:46	WG1364657
Vinyl chloride	13.4		0.118	0.500	1	10/17/2019 18:46	WG1364657
Xylenes, Total	U		0.316	1.50	1	10/17/2019 18:46	WG1364657
(S) Toluene-d8	*113*			*80.0-120*		*10/17/2019 18:46*	WG1364657
(S) 4-Bromofluorobenzene	*114*			*77.0-126*		*10/17/2019 18:46*	WG1364657
(S) 1,2-Dichloroethane-d4	*105*			*70.0-130*		*10/17/2019 18:46*	WG1364657

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	404000		2710	20000	1	10/16/2019 00:39	WG1363488

Sample Narrative:

L1148422-02 WG1363488: Endpoint pH 4.5 headspace

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	18500		51.9	1000	1	10/11/2019 02:01	WG1360711
Nitrate	U		22.7	100	1	10/11/2019 02:01	WG1360711
Sulfate	U		77.4	5000	1	10/11/2019 02:01	WG1360711

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	12000		102	1000	1	10/12/2019 21:11	WG1362106

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	12500		300	2000	20	10/15/2019 17:29	WG1362075
Manganese	3570		5.00	100	20	10/15/2019 17:29	WG1362075

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	11000		2.87	6.78	10	10/15/2019 11:14	WG1362983
Ethane	U		0.296	1.29	1	10/14/2019 15:12	WG1362474
Ethene	U		0.422	1.27	1	10/14/2019 15:12	WG1362474

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.66	J	1.05	25.0	1	10/17/2019 19:06	WG1364657
Acrylonitrile	U		0.873	5.00	1	10/17/2019 19:06	WG1364657
Benzene	U		0.0896	0.500	1	10/17/2019 19:06	WG1364657
Bromobenzene	U		0.133	0.500	1	10/17/2019 19:06	WG1364657
Bromodichloromethane	U		0.0800	0.500	1	10/17/2019 19:06	WG1364657
Bromochloromethane	U		0.145	0.500	1	10/17/2019 19:06	WG1364657
Bromoform	U		0.186	0.500	1	10/17/2019 19:06	WG1364657
Bromomethane	U		0.157	2.50	1	10/17/2019 19:06	WG1364657
n-Butylbenzene	U		0.143	0.500	1	10/17/2019 19:06	WG1364657
sec-Butylbenzene	U		0.134	0.500	1	10/17/2019 19:06	WG1364657
tert-Butylbenzene	U		0.183	0.500	1	10/17/2019 19:06	WG1364657
Carbon disulfide	U		0.101	0.500	1	10/17/2019 19:06	WG1364657
Carbon tetrachloride	U		0.159	0.500	1	10/17/2019 19:06	WG1364657
Chlorobenzene	U		0.140	0.500	1	10/17/2019 19:06	WG1364657
Chlorodibromomethane	U		0.128	0.500	1	10/17/2019 19:06	WG1364657
Chloroethane	U		0.141	2.50	1	10/17/2019 19:06	WG1364657
Chloroform	U		0.0860	0.500	1	10/17/2019 19:06	WG1364657
Chloromethane	U		0.153	1.25	1	10/17/2019 19:06	WG1364657
2-Chlorotoluene	U		0.111	0.500	1	10/17/2019 19:06	WG1364657
4-Chlorotoluene	U		0.0972	0.500	1	10/17/2019 19:06	WG1364657

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/17/2019 19:06	WG1364657
1,2-Dibromoethane	U		0.193	0.500	1	10/17/2019 19:06	WG1364657
Dibromomethane	U		0.117	0.500	1	10/17/2019 19:06	WG1364657
1,2-Dichlorobenzene	U		0.101	0.500	1	10/17/2019 19:06	WG1364657
1,3-Dichlorobenzene	U		0.130	0.500	1	10/17/2019 19:06	WG1364657
1,4-Dichlorobenzene	U		0.121	0.500	1	10/17/2019 19:06	WG1364657
Dichlorodifluoromethane	U		0.127	2.50	1	10/17/2019 19:06	WG1364657
1,1-Dichloroethane	U		0.114	0.500	1	10/17/2019 19:06	WG1364657
1,2-Dichloroethane	U		0.108	0.500	1	10/17/2019 19:06	WG1364657
1,1-Dichloroethene	U		0.188	0.500	1	10/17/2019 19:06	WG1364657
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/17/2019 19:06	WG1364657
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/17/2019 19:06	WG1364657
1,2-Dichloropropane	U		0.190	0.500	1	10/17/2019 19:06	WG1364657
1,1-Dichloropropene	U		0.128	0.500	1	10/17/2019 19:06	WG1364657
1,3-Dichloropropane	U		0.147	1.00	1	10/17/2019 19:06	WG1364657
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/17/2019 19:06	WG1364657
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/17/2019 19:06	WG1364657
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/17/2019 19:06	WG1364657
2,2-Dichloropropane	U		0.0929	0.500	1	10/17/2019 19:06	WG1364657
Di-isopropyl ether	U		0.0924	0.500	1	10/17/2019 19:06	WG1364657
Ethylbenzene	U		0.158	0.500	1	10/17/2019 19:06	WG1364657
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/17/2019 19:06	WG1364657
2-Hexanone	U		0.757	5.00	1	10/17/2019 19:06	WG1364657
n-Hexane	U		0.305	5.00	1	10/17/2019 19:06	WG1364657
Iodomethane	U		0.377	10.0	1	10/17/2019 19:06	WG1364657
Isopropylbenzene	U		0.126	0.500	1	10/17/2019 19:06	WG1364657
p-Isopropyltoluene	U		0.138	0.500	1	10/17/2019 19:06	WG1364657
2-Butanone (MEK)	U		1.28	5.00	1	10/17/2019 19:06	WG1364657
Methylene Chloride	U		1.07	2.50	1	10/17/2019 19:06	WG1364657
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/17/2019 19:06	WG1364657
Methyl tert-butyl ether	U		0.102	0.500	1	10/17/2019 19:06	WG1364657
Naphthalene	U		0.174	2.50	1	10/17/2019 19:06	WG1364657
n-Propylbenzene	U		0.162	0.500	1	10/17/2019 19:06	WG1364657
Styrene	U		0.117	0.500	1	10/17/2019 19:06	WG1364657
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/17/2019 19:06	WG1364657
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/17/2019 19:06	WG1364657
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/17/2019 19:06	WG1364657
Tetrachloroethene	U		0.199	0.500	1	10/17/2019 19:06	WG1364657
Toluene	U		0.412	0.500	1	10/17/2019 19:06	WG1364657
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/17/2019 19:06	WG1364657
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/17/2019 19:06	WG1364657
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/17/2019 19:06	WG1364657
1,1,2-Trichloroethane	U		0.186	0.500	1	10/17/2019 19:06	WG1364657
Trichloroethene	U		0.153	0.500	1	10/17/2019 19:06	WG1364657
Trichlorofluoromethane	U		0.130	2.50	1	10/17/2019 19:06	WG1364657
1,2,3-Trichloropropane	U		0.247	2.50	1	10/17/2019 19:06	WG1364657
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/17/2019 19:06	WG1364657
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/17/2019 19:06	WG1364657
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/17/2019 19:06	WG1364657
Vinyl acetate	U		0.645	5.00	1	10/17/2019 19:06	WG1364657
Vinyl chloride	U		0.118	0.500	1	10/17/2019 19:06	WG1364657
Xylenes, Total	U		0.316	1.50	1	10/17/2019 19:06	WG1364657
(S) Toluene-d8	*110*			*80.0-120*		*10/17/2019 19:06*	WG1364657
(S) 4-Bromofluorobenzene	*111*			*77.0-126*		*10/17/2019 19:06*	WG1364657
(S) 1,2-Dichloroethane-d4	*108*			*70.0-130*		*10/17/2019 19:06*	WG1364657

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U		1.05	25.0	1	10/17/2019 19:26	WG1364657
Acrylonitrile	U		0.873	5.00	1	10/17/2019 19:26	WG1364657
Benzene	11.2		0.0896	0.500	1	10/17/2019 19:26	WG1364657
Bromobenzene	U		0.133	0.500	1	10/17/2019 19:26	WG1364657
Bromodichloromethane	U		0.0800	0.500	1	10/17/2019 19:26	WG1364657
Bromochloromethane	U		0.145	0.500	1	10/17/2019 19:26	WG1364657
Bromoform	U		0.186	0.500	1	10/17/2019 19:26	WG1364657
Bromomethane	U		0.157	2.50	1	10/17/2019 19:26	WG1364657
n-Butylbenzene	8.26		0.143	0.500	1	10/17/2019 19:26	WG1364657
sec-Butylbenzene	14.4		0.134	0.500	1	10/17/2019 19:26	WG1364657
tert-Butylbenzene	0.365	J	0.183	0.500	1	10/17/2019 19:26	WG1364657
Carbon disulfide	U		0.101	0.500	1	10/17/2019 19:26	WG1364657
Carbon tetrachloride	U		0.159	0.500	1	10/17/2019 19:26	WG1364657
Chlorobenzene	U		0.140	0.500	1	10/17/2019 19:26	WG1364657
Chlorodibromomethane	U		0.128	0.500	1	10/17/2019 19:26	WG1364657
Chloroethane	U		0.141	2.50	1	10/17/2019 19:26	WG1364657
Chloroform	U		0.0860	0.500	1	10/17/2019 19:26	WG1364657
Chloromethane	U		0.153	1.25	1	10/17/2019 19:26	WG1364657
2-Chlorotoluene	U		0.111	0.500	1	10/17/2019 19:26	WG1364657
4-Chlorotoluene	U		0.0972	0.500	1	10/17/2019 19:26	WG1364657
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/17/2019 19:26	WG1364657
1,2-Dibromoethane	U		0.193	0.500	1	10/17/2019 19:26	WG1364657
Dibromomethane	U		0.117	0.500	1	10/17/2019 19:26	WG1364657
1,2-Dichlorobenzene	U		0.101	0.500	1	10/17/2019 19:26	WG1364657
1,3-Dichlorobenzene	U		0.130	0.500	1	10/17/2019 19:26	WG1364657
1,4-Dichlorobenzene	U		0.121	0.500	1	10/17/2019 19:26	WG1364657
Dichlorodifluoromethane	U		0.127	2.50	1	10/17/2019 19:26	WG1364657
1,1-Dichloroethane	U		0.114	0.500	1	10/17/2019 19:26	WG1364657
1,2-Dichloroethane	U		0.108	0.500	1	10/17/2019 19:26	WG1364657
1,1-Dichloroethene	U		0.188	0.500	1	10/17/2019 19:26	WG1364657
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/17/2019 19:26	WG1364657
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/17/2019 19:26	WG1364657
1,2-Dichloropropane	U		0.190	0.500	1	10/17/2019 19:26	WG1364657
1,1-Dichloropropene	U		0.128	0.500	1	10/17/2019 19:26	WG1364657
1,3-Dichloropropane	U		0.147	1.00	1	10/17/2019 19:26	WG1364657
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/17/2019 19:26	WG1364657
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/17/2019 19:26	WG1364657
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/17/2019 19:26	WG1364657
2,2-Dichloropropane	U		0.0929	0.500	1	10/17/2019 19:26	WG1364657
Di-isopropyl ether	U		0.0924	0.500	1	10/17/2019 19:26	WG1364657
Ethylbenzene	16.6		0.158	0.500	1	10/17/2019 19:26	WG1364657
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/17/2019 19:26	WG1364657
2-Hexanone	U		0.757	5.00	1	10/17/2019 19:26	WG1364657
n-Hexane	4.81	J	0.305	5.00	1	10/17/2019 19:26	WG1364657
Iodomethane	U		0.377	10.0	1	10/17/2019 19:26	WG1364657
Isopropylbenzene	49.9		0.126	0.500	1	10/17/2019 19:26	WG1364657
p-Isopropyltoluene	0.312	J	0.138	0.500	1	10/17/2019 19:26	WG1364657
2-Butanone (MEK)	U		1.28	5.00	1	10/17/2019 19:26	WG1364657
Methylene Chloride	U		1.07	2.50	1	10/17/2019 19:26	WG1364657
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/17/2019 19:26	WG1364657
Methyl tert-butyl ether	U		0.102	0.500	1	10/17/2019 19:26	WG1364657
Naphthalene	36.7		0.174	2.50	1	10/17/2019 19:26	WG1364657
n-Propylbenzene	152		0.162	0.500	1	10/17/2019 19:26	WG1364657
Styrene	U		0.117	0.500	1	10/17/2019 19:26	WG1364657
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/17/2019 19:26	WG1364657
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/17/2019 19:26	WG1364657

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/17/2019 19:26	WG1364657
Tetrachloroethene	U		0.199	0.500	1	10/17/2019 19:26	WG1364657
Toluene	2.39		0.412	0.500	1	10/17/2019 19:26	WG1364657
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/17/2019 19:26	WG1364657
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/17/2019 19:26	WG1364657
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/17/2019 19:26	WG1364657
1,1,2-Trichloroethane	U		0.186	0.500	1	10/17/2019 19:26	WG1364657
Trichloroethene	U		0.153	0.500	1	10/17/2019 19:26	WG1364657
Trichlorofluoromethane	U		0.130	2.50	1	10/17/2019 19:26	WG1364657
1,2,3-Trichloropropane	U		0.247	2.50	1	10/17/2019 19:26	WG1364657
1,2,4-Trimethylbenzene	4.11		0.123	0.500	1	10/17/2019 19:26	WG1364657
1,2,3-Trimethylbenzene	7.95		0.0739	0.500	1	10/17/2019 19:26	WG1364657
1,3,5-Trimethylbenzene	0.379	J	0.124	0.500	1	10/17/2019 19:26	WG1364657
Vinyl acetate	U		0.645	5.00	1	10/17/2019 19:26	WG1364657
Vinyl chloride	U		0.118	0.500	1	10/17/2019 19:26	WG1364657
Xylenes, Total	3.77		0.316	1.50	1	10/17/2019 19:26	WG1364657
(S) Toluene-d8	*107*			*80.0-120*		*10/17/2019 19:26*	WG1364657
(S) 4-Bromofluorobenzene	*105*			*77.0-126*		*10/17/2019 19:26*	WG1364657
(S) 1,2-Dichloroethane-d4	*107*			*70.0-130*		*10/17/2019 19:26*	WG1364657

Method Blank (MB)

(MB) R3461442-1 10/16/19 00:24

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Alkalinity	3770	J	2710	20000

Sample Narrative:

BLANK: Endpoint pH 4.5

L1148434-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1148434-02 10/16/19 01:21 • (DUP) R3461442-2 10/16/19 01:29

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	863000	863000	1	0.0313		20

Sample Narrative:

OS: Endpoint pH 4.5 headspace

DUP: Endpoint pH 4.5

L1148452-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1148452-02 10/16/19 03:07 • (DUP) R3461442-4 10/16/19 03:14

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	545000	548000	1	0.547		20

Sample Narrative:

OS: Endpoint pH 4.5 headspace

DUP: Endpoint pH 4.5

Laboratory Control Sample (LCS)

(LCS) R3461442-3 10/16/19 01:37

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Alkalinity	100000	101000	101	85.0-115	

Sample Narrative:

LCS: Endpoint pH 4.5

Method Blank (MB)

(MB) R3460200-1 10/10/19 12:59

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	78.6	J	51.9	1000
Nitrate	U		22.7	100
Sulfate	U		77.4	5000

L1148416-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1148416-06 10/10/19 22:10 • (DUP) R3460200-3 10/10/19 22:25

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	2180	2170	1	0.299		15
Nitrate	8630	8620	1	0.0568		15
Sulfate	3920	3900	1	0.429	J	15

L1148422-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1148422-01 10/11/19 01:18 • (DUP) R3460200-6 10/11/19 01:32

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	11500	11700	1	2.26		15
Nitrate	1610	1410	1	13.8		15
Sulfate	13800	13300	1	3.28		15

Laboratory Control Sample (LCS)

(LCS) R3460200-2 10/10/19 13:13

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	38300	95.8	80.0-120	
Nitrate	8000	7960	99.5	80.0-120	
Sulfate	40000	39500	98.8	80.0-120	

L1148416-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148416-06 10/10/19 22:10 • (MS) R3460200-4 10/10/19 22:39 • (MSD) R3460200-5 10/10/19 22:54

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	2180	52000	51300	99.7	98.2	1	80.0-120			1.41	15
Nitrate	5000	8630	13300	13200	93.6	91.8	1	80.0-120	E	E	0.651	15
Sulfate	50000	3920	53700	53000	99.5	98.1	1	80.0-120			1.37	15

L1148422-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L1148422-01 10/11/19 01:18 • (MS) R3460200-7 10/11/19 01:47

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	11500	60600	98.3	1	80.0-120	
Nitrate	5000	1610	6640	101	1	80.0-120	
Sulfate	50000	13800	63200	99.0	1	80.0-120	

Method Blank (MB)

(MB) R3461018-1 10/12/19 19:40

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
TOC (Total Organic Carbon)	222	J	102	1000

L1148426-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1148426-02 10/12/19 21:27 • (DUP) R3461018-3 10/12/19 21:41

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	13800	13600	1	1.24		20

L1148434-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1148434-02 10/13/19 13:55 • (DUP) R3461018-6 10/13/19 14:08

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	323000	321000	10	0.497		20

Laboratory Control Sample (LCS)

(LCS) R3461018-2 10/12/19 20:10

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TOC (Total Organic Carbon)	75000	74500	99.4	85.0-115	

L1148430-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148430-02 10/13/19 12:28 • (MS) R3461018-4 10/13/19 12:42 • (MSD) R3461018-5 10/13/19 12:57

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	890	51800	52100	102	102	1	80.0-120			0.481	20

L1148438-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148438-01 10/14/19 11:53 • (MS) R3461018-9 10/14/19 12:10 • (MSD) R3461018-10 10/14/19 12:27

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	2390	53300	53500	102	102	1	80.0-120			0.449	20

Method Blank (MB)

(MB) R3461231-1 10/15/19 14:37

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Iron	U		15.0	100
Manganese	0.308	J	0.250	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461231-2 10/15/19 14:42 • (LCSD) R3461231-3 10/15/19 14:47

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Iron	5000	5060	5190	101	104	80.0-120			2.60	20
Manganese	50.0	50.2	51.0	100	102	80.0-120			1.57	20

L1148262-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148262-06 10/15/19 14:52 • (MS) R3461231-5 10/15/19 15:02 • (MSD) R3461231-6 10/15/19 15:07

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	ug/l	%	%		%			%	%
Iron	5000	553	5690	5750	103	104	1	75.0-125			1.06	20
Manganese	50.0	27.2	77.2	77.0	100	99.6	1	75.0-125			0.252	20

Method Blank (MB)

(MB) R3460900-1 10/14/19 15:05

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1148844-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1148844-02 10/14/19 15:17 • (DUP) R3460900-2 10/14/19 16:06

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Methane	5560	5470	1	1.51		20
Ethane	141	138	1	2.40		20
Ethene	17.6	17.1	1	3.01		20

L1149259-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1149259-01 10/14/19 16:43 • (DUP) R3460900-3 10/14/19 16:48

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Methane	2030	2050	1	1.19		20
Ethane	U	0.000	1	0.000		20
Ethene	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3460900-4 10/14/19 16:59 • (LCSD) R3460900-5 10/14/19 17:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Methane	67.8	76.9	73.6	113	109	85.0-115			4.36	20
Ethane	129	134	130	104	101	85.0-115			2.75	20
Ethene	127	140	136	110	107	85.0-115			2.68	20

Method Blank (MB)

(MB) R3461176-1 10/15/19 11:12

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678

L1148902-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1148902-01 10/15/19 11:26 • (DUP) R3461176-2 10/15/19 13:07

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	203	210	1	3.41		20

L1148902-15 Original Sample (OS) • Duplicate (DUP)

(OS) L1148902-15 10/15/19 13:40 • (DUP) R3461176-3 10/15/19 13:45

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	3160	3120	1	1.15		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461176-4 10/15/19 13:59 • (LCSD) R3461176-5 10/15/19 14:04

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	75.3	75.9	111	112	85.0-115			0.863	20

Method Blank (MB)

(MB) R3462245-3 10/17/19 12:06

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3462245-3 10/17/19 12:06

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*113*			*80.0-120*
(S) 4-Bromofluorobenzene	*108*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3462245-1 10/17/19 11:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	159	127	19.0-160	
Acrylonitrile	125	136	109	55.0-149	
Benzene	25.0	21.8	87.2	70.0-123	
Bromobenzene	25.0	21.6	86.4	73.0-121	
Bromodichloromethane	25.0	22.7	90.8	75.0-120	
Bromochloromethane	25.0	25.5	102	76.0-122	
Bromoform	25.0	29.0	116	68.0-132	
Bromomethane	25.0	22.7	90.8	10.0-160	
n-Butylbenzene	25.0	22.8	91.2	73.0-125	
sec-Butylbenzene	25.0	23.2	92.8	75.0-125	
tert-Butylbenzene	25.0	25.3	101	76.0-124	
Carbon disulfide	25.0	21.1	84.4	61.0-128	
Carbon tetrachloride	25.0	25.6	102	68.0-126	
Chlorobenzene	25.0	24.7	98.8	80.0-121	
Chlorodibromomethane	25.0	27.7	111	77.0-125	
Chloroethane	25.0	23.8	95.2	47.0-150	
Chloroform	25.0	21.1	84.4	73.0-120	
Chloromethane	25.0	22.2	88.8	41.0-142	
2-Chlorotoluene	25.0	22.5	90.0	76.0-123	
4-Chlorotoluene	25.0	22.5	90.0	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	26.4	106	58.0-134	
1,2-Dibromoethane	25.0	24.1	96.4	80.0-122	
Dibromomethane	25.0	25.3	101	80.0-120	
1,2-Dichlorobenzene	25.0	25.3	101	79.0-121	
1,3-Dichlorobenzene	25.0	24.3	97.2	79.0-120	
1,4-Dichlorobenzene	25.0	22.9	91.6	79.0-120	
Dichlorodifluoromethane	25.0	20.9	83.6	51.0-149	
1,1-Dichloroethane	25.0	22.7	90.8	70.0-126	
1,2-Dichloroethane	25.0	22.6	90.4	70.0-128	
1,1-Dichloroethene	25.0	23.3	93.2	71.0-124	
cis-1,2-Dichloroethene	25.0	23.0	92.0	73.0-120	
trans-1,2-Dichloroethene	25.0	22.3	89.2	73.0-120	
1,2-Dichloropropane	25.0	23.7	94.8	77.0-125	
1,1-Dichloropropene	25.0	22.2	88.8	74.0-126	
1,3-Dichloropropane	25.0	23.9	95.6	80.0-120	
cis-1,3-Dichloropropene	25.0	23.7	94.8	80.0-123	
trans-1,3-Dichloropropene	25.0	24.6	98.4	78.0-124	
trans-1,4-Dichloro-2-butene	25.0	25.5	102	33.0-144	
2,2-Dichloropropane	25.0	23.8	95.2	58.0-130	
Di-isopropyl ether	25.0	25.2	101	58.0-138	

Laboratory Control Sample (LCS)

(LCS) R3462245-1 10/17/19 11:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	23.9	95.6	79.0-123	
Hexachloro-1,3-butadiene	25.0	24.2	96.8	54.0-138	
2-Hexanone	125	138	110	67.0-149	
n-Hexane	25.0	23.0	92.0	57.0-133	
Iodomethane	125	125	100	33.0-147	
Isopropylbenzene	25.0	26.4	106	76.0-127	
p-Isopropyltoluene	25.0	24.4	97.6	76.0-125	
2-Butanone (MEK)	125	140	112	44.0-160	
Methylene Chloride	25.0	21.5	86.0	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	144	115	68.0-142	
Methyl tert-butyl ether	25.0	24.4	97.6	68.0-125	
Naphthalene	25.0	25.6	102	54.0-135	
n-Propylbenzene	25.0	23.1	92.4	77.0-124	
Styrene	25.0	25.9	104	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	27.4	110	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	23.2	92.8	65.0-130	
1,1,2-Trichlorotrifluoroethane	25.0	24.0	96.0	69.0-132	
Tetrachloroethene	25.0	25.4	102	72.0-132	
Toluene	25.0	23.4	93.6	79.0-120	
1,2,3-Trichlorobenzene	25.0	26.6	106	50.0-138	
1,2,4-Trichlorobenzene	25.0	25.6	102	57.0-137	
1,1,1-Trichloroethane	25.0	24.2	96.8	73.0-124	
1,1,2-Trichloroethane	25.0	24.7	98.8	80.0-120	
Trichloroethene	25.0	24.1	96.4	78.0-124	
Trichlorofluoromethane	25.0	23.8	95.2	59.0-147	
1,2,3-Trichloropropane	25.0	23.7	94.8	73.0-130	
1,2,4-Trimethylbenzene	25.0	22.8	91.2	76.0-121	
1,2,3-Trimethylbenzene	25.0	22.7	90.8	77.0-120	
1,3,5-Trimethylbenzene	25.0	23.5	94.0	76.0-122	
Vinyl acetate	125	140	112	11.0-160	
Vinyl chloride	25.0	23.1	92.4	67.0-131	
Xylenes, Total	75.0	74.6	99.5	79.0-123	
(S) Toluene-d8			*110*	*80.0-120*	
(S) 4-Bromofluorobenzene			*113*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*108*	*70.0-130*	

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

MDL	Method Detection Limit.
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

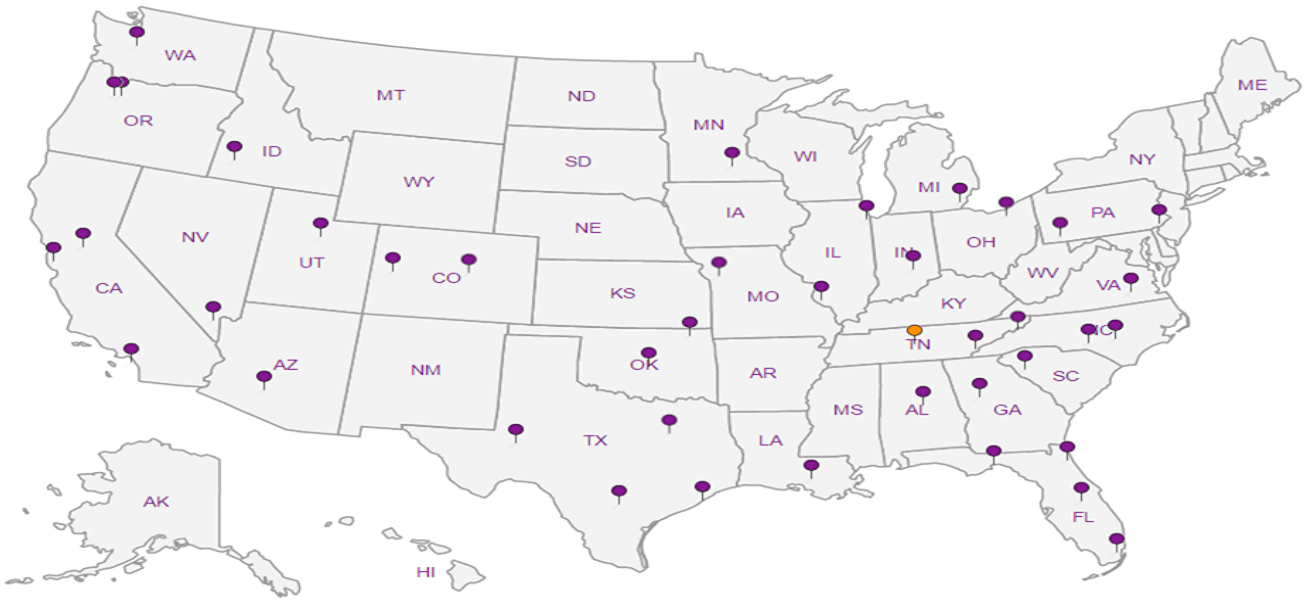
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



PES-Seattle

Billing Information: PES-Seattle

Pres Chk

Report to: Bill Haldeman/Brian O'neal

Email To: on file

Project Description: American Linen

City/State Collected: Seattle, WA

Phone: on file

Fax:

Client Project # 1413.001.02.501E

Lab Project # PESENVSWA-ALP

Collected by (print): Hannah Cohen

Site/Facility ID # American Linen

P.O. #

Collected by (signature): Hannah Cohen

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Analysis / Container / Preservative

Chain of Custody Page 1 of 1

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# 1148422

F035

Acctnum: PESENVSWA

Template:

Prelogin:

TSR: Brian Ford

PB:

Shipped Via:

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	**NO3,SO4,Chloride**48 hour hold	NWTPHGX	VOCs (V8260LLC)	Total Fe Mn 6020	TOC	Alkalinity	EEM (RSK175LL)				Remarks	Sample # (lab only)
MW-323-100919	Grab	GW	75	10/9/19	1135		X		X	X	X	X	X					-01
MW-317-100919	1	GW	40	1	1315		X		X	X	X	X	X					-02
SCL-MW104-100919	1	GW	12	1	1550				X									-03
		GW																
		GW																
		GW																
		GW																
		GW																
		GW																
		GW																

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____

Flow _____ Other _____

Samples returned via:
__ UPS __ FedEx __ Courier __ _____

Tracking # 1203 5774 6540

Sample Receipt Checklist
COC Seal Present/Intact: NP Y N
COC Signed/Accurate: Y N
Bottles arrive intact: Y N
Correct bottles used: Y N
Sufficient volume sent: Y N
If Applicable
VOA Zero Headspace: Y N
Preservation Correct/Checked: Y N

RAD SCREEN: <0.5 mR/hr

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Hannah Cohen	10/9/19	1610	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)

Trip Blank Received: Yes / No HCL / MeoH TBR

Temp: A3 °C Bottles Received: 21

5.3-0-5.3

Date: 10/10/19 Time: 8:30

If preservation required by Login: Date/Time

Hold:

Condition: NCF / OK

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 24, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1148900
Samples Received:	10/11/2019
Project Number:	1413.001.02.501E
Description:	American Linen
Site:	AMERICAN LINEN
Report To:	Brian O'Neal/Bill Haldeman 1215 Fourth Ave., Suite 1350 Seattle, WA 98161

Entire Report Reviewed By:

Brian Ford

Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

TABLE OF CONTENTS

Cp: Cover Page 1

Tc: Table of Contents 2

Ss: Sample Summary 3

Cn: Case Narrative 5

Sr: Sample Results 6

- MW-314-101019 L1148900-01 6
- SCL-MW105-101019 L1148900-02 9
- MW-8-101019 L1148900-03 11
- MW-311-101019 L1148900-04 13
- SCS-2-101019 L1148900-05 15
- MW-108-101019 L1148900-06 17
- MW-313-101019 L1148900-07 20
- MW-310-101019 L1148900-08 23
- MW-119-101019 L1148900-09 26
- TRIP-101019 L1148900-10 28

Qc: Quality Control Summary 30

- Wet Chemistry by Method 2320 B-2011 30
- Wet Chemistry by Method 9056A 32
- Wet Chemistry by Method 9060A 34
- Metals (ICPMS) by Method 6020B 35
- Volatile Organic Compounds (GC) by Method RSK175 36
- Volatile Organic Compounds (GC/MS) by Method 8260C 37

Gl: Glossary of Terms 48

Al: Accreditations & Locations 49

Sc: Sample Chain of Custody 50

MW-314-101019 L1148900-01 GW

Collected by: Ben Hecht | Collected date/time: 10/10/19 08:35 | Received date/time: 10/11/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1364209	1	10/18/19 00:08	10/18/19 00:08	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361340	1	10/11/19 19:57	10/11/19 19:57	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361340	10	10/12/19 10:42	10/12/19 10:42	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1362294	1	10/14/19 02:49	10/14/19 02:49	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1363727	10	10/16/19 10:52	10/17/19 00:17	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1362474	1	10/14/19 16:16	10/14/19 16:16	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1365855	1	10/19/19 18:28	10/19/19 18:28	JAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366289	10	10/21/19 14:12	10/21/19 14:12	ACG	Mt. Juliet, TN

SCL-MW105-101019 L1148900-02 GW

Collected by: Ben Hecht | Collected date/time: 10/10/19 09:50 | Received date/time: 10/11/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1365855	1	10/19/19 18:48	10/19/19 18:48	JAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366289	10	10/21/19 14:32	10/21/19 14:32	ACG	Mt. Juliet, TN

MW-8-101019 L1148900-03 GW

Collected by: Ben Hecht | Collected date/time: 10/10/19 10:30 | Received date/time: 10/11/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366370	1	10/20/19 23:18	10/20/19 23:18	JHH	Mt. Juliet, TN

MW-311-101019 L1148900-04 GW

Collected by: Ben Hecht | Collected date/time: 10/10/19 11:20 | Received date/time: 10/11/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1364209	1	10/18/19 00:15	10/18/19 00:15	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361340	1	10/11/19 20:14	10/11/19 20:14	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1362294	1	10/14/19 03:05	10/14/19 03:05	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1363727	1	10/16/19 10:52	10/16/19 22:45	LD	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1363727	5	10/16/19 10:52	10/17/19 00:21	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1362474	1	10/14/19 16:19	10/14/19 16:19	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1365855	1	10/19/19 19:29	10/19/19 19:29	JAH	Mt. Juliet, TN

SCS-2-101019 L1148900-05 GW

Collected by: Ben Hecht | Collected date/time: 10/10/19 11:35 | Received date/time: 10/11/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1365855	1	10/19/19 19:49	10/19/19 19:49	JAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366289	10	10/21/19 14:53	10/21/19 14:53	ACG	Mt. Juliet, TN

MW-108-101019 L1148900-06 GW

Collected by: Ben Hecht | Collected date/time: 10/10/19 12:45 | Received date/time: 10/11/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1364209	1	10/18/19 00:22	10/18/19 00:22	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361340	1	10/11/19 21:07	10/11/19 21:07	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1362294	1	10/14/19 04:05	10/14/19 04:05	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1363727	10	10/16/19 10:52	10/17/19 00:24	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1362474	1	10/14/19 16:23	10/14/19 16:23	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1365855	1	10/19/19 20:09	10/19/19 20:09	JAH	Mt. Juliet, TN

MW-108-101019 L1148900-06 GW

Collected by: Ben Hecht | Collected date/time: 10/10/19 12:45 | Received date/time: 10/11/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366289	25	10/21/19 15:13	10/21/19 15:13	ACG	Mt. Juliet, TN

MW-313-101019 L1148900-07 GW

Collected by: Ben Hecht | Collected date/time: 10/10/19 14:15 | Received date/time: 10/11/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1364209	1	10/18/19 00:28	10/18/19 00:28	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361340	1	10/11/19 21:42	10/11/19 21:42	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1362294	1	10/14/19 04:27	10/14/19 04:27	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1363727	1	10/16/19 10:52	10/16/19 23:05	LD	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1363727	10	10/16/19 10:52	10/17/19 00:48	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1362474	1	10/14/19 16:28	10/14/19 16:28	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1365855	1	10/19/19 20:30	10/19/19 20:30	JAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366289	1	10/21/19 15:33	10/21/19 15:33	ACG	Mt. Juliet, TN

MW-310-101019 L1148900-08 GW

Collected by: Ben Hecht | Collected date/time: 10/10/19 13:45 | Received date/time: 10/11/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1364211	1	10/17/19 16:38	10/17/19 16:38	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361340	1	10/11/19 22:00	10/11/19 22:00	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1362294	1	10/14/19 04:49	10/14/19 04:49	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1363727	20	10/16/19 10:52	10/17/19 00:37	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1362474	1	10/14/19 16:32	10/14/19 16:32	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1365855	1	10/19/19 20:50	10/19/19 20:50	JAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366289	1	10/21/19 16:18	10/21/19 16:18	BMB	Mt. Juliet, TN

MW-119-101019 L1148900-09 GW

Collected by: Ben Hecht | Collected date/time: 10/10/19 15:35 | Received date/time: 10/11/19 08:45

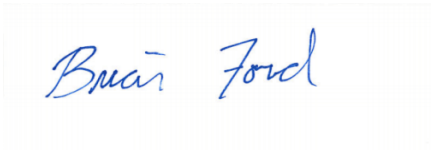
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1364211	1	10/17/19 16:44	10/17/19 16:44	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361340	1	10/11/19 22:18	10/11/19 22:18	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1362294	1	10/14/19 05:09	10/14/19 05:09	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1363727	20	10/16/19 10:52	10/17/19 00:40	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1362474	1	10/14/19 16:35	10/14/19 16:35	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1365855	1	10/19/19 21:10	10/19/19 21:10	JAH	Mt. Juliet, TN

TRIP-101019 L1148900-10 GW

Collected by: Ben Hecht | Collected date/time: 10/10/19 16:00 | Received date/time: 10/11/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1365855	1	10/19/19 16:05	10/19/19 16:05	JAH	Mt. Juliet, TN

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	253000		2710	20000	1	10/18/2019 00:08	WG1364209

Sample Narrative:

L1148900-01 WG1364209: Endpoint pH 4.5 headspace

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	24400		51.9	1000	1	10/11/2019 19:57	WG1361340
Nitrate	U		22.7	100	1	10/11/2019 19:57	WG1361340
Sulfate	264000		774	50000	10	10/12/2019 10:42	WG1361340

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	2840	B	102	1000	1	10/14/2019 02:49	WG1362294

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	2420		150	1000	10	10/17/2019 00:17	WG1363727
Manganese	1110		2.50	50.0	10	10/17/2019 00:17	WG1363727

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	377		0.287	0.678	1	10/14/2019 16:16	WG1362474
Ethane	18.6		0.296	1.29	1	10/14/2019 16:16	WG1362474
Ethene	U		0.422	1.27	1	10/14/2019 16:16	WG1362474

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U		1.05	25.0	1	10/19/2019 18:28	WG1365855
Acrylonitrile	U		0.873	5.00	1	10/19/2019 18:28	WG1365855
Benzene	U		0.0896	0.500	1	10/19/2019 18:28	WG1365855
Bromobenzene	U		0.133	0.500	1	10/19/2019 18:28	WG1365855
Bromodichloromethane	U		0.0800	0.500	1	10/19/2019 18:28	WG1365855
Bromochloromethane	U		0.145	0.500	1	10/19/2019 18:28	WG1365855
Bromoform	U		0.186	0.500	1	10/19/2019 18:28	WG1365855
Bromomethane	U		0.157	2.50	1	10/19/2019 18:28	WG1365855
n-Butylbenzene	U		0.143	0.500	1	10/19/2019 18:28	WG1365855
sec-Butylbenzene	U		0.134	0.500	1	10/19/2019 18:28	WG1365855
tert-Butylbenzene	U		0.183	0.500	1	10/19/2019 18:28	WG1365855
Carbon disulfide	U		0.101	0.500	1	10/19/2019 18:28	WG1365855
Carbon tetrachloride	U		0.159	0.500	1	10/19/2019 18:28	WG1365855
Chlorobenzene	U		0.140	0.500	1	10/19/2019 18:28	WG1365855
Chlorodibromomethane	U		0.128	0.500	1	10/19/2019 18:28	WG1365855
Chloroethane	U		0.141	2.50	1	10/19/2019 18:28	WG1365855
Chloroform	U		0.0860	0.500	1	10/19/2019 18:28	WG1365855
Chloromethane	U		0.153	1.25	1	10/19/2019 18:28	WG1365855
2-Chlorotoluene	U		0.111	0.500	1	10/19/2019 18:28	WG1365855
4-Chlorotoluene	U		0.0972	0.500	1	10/19/2019 18:28	WG1365855

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/19/2019 18:28	WG1365855
1,2-Dibromoethane	U		0.193	0.500	1	10/19/2019 18:28	WG1365855
Dibromomethane	U		0.117	0.500	1	10/19/2019 18:28	WG1365855
1,2-Dichlorobenzene	U		0.101	0.500	1	10/19/2019 18:28	WG1365855
1,3-Dichlorobenzene	U		0.130	0.500	1	10/19/2019 18:28	WG1365855
1,4-Dichlorobenzene	U		0.121	0.500	1	10/19/2019 18:28	WG1365855
Dichlorodifluoromethane	U		0.127	2.50	1	10/19/2019 18:28	WG1365855
1,1-Dichloroethane	U		0.114	0.500	1	10/19/2019 18:28	WG1365855
1,2-Dichloroethane	U		0.108	0.500	1	10/19/2019 18:28	WG1365855
1,1-Dichloroethene	3.21		0.188	0.500	1	10/19/2019 18:28	WG1365855
cis-1,2-Dichloroethene	491		0.933	5.00	10	10/21/2019 14:12	WG1366289
trans-1,2-Dichloroethene	1.63		0.152	0.500	1	10/19/2019 18:28	WG1365855
1,2-Dichloropropane	U		0.190	0.500	1	10/19/2019 18:28	WG1365855
1,1-Dichloropropene	U		0.128	0.500	1	10/19/2019 18:28	WG1365855
1,3-Dichloropropane	U		0.147	1.00	1	10/19/2019 18:28	WG1365855
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/19/2019 18:28	WG1365855
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/19/2019 18:28	WG1365855
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/19/2019 18:28	WG1365855
2,2-Dichloropropane	U		0.0929	0.500	1	10/19/2019 18:28	WG1365855
Di-isopropyl ether	U		0.0924	0.500	1	10/19/2019 18:28	WG1365855
Ethylbenzene	U		0.158	0.500	1	10/19/2019 18:28	WG1365855
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/19/2019 18:28	WG1365855
2-Hexanone	U		0.757	5.00	1	10/19/2019 18:28	WG1365855
n-Hexane	U		0.305	5.00	1	10/19/2019 18:28	WG1365855
Iodomethane	U		0.377	10.0	1	10/19/2019 18:28	WG1365855
Isopropylbenzene	U		0.126	0.500	1	10/19/2019 18:28	WG1365855
p-Isopropyltoluene	U		0.138	0.500	1	10/19/2019 18:28	WG1365855
2-Butanone (MEK)	U		1.28	5.00	1	10/19/2019 18:28	WG1365855
Methylene Chloride	U		1.07	2.50	1	10/19/2019 18:28	WG1365855
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/19/2019 18:28	WG1365855
Methyl tert-butyl ether	U		0.102	0.500	1	10/19/2019 18:28	WG1365855
Naphthalene	U		0.174	2.50	1	10/19/2019 18:28	WG1365855
n-Propylbenzene	U		0.162	0.500	1	10/19/2019 18:28	WG1365855
Styrene	U		0.117	0.500	1	10/19/2019 18:28	WG1365855
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/19/2019 18:28	WG1365855
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/19/2019 18:28	WG1365855
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/19/2019 18:28	WG1365855
Tetrachloroethene	26.1		0.199	0.500	1	10/19/2019 18:28	WG1365855
Toluene	U		0.412	0.500	1	10/19/2019 18:28	WG1365855
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/19/2019 18:28	WG1365855
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/19/2019 18:28	WG1365855
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/19/2019 18:28	WG1365855
1,1,2-Trichloroethane	U		0.186	0.500	1	10/19/2019 18:28	WG1365855
Trichloroethene	106		0.153	0.500	1	10/19/2019 18:28	WG1365855
Trichlorofluoromethane	U		0.130	2.50	1	10/19/2019 18:28	WG1365855
1,2,3-Trichloropropane	U		0.247	2.50	1	10/19/2019 18:28	WG1365855
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/19/2019 18:28	WG1365855
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/19/2019 18:28	WG1365855
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/19/2019 18:28	WG1365855
Vinyl acetate	U		0.645	5.00	1	10/19/2019 18:28	WG1365855
Vinyl chloride	43.6		0.118	0.500	1	10/19/2019 18:28	WG1365855
Xylenes, Total	U		0.316	1.50	1	10/19/2019 18:28	WG1365855
(S) Toluene-d8	*117*			*80.0-120*		*10/19/2019 18:28*	WG1365855
(S) Toluene-d8	*115*			*80.0-120*		*10/21/2019 14:12*	WG1366289
(S) 4-Bromofluorobenzene	*111*			*77.0-126*		*10/19/2019 18:28*	WG1365855
(S) 4-Bromofluorobenzene	*92.4*			*77.0-126*		*10/21/2019 14:12*	WG1366289

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*99.2*			*70.0-130*		*10/19/2019 18:28*	WG1365855
(S) 1,2-Dichloroethane-d4	*95.6*			*70.0-130*		*10/21/2019 14:12*	WG1366289

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U		1.05	25.0	1	10/19/2019 18:48	WG1365855
Acrylonitrile	U		0.873	5.00	1	10/19/2019 18:48	WG1365855
Benzene	133		0.0896	0.500	1	10/19/2019 18:48	WG1365855
Bromobenzene	U		0.133	0.500	1	10/19/2019 18:48	WG1365855
Bromodichloromethane	U		0.0800	0.500	1	10/19/2019 18:48	WG1365855
Bromochloromethane	U		0.145	0.500	1	10/19/2019 18:48	WG1365855
Bromoform	U		0.186	0.500	1	10/19/2019 18:48	WG1365855
Bromomethane	U		0.157	2.50	1	10/19/2019 18:48	WG1365855
n-Butylbenzene	U		0.143	0.500	1	10/19/2019 18:48	WG1365855
sec-Butylbenzene	8.08		0.134	0.500	1	10/19/2019 18:48	WG1365855
tert-Butylbenzene	0.260	J	0.183	0.500	1	10/19/2019 18:48	WG1365855
Carbon disulfide	U		0.101	0.500	1	10/19/2019 18:48	WG1365855
Carbon tetrachloride	U		0.159	0.500	1	10/19/2019 18:48	WG1365855
Chlorobenzene	U		0.140	0.500	1	10/19/2019 18:48	WG1365855
Chlorodibromomethane	U		0.128	0.500	1	10/19/2019 18:48	WG1365855
Chloroethane	U		0.141	2.50	1	10/19/2019 18:48	WG1365855
Chloroform	U		0.0860	0.500	1	10/19/2019 18:48	WG1365855
Chloromethane	U		0.153	1.25	1	10/19/2019 18:48	WG1365855
2-Chlorotoluene	U		0.111	0.500	1	10/19/2019 18:48	WG1365855
4-Chlorotoluene	U		0.0972	0.500	1	10/19/2019 18:48	WG1365855
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/19/2019 18:48	WG1365855
1,2-Dibromoethane	U		0.193	0.500	1	10/19/2019 18:48	WG1365855
Dibromomethane	U		0.117	0.500	1	10/19/2019 18:48	WG1365855
1,2-Dichlorobenzene	U		0.101	0.500	1	10/19/2019 18:48	WG1365855
1,3-Dichlorobenzene	U		0.130	0.500	1	10/19/2019 18:48	WG1365855
1,4-Dichlorobenzene	U		0.121	0.500	1	10/19/2019 18:48	WG1365855
Dichlorodifluoromethane	U		0.127	2.50	1	10/19/2019 18:48	WG1365855
1,1-Dichloroethane	U		0.114	0.500	1	10/19/2019 18:48	WG1365855
1,2-Dichloroethane	U		0.108	0.500	1	10/19/2019 18:48	WG1365855
1,1-Dichloroethene	U		0.188	0.500	1	10/19/2019 18:48	WG1365855
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/19/2019 18:48	WG1365855
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/19/2019 18:48	WG1365855
1,2-Dichloropropane	U		0.190	0.500	1	10/19/2019 18:48	WG1365855
1,1-Dichloropropene	U		0.128	0.500	1	10/19/2019 18:48	WG1365855
1,3-Dichloropropane	U		0.147	1.00	1	10/19/2019 18:48	WG1365855
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/19/2019 18:48	WG1365855
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/19/2019 18:48	WG1365855
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/19/2019 18:48	WG1365855
2,2-Dichloropropane	U		0.0929	0.500	1	10/19/2019 18:48	WG1365855
Di-isopropyl ether	U		0.0924	0.500	1	10/19/2019 18:48	WG1365855
Ethylbenzene	41.0		0.158	0.500	1	10/19/2019 18:48	WG1365855
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/19/2019 18:48	WG1365855
2-Hexanone	U		0.757	5.00	1	10/19/2019 18:48	WG1365855
n-Hexane	55.0		0.305	5.00	1	10/19/2019 18:48	WG1365855
Iodomethane	U		0.377	10.0	1	10/19/2019 18:48	WG1365855
Isopropylbenzene	149		0.126	0.500	1	10/19/2019 18:48	WG1365855
p-Isopropyltoluene	1.96		0.138	0.500	1	10/19/2019 18:48	WG1365855
2-Butanone (MEK)	U		1.28	5.00	1	10/19/2019 18:48	WG1365855
Methylene Chloride	U		1.07	2.50	1	10/19/2019 18:48	WG1365855
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/19/2019 18:48	WG1365855
Methyl tert-butyl ether	U		0.102	0.500	1	10/19/2019 18:48	WG1365855
Naphthalene	4.44		0.174	2.50	1	10/19/2019 18:48	WG1365855
n-Propylbenzene	359	J0	1.62	5.00	10	10/21/2019 14:32	WG1366289
Styrene	U		0.117	0.500	1	10/19/2019 18:48	WG1365855
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/19/2019 18:48	WG1365855
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/19/2019 18:48	WG1365855

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/19/2019 18:48	WG1365855
Tetrachloroethene	U		0.199	0.500	1	10/19/2019 18:48	WG1365855
Toluene	15.5		0.412	0.500	1	10/19/2019 18:48	WG1365855
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/19/2019 18:48	WG1365855
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/19/2019 18:48	WG1365855
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/19/2019 18:48	WG1365855
1,1,2-Trichloroethane	U		0.186	0.500	1	10/19/2019 18:48	WG1365855
Trichloroethene	U		0.153	0.500	1	10/19/2019 18:48	WG1365855
Trichlorofluoromethane	U		0.130	2.50	1	10/19/2019 18:48	WG1365855
1,2,3-Trichloropropane	U		0.247	2.50	1	10/19/2019 18:48	WG1365855
1,2,4-Trimethylbenzene	0.510		0.123	0.500	1	10/19/2019 18:48	WG1365855
1,2,3-Trimethylbenzene	14.4		0.0739	0.500	1	10/19/2019 18:48	WG1365855
1,3,5-Trimethylbenzene	5.00		0.124	0.500	1	10/19/2019 18:48	WG1365855
Vinyl acetate	U		0.645	5.00	1	10/19/2019 18:48	WG1365855
Vinyl chloride	U		0.118	0.500	1	10/19/2019 18:48	WG1365855
Xylenes, Total	34.6		0.316	1.50	1	10/19/2019 18:48	WG1365855
(S) Toluene-d8	*105*			*80.0-120*		*10/19/2019 18:48*	WG1365855
(S) Toluene-d8	*112*			*80.0-120*		*10/21/2019 14:32*	WG1366289
(S) 4-Bromofluorobenzene	*105*			*77.0-126*		*10/19/2019 18:48*	WG1365855
(S) 4-Bromofluorobenzene	*94.5*			*77.0-126*		*10/21/2019 14:32*	WG1366289
(S) 1,2-Dichloroethane-d4	*106*			*70.0-130*		*10/19/2019 18:48*	WG1365855
(S) 1,2-Dichloroethane-d4	*97.0*			*70.0-130*		*10/21/2019 14:32*	WG1366289

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/20/2019 23:18	WG1366370
Acrylonitrile	U		0.873	5.00	1	10/20/2019 23:18	WG1366370
Benzene	U		0.0896	0.500	1	10/20/2019 23:18	WG1366370
Bromobenzene	U		0.133	0.500	1	10/20/2019 23:18	WG1366370
Bromodichloromethane	U		0.0800	0.500	1	10/20/2019 23:18	WG1366370
Bromochloromethane	U		0.145	0.500	1	10/20/2019 23:18	WG1366370
Bromoform	U		0.186	0.500	1	10/20/2019 23:18	WG1366370
Bromomethane	U		0.157	2.50	1	10/20/2019 23:18	WG1366370
n-Butylbenzene	U		0.143	0.500	1	10/20/2019 23:18	WG1366370
sec-Butylbenzene	U		0.134	0.500	1	10/20/2019 23:18	WG1366370
tert-Butylbenzene	U		0.183	0.500	1	10/20/2019 23:18	WG1366370
Carbon disulfide	U		0.101	0.500	1	10/20/2019 23:18	WG1366370
Carbon tetrachloride	U		0.159	0.500	1	10/20/2019 23:18	WG1366370
Chlorobenzene	U		0.140	0.500	1	10/20/2019 23:18	WG1366370
Chlorodibromomethane	U		0.128	0.500	1	10/20/2019 23:18	WG1366370
Chloroethane	U		0.141	2.50	1	10/20/2019 23:18	WG1366370
Chloroform	U		0.0860	0.500	1	10/20/2019 23:18	WG1366370
Chloromethane	U		0.153	1.25	1	10/20/2019 23:18	WG1366370
2-Chlorotoluene	U		0.111	0.500	1	10/20/2019 23:18	WG1366370
4-Chlorotoluene	U		0.0972	0.500	1	10/20/2019 23:18	WG1366370
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/20/2019 23:18	WG1366370
1,2-Dibromoethane	U		0.193	0.500	1	10/20/2019 23:18	WG1366370
Dibromomethane	U		0.117	0.500	1	10/20/2019 23:18	WG1366370
1,2-Dichlorobenzene	U		0.101	0.500	1	10/20/2019 23:18	WG1366370
1,3-Dichlorobenzene	U		0.130	0.500	1	10/20/2019 23:18	WG1366370
1,4-Dichlorobenzene	U		0.121	0.500	1	10/20/2019 23:18	WG1366370
Dichlorodifluoromethane	U		0.127	2.50	1	10/20/2019 23:18	WG1366370
1,1-Dichloroethane	U		0.114	0.500	1	10/20/2019 23:18	WG1366370
1,2-Dichloroethane	U		0.108	0.500	1	10/20/2019 23:18	WG1366370
1,1-Dichloroethene	U		0.188	0.500	1	10/20/2019 23:18	WG1366370
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/20/2019 23:18	WG1366370
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/20/2019 23:18	WG1366370
1,2-Dichloropropane	0.253	J	0.190	0.500	1	10/20/2019 23:18	WG1366370
1,1-Dichloropropene	U		0.128	0.500	1	10/20/2019 23:18	WG1366370
1,3-Dichloropropane	U		0.147	1.00	1	10/20/2019 23:18	WG1366370
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/20/2019 23:18	WG1366370
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/20/2019 23:18	WG1366370
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/20/2019 23:18	WG1366370
2,2-Dichloropropane	U		0.0929	0.500	1	10/20/2019 23:18	WG1366370
Di-isopropyl ether	U		0.0924	0.500	1	10/20/2019 23:18	WG1366370
Ethylbenzene	U		0.158	0.500	1	10/20/2019 23:18	WG1366370
Hexachloro-1,3-butadiene	U	J4	0.157	1.00	1	10/20/2019 23:18	WG1366370
2-Hexanone	U		0.757	5.00	1	10/20/2019 23:18	WG1366370
n-Hexane	U		0.305	5.00	1	10/20/2019 23:18	WG1366370
Iodomethane	U	J0	0.377	10.0	1	10/20/2019 23:18	WG1366370
Isopropylbenzene	U		0.126	0.500	1	10/20/2019 23:18	WG1366370
p-Isopropyltoluene	U		0.138	0.500	1	10/20/2019 23:18	WG1366370
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/20/2019 23:18	WG1366370
Methylene Chloride	U		1.07	2.50	1	10/20/2019 23:18	WG1366370
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/20/2019 23:18	WG1366370
Methyl tert-butyl ether	U		0.102	0.500	1	10/20/2019 23:18	WG1366370
Naphthalene	0.886	B J J0	0.174	2.50	1	10/20/2019 23:18	WG1366370
n-Propylbenzene	U		0.162	0.500	1	10/20/2019 23:18	WG1366370
Styrene	U		0.117	0.500	1	10/20/2019 23:18	WG1366370
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/20/2019 23:18	WG1366370
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/20/2019 23:18	WG1366370

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/20/2019 23:18	WG1366370
Tetrachloroethene	U		0.199	0.500	1	10/20/2019 23:18	WG1366370
Toluene	U		0.412	0.500	1	10/20/2019 23:18	WG1366370
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/20/2019 23:18	WG1366370
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/20/2019 23:18	WG1366370
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/20/2019 23:18	WG1366370
1,1,2-Trichloroethane	U		0.186	0.500	1	10/20/2019 23:18	WG1366370
Trichloroethene	0.167	J	0.153	0.500	1	10/20/2019 23:18	WG1366370
Trichlorofluoromethane	U		0.130	2.50	1	10/20/2019 23:18	WG1366370
1,2,3-Trichloropropane	U		0.247	2.50	1	10/20/2019 23:18	WG1366370
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/20/2019 23:18	WG1366370
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/20/2019 23:18	WG1366370
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/20/2019 23:18	WG1366370
Vinyl acetate	U		0.645	5.00	1	10/20/2019 23:18	WG1366370
Vinyl chloride	U		0.118	0.500	1	10/20/2019 23:18	WG1366370
Xylenes, Total	U		0.316	1.50	1	10/20/2019 23:18	WG1366370
(S) Toluene-d8	*95.6*			*80.0-120*		*10/20/2019 23:18*	WG1366370
(S) 4-Bromofluorobenzene	*89.6*			*77.0-126*		*10/20/2019 23:18*	WG1366370
(S) 1,2-Dichloroethane-d4	*81.3*			*70.0-130*		*10/20/2019 23:18*	WG1366370

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	394000		2710	20000	1	10/18/2019 00:15	WG1364209

Sample Narrative:

L1148900-04 WG1364209: Endpoint pH 4.5 headspace

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	45900		51.9	1000	1	10/11/2019 20:14	WG1361340
Nitrate	U		22.7	100	1	10/11/2019 20:14	WG1361340
Sulfate	35000		77.4	5000	1	10/11/2019 20:14	WG1361340

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	5310	B	102	1000	1	10/14/2019 03:05	WG1362294

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	349		15.0	100	1	10/16/2019 22:45	WG1363727
Manganese	738		1.25	25.0	5	10/17/2019 00:21	WG1363727

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	856		0.287	0.678	1	10/14/2019 16:19	WG1362474
Ethane	40.8		0.296	1.29	1	10/14/2019 16:19	WG1362474
Ethene	10.4		0.422	1.27	1	10/14/2019 16:19	WG1362474

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	3.51	J	1.05	25.0	1	10/19/2019 19:29	WG1365855
Acrylonitrile	U		0.873	5.00	1	10/19/2019 19:29	WG1365855
Benzene	U		0.0896	0.500	1	10/19/2019 19:29	WG1365855
Bromobenzene	U		0.133	0.500	1	10/19/2019 19:29	WG1365855
Bromodichloromethane	U		0.0800	0.500	1	10/19/2019 19:29	WG1365855
Bromochloromethane	U		0.145	0.500	1	10/19/2019 19:29	WG1365855
Bromoform	U		0.186	0.500	1	10/19/2019 19:29	WG1365855
Bromomethane	U		0.157	2.50	1	10/19/2019 19:29	WG1365855
n-Butylbenzene	U		0.143	0.500	1	10/19/2019 19:29	WG1365855
sec-Butylbenzene	U		0.134	0.500	1	10/19/2019 19:29	WG1365855
tert-Butylbenzene	U		0.183	0.500	1	10/19/2019 19:29	WG1365855
Carbon disulfide	0.343	J	0.101	0.500	1	10/19/2019 19:29	WG1365855
Carbon tetrachloride	U		0.159	0.500	1	10/19/2019 19:29	WG1365855
Chlorobenzene	U		0.140	0.500	1	10/19/2019 19:29	WG1365855
Chlorodibromomethane	U		0.128	0.500	1	10/19/2019 19:29	WG1365855
Chloroethane	U		0.141	2.50	1	10/19/2019 19:29	WG1365855
Chloroform	U		0.0860	0.500	1	10/19/2019 19:29	WG1365855
Chloromethane	U		0.153	1.25	1	10/19/2019 19:29	WG1365855
2-Chlorotoluene	U		0.111	0.500	1	10/19/2019 19:29	WG1365855
4-Chlorotoluene	U		0.0972	0.500	1	10/19/2019 19:29	WG1365855

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/19/2019 19:29	WG1365855
1,2-Dibromoethane	U		0.193	0.500	1	10/19/2019 19:29	WG1365855
Dibromomethane	U		0.117	0.500	1	10/19/2019 19:29	WG1365855
1,2-Dichlorobenzene	U		0.101	0.500	1	10/19/2019 19:29	WG1365855
1,3-Dichlorobenzene	U		0.130	0.500	1	10/19/2019 19:29	WG1365855
1,4-Dichlorobenzene	U		0.121	0.500	1	10/19/2019 19:29	WG1365855
Dichlorodifluoromethane	U		0.127	2.50	1	10/19/2019 19:29	WG1365855
1,1-Dichloroethane	U		0.114	0.500	1	10/19/2019 19:29	WG1365855
1,2-Dichloroethane	U		0.108	0.500	1	10/19/2019 19:29	WG1365855
1,1-Dichloroethene	0.665		0.188	0.500	1	10/19/2019 19:29	WG1365855
cis-1,2-Dichloroethene	173		0.0933	0.500	1	10/19/2019 19:29	WG1365855
trans-1,2-Dichloroethene	0.221	J	0.152	0.500	1	10/19/2019 19:29	WG1365855
1,2-Dichloropropane	U		0.190	0.500	1	10/19/2019 19:29	WG1365855
1,1-Dichloropropene	U		0.128	0.500	1	10/19/2019 19:29	WG1365855
1,3-Dichloropropane	U		0.147	1.00	1	10/19/2019 19:29	WG1365855
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/19/2019 19:29	WG1365855
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/19/2019 19:29	WG1365855
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/19/2019 19:29	WG1365855
2,2-Dichloropropane	U		0.0929	0.500	1	10/19/2019 19:29	WG1365855
Di-isopropyl ether	U		0.0924	0.500	1	10/19/2019 19:29	WG1365855
Ethylbenzene	U		0.158	0.500	1	10/19/2019 19:29	WG1365855
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/19/2019 19:29	WG1365855
2-Hexanone	U		0.757	5.00	1	10/19/2019 19:29	WG1365855
n-Hexane	U		0.305	5.00	1	10/19/2019 19:29	WG1365855
Iodomethane	U		0.377	10.0	1	10/19/2019 19:29	WG1365855
Isopropylbenzene	U		0.126	0.500	1	10/19/2019 19:29	WG1365855
p-Isopropyltoluene	U		0.138	0.500	1	10/19/2019 19:29	WG1365855
2-Butanone (MEK)	2.39	J	1.28	5.00	1	10/19/2019 19:29	WG1365855
Methylene Chloride	U		1.07	2.50	1	10/19/2019 19:29	WG1365855
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/19/2019 19:29	WG1365855
Methyl tert-butyl ether	U		0.102	0.500	1	10/19/2019 19:29	WG1365855
Naphthalene	U		0.174	2.50	1	10/19/2019 19:29	WG1365855
n-Propylbenzene	U		0.162	0.500	1	10/19/2019 19:29	WG1365855
Styrene	U		0.117	0.500	1	10/19/2019 19:29	WG1365855
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/19/2019 19:29	WG1365855
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/19/2019 19:29	WG1365855
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/19/2019 19:29	WG1365855
Tetrachloroethene	20.4		0.199	0.500	1	10/19/2019 19:29	WG1365855
Toluene	U		0.412	0.500	1	10/19/2019 19:29	WG1365855
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/19/2019 19:29	WG1365855
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/19/2019 19:29	WG1365855
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/19/2019 19:29	WG1365855
1,1,2-Trichloroethane	U		0.186	0.500	1	10/19/2019 19:29	WG1365855
Trichloroethene	46.1		0.153	0.500	1	10/19/2019 19:29	WG1365855
Trichlorofluoromethane	U		0.130	2.50	1	10/19/2019 19:29	WG1365855
1,2,3-Trichloropropane	U		0.247	2.50	1	10/19/2019 19:29	WG1365855
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/19/2019 19:29	WG1365855
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/19/2019 19:29	WG1365855
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/19/2019 19:29	WG1365855
Vinyl acetate	U		0.645	5.00	1	10/19/2019 19:29	WG1365855
Vinyl chloride	25.1		0.118	0.500	1	10/19/2019 19:29	WG1365855
Xylenes, Total	U		0.316	1.50	1	10/19/2019 19:29	WG1365855
(S) Toluene-d8	*114*			*80.0-120*		*10/19/2019 19:29*	WG1365855
(S) 4-Bromofluorobenzene	*111*			*77.0-126*		*10/19/2019 19:29*	WG1365855
(S) 1,2-Dichloroethane-d4	*98.9*			*70.0-130*		*10/19/2019 19:29*	WG1365855

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U		1.05	25.0	1	10/19/2019 19:49	WG1365855
Acrylonitrile	U		0.873	5.00	1	10/19/2019 19:49	WG1365855
Benzene	20.3		0.0896	0.500	1	10/19/2019 19:49	WG1365855
Bromobenzene	U		0.133	0.500	1	10/19/2019 19:49	WG1365855
Bromodichloromethane	U		0.0800	0.500	1	10/19/2019 19:49	WG1365855
Bromochloromethane	U		0.145	0.500	1	10/19/2019 19:49	WG1365855
Bromoform	U		0.186	0.500	1	10/19/2019 19:49	WG1365855
Bromomethane	U		0.157	2.50	1	10/19/2019 19:49	WG1365855
n-Butylbenzene	U		0.143	0.500	1	10/19/2019 19:49	WG1365855
sec-Butylbenzene	2.75		0.134	0.500	1	10/19/2019 19:49	WG1365855
tert-Butylbenzene	U		0.183	0.500	1	10/19/2019 19:49	WG1365855
Carbon disulfide	U		0.101	0.500	1	10/19/2019 19:49	WG1365855
Carbon tetrachloride	U		0.159	0.500	1	10/19/2019 19:49	WG1365855
Chlorobenzene	U		0.140	0.500	1	10/19/2019 19:49	WG1365855
Chlorodibromomethane	U		0.128	0.500	1	10/19/2019 19:49	WG1365855
Chloroethane	U		0.141	2.50	1	10/19/2019 19:49	WG1365855
Chloroform	U		0.0860	0.500	1	10/19/2019 19:49	WG1365855
Chloromethane	U		0.153	1.25	1	10/19/2019 19:49	WG1365855
2-Chlorotoluene	U		0.111	0.500	1	10/19/2019 19:49	WG1365855
4-Chlorotoluene	U		0.0972	0.500	1	10/19/2019 19:49	WG1365855
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/19/2019 19:49	WG1365855
1,2-Dibromoethane	U		0.193	0.500	1	10/19/2019 19:49	WG1365855
Dibromomethane	U		0.117	0.500	1	10/19/2019 19:49	WG1365855
1,2-Dichlorobenzene	U		0.101	0.500	1	10/19/2019 19:49	WG1365855
1,3-Dichlorobenzene	U		0.130	0.500	1	10/19/2019 19:49	WG1365855
1,4-Dichlorobenzene	U		0.121	0.500	1	10/19/2019 19:49	WG1365855
Dichlorodifluoromethane	U		0.127	2.50	1	10/19/2019 19:49	WG1365855
1,1-Dichloroethane	U		0.114	0.500	1	10/19/2019 19:49	WG1365855
1,2-Dichloroethane	U		0.108	0.500	1	10/19/2019 19:49	WG1365855
1,1-Dichloroethene	U		0.188	0.500	1	10/19/2019 19:49	WG1365855
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/19/2019 19:49	WG1365855
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/19/2019 19:49	WG1365855
1,2-Dichloropropane	U		0.190	0.500	1	10/19/2019 19:49	WG1365855
1,1-Dichloropropene	U		0.128	0.500	1	10/19/2019 19:49	WG1365855
1,3-Dichloropropane	U		0.147	1.00	1	10/19/2019 19:49	WG1365855
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/19/2019 19:49	WG1365855
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/19/2019 19:49	WG1365855
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/19/2019 19:49	WG1365855
2,2-Dichloropropane	U		0.0929	0.500	1	10/19/2019 19:49	WG1365855
Di-isopropyl ether	0.813		0.0924	0.500	1	10/19/2019 19:49	WG1365855
Ethylbenzene	307		1.58	5.00	10	10/21/2019 14:53	WG1366289
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/19/2019 19:49	WG1365855
2-Hexanone	U		0.757	5.00	1	10/19/2019 19:49	WG1365855
n-Hexane	14.1		0.305	5.00	1	10/19/2019 19:49	WG1365855
Iodomethane	U		0.377	10.0	1	10/19/2019 19:49	WG1365855
Isopropylbenzene	28.7		0.126	0.500	1	10/19/2019 19:49	WG1365855
p-Isopropyltoluene	0.676		0.138	0.500	1	10/19/2019 19:49	WG1365855
2-Butanone (MEK)	U		1.28	5.00	1	10/19/2019 19:49	WG1365855
Methylene Chloride	U		1.07	2.50	1	10/19/2019 19:49	WG1365855
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/19/2019 19:49	WG1365855
Methyl tert-butyl ether	U		0.102	0.500	1	10/19/2019 19:49	WG1365855
Naphthalene	89.5	J0	1.74	25.0	10	10/21/2019 14:53	WG1366289
n-Propylbenzene	58.4		0.162	0.500	1	10/19/2019 19:49	WG1365855
Styrene	U		0.117	0.500	1	10/19/2019 19:49	WG1365855
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/19/2019 19:49	WG1365855
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/19/2019 19:49	WG1365855

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/19/2019 19:49	WG1365855
Tetrachloroethene	U		0.199	0.500	1	10/19/2019 19:49	WG1365855
Toluene	6.00		0.412	0.500	1	10/19/2019 19:49	WG1365855
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/19/2019 19:49	WG1365855
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/19/2019 19:49	WG1365855
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/19/2019 19:49	WG1365855
1,1,2-Trichloroethane	U		0.186	0.500	1	10/19/2019 19:49	WG1365855
Trichloroethene	U		0.153	0.500	1	10/19/2019 19:49	WG1365855
Trichlorofluoromethane	U		0.130	2.50	1	10/19/2019 19:49	WG1365855
1,2,3-Trichloropropane	U		0.247	2.50	1	10/19/2019 19:49	WG1365855
1,2,4-Trimethylbenzene	130		0.123	0.500	1	10/19/2019 19:49	WG1365855
1,2,3-Trimethylbenzene	119		0.0739	0.500	1	10/19/2019 19:49	WG1365855
1,3,5-Trimethylbenzene	8.19		0.124	0.500	1	10/19/2019 19:49	WG1365855
Vinyl acetate	U		0.645	5.00	1	10/19/2019 19:49	WG1365855
Vinyl chloride	U		0.118	0.500	1	10/19/2019 19:49	WG1365855
Xylenes, Total	123		0.316	1.50	1	10/19/2019 19:49	WG1365855
(S) Toluene-d8	*106*			*80.0-120*		*10/19/2019 19:49*	WG1365855
(S) Toluene-d8	*109*			*80.0-120*		*10/21/2019 14:53*	WG1366289
(S) 4-Bromofluorobenzene	*108*			*77.0-126*		*10/19/2019 19:49*	WG1365855
(S) 4-Bromofluorobenzene	*89.8*			*77.0-126*		*10/21/2019 14:53*	WG1366289
(S) 1,2-Dichloroethane-d4	*99.4*			*70.0-130*		*10/19/2019 19:49*	WG1365855
(S) 1,2-Dichloroethane-d4	*95.0*			*70.0-130*		*10/21/2019 14:53*	WG1366289

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	570000		2710	20000	1	10/18/2019 00:22	WG1364209

Sample Narrative:

L1148900-06 WG1364209: Endpoint pH 4.5 headspace

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	26100		51.9	1000	1	10/11/2019 21:07	WG1361340
Nitrate	U		22.7	100	1	10/11/2019 21:07	WG1361340
Sulfate	43700		77.4	5000	1	10/11/2019 21:07	WG1361340

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	5830	B	102	1000	1	10/14/2019 04:05	WG1362294

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	13500		150	1000	10	10/17/2019 00:24	WG1363727
Manganese	1760		2.50	50.0	10	10/17/2019 00:24	WG1363727

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	3650		0.287	0.678	1	10/14/2019 16:23	WG1362474
Ethane	70.7		0.296	1.29	1	10/14/2019 16:23	WG1362474
Ethene	6.24		0.422	1.27	1	10/14/2019 16:23	WG1362474

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	1.73	J	1.05	25.0	1	10/19/2019 20:09	WG1365855
Acrylonitrile	U		0.873	5.00	1	10/19/2019 20:09	WG1365855
Benzene	3.16		0.0896	0.500	1	10/19/2019 20:09	WG1365855
Bromobenzene	U		0.133	0.500	1	10/19/2019 20:09	WG1365855
Bromodichloromethane	U		0.0800	0.500	1	10/19/2019 20:09	WG1365855
Bromochloromethane	U		0.145	0.500	1	10/19/2019 20:09	WG1365855
Bromoform	U		0.186	0.500	1	10/19/2019 20:09	WG1365855
Bromomethane	U		0.157	2.50	1	10/19/2019 20:09	WG1365855
n-Butylbenzene	U		0.143	0.500	1	10/19/2019 20:09	WG1365855
sec-Butylbenzene	U		0.134	0.500	1	10/19/2019 20:09	WG1365855
tert-Butylbenzene	U		0.183	0.500	1	10/19/2019 20:09	WG1365855
Carbon disulfide	U		0.101	0.500	1	10/19/2019 20:09	WG1365855
Carbon tetrachloride	U		0.159	0.500	1	10/19/2019 20:09	WG1365855
Chlorobenzene	U		0.140	0.500	1	10/19/2019 20:09	WG1365855
Chlorodibromomethane	U		0.128	0.500	1	10/19/2019 20:09	WG1365855
Chloroethane	U		0.141	2.50	1	10/19/2019 20:09	WG1365855
Chloroform	U		0.0860	0.500	1	10/19/2019 20:09	WG1365855
Chloromethane	U		0.153	1.25	1	10/19/2019 20:09	WG1365855
2-Chlorotoluene	U		0.111	0.500	1	10/19/2019 20:09	WG1365855
4-Chlorotoluene	U		0.0972	0.500	1	10/19/2019 20:09	WG1365855

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/19/2019 20:09	WG1365855
1,2-Dibromoethane	U		0.193	0.500	1	10/19/2019 20:09	WG1365855
Dibromomethane	U		0.117	0.500	1	10/19/2019 20:09	WG1365855
1,2-Dichlorobenzene	U		0.101	0.500	1	10/19/2019 20:09	WG1365855
1,3-Dichlorobenzene	U		0.130	0.500	1	10/19/2019 20:09	WG1365855
1,4-Dichlorobenzene	U		0.121	0.500	1	10/19/2019 20:09	WG1365855
Dichlorodifluoromethane	U		0.127	2.50	1	10/19/2019 20:09	WG1365855
1,1-Dichloroethane	U		0.114	0.500	1	10/19/2019 20:09	WG1365855
1,2-Dichloroethane	U		0.108	0.500	1	10/19/2019 20:09	WG1365855
1,1-Dichloroethene	9.11		0.188	0.500	1	10/19/2019 20:09	WG1365855
cis-1,2-Dichloroethene	1080		2.33	12.5	25	10/21/2019 15:13	WG1366289
trans-1,2-Dichloroethene	5.55		0.152	0.500	1	10/19/2019 20:09	WG1365855
1,2-Dichloropropane	U		0.190	0.500	1	10/19/2019 20:09	WG1365855
1,1-Dichloropropene	U		0.128	0.500	1	10/19/2019 20:09	WG1365855
1,3-Dichloropropane	U		0.147	1.00	1	10/19/2019 20:09	WG1365855
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/19/2019 20:09	WG1365855
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/19/2019 20:09	WG1365855
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/19/2019 20:09	WG1365855
2,2-Dichloropropane	U		0.0929	0.500	1	10/19/2019 20:09	WG1365855
Di-isopropyl ether	U		0.0924	0.500	1	10/19/2019 20:09	WG1365855
Ethylbenzene	0.327	J	0.158	0.500	1	10/19/2019 20:09	WG1365855
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/19/2019 20:09	WG1365855
2-Hexanone	U		0.757	5.00	1	10/19/2019 20:09	WG1365855
n-Hexane	U		0.305	5.00	1	10/19/2019 20:09	WG1365855
Iodomethane	U		0.377	10.0	1	10/19/2019 20:09	WG1365855
Isopropylbenzene	U		0.126	0.500	1	10/19/2019 20:09	WG1365855
p-Isopropyltoluene	U		0.138	0.500	1	10/19/2019 20:09	WG1365855
2-Butanone (MEK)	U		1.28	5.00	1	10/19/2019 20:09	WG1365855
Methylene Chloride	U		1.07	2.50	1	10/19/2019 20:09	WG1365855
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/19/2019 20:09	WG1365855
Methyl tert-butyl ether	U		0.102	0.500	1	10/19/2019 20:09	WG1365855
Naphthalene	23.8	B J J0	4.35	62.5	25	10/21/2019 15:13	WG1366289
n-Propylbenzene	0.177	J	0.162	0.500	1	10/19/2019 20:09	WG1365855
Styrene	U		0.117	0.500	1	10/19/2019 20:09	WG1365855
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/19/2019 20:09	WG1365855
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/19/2019 20:09	WG1365855
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/19/2019 20:09	WG1365855
Tetrachloroethene	524		4.98	12.5	25	10/21/2019 15:13	WG1366289
Toluene	U		0.412	0.500	1	10/19/2019 20:09	WG1365855
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/19/2019 20:09	WG1365855
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/19/2019 20:09	WG1365855
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/19/2019 20:09	WG1365855
1,1,2-Trichloroethane	U		0.186	0.500	1	10/19/2019 20:09	WG1365855
Trichloroethene	483		3.83	12.5	25	10/21/2019 15:13	WG1366289
Trichlorofluoromethane	U		0.130	2.50	1	10/19/2019 20:09	WG1365855
1,2,3-Trichloropropane	U		0.247	2.50	1	10/19/2019 20:09	WG1365855
1,2,4-Trimethylbenzene	0.392	J	0.123	0.500	1	10/19/2019 20:09	WG1365855
1,2,3-Trimethylbenzene	0.556		0.0739	0.500	1	10/19/2019 20:09	WG1365855
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/19/2019 20:09	WG1365855
Vinyl acetate	U		0.645	5.00	1	10/19/2019 20:09	WG1365855
Vinyl chloride	194		0.118	0.500	1	10/19/2019 20:09	WG1365855
Xylenes, Total	U		0.316	1.50	1	10/19/2019 20:09	WG1365855
(S) Toluene-d8	*115*			*80.0-120*		*10/19/2019 20:09*	WG1365855
(S) Toluene-d8	*111*			*80.0-120*		*10/21/2019 15:13*	WG1366289
(S) 4-Bromofluorobenzene	*107*			*77.0-126*		*10/19/2019 20:09*	WG1365855
(S) 4-Bromofluorobenzene	*92.6*			*77.0-126*		*10/21/2019 15:13*	WG1366289

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*93.2*			*70.0-130*		*10/19/2019 20:09*	WG1365855
(S) 1,2-Dichloroethane-d4	*98.4*			*70.0-130*		*10/21/2019 15:13*	WG1366289

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	378000		2710	20000	1	10/18/2019 00:28	WG1364209

Sample Narrative:

L1148900-07 WG1364209: Endpoint pH 4.5 headspace

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	11600		51.9	1000	1	10/11/2019 21:42	WG1361340
Nitrate	199		22.7	100	1	10/11/2019 21:42	WG1361340
Sulfate	66300		77.4	5000	1	10/11/2019 21:42	WG1361340

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	4390	B	102	1000	1	10/14/2019 04:27	WG1362294

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	2150		15.0	100	1	10/16/2019 23:05	WG1363727
Manganese	1590		2.50	50.0	10	10/17/2019 00:48	WG1363727

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	76.2		0.287	0.678	1	10/14/2019 16:28	WG1362474
Ethane	U		0.296	1.29	1	10/14/2019 16:28	WG1362474
Ethene	U		0.422	1.27	1	10/14/2019 16:28	WG1362474

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	U		1.05	25.0	1	10/19/2019 20:30	WG1365855
Acrylonitrile	U		0.873	5.00	1	10/19/2019 20:30	WG1365855
Benzene	U		0.0896	0.500	1	10/19/2019 20:30	WG1365855
Bromobenzene	U		0.133	0.500	1	10/19/2019 20:30	WG1365855
Bromodichloromethane	U		0.0800	0.500	1	10/19/2019 20:30	WG1365855
Bromochloromethane	U		0.145	0.500	1	10/19/2019 20:30	WG1365855
Bromoform	U		0.186	0.500	1	10/19/2019 20:30	WG1365855
Bromomethane	U		0.157	2.50	1	10/19/2019 20:30	WG1365855
n-Butylbenzene	U		0.143	0.500	1	10/19/2019 20:30	WG1365855
sec-Butylbenzene	U		0.134	0.500	1	10/19/2019 20:30	WG1365855
tert-Butylbenzene	U		0.183	0.500	1	10/19/2019 20:30	WG1365855
Carbon disulfide	U		0.101	0.500	1	10/19/2019 20:30	WG1365855
Carbon tetrachloride	U		0.159	0.500	1	10/19/2019 20:30	WG1365855
Chlorobenzene	U		0.140	0.500	1	10/19/2019 20:30	WG1365855
Chlorodibromomethane	U		0.128	0.500	1	10/19/2019 20:30	WG1365855
Chloroethane	U		0.141	2.50	1	10/19/2019 20:30	WG1365855
Chloroform	U		0.0860	0.500	1	10/19/2019 20:30	WG1365855
Chloromethane	U		0.153	1.25	1	10/19/2019 20:30	WG1365855
2-Chlorotoluene	U		0.111	0.500	1	10/19/2019 20:30	WG1365855
4-Chlorotoluene	U		0.0972	0.500	1	10/19/2019 20:30	WG1365855

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/19/2019 20:30	WG1365855
1,2-Dibromoethane	U		0.193	0.500	1	10/19/2019 20:30	WG1365855
Dibromomethane	U		0.117	0.500	1	10/19/2019 20:30	WG1365855
1,2-Dichlorobenzene	U		0.101	0.500	1	10/19/2019 20:30	WG1365855
1,3-Dichlorobenzene	U		0.130	0.500	1	10/19/2019 20:30	WG1365855
1,4-Dichlorobenzene	U		0.121	0.500	1	10/19/2019 20:30	WG1365855
Dichlorodifluoromethane	U		0.127	2.50	1	10/19/2019 20:30	WG1365855
1,1-Dichloroethane	U		0.114	0.500	1	10/19/2019 20:30	WG1365855
1,2-Dichloroethane	U		0.108	0.500	1	10/19/2019 20:30	WG1365855
1,1-Dichloroethene	U		0.188	0.500	1	10/19/2019 20:30	WG1365855
cis-1,2-Dichloroethene	7.34		0.0933	0.500	1	10/21/2019 15:33	WG1366289
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/19/2019 20:30	WG1365855
1,2-Dichloropropane	U		0.190	0.500	1	10/19/2019 20:30	WG1365855
1,1-Dichloropropene	U		0.128	0.500	1	10/19/2019 20:30	WG1365855
1,3-Dichloropropane	U		0.147	1.00	1	10/19/2019 20:30	WG1365855
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/19/2019 20:30	WG1365855
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/19/2019 20:30	WG1365855
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/19/2019 20:30	WG1365855
2,2-Dichloropropane	U		0.0929	0.500	1	10/19/2019 20:30	WG1365855
Di-isopropyl ether	U		0.0924	0.500	1	10/19/2019 20:30	WG1365855
Ethylbenzene	U		0.158	0.500	1	10/19/2019 20:30	WG1365855
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/19/2019 20:30	WG1365855
2-Hexanone	U		0.757	5.00	1	10/19/2019 20:30	WG1365855
n-Hexane	U		0.305	5.00	1	10/19/2019 20:30	WG1365855
Iodomethane	U		0.377	10.0	1	10/19/2019 20:30	WG1365855
Isopropylbenzene	U		0.126	0.500	1	10/19/2019 20:30	WG1365855
p-Isopropyltoluene	U		0.138	0.500	1	10/19/2019 20:30	WG1365855
2-Butanone (MEK)	U		1.28	5.00	1	10/19/2019 20:30	WG1365855
Methylene Chloride	U		1.07	2.50	1	10/19/2019 20:30	WG1365855
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/19/2019 20:30	WG1365855
Methyl tert-butyl ether	U		0.102	0.500	1	10/19/2019 20:30	WG1365855
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 15:33	WG1366289
n-Propylbenzene	U		0.162	0.500	1	10/19/2019 20:30	WG1365855
Styrene	U		0.117	0.500	1	10/19/2019 20:30	WG1365855
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/19/2019 20:30	WG1365855
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/19/2019 20:30	WG1365855
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/19/2019 20:30	WG1365855
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 15:33	WG1366289
Toluene	U		0.412	0.500	1	10/19/2019 20:30	WG1365855
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/19/2019 20:30	WG1365855
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/19/2019 20:30	WG1365855
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/19/2019 20:30	WG1365855
1,1,2-Trichloroethane	U		0.186	0.500	1	10/19/2019 20:30	WG1365855
Trichloroethene	U		0.153	0.500	1	10/21/2019 15:33	WG1366289
Trichlorofluoromethane	U		0.130	2.50	1	10/19/2019 20:30	WG1365855
1,2,3-Trichloropropane	U		0.247	2.50	1	10/19/2019 20:30	WG1365855
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/19/2019 20:30	WG1365855
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/19/2019 20:30	WG1365855
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/19/2019 20:30	WG1365855
Vinyl acetate	U		0.645	5.00	1	10/19/2019 20:30	WG1365855
Vinyl chloride	1.09		0.118	0.500	1	10/19/2019 20:30	WG1365855
Xylenes, Total	U		0.316	1.50	1	10/19/2019 20:30	WG1365855
(S) Toluene-d8	*112*			*80.0-120*		*10/19/2019 20:30*	WG1365855
(S) Toluene-d8	*113*			*80.0-120*		*10/21/2019 15:33*	WG1366289
(S) 4-Bromofluorobenzene	*111*			*77.0-126*		*10/19/2019 20:30*	WG1365855
(S) 4-Bromofluorobenzene	*94.9*			*77.0-126*		*10/21/2019 15:33*	WG1366289

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*97.1*			*70.0-130*		*10/19/2019 20:30*	WG1365855
(S) 1,2-Dichloroethane-d4	*97.0*			*70.0-130*		*10/21/2019 15:33*	WG1366289

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	786000		2710	20000	1	10/17/2019 16:38	WG1364211

Sample Narrative:
L1148900-08 WG1364211: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	10700		51.9	1000	1	10/11/2019 22:00	WG1361340
Nitrate	U		22.7	100	1	10/11/2019 22:00	WG1361340
Sulfate	88000		77.4	5000	1	10/11/2019 22:00	WG1361340

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	8930		102	1000	1	10/14/2019 04:49	WG1362294

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	11200		300	2000	20	10/17/2019 00:37	WG1363727
Manganese	3010		5.00	100	20	10/17/2019 00:37	WG1363727

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	558		0.287	0.678	1	10/14/2019 16:32	WG1362474
Ethane	U		0.296	1.29	1	10/14/2019 16:32	WG1362474
Ethene	U		0.422	1.27	1	10/14/2019 16:32	WG1362474

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.91	J	1.05	25.0	1	10/19/2019 20:50	WG1365855
Acrylonitrile	U		0.873	5.00	1	10/19/2019 20:50	WG1365855
Benzene	U		0.0896	0.500	1	10/19/2019 20:50	WG1365855
Bromobenzene	U		0.133	0.500	1	10/19/2019 20:50	WG1365855
Bromodichloromethane	U		0.0800	0.500	1	10/19/2019 20:50	WG1365855
Bromochloromethane	U		0.145	0.500	1	10/19/2019 20:50	WG1365855
Bromoform	U		0.186	0.500	1	10/19/2019 20:50	WG1365855
Bromomethane	U		0.157	2.50	1	10/19/2019 20:50	WG1365855
n-Butylbenzene	U		0.143	0.500	1	10/19/2019 20:50	WG1365855
sec-Butylbenzene	U		0.134	0.500	1	10/19/2019 20:50	WG1365855
tert-Butylbenzene	U		0.183	0.500	1	10/19/2019 20:50	WG1365855
Carbon disulfide	U		0.101	0.500	1	10/19/2019 20:50	WG1365855
Carbon tetrachloride	U		0.159	0.500	1	10/19/2019 20:50	WG1365855
Chlorobenzene	U		0.140	0.500	1	10/19/2019 20:50	WG1365855
Chlorodibromomethane	U		0.128	0.500	1	10/19/2019 20:50	WG1365855
Chloroethane	U		0.141	2.50	1	10/19/2019 20:50	WG1365855
Chloroform	U		0.0860	0.500	1	10/19/2019 20:50	WG1365855
Chloromethane	U		0.153	1.25	1	10/19/2019 20:50	WG1365855
2-Chlorotoluene	U		0.111	0.500	1	10/19/2019 20:50	WG1365855
4-Chlorotoluene	U		0.0972	0.500	1	10/19/2019 20:50	WG1365855

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/19/2019 20:50	WG1365855
1,2-Dibromoethane	U		0.193	0.500	1	10/19/2019 20:50	WG1365855
Dibromomethane	U		0.117	0.500	1	10/19/2019 20:50	WG1365855
1,2-Dichlorobenzene	U		0.101	0.500	1	10/19/2019 20:50	WG1365855
1,3-Dichlorobenzene	U		0.130	0.500	1	10/19/2019 20:50	WG1365855
1,4-Dichlorobenzene	U		0.121	0.500	1	10/19/2019 20:50	WG1365855
Dichlorodifluoromethane	U		0.127	2.50	1	10/19/2019 20:50	WG1365855
1,1-Dichloroethane	U		0.114	0.500	1	10/19/2019 20:50	WG1365855
1,2-Dichloroethane	U		0.108	0.500	1	10/19/2019 20:50	WG1365855
1,1-Dichloroethene	U		0.188	0.500	1	10/19/2019 20:50	WG1365855
cis-1,2-Dichloroethene	0.148	J	0.0933	0.500	1	10/21/2019 16:18	WG1366289
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/19/2019 20:50	WG1365855
1,2-Dichloropropane	U		0.190	0.500	1	10/19/2019 20:50	WG1365855
1,1-Dichloropropene	U		0.128	0.500	1	10/19/2019 20:50	WG1365855
1,3-Dichloropropane	U		0.147	1.00	1	10/19/2019 20:50	WG1365855
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/19/2019 20:50	WG1365855
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/19/2019 20:50	WG1365855
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/19/2019 20:50	WG1365855
2,2-Dichloropropane	U		0.0929	0.500	1	10/19/2019 20:50	WG1365855
Di-isopropyl ether	U		0.0924	0.500	1	10/19/2019 20:50	WG1365855
Ethylbenzene	U		0.158	0.500	1	10/19/2019 20:50	WG1365855
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/19/2019 20:50	WG1365855
2-Hexanone	U		0.757	5.00	1	10/19/2019 20:50	WG1365855
n-Hexane	U		0.305	5.00	1	10/19/2019 20:50	WG1365855
Iodomethane	U		0.377	10.0	1	10/19/2019 20:50	WG1365855
Isopropylbenzene	0.352	J	0.126	0.500	1	10/19/2019 20:50	WG1365855
p-Isopropyltoluene	U		0.138	0.500	1	10/19/2019 20:50	WG1365855
2-Butanone (MEK)	U		1.28	5.00	1	10/19/2019 20:50	WG1365855
Methylene Chloride	U		1.07	2.50	1	10/19/2019 20:50	WG1365855
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/19/2019 20:50	WG1365855
Methyl tert-butyl ether	U		0.102	0.500	1	10/19/2019 20:50	WG1365855
Naphthalene	U		0.174	2.50	1	10/21/2019 16:18	WG1366289
n-Propylbenzene	U		0.162	0.500	1	10/19/2019 20:50	WG1365855
Styrene	U		0.117	0.500	1	10/19/2019 20:50	WG1365855
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/19/2019 20:50	WG1365855
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/19/2019 20:50	WG1365855
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/19/2019 20:50	WG1365855
Tetrachloroethene	U		0.199	0.500	1	10/19/2019 20:50	WG1365855
Toluene	U		0.412	0.500	1	10/19/2019 20:50	WG1365855
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/19/2019 20:50	WG1365855
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/19/2019 20:50	WG1365855
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/19/2019 20:50	WG1365855
1,1,2-Trichloroethane	U		0.186	0.500	1	10/19/2019 20:50	WG1365855
Trichloroethene	U		0.153	0.500	1	10/21/2019 16:18	WG1366289
Trichlorofluoromethane	U		0.130	2.50	1	10/19/2019 20:50	WG1365855
1,2,3-Trichloropropane	U		0.247	2.50	1	10/19/2019 20:50	WG1365855
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/19/2019 20:50	WG1365855
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/19/2019 20:50	WG1365855
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/19/2019 20:50	WG1365855
Vinyl acetate	U		0.645	5.00	1	10/19/2019 20:50	WG1365855
Vinyl chloride	U		0.118	0.500	1	10/19/2019 20:50	WG1365855
Xylenes, Total	U		0.316	1.50	1	10/19/2019 20:50	WG1365855
(S) Toluene-d8	*111*			*80.0-120*		*10/19/2019 20:50*	WG1365855
(S) Toluene-d8	*112*			*80.0-120*		*10/21/2019 16:18*	WG1366289
(S) 4-Bromofluorobenzene	*111*			*77.0-126*		*10/19/2019 20:50*	WG1365855
(S) 4-Bromofluorobenzene	*93.8*			*77.0-126*		*10/21/2019 16:18*	WG1366289

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*96.6*			*70.0-130*		*10/19/2019 20:50*	WG1365855
(S) 1,2-Dichloroethane-d4	*94.3*			*70.0-130*		*10/21/2019 16:18*	WG1366289

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	226000		2710	20000	1	10/17/2019 16:44	WG1364211

Sample Narrative:
L1148900-09 WG1364211: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	18600		51.9	1000	1	10/11/2019 22:18	WG1361340
Nitrate	U		22.7	100	1	10/11/2019 22:18	WG1361340
Sulfate	26400		77.4	5000	1	10/11/2019 22:18	WG1361340

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	4980	B	102	1000	1	10/14/2019 05:09	WG1362294

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	10700		300	2000	20	10/17/2019 00:40	WG1363727
Manganese	2630		5.00	100	20	10/17/2019 00:40	WG1363727

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	289		0.287	0.678	1	10/14/2019 16:35	WG1362474
Ethane	U		0.296	1.29	1	10/14/2019 16:35	WG1362474
Ethene	U		0.422	1.27	1	10/14/2019 16:35	WG1362474

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.20	J	1.05	25.0	1	10/19/2019 21:10	WG1365855
Acrylonitrile	U		0.873	5.00	1	10/19/2019 21:10	WG1365855
Benzene	U		0.0896	0.500	1	10/19/2019 21:10	WG1365855
Bromobenzene	U		0.133	0.500	1	10/19/2019 21:10	WG1365855
Bromodichloromethane	U		0.0800	0.500	1	10/19/2019 21:10	WG1365855
Bromochloromethane	U		0.145	0.500	1	10/19/2019 21:10	WG1365855
Bromoform	U		0.186	0.500	1	10/19/2019 21:10	WG1365855
Bromomethane	U		0.157	2.50	1	10/19/2019 21:10	WG1365855
n-Butylbenzene	U		0.143	0.500	1	10/19/2019 21:10	WG1365855
sec-Butylbenzene	U		0.134	0.500	1	10/19/2019 21:10	WG1365855
tert-Butylbenzene	U		0.183	0.500	1	10/19/2019 21:10	WG1365855
Carbon disulfide	U		0.101	0.500	1	10/19/2019 21:10	WG1365855
Carbon tetrachloride	U		0.159	0.500	1	10/19/2019 21:10	WG1365855
Chlorobenzene	U		0.140	0.500	1	10/19/2019 21:10	WG1365855
Chlorodibromomethane	U		0.128	0.500	1	10/19/2019 21:10	WG1365855
Chloroethane	U		0.141	2.50	1	10/19/2019 21:10	WG1365855
Chloroform	U		0.0860	0.500	1	10/19/2019 21:10	WG1365855
Chloromethane	U		0.153	1.25	1	10/19/2019 21:10	WG1365855
2-Chlorotoluene	U		0.111	0.500	1	10/19/2019 21:10	WG1365855
4-Chlorotoluene	U		0.0972	0.500	1	10/19/2019 21:10	WG1365855

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/19/2019 21:10	WG1365855
1,2-Dibromoethane	U		0.193	0.500	1	10/19/2019 21:10	WG1365855
Dibromomethane	U		0.117	0.500	1	10/19/2019 21:10	WG1365855
1,2-Dichlorobenzene	U		0.101	0.500	1	10/19/2019 21:10	WG1365855
1,3-Dichlorobenzene	U		0.130	0.500	1	10/19/2019 21:10	WG1365855
1,4-Dichlorobenzene	U		0.121	0.500	1	10/19/2019 21:10	WG1365855
Dichlorodifluoromethane	U		0.127	2.50	1	10/19/2019 21:10	WG1365855
1,1-Dichloroethane	U		0.114	0.500	1	10/19/2019 21:10	WG1365855
1,2-Dichloroethane	U		0.108	0.500	1	10/19/2019 21:10	WG1365855
1,1-Dichloroethene	U		0.188	0.500	1	10/19/2019 21:10	WG1365855
cis-1,2-Dichloroethene	12.6		0.0933	0.500	1	10/19/2019 21:10	WG1365855
trans-1,2-Dichloroethene	0.159	J	0.152	0.500	1	10/19/2019 21:10	WG1365855
1,2-Dichloropropane	U		0.190	0.500	1	10/19/2019 21:10	WG1365855
1,1-Dichloropropene	U		0.128	0.500	1	10/19/2019 21:10	WG1365855
1,3-Dichloropropane	U		0.147	1.00	1	10/19/2019 21:10	WG1365855
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/19/2019 21:10	WG1365855
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/19/2019 21:10	WG1365855
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/19/2019 21:10	WG1365855
2,2-Dichloropropane	U		0.0929	0.500	1	10/19/2019 21:10	WG1365855
Di-isopropyl ether	U		0.0924	0.500	1	10/19/2019 21:10	WG1365855
Ethylbenzene	U		0.158	0.500	1	10/19/2019 21:10	WG1365855
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/19/2019 21:10	WG1365855
2-Hexanone	U		0.757	5.00	1	10/19/2019 21:10	WG1365855
n-Hexane	U		0.305	5.00	1	10/19/2019 21:10	WG1365855
Iodomethane	U		0.377	10.0	1	10/19/2019 21:10	WG1365855
Isopropylbenzene	U		0.126	0.500	1	10/19/2019 21:10	WG1365855
p-Isopropyltoluene	U		0.138	0.500	1	10/19/2019 21:10	WG1365855
2-Butanone (MEK)	U		1.28	5.00	1	10/19/2019 21:10	WG1365855
Methylene Chloride	U		1.07	2.50	1	10/19/2019 21:10	WG1365855
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/19/2019 21:10	WG1365855
Methyl tert-butyl ether	U		0.102	0.500	1	10/19/2019 21:10	WG1365855
Naphthalene	U		0.174	2.50	1	10/19/2019 21:10	WG1365855
n-Propylbenzene	U		0.162	0.500	1	10/19/2019 21:10	WG1365855
Styrene	U		0.117	0.500	1	10/19/2019 21:10	WG1365855
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/19/2019 21:10	WG1365855
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/19/2019 21:10	WG1365855
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/19/2019 21:10	WG1365855
Tetrachloroethene	0.876		0.199	0.500	1	10/19/2019 21:10	WG1365855
Toluene	U		0.412	0.500	1	10/19/2019 21:10	WG1365855
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/19/2019 21:10	WG1365855
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/19/2019 21:10	WG1365855
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/19/2019 21:10	WG1365855
1,1,2-Trichloroethane	U		0.186	0.500	1	10/19/2019 21:10	WG1365855
Trichloroethene	7.54		0.153	0.500	1	10/19/2019 21:10	WG1365855
Trichlorofluoromethane	U		0.130	2.50	1	10/19/2019 21:10	WG1365855
1,2,3-Trichloropropane	U		0.247	2.50	1	10/19/2019 21:10	WG1365855
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/19/2019 21:10	WG1365855
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/19/2019 21:10	WG1365855
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/19/2019 21:10	WG1365855
Vinyl acetate	U		0.645	5.00	1	10/19/2019 21:10	WG1365855
Vinyl chloride	U		0.118	0.500	1	10/19/2019 21:10	WG1365855
Xylenes, Total	U		0.316	1.50	1	10/19/2019 21:10	WG1365855
(S) Toluene-d8	*115*			*80.0-120*		*10/19/2019 21:10*	WG1365855
(S) 4-Bromofluorobenzene	*112*			*77.0-126*		*10/19/2019 21:10*	WG1365855
(S) 1,2-Dichloroethane-d4	*98.4*			*70.0-130*		*10/19/2019 21:10*	WG1365855

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U		1.05	25.0	1	10/19/2019 16:05	WG1365855
Acrylonitrile	U		0.873	5.00	1	10/19/2019 16:05	WG1365855
Benzene	U		0.0896	0.500	1	10/19/2019 16:05	WG1365855
Bromobenzene	U		0.133	0.500	1	10/19/2019 16:05	WG1365855
Bromodichloromethane	U		0.0800	0.500	1	10/19/2019 16:05	WG1365855
Bromochloromethane	U		0.145	0.500	1	10/19/2019 16:05	WG1365855
Bromoform	U		0.186	0.500	1	10/19/2019 16:05	WG1365855
Bromomethane	U		0.157	2.50	1	10/19/2019 16:05	WG1365855
n-Butylbenzene	U		0.143	0.500	1	10/19/2019 16:05	WG1365855
sec-Butylbenzene	U		0.134	0.500	1	10/19/2019 16:05	WG1365855
tert-Butylbenzene	U		0.183	0.500	1	10/19/2019 16:05	WG1365855
Carbon disulfide	U		0.101	0.500	1	10/19/2019 16:05	WG1365855
Carbon tetrachloride	U		0.159	0.500	1	10/19/2019 16:05	WG1365855
Chlorobenzene	U		0.140	0.500	1	10/19/2019 16:05	WG1365855
Chlorodibromomethane	U		0.128	0.500	1	10/19/2019 16:05	WG1365855
Chloroethane	U		0.141	2.50	1	10/19/2019 16:05	WG1365855
Chloroform	U		0.0860	0.500	1	10/19/2019 16:05	WG1365855
Chloromethane	U		0.153	1.25	1	10/19/2019 16:05	WG1365855
2-Chlorotoluene	U		0.111	0.500	1	10/19/2019 16:05	WG1365855
4-Chlorotoluene	U		0.0972	0.500	1	10/19/2019 16:05	WG1365855
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/19/2019 16:05	WG1365855
1,2-Dibromoethane	U		0.193	0.500	1	10/19/2019 16:05	WG1365855
Dibromomethane	U		0.117	0.500	1	10/19/2019 16:05	WG1365855
1,2-Dichlorobenzene	U		0.101	0.500	1	10/19/2019 16:05	WG1365855
1,3-Dichlorobenzene	U		0.130	0.500	1	10/19/2019 16:05	WG1365855
1,4-Dichlorobenzene	U		0.121	0.500	1	10/19/2019 16:05	WG1365855
Dichlorodifluoromethane	U		0.127	2.50	1	10/19/2019 16:05	WG1365855
1,1-Dichloroethane	U		0.114	0.500	1	10/19/2019 16:05	WG1365855
1,2-Dichloroethane	U		0.108	0.500	1	10/19/2019 16:05	WG1365855
1,1-Dichloroethene	U		0.188	0.500	1	10/19/2019 16:05	WG1365855
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/19/2019 16:05	WG1365855
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/19/2019 16:05	WG1365855
1,2-Dichloropropane	U		0.190	0.500	1	10/19/2019 16:05	WG1365855
1,1-Dichloropropene	U		0.128	0.500	1	10/19/2019 16:05	WG1365855
1,3-Dichloropropane	U		0.147	1.00	1	10/19/2019 16:05	WG1365855
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/19/2019 16:05	WG1365855
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/19/2019 16:05	WG1365855
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/19/2019 16:05	WG1365855
2,2-Dichloropropane	U		0.0929	0.500	1	10/19/2019 16:05	WG1365855
Di-isopropyl ether	U		0.0924	0.500	1	10/19/2019 16:05	WG1365855
Ethylbenzene	U		0.158	0.500	1	10/19/2019 16:05	WG1365855
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/19/2019 16:05	WG1365855
2-Hexanone	U		0.757	5.00	1	10/19/2019 16:05	WG1365855
n-Hexane	U		0.305	5.00	1	10/19/2019 16:05	WG1365855
Iodomethane	U		0.377	10.0	1	10/19/2019 16:05	WG1365855
Isopropylbenzene	U		0.126	0.500	1	10/19/2019 16:05	WG1365855
p-Isopropyltoluene	U		0.138	0.500	1	10/19/2019 16:05	WG1365855
2-Butanone (MEK)	U		1.28	5.00	1	10/19/2019 16:05	WG1365855
Methylene Chloride	U		1.07	2.50	1	10/19/2019 16:05	WG1365855
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/19/2019 16:05	WG1365855
Methyl tert-butyl ether	U		0.102	0.500	1	10/19/2019 16:05	WG1365855
Naphthalene	U		0.174	2.50	1	10/19/2019 16:05	WG1365855
n-Propylbenzene	U		0.162	0.500	1	10/19/2019 16:05	WG1365855
Styrene	U		0.117	0.500	1	10/19/2019 16:05	WG1365855
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/19/2019 16:05	WG1365855
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/19/2019 16:05	WG1365855

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/19/2019 16:05	WG1365855
Tetrachloroethene	U		0.199	0.500	1	10/19/2019 16:05	WG1365855
Toluene	U		0.412	0.500	1	10/19/2019 16:05	WG1365855
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/19/2019 16:05	WG1365855
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/19/2019 16:05	WG1365855
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/19/2019 16:05	WG1365855
1,1,2-Trichloroethane	U		0.186	0.500	1	10/19/2019 16:05	WG1365855
Trichloroethene	U		0.153	0.500	1	10/19/2019 16:05	WG1365855
Trichlorofluoromethane	U		0.130	2.50	1	10/19/2019 16:05	WG1365855
1,2,3-Trichloropropane	U		0.247	2.50	1	10/19/2019 16:05	WG1365855
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/19/2019 16:05	WG1365855
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/19/2019 16:05	WG1365855
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/19/2019 16:05	WG1365855
Vinyl acetate	U		0.645	5.00	1	10/19/2019 16:05	WG1365855
Vinyl chloride	U		0.118	0.500	1	10/19/2019 16:05	WG1365855
Xylenes, Total	U		0.316	1.50	1	10/19/2019 16:05	WG1365855
(S) Toluene-d8	*113*			*80.0-120*		*10/19/2019 16:05*	WG1365855
(S) 4-Bromofluorobenzene	*113*			*77.0-126*		*10/19/2019 16:05*	WG1365855
(S) 1,2-Dichloroethane-d4	*98.1*			*70.0-130*		*10/19/2019 16:05*	WG1365855

Method Blank (MB)

(MB) R3462293-1 10/18/19 00:00

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Alkalinity	5440	J	2710	20000

Sample Narrative:

BLANK: Endpoint pH 4.5

L1148902-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1148902-01 10/18/19 00:35 • (DUP) R3462293-2 10/18/19 00:41

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	364000	362000	1	0.303		20

Sample Narrative:

OS: Endpoint pH 4.5 headspace

DUP: Endpoint pH 4.5

L1148902-16 Original Sample (OS) • Duplicate (DUP)

(OS) L1148902-16 10/18/19 02:38 • (DUP) R3462293-4 10/18/19 02:45

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	257000	265000	1	2.93		20

Sample Narrative:

OS: Endpoint pH 4.5 headspace

DUP: Endpoint pH 4.5

Laboratory Control Sample (LCS)

(LCS) R3462293-3 10/18/19 01:09

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Alkalinity	100000	99800	99.8	85.0-115	

Sample Narrative:

LCS: Endpoint pH 4.5

Method Blank (MB)

(MB) R3462246-1 10/17/19 15:27

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Alkalinity	5510	J	2710	20000

Sample Narrative:

BLANK: Endpoint pH 4.5

L1148878-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1148878-01 10/17/19 16:23 • (DUP) R3462246-3 10/17/19 16:30

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	570000	572000	1	0.322		20

Sample Narrative:

OS: Endpoint pH 4.5 HEADSPACE

DUP: Endpoint pH 4.5

L1149219-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1149219-04 10/17/19 18:27 • (DUP) R3462246-6 10/17/19 18:34

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	351000	353000	1	0.456		20

Sample Narrative:

OS: Endpoint pH 4.5 HEADSPACE

DUP: Endpoint pH 4.5

Laboratory Control Sample (LCS)

(LCS) R3462246-5 10/17/19 16:51

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Alkalinity	100000	101000	101	85.0-115	

Sample Narrative:

LCS: Endpoint pH 4.5

Method Blank (MB)

(MB) R3460365-1 10/11/19 09:54

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	U		51.9	1000
Nitrate	U		22.7	100
Sulfate	U		77.4	5000

L1148852-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1148852-05 10/11/19 17:36 • (DUP) R3460365-3 10/11/19 17:53

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	ND	213	1	0.000		15
Nitrate	ND	0.000	1	0.000		15
Sulfate	ND	0.000	1	0.000		15

L1148902-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1148902-01 10/11/19 22:53 • (DUP) R3460365-6 10/11/19 23:11

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	37500	37300	1	0.490		15
Nitrate	170	168	1	1.54		15
Sulfate	8290	8280	1	0.0821		15

Laboratory Control Sample (LCS)

(LCS) R3460365-2 10/11/19 10:11

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	38700	96.7	80.0-120	
Nitrate	8000	7920	99.0	80.0-120	
Sulfate	40000	39300	98.4	80.0-120	

L1148854-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148854-01 10/11/19 18:11 • (MS) R3460365-4 10/11/19 18:29 • (MSD) R3460365-5 10/11/19 18:46

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	343000	375000	376000	65.5	65.7	1	80.0-120	E V	E V	0.0306	15
Nitrate	5000	ND	4860	4950	97.3	99.0	1	80.0-120			1.77	15
Sulfate	50000	ND	52100	51900	98.3	98.1	1	80.0-120			0.235	15

L1148902-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1148902-02 10/11/19 23:28 • (MS) R3460365-7 10/11/19 23:46

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	25000	73000	96.1	1	80.0-120	
Nitrate	5000	U	4850	97.0	1	80.0-120	
Sulfate	50000	1490	50100	97.2	1	80.0-120	

Method Blank (MB)

(MB) R3461010-1 10/13/19 17:37

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
TOC (Total Organic Carbon)	662	J	102	1000

L1148464-41 Original Sample (OS) • Duplicate (DUP)

(OS) L1148464-41 10/13/19 19:54 • (DUP) R3461010-3 10/13/19 20:12

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	ND	640	1	11.4	J	20

L1148844-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1148844-06 10/14/19 00:29 • (DUP) R3461010-6 10/14/19 00:50

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	27900	28400	1	1.67		20

Laboratory Control Sample (LCS)

(LCS) R3461010-2 10/13/19 18:20

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TOC (Total Organic Carbon)	75000	77100	103	85.0-115	

L1148844-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148844-04 10/13/19 23:08 • (MS) R3461010-4 10/13/19 23:29 • (MSD) R3461010-5 10/13/19 23:50

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	4760	56900	55100	104	101	1	80.0-120			3.30	20

L1148900-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148900-04 10/14/19 03:05 • (MS) R3461010-7 10/14/19 03:26 • (MSD) R3461010-8 10/14/19 03:49

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	5310	57700	57900	105	105	1	80.0-120			0.380	20

Method Blank (MB)

(MB) R3461834-1 10/16/19 22:15

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Iron	U		15.0	100
Manganese	0.691	J	0.250	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461834-2 10/16/19 22:18 • (LCSD) R3461834-3 10/16/19 22:21

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Iron	5000	4820	4870	96.5	97.4	80.0-120			1.00	20
Manganese	50.0	48.6	48.7	97.3	97.3	80.0-120			0.0807	20

L1148780-22 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148780-22 10/16/19 22:25 • (MS) R3461834-5 10/16/19 22:31 • (MSD) R3461834-6 10/16/19 22:35

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Iron	5000	ND	4660	5000	93.2	100	1	75.0-125			6.96	20
Manganese	50.0	20.3	65.8	69.2	91.1	97.9	1	75.0-125			5.01	20

Method Blank (MB)

(MB) R3460900-1 10/14/19 15:05

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1148844-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1148844-02 10/14/19 15:17 • (DUP) R3460900-2 10/14/19 16:06

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Methane	5560	5470	1	1.51		20
Ethane	141	138	1	2.40		20
Ethene	17.6	17.1	1	3.01		20

L1149259-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1149259-01 10/14/19 16:43 • (DUP) R3460900-3 10/14/19 16:48

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Methane	2030	2050	1	1.19		20
Ethane	U	0.000	1	0.000		20
Ethene	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3460900-4 10/14/19 16:59 • (LCSD) R3460900-5 10/14/19 17:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Methane	67.8	76.9	73.6	113	109	85.0-115			4.36	20
Ethane	129	134	130	104	101	85.0-115			2.75	20
Ethene	127	140	136	110	107	85.0-115			2.68	20

Method Blank (MB)

(MB) R3462928-3 10/19/19 12:46

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3462928-3 10/19/19 12:46

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*112*			*80.0-120*
(S) 4-Bromofluorobenzene	*109*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*96.0*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3462928-1 10/19/19 11:45

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	140	112	19.0-160	
Acrylonitrile	125	141	113	55.0-149	
Benzene	25.0	23.7	94.8	70.0-123	
Bromobenzene	25.0	20.6	82.4	73.0-121	
Bromodichloromethane	25.0	24.0	96.0	75.0-120	
Bromochloromethane	25.0	27.3	109	76.0-122	
Bromoform	25.0	29.5	118	68.0-132	
Bromomethane	25.0	25.4	102	10.0-160	
n-Butylbenzene	25.0	22.2	88.8	73.0-125	
sec-Butylbenzene	25.0	23.1	92.4	75.0-125	
tert-Butylbenzene	25.0	25.0	100	76.0-124	
Carbon disulfide	25.0	23.8	95.2	61.0-128	
Carbon tetrachloride	25.0	28.4	114	68.0-126	
Chlorobenzene	25.0	27.2	109	80.0-121	
Chlorodibromomethane	25.0	29.5	118	77.0-125	
Chloroethane	25.0	25.7	103	47.0-150	
Chloroform	25.0	22.5	90.0	73.0-120	
Chloromethane	25.0	25.5	102	41.0-142	
2-Chlorotoluene	25.0	22.2	88.8	76.0-123	
4-Chlorotoluene	25.0	22.2	88.8	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	25.2	101	58.0-134	
1,2-Dibromoethane	25.0	26.1	104	80.0-122	
Dibromomethane	25.0	26.1	104	80.0-120	
1,2-Dichlorobenzene	25.0	24.9	99.6	79.0-121	
1,3-Dichlorobenzene	25.0	24.5	98.0	79.0-120	
1,4-Dichlorobenzene	25.0	22.7	90.8	79.0-120	
Dichlorodifluoromethane	25.0	25.7	103	51.0-149	
1,1-Dichloroethane	25.0	24.6	98.4	70.0-126	
1,2-Dichloroethane	25.0	23.5	94.0	70.0-128	
1,1-Dichloroethene	25.0	26.1	104	71.0-124	
cis-1,2-Dichloroethene	25.0	25.4	102	73.0-120	
trans-1,2-Dichloroethene	25.0	24.6	98.4	73.0-120	
1,2-Dichloropropane	25.0	24.9	99.6	77.0-125	
1,1-Dichloropropene	25.0	24.8	99.2	74.0-126	
1,3-Dichloropropane	25.0	25.7	103	80.0-120	
cis-1,3-Dichloropropene	25.0	24.9	99.6	80.0-123	
trans-1,3-Dichloropropene	25.0	26.3	105	78.0-124	
trans-1,4-Dichloro-2-butene	25.0	23.5	94.0	33.0-144	
2,2-Dichloropropane	25.0	25.8	103	58.0-130	
Di-isopropyl ether	25.0	26.2	105	58.0-138	

Laboratory Control Sample (LCS)

(LCS) R3462928-1 10/19/19 11:45

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	26.0	104	79.0-123	
Hexachloro-1,3-butadiene	25.0	23.6	94.4	54.0-138	
2-Hexanone	125	141	113	67.0-149	
n-Hexane	25.0	26.6	106	57.0-133	
Iodomethane	125	139	111	33.0-147	
Isopropylbenzene	25.0	28.4	114	76.0-127	
p-Isopropyltoluene	25.0	24.2	96.8	76.0-125	
2-Butanone (MEK)	125	139	111	44.0-160	
Methylene Chloride	25.0	23.6	94.4	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	147	118	68.0-142	
Methyl tert-butyl ether	25.0	25.5	102	68.0-125	
Naphthalene	25.0	23.7	94.8	54.0-135	
n-Propylbenzene	25.0	22.8	91.2	77.0-124	
Styrene	25.0	28.1	112	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	29.7	119	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	22.7	90.8	65.0-130	
1,1,2-Trichlorotrifluoroethane	25.0	28.0	112	69.0-132	
Tetrachloroethene	25.0	28.6	114	72.0-132	
Toluene	25.0	25.6	102	79.0-120	
1,2,3-Trichlorobenzene	25.0	23.1	92.4	50.0-138	
1,2,4-Trichlorobenzene	25.0	23.0	92.0	57.0-137	
1,1,1-Trichloroethane	25.0	26.0	104	73.0-124	
1,1,2-Trichloroethane	25.0	26.7	107	80.0-120	
Trichloroethene	25.0	27.0	108	78.0-124	
Trichlorofluoromethane	25.0	27.4	110	59.0-147	
1,2,3-Trichloropropane	25.0	22.8	91.2	73.0-130	
1,2,4-Trimethylbenzene	25.0	22.8	91.2	76.0-121	
1,2,3-Trimethylbenzene	25.0	21.9	87.6	77.0-120	
1,3,5-Trimethylbenzene	25.0	23.4	93.6	76.0-122	
Vinyl acetate	125	149	119	11.0-160	
Vinyl chloride	25.0	26.6	106	67.0-131	
Xylenes, Total	75.0	81.4	109	79.0-123	
(S) Toluene-d8			*112*	*80.0-120*	
(S) 4-Bromofluorobenzene			*109*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*106*	*70.0-130*	

Method Blank (MB)

(MB) R3463319-2 10/21/19 10:16

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
cis-1,2-Dichloroethene	U		0.0933	0.500
Ethylbenzene	U		0.158	0.500
Naphthalene	0.191	J	0.174	2.50
n-Propylbenzene	U		0.162	0.500
Tetrachloroethene	U		0.199	0.500
Trichloroethene	U		0.153	0.500
(S) Toluene-d8	*113*			*80.0-120*
(S) 4-Bromofluorobenzene	*90.0*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*94.7*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3463319-1 10/21/19 09:35

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
cis-1,2-Dichloroethene	25.0	21.8	87.2	73.0-120	
Ethylbenzene	25.0	22.0	88.0	79.0-123	
Naphthalene	25.0	13.9	55.6	54.0-135	
n-Propylbenzene	25.0	30.5	122	77.0-124	
Tetrachloroethene	25.0	22.4	89.6	72.0-132	
Trichloroethene	25.0	22.6	90.4	78.0-124	
(S) Toluene-d8			*107*	*80.0-120*	
(S) 4-Bromofluorobenzene			*93.1*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*101*	*70.0-130*	

Method Blank (MB)

(MB) R3463386-2 10/20/19 20:35

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3463386-2 10/20/19 20:35

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	0.266	J	0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	8.25	J	0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	1.03	J	0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	0.416	J	0.164	0.500
1,2,4-Trichlorobenzene	0.361	J	0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*95.5*			*80.0-120*
(S) 4-Bromofluorobenzene	*93.4*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*81.4*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3463386-1 10/20/19 19:55

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	96.7	77.4	19.0-160	
Acrylonitrile	125	101	80.8	55.0-149	
Benzene	25.0	23.8	95.2	70.0-123	
Bromobenzene	25.0	26.2	105	73.0-121	
Bromodichloromethane	25.0	23.0	92.0	75.0-120	
Bromochloromethane	25.0	25.2	101	76.0-122	
Bromoform	25.0	23.6	94.4	68.0-132	
Bromomethane	25.0	24.1	96.4	10.0-160	
n-Butylbenzene	25.0	28.7	115	73.0-125	
sec-Butylbenzene	25.0	27.3	109	75.0-125	
tert-Butylbenzene	25.0	25.9	104	76.0-124	
Carbon disulfide	25.0	23.9	95.6	61.0-128	
Carbon tetrachloride	25.0	22.2	88.8	68.0-126	
Chlorobenzene	25.0	24.8	99.2	80.0-121	
Chlorodibromomethane	25.0	24.5	98.0	77.0-125	
Chloroethane	25.0	23.7	94.8	47.0-150	
Chloroform	25.0	23.4	93.6	73.0-120	
Chloromethane	25.0	22.3	89.2	41.0-142	
2-Chlorotoluene	25.0	25.7	103	76.0-123	
4-Chlorotoluene	25.0	25.1	100	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	21.5	86.0	58.0-134	
1,2-Dibromoethane	25.0	24.0	96.0	80.0-122	
Dibromomethane	25.0	23.7	94.8	80.0-120	
1,2-Dichlorobenzene	25.0	28.6	114	79.0-121	
1,3-Dichlorobenzene	25.0	29.0	116	79.0-120	
1,4-Dichlorobenzene	25.0	28.1	112	79.0-120	
Dichlorodifluoromethane	25.0	26.5	106	51.0-149	
1,1-Dichloroethane	25.0	22.5	90.0	70.0-126	
1,2-Dichloroethane	25.0	21.1	84.4	70.0-128	
1,1-Dichloroethene	25.0	27.4	110	71.0-124	
cis-1,2-Dichloroethene	25.0	25.2	101	73.0-120	
trans-1,2-Dichloroethene	25.0	24.1	96.4	73.0-120	
1,2-Dichloropropane	25.0	22.3	89.2	77.0-125	
1,1-Dichloropropene	25.0	24.5	98.0	74.0-126	
1,3-Dichloropropane	25.0	25.1	100	80.0-120	
cis-1,3-Dichloropropene	25.0	23.3	93.2	80.0-123	
trans-1,3-Dichloropropene	25.0	23.7	94.8	78.0-124	
trans-1,4-Dichloro-2-butene	25.0	17.4	69.6	33.0-144	
2,2-Dichloropropane	25.0	20.8	83.2	58.0-130	
Di-isopropyl ether	25.0	21.8	87.2	58.0-138	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS)

(LCS) R3463386-1 10/20/19 19:55

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	24.0	96.0	79.0-123	
Hexachloro-1,3-butadiene	25.0	37.4	150	54.0-138	J4
2-Hexanone	125	101	80.8	67.0-149	
n-Hexane	25.0	21.4	85.6	57.0-133	
Iodomethane	125	102	81.6	33.0-147	
Isopropylbenzene	25.0	22.9	91.6	76.0-127	
p-Isopropyltoluene	25.0	28.4	114	76.0-125	
2-Butanone (MEK)	125	87.2	69.8	44.0-160	
Methylene Chloride	25.0	23.6	94.4	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	92.0	73.6	68.0-142	
Methyl tert-butyl ether	25.0	22.1	88.4	68.0-125	
Naphthalene	25.0	20.5	82.0	54.0-135	
n-Propylbenzene	25.0	24.3	97.2	77.0-124	
Styrene	25.0	24.7	98.8	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	24.2	96.8	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	22.5	90.0	65.0-130	
1,1,2-Trichlorotrifluoroethane	25.0	22.9	91.6	69.0-132	
Tetrachloroethene	25.0	25.4	102	72.0-132	
Toluene	25.0	24.0	96.0	79.0-120	
1,2,3-Trichlorobenzene	25.0	27.8	111	50.0-138	
1,2,4-Trichlorobenzene	25.0	31.4	126	57.0-137	
1,1,1-Trichloroethane	25.0	22.1	88.4	73.0-124	
1,1,2-Trichloroethane	25.0	23.3	93.2	80.0-120	
Trichloroethene	25.0	24.2	96.8	78.0-124	
Trichlorofluoromethane	25.0	25.9	104	59.0-147	
1,2,3-Trichloropropane	25.0	22.7	90.8	73.0-130	
1,2,4-Trimethylbenzene	25.0	25.1	100	76.0-121	
1,2,3-Trimethylbenzene	25.0	26.0	104	77.0-120	
1,3,5-Trimethylbenzene	25.0	24.9	99.6	76.0-122	
Vinyl acetate	125	105	84.0	11.0-160	
Vinyl chloride	25.0	26.9	108	67.0-131	
Xylenes, Total	75.0	73.3	97.7	79.0-123	
(S) Toluene-d8			*93.7*	*80.0-120*	
(S) 4-Bromofluorobenzene			*90.1*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*84.9*	*70.0-130*	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L1148900-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148900-03 10/20/19 23:18 • (MS) R3463386-3 10/21/19 00:16 • (MSD) R3463386-4 10/21/19 00:36

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Acetone	125	U	77.0	85.5	61.6	68.4	1	10.0-160			10.5	35
Acrylonitrile	125	U	95.0	104	76.0	83.2	1	21.0-160			9.05	32
Benzene	25.0	U	21.6	22.5	86.4	90.0	1	17.0-158			4.08	27
Bromobenzene	25.0	U	23.9	25.8	95.6	103	1	30.0-149			7.65	28
Bromodichloromethane	25.0	U	21.0	21.9	84.0	87.6	1	31.0-150			4.20	27
Bromochloromethane	25.0	U	22.4	22.8	89.6	91.2	1	38.0-142			1.77	26
Bromoform	25.0	U	21.6	24.3	86.4	97.2	1	29.0-150			11.8	29
Bromomethane	25.0	U	18.9	19.9	75.6	79.6	1	10.0-160			5.15	38
n-Butylbenzene	25.0	U	26.1	27.5	104	110	1	31.0-150			5.22	30
sec-Butylbenzene	25.0	U	24.5	26.3	98.0	105	1	33.0-155			7.09	29
tert-Butylbenzene	25.0	U	23.6	25.1	94.4	100	1	34.0-153			6.16	28
Carbon disulfide	25.0	U	20.2	21.1	80.8	84.4	1	10.0-156			4.36	28
Carbon tetrachloride	25.0	U	20.5	21.3	82.0	85.2	1	23.0-159			3.83	28
Chlorobenzene	25.0	U	22.5	24.3	90.0	97.2	1	33.0-152			7.69	27
Chlorodibromomethane	25.0	U	22.8	24.8	91.2	99.2	1	37.0-149			8.40	27
Chloroethane	25.0	U	21.5	21.9	86.0	87.6	1	10.0-160			1.84	30
Chloroform	25.0	U	21.1	21.8	84.4	87.2	1	29.0-154			3.26	28
Chloromethane	25.0	U	19.6	20.0	78.4	80.0	1	10.0-160			2.02	29
2-Chlorotoluene	25.0	U	23.6	25.1	94.4	100	1	32.0-153			6.16	28
4-Chlorotoluene	25.0	U	22.7	24.3	90.8	97.2	1	32.0-150			6.81	28
1,2-Dibromo-3-Chloropropane	25.0	U	19.4	22.6	77.6	90.4	1	22.0-151			15.2	34
1,2-Dibromoethane	25.0	U	21.7	23.2	86.8	92.8	1	34.0-147			6.68	27
Dibromomethane	25.0	U	21.7	22.3	86.8	89.2	1	30.0-151			2.73	27
1,2-Dichlorobenzene	25.0	U	25.6	28.2	102	113	1	34.0-149			9.67	28
1,3-Dichlorobenzene	25.0	U	26.0	28.0	104	112	1	36.0-146			7.41	27
1,4-Dichlorobenzene	25.0	U	26.0	27.4	104	110	1	35.0-142			5.24	27
Dichlorodifluoromethane	25.0	U	23.8	24.1	95.2	96.4	1	10.0-160			1.25	29
1,1-Dichloroethane	25.0	U	20.4	20.8	81.6	83.2	1	25.0-158			1.94	27
1,2-Dichloroethane	25.0	U	19.3	20.3	77.2	81.2	1	29.0-151			5.05	27
1,1-Dichloroethene	25.0	U	24.6	25.9	98.4	104	1	11.0-160			5.15	29
cis-1,2-Dichloroethene	25.0	U	22.6	23.6	90.4	94.4	1	10.0-160			4.33	27
trans-1,2-Dichloroethene	25.0	U	21.8	22.8	87.2	91.2	1	17.0-153			4.48	27
1,2-Dichloropropane	25.0	0.253	20.7	21.4	81.8	84.6	1	30.0-156			3.33	27
1,1-Dichloropropene	25.0	U	22.2	22.8	88.8	91.2	1	25.0-158			2.67	27
1,3-Dichloropropane	25.0	U	22.9	25.2	91.6	101	1	38.0-147			9.56	27
cis-1,3-Dichloropropene	25.0	U	20.3	20.7	81.2	82.8	1	34.0-149			1.95	28
trans-1,3-Dichloropropene	25.0	U	21.3	22.8	85.2	91.2	1	32.0-149			6.80	28
trans-1,4-Dichloro-2-butene	25.0	U	14.8	15.7	59.2	62.8	1	10.0-157			5.90	37
2,2-Dichloropropane	25.0	U	17.6	16.6	70.4	66.4	1	24.0-152			5.85	29
Di-isopropyl ether	25.0	U	20.0	20.9	80.0	83.6	1	21.0-160			4.40	28

L1148900-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1148900-03 10/20/19 23:18 • (MS) R3463386-3 10/21/19 00:16 • (MSD) R3463386-4 10/21/19 00:36

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	25.0	U	22.4	24.1	89.6	96.4	1	30.0-155			7.31	27
Hexachloro-1,3-butadiene	25.0	U	32.9	36.6	132	146	1	20.0-154			10.6	34
2-Hexanone	125	U	92.3	106	73.8	84.8	1	21.0-160			13.8	29
n-Hexane	25.0	U	20.0	20.5	80.0	82.0	1	10.0-153			2.47	28
Iodomethane	125	U	83.1	78.2	66.5	62.6	1	10.0-160			6.08	40
Isopropylbenzene	25.0	U	20.7	22.4	82.8	89.6	1	28.0-157			7.89	27
p-Isopropyltoluene	25.0	U	25.7	27.5	103	110	1	30.0-154			6.77	29
2-Butanone (MEK)	125	U	79.6	86.9	63.7	69.5	1	10.0-160			8.77	32
Methylene Chloride	25.0	U	21.4	22.6	85.6	90.4	1	23.0-144			5.45	28
4-Methyl-2-pentanone (MIBK)	125	U	86.2	98.4	69.0	78.7	1	29.0-160			13.2	29
Methyl tert-butyl ether	25.0	U	20.0	21.0	80.0	84.0	1	28.0-150			4.88	29
Naphthalene	25.0	0.886	18.0	21.3	68.5	81.7	1	12.0-156			16.8	35
n-Propylbenzene	25.0	U	22.3	23.6	89.2	94.4	1	31.0-154			5.66	28
Styrene	25.0	U	22.4	24.5	89.6	98.0	1	33.0-155			8.96	28
1,1,1,2-Tetrachloroethane	25.0	U	22.2	24.5	88.8	98.0	1	36.0-151			9.85	29
1,1,2,2-Tetrachloroethane	25.0	U	21.1	24.6	84.4	98.4	1	33.0-150			15.3	28
1,1,2-Trichlorotrifluoroethane	25.0	U	22.6	22.7	90.4	90.8	1	23.0-160			0.442	30
Tetrachloroethene	25.0	U	23.6	25.0	94.4	100	1	10.0-160			5.76	27
Toluene	25.0	U	22.2	23.7	88.8	94.8	1	26.0-154			6.54	28
1,2,3-Trichlorobenzene	25.0	U	24.8	28.4	99.2	114	1	17.0-150			13.5	36
1,2,4-Trichlorobenzene	25.0	U	28.0	31.7	112	127	1	24.0-150			12.4	33
1,1,1-Trichloroethane	25.0	U	20.3	20.9	81.2	83.6	1	23.0-160			2.91	28
1,1,2-Trichloroethane	25.0	U	22.0	24.0	88.0	96.0	1	35.0-147			8.70	27
Trichloroethene	25.0	0.167	21.3	22.4	84.5	88.9	1	10.0-160			5.03	25
Trichlorofluoromethane	25.0	U	24.2	24.5	96.8	98.0	1	17.0-160			1.23	31
1,2,3-Trichloropropane	25.0	U	22.1	25.0	88.4	100	1	34.0-151			12.3	29
1,2,4-Trimethylbenzene	25.0	U	23.3	24.5	93.2	98.0	1	26.0-154			5.02	27
1,2,3-Trimethylbenzene	25.0	U	24.1	25.8	96.4	103	1	32.0-149			6.81	28
1,3,5-Trimethylbenzene	25.0	U	22.8	24.0	91.2	96.0	1	28.0-153			5.13	27
Vinyl acetate	125	U	109	117	87.2	93.6	1	12.0-160			7.08	31
Vinyl chloride	25.0	U	23.2	23.9	92.8	95.6	1	10.0-160			2.97	27
Xylenes, Total	75.0	U	66.5	71.6	88.7	95.5	1	29.0-154			7.39	28
(S) Toluene-d8					*94.5*	*99.2*		*80.0-120*				
(S) 4-Bromofluorobenzene					*92.1*	*95.1*		*77.0-126*				
(S) 1,2-Dichloroethane-d4					*81.8*	*79.6*		*70.0-130*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J0	J0: The identification of the analyte is acceptable, but the reported concentration is an estimate. The calibration met method criteria.
J4	The associated batch QC was outside the established quality control range for accuracy.
V	The sample concentration is too high to evaluate accurate spike recoveries.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

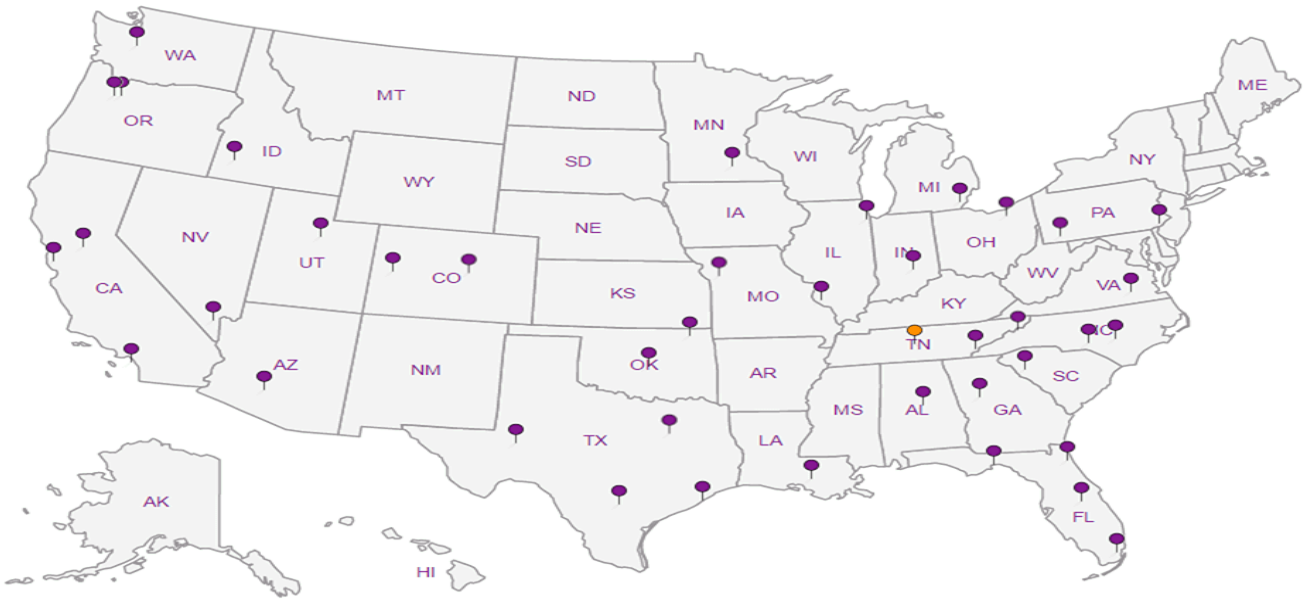
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



PES-Seattle

Billing Information: PES-Seattle

Pres Chk

Report to: Bill Haldeman/Brian O'neal

Email To: on file

Project Description: American Linen

City/State Collected: Seattle, WA

Phone: on file
Fax:

Client Project # 1413.001.02.501E
1413.001.05.601

Lab Project # PESENVSWA-ALP

Collected by (print): Ben Hecht

Site/Facility ID # American Linen

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed: STAT

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	**NO3,SO4,Chloride**48 hour hold	NWTPHGX	VOCs (V8260LLC)	Total Fe Mn 6020	TOC	Alkalinity	EEM (RSK175LL)	Remarks	Sample # (lab only)
MW-314-101019	Grab	GW	72	10-10-19	0835	9	X	X (GH)	X	X	X	X	X	No Gx	-01
SCL-MW 105-101019		GW	25'		0950	3			X						02
MW-8-101019		GW	16		10:30	5			X					QA/QC	03
MW-311-101019		GW	68'		1120	9	X		X	X	X	X	X		04
SCS-2-101019		GW	20		1135	3			X						05
MW108-101019		GW	45		1245	9	X		X	X	X	X	X		06
MW-313-101019		GW	26.5		14:15	9	X		X	X	X	X	X		07
MW-310-101019		GW	20		1345	9	X		X	X	X	X	X		08
MW119-101019		GW	40		1535	9	X		X	X	X	X	X		09
TRIP-101019	-	GW	-		1600	1			X						10

Chain of Custody Page ___ of ___

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# L1148960
C195

Acctnum: PESENVSWA
Template:
Prelogin:
TSR: Brian Ford
PB:
Shipped Via:

* Matrix:
SS - Soil **AIR** - Air **F** - Filter
GW - Groundwater **B** - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____
Flow _____ Other _____

Samples returned via:
__ UPS __ FedEx __ Courier __ _____

Tracking # FedEx 1203 5774 6561

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

RAD SCREEN: <0.5 mR/hr

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No (HCL / MeoH) TBR	If preservation required by Login: Date/Time
	10-10-19	1645		1	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 12 °C Bottles Received: 6.0-0.1=5.9 65	
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/11/19 Time: 8:45	Hold: Condition: NCF / OK

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 23, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1149387
Samples Received:	10/12/2019
Project Number:	1413.001.02.501E
Description:	American Linen

Report To: Brian O'Neal/Bill Haldeman
1215 Fourth Ave., Suite 1350
Seattle, WA 98161

Entire Report Reviewed By: Brian Ford

Brian Ford
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

Cp: Cover Page 1

Tc: Table of Contents 2

Ss: Sample Summary 3

Cn: Case Narrative 5

Sr: Sample Results 6

MW-916-101119 L1149387-01 6

SMW-3-101119 L1149387-02 8

MW128-101119 L1149387-03 10

MW124-101119 L1149387-04 12

MW-307-101119 L1149387-05 15

MW-214-101119 L1149387-06 18

MW-312-101119 L1149387-07 20

MW-308-101119 L1149387-08 22

EQ-101119 L1149387-09 24

TRIP-101119 L1149387-10 27

Qc: Quality Control Summary 29

Wet Chemistry by Method 2320 B-2011 29

Wet Chemistry by Method 9056A 30

Wet Chemistry by Method 9060A 32

Metals (ICPMS) by Method 6020B 33

Volatile Organic Compounds (GC) by Method NWTPHGX 34

Volatile Organic Compounds (GC) by Method RSK175 35

Volatile Organic Compounds (GC/MS) by Method 8260C 37

Gl: Glossary of Terms 41

Al: Accreditations & Locations 42

Sc: Sample Chain of Custody 43

MW-916-101119 L1149387-01 GW

Collected by: KZ/BH/HC | Collected date/time: 10/11/19 08:00 | Received date/time: 10/12/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365100	2.5	10/19/19 16:55	10/19/19 16:55	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361957	1	10/12/19 19:01	10/12/19 19:01	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/16/19 19:57	10/16/19 19:57	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364591	1	10/18/19 10:15	10/18/19 13:17	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1363432	10	10/16/19 11:54	10/16/19 11:54	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 08:47	10/21/19 08:47	BMB	Mt. Juliet, TN

SMW-3-101119 L1149387-02 GW

Collected by: KZ/BH/HC | Collected date/time: 10/11/19 09:45 | Received date/time: 10/12/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 09:06	10/21/19 09:06	BMB	Mt. Juliet, TN

MW128-101119 L1149387-03 GW

Collected by: KZ/BH/HC | Collected date/time: 10/11/19 10:45 | Received date/time: 10/12/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365100	2.5	10/19/19 17:05	10/19/19 17:05	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361957	1	10/12/19 19:18	10/12/19 19:18	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/16/19 20:15	10/16/19 20:15	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364591	1	10/18/19 10:15	10/18/19 13:20	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1363429	10	10/16/19 14:53	10/16/19 14:53	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1363432	1	10/16/19 12:05	10/16/19 12:05	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 09:26	10/21/19 09:26	BMB	Mt. Juliet, TN

MW124-101119 L1149387-04 GW

Collected by: KZ/BH/HC | Collected date/time: 10/11/19 11:11 | Received date/time: 10/12/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365100	1	10/19/19 17:13	10/19/19 17:13	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361957	1	10/12/19 19:34	10/12/19 19:34	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/16/19 20:32	10/16/19 20:32	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364591	1	10/18/19 10:15	10/18/19 13:24	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1363461	1	10/16/19 16:01	10/16/19 16:01	DWR	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1363432	1	10/16/19 13:29	10/16/19 13:29	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 09:46	10/21/19 09:46	BMB	Mt. Juliet, TN

MW-307-101119 L1149387-05 GW

Collected by: KZ/BH/HC | Collected date/time: 10/11/19 11:35 | Received date/time: 10/12/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365100	1	10/19/19 17:21	10/19/19 17:21	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361957	1	10/12/19 19:51	10/12/19 19:51	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/16/19 20:50	10/16/19 20:50	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364591	1	10/18/19 10:15	10/18/19 13:27	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1363461	1	10/16/19 16:25	10/16/19 16:25	DWR	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1363432	1	10/16/19 13:00	10/16/19 13:00	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 10:05	10/21/19 10:05	BMB	Mt. Juliet, TN

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-214-101119 L1149387-06 GW

Collected by: KZ/BH/HC | Collected date/time: 10/11/19 12:15 | Received date/time: 10/12/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 10:25	10/21/19 10:25	BMB	Mt. Juliet, TN

MW-312-101119 L1149387-07 GW

Collected by: KZ/BH/HC | Collected date/time: 10/11/19 13:50 | Received date/time: 10/12/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365100	2.5	10/19/19 17:30	10/19/19 17:30	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361957	1	10/12/19 20:07	10/12/19 20:07	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/16/19 21:13	10/16/19 21:13	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364591	1	10/18/19 10:15	10/18/19 13:30	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1363432	1	10/16/19 13:02	10/16/19 13:02	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 10:45	10/21/19 10:45	BMB	Mt. Juliet, TN

MW-308-101119 L1149387-08 GW

Collected by: KZ/BH/HC | Collected date/time: 10/11/19 14:55 | Received date/time: 10/12/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365100	2.5	10/19/19 17:37	10/19/19 17:37	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361957	1	10/12/19 20:23	10/12/19 20:23	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/16/19 21:34	10/16/19 21:34	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364591	1	10/18/19 10:15	10/18/19 13:34	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1363432	1	10/16/19 13:05	10/16/19 13:05	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 11:04	10/21/19 11:04	BMB	Mt. Juliet, TN

EQ-101119 L1149387-09 GW

Collected by: KZ/BH/HC | Collected date/time: 10/11/19 14:40 | Received date/time: 10/12/19 08:45

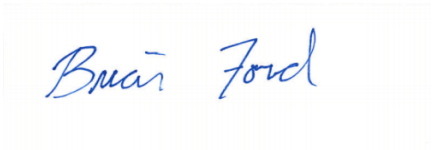
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365100	1	10/19/19 17:53	10/19/19 17:53	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1361957	1	10/12/19 21:29	10/12/19 21:29	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/16/19 23:27	10/16/19 23:27	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364591	1	10/18/19 10:15	10/18/19 13:37	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1363461	1	10/16/19 16:49	10/16/19 16:49	DWR	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1363432	1	10/16/19 13:07	10/16/19 13:07	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 11:24	10/21/19 11:24	BMB	Mt. Juliet, TN

TRIP-101119 L1149387-10 GW

Collected by: KZ/BH/HC | Collected date/time: 10/11/19 16:00 | Received date/time: 10/12/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1363461	1	10/16/19 13:22	10/16/19 13:22	ADM	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 08:27	10/21/19 08:27	BMB	Mt. Juliet, TN

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Sample Delivery Group (SDG) Narrative

VOC pH outside of method requirement.

Lab Sample ID	Project Sample ID	Method
L1149387-04	MW124-101119	8260C
L1149387-05	MW-307-101119	8260C
L1149387-07	MW-312-101119	8260C

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	828000		6780	50000	2.5	10/19/2019 16:55	WG1365100

Sample Narrative:

L1149387-01 WG1365100: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	21400		51.9	1000	1	10/12/2019 19:01	WG1361957
Nitrate	U		22.7	100	1	10/12/2019 19:01	WG1361957
Sulfate	14000		77.4	5000	1	10/12/2019 19:01	WG1361957

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	4420		102	1000	1	10/16/2019 19:57	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	8740		15.0	100	1	10/18/2019 13:17	WG1364591
Manganese	218		0.250	5.00	1	10/18/2019 13:17	WG1364591

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	10100		2.87	6.78	10	10/16/2019 11:54	WG1363432
Ethane	U		2.96	12.9	10	10/16/2019 11:54	WG1363432
Ethene	U		4.22	12.7	10	10/16/2019 11:54	WG1363432

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	U	J0	1.05	25.0	1	10/21/2019 08:47	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 08:47	WG1366365
Benzene	1.34		0.0896	0.500	1	10/21/2019 08:47	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 08:47	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 08:47	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 08:47	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 08:47	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 08:47	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 08:47	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 08:47	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 08:47	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 08:47	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 08:47	WG1366365
Chlorobenzene	U		0.140	0.500	1	10/21/2019 08:47	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 08:47	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 08:47	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 08:47	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 08:47	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 08:47	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 08:47	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 08:47	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 08:47	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 08:47	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 08:47	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 08:47	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 08:47	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 08:47	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 08:47	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 08:47	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 08:47	WG1366365
cis-1,2-Dichloroethene	0.841		0.0933	0.500	1	10/21/2019 08:47	WG1366365
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 08:47	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 08:47	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 08:47	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 08:47	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 08:47	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 08:47	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 08:47	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 08:47	WG1366365
Di-isopropyl ether	0.137	J	0.0924	0.500	1	10/21/2019 08:47	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 08:47	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 08:47	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 08:47	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 08:47	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 08:47	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 08:47	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 08:47	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 08:47	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 08:47	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 08:47	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 08:47	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 08:47	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 08:47	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 08:47	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 08:47	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 08:47	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 08:47	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 08:47	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 08:47	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 08:47	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 08:47	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 08:47	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 08:47	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 08:47	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 08:47	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 08:47	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 08:47	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 08:47	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 08:47	WG1366365
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 08:47	WG1366365
Vinyl chloride	24.1		0.118	0.500	1	10/21/2019 08:47	WG1366365
Xylenes, Total	U		0.316	1.50	1	10/21/2019 08:47	WG1366365
(S) Toluene-d8	*95.6*			*80.0-120*		*10/21/2019 08:47*	WG1366365
(S) 4-Bromofluorobenzene	*88.4*			*77.0-126*		*10/21/2019 08:47*	WG1366365
(S) 1,2-Dichloroethane-d4	*83.8*			*70.0-130*		*10/21/2019 08:47*	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/21/2019 09:06	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 09:06	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 09:06	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 09:06	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 09:06	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 09:06	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 09:06	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 09:06	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 09:06	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 09:06	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 09:06	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 09:06	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 09:06	WG1366365
Chlorobenzene	U		0.140	0.500	1	10/21/2019 09:06	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 09:06	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 09:06	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 09:06	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 09:06	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 09:06	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 09:06	WG1366365
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 09:06	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 09:06	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 09:06	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 09:06	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 09:06	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 09:06	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 09:06	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 09:06	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 09:06	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 09:06	WG1366365
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/21/2019 09:06	WG1366365
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 09:06	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 09:06	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 09:06	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 09:06	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 09:06	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 09:06	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 09:06	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 09:06	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 09:06	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 09:06	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 09:06	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 09:06	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 09:06	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 09:06	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 09:06	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 09:06	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 09:06	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 09:06	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 09:06	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 09:06	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 09:06	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 09:06	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 09:06	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 09:06	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 09:06	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 09:06	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 09:06	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 09:06	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 09:06	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 09:06	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 09:06	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 09:06	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 09:06	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 09:06	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 09:06	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 09:06	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 09:06	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 09:06	WG1366365
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 09:06	WG1366365
Vinyl chloride	U		0.118	0.500	1	10/21/2019 09:06	WG1366365
Xylenes, Total	U		0.316	1.50	1	10/21/2019 09:06	WG1366365
(S) Toluene-d8	*98.3*			*80.0-120*		*10/21/2019 09:06*	WG1366365
(S) 4-Bromofluorobenzene	*91.1*			*77.0-126*		*10/21/2019 09:06*	WG1366365
(S) 1,2-Dichloroethane-d4	*82.2*			*70.0-130*		*10/21/2019 09:06*	WG1366365

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	746000		6780	50000	2.5	10/19/2019 17:05	WG1365100

Sample Narrative:

L1149387-03 WG1365100: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	22600		51.9	1000	1	10/12/2019 19:18	WG1361957
Nitrate	U		22.7	100	1	10/12/2019 19:18	WG1361957
Sulfate	20900		77.4	5000	1	10/12/2019 19:18	WG1361957

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	4200		102	1000	1	10/16/2019 20:15	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	7950		15.0	100	1	10/18/2019 13:20	WG1364591
Manganese	207		0.250	5.00	1	10/18/2019 13:20	WG1364591

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	13100		2.87	6.78	10	10/16/2019 14:53	WG1363429
Ethane	8.49		0.296	1.29	1	10/16/2019 12:05	WG1363432
Ethene	23.5		0.422	1.27	1	10/16/2019 12:05	WG1363432

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/21/2019 09:26	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 09:26	WG1366365
Benzene	0.984		0.0896	0.500	1	10/21/2019 09:26	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 09:26	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 09:26	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 09:26	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 09:26	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 09:26	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 09:26	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 09:26	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 09:26	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 09:26	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 09:26	WG1366365
Chlorobenzene	U		0.140	0.500	1	10/21/2019 09:26	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 09:26	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 09:26	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 09:26	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 09:26	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 09:26	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 09:26	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 09:26	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 09:26	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 09:26	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 09:26	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 09:26	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 09:26	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 09:26	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 09:26	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 09:26	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 09:26	WG1366365
cis-1,2-Dichloroethene	0.619		0.0933	0.500	1	10/21/2019 09:26	WG1366365
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 09:26	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 09:26	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 09:26	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 09:26	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 09:26	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 09:26	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 09:26	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 09:26	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 09:26	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 09:26	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 09:26	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 09:26	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 09:26	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 09:26	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 09:26	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 09:26	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 09:26	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 09:26	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 09:26	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 09:26	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 09:26	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 09:26	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 09:26	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 09:26	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 09:26	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 09:26	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 09:26	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 09:26	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 09:26	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 09:26	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 09:26	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 09:26	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 09:26	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 09:26	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 09:26	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 09:26	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 09:26	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 09:26	WG1366365
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 09:26	WG1366365
Vinyl chloride	13.3		0.118	0.500	1	10/21/2019 09:26	WG1366365
Xylenes, Total	U		0.316	1.50	1	10/21/2019 09:26	WG1366365
(S) Toluene-d8	*95.1*			*80.0-120*		*10/21/2019 09:26*	WG1366365
(S) 4-Bromofluorobenzene	*90.7*			*77.0-126*		*10/21/2019 09:26*	WG1366365
(S) 1,2-Dichloroethane-d4	*81.2*			*70.0-130*		*10/21/2019 09:26*	WG1366365

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	152000		2710	20000	1	10/19/2019 17:13	WG1365100

Sample Narrative:

L1149387-04 WG1365100: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	6260		51.9	1000	1	10/12/2019 19:34	WG1361957
Nitrate	U		22.7	100	1	10/12/2019 19:34	WG1361957
Sulfate	5920	B	77.4	5000	1	10/12/2019 19:34	WG1361957

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	3780	B	102	1000	1	10/16/2019 20:32	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	2240		15.0	100	1	10/18/2019 13:24	WG1364591
Manganese	301		0.250	5.00	1	10/18/2019 13:24	WG1364591

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/16/2019 16:01	WG1363461
(S) a,a,a-Trifluorotoluene(FID)	*108*			*78.0-120*		*10/16/2019 16:01*	WG1363461

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	12.3		0.287	0.678	1	10/16/2019 13:29	WG1363432
Ethane	U		0.296	1.29	1	10/16/2019 13:29	WG1363432
Ethene	U		0.422	1.27	1	10/16/2019 13:29	WG1363432

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	9.24	J J0	1.05	25.0	1	10/21/2019 09:46	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 09:46	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 09:46	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 09:46	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 09:46	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 09:46	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 09:46	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 09:46	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 09:46	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 09:46	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 09:46	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 09:46	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 09:46	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/21/2019 09:46	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 09:46	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 09:46	WG1366365
Chloroform	1.06		0.0860	0.500	1	10/21/2019 09:46	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 09:46	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 09:46	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 09:46	WG1366365
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 09:46	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 09:46	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 09:46	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 09:46	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 09:46	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 09:46	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 09:46	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 09:46	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 09:46	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 09:46	WG1366365
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/21/2019 09:46	WG1366365
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 09:46	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 09:46	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 09:46	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 09:46	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 09:46	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 09:46	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 09:46	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 09:46	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 09:46	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 09:46	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 09:46	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 09:46	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 09:46	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 09:46	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 09:46	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 09:46	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 09:46	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 09:46	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 09:46	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 09:46	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 09:46	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 09:46	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 09:46	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 09:46	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 09:46	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 09:46	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 09:46	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 09:46	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 09:46	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 09:46	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 09:46	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 09:46	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 09:46	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 09:46	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 09:46	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 09:46	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 09:46	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 09:46	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 09:46	WG1366365
Vinyl chloride	U		0.118	0.500	1	10/21/2019 09:46	WG1366365
Xylenes, Total	U		0.316	1.50	1	10/21/2019 09:46	WG1366365
(S) Toluene-d8	*97.9*			*80.0-120*		*10/21/2019 09:46*	WG1366365
(S) 4-Bromofluorobenzene	*91.6*			*77.0-126*		*10/21/2019 09:46*	WG1366365
(S) 1,2-Dichloroethane-d4	*84.9*			*70.0-130*		*10/21/2019 09:46*	WG1366365

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	276000		2710	20000	1	10/19/2019 17:21	WG1365100

Sample Narrative:

L1149387-05 WG1365100: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	14600		51.9	1000	1	10/12/2019 19:51	WG1361957
Nitrate	U		22.7	100	1	10/12/2019 19:51	WG1361957
Sulfate	69100		77.4	5000	1	10/12/2019 19:51	WG1361957

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	4120	B	102	1000	1	10/16/2019 20:50	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	1030		15.0	100	1	10/18/2019 13:27	WG1364591
Manganese	149		0.250	5.00	1	10/18/2019 13:27	WG1364591

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/16/2019 16:25	WG1363461
(S) a,a,a-Trifluorotoluene(FID)	*108*			*78.0-120*		*10/16/2019 16:25*	WG1363461

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	26.6		0.287	0.678	1	10/16/2019 13:00	WG1363432
Ethane	13.0		0.296	1.29	1	10/16/2019 13:00	WG1363432
Ethene	7.90		0.422	1.27	1	10/16/2019 13:00	WG1363432

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.17	J J0	1.05	25.0	1	10/21/2019 10:05	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 10:05	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 10:05	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 10:05	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 10:05	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 10:05	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 10:05	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 10:05	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 10:05	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 10:05	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 10:05	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 10:05	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 10:05	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/21/2019 10:05	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 10:05	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 10:05	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 10:05	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 10:05	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 10:05	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 10:05	WG1366365
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 10:05	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 10:05	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 10:05	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 10:05	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 10:05	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 10:05	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 10:05	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 10:05	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 10:05	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 10:05	WG1366365
cis-1,2-Dichloroethene	0.935		0.0933	0.500	1	10/21/2019 10:05	WG1366365
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 10:05	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 10:05	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 10:05	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 10:05	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 10:05	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 10:05	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 10:05	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 10:05	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 10:05	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 10:05	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 10:05	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 10:05	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 10:05	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 10:05	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 10:05	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 10:05	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 10:05	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 10:05	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 10:05	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 10:05	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 10:05	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 10:05	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 10:05	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 10:05	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 10:05	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 10:05	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 10:05	WG1366365
Toluene	1.05		0.412	0.500	1	10/21/2019 10:05	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 10:05	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 10:05	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 10:05	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 10:05	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 10:05	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 10:05	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 10:05	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 10:05	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 10:05	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 10:05	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 10:05	WG1366365
Vinyl chloride	0.289	J	0.118	0.500	1	10/21/2019 10:05	WG1366365
Xylenes, Total	U		0.316	1.50	1	10/21/2019 10:05	WG1366365
(S) Toluene-d8	*96.6*			*80.0-120*		*10/21/2019 10:05*	WG1366365
(S) 4-Bromofluorobenzene	*89.9*			*77.0-126*		*10/21/2019 10:05*	WG1366365
(S) 1,2-Dichloroethane-d4	*83.1*			*70.0-130*		*10/21/2019 10:05*	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/21/2019 10:25	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 10:25	WG1366365
Benzene	1.95		0.0896	0.500	1	10/21/2019 10:25	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 10:25	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 10:25	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 10:25	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 10:25	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 10:25	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 10:25	WG1366365
sec-Butylbenzene	0.384	J	0.134	0.500	1	10/21/2019 10:25	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 10:25	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 10:25	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 10:25	WG1366365
Chlorobenzene	U		0.140	0.500	1	10/21/2019 10:25	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 10:25	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 10:25	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 10:25	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 10:25	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 10:25	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 10:25	WG1366365
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 10:25	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 10:25	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 10:25	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 10:25	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 10:25	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 10:25	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 10:25	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 10:25	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 10:25	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 10:25	WG1366365
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/21/2019 10:25	WG1366365
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 10:25	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 10:25	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 10:25	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 10:25	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 10:25	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 10:25	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 10:25	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 10:25	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 10:25	WG1366365
Ethylbenzene	0.355	J	0.158	0.500	1	10/21/2019 10:25	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 10:25	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 10:25	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 10:25	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 10:25	WG1366365
Isopropylbenzene	1.11		0.126	0.500	1	10/21/2019 10:25	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 10:25	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 10:25	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 10:25	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 10:25	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 10:25	WG1366365
Naphthalene	4.32	J0	0.174	2.50	1	10/21/2019 10:25	WG1366365
n-Propylbenzene	0.521		0.162	0.500	1	10/21/2019 10:25	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 10:25	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 10:25	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 10:25	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 10:25	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 10:25	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 10:25	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 10:25	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 10:25	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 10:25	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 10:25	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 10:25	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 10:25	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 10:25	WG1366365
1,2,4-Trimethylbenzene	0.174	J	0.123	0.500	1	10/21/2019 10:25	WG1366365
1,2,3-Trimethylbenzene	2.69		0.0739	0.500	1	10/21/2019 10:25	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 10:25	WG1366365
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 10:25	WG1366365
Vinyl chloride	U		0.118	0.500	1	10/21/2019 10:25	WG1366365
Xylenes, Total	U		0.316	1.50	1	10/21/2019 10:25	WG1366365
(S) Toluene-d8	*94.1*			*80.0-120*		*10/21/2019 10:25*	WG1366365
(S) 4-Bromofluorobenzene	*91.6*			*77.0-126*		*10/21/2019 10:25*	WG1366365
(S) 1,2-Dichloroethane-d4	*84.4*			*70.0-130*		*10/21/2019 10:25*	WG1366365

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	1220000		6780	50000	2.5	10/19/2019 17:30	WG1365100

Sample Narrative:
L1149387-07 WG1365100: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	10900		51.9	1000	1	10/12/2019 20:07	WG1361957
Nitrate	U		22.7	100	1	10/12/2019 20:07	WG1361957
Sulfate	5710	B	77.4	5000	1	10/12/2019 20:07	WG1361957

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	14700		102	1000	1	10/16/2019 21:13	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	5180		15.0	100	1	10/18/2019 13:30	WG1364591
Manganese	845		0.250	5.00	1	10/18/2019 13:30	WG1364591

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	768		0.287	0.678	1	10/16/2019 13:02	WG1363432
Ethane	U		0.296	1.29	1	10/16/2019 13:02	WG1363432
Ethene	U		0.422	1.27	1	10/16/2019 13:02	WG1363432

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.53	J J0	1.05	25.0	1	10/21/2019 10:45	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 10:45	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 10:45	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 10:45	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 10:45	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 10:45	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 10:45	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 10:45	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 10:45	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 10:45	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 10:45	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 10:45	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 10:45	WG1366365
Chlorobenzene	U		0.140	0.500	1	10/21/2019 10:45	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 10:45	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 10:45	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 10:45	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 10:45	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 10:45	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 10:45	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 10:45	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 10:45	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 10:45	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 10:45	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 10:45	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 10:45	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 10:45	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 10:45	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 10:45	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 10:45	WG1366365
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/21/2019 10:45	WG1366365
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 10:45	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 10:45	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 10:45	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 10:45	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 10:45	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 10:45	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 10:45	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 10:45	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 10:45	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 10:45	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 10:45	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 10:45	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 10:45	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 10:45	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 10:45	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 10:45	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 10:45	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 10:45	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 10:45	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 10:45	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 10:45	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 10:45	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 10:45	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 10:45	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 10:45	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 10:45	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 10:45	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 10:45	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 10:45	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 10:45	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 10:45	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 10:45	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 10:45	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 10:45	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 10:45	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 10:45	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 10:45	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 10:45	WG1366365
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 10:45	WG1366365
Vinyl chloride	U		0.118	0.500	1	10/21/2019 10:45	WG1366365
Xylenes, Total	U		0.316	1.50	1	10/21/2019 10:45	WG1366365
(S) Toluene-d8	*98.6*			*80.0-120*		*10/21/2019 10:45*	WG1366365
(S) 4-Bromofluorobenzene	*94.4*			*77.0-126*		*10/21/2019 10:45*	WG1366365
(S) 1,2-Dichloroethane-d4	*86.6*			*70.0-130*		*10/21/2019 10:45*	WG1366365

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	901000		6780	50000	2.5	10/19/2019 17:37	WG1365100

Sample Narrative:

L1149387-08 WG1365100: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	15400		51.9	1000	1	10/12/2019 20:23	WG1361957
Nitrate	U		22.7	100	1	10/12/2019 20:23	WG1361957
Sulfate	95400		77.4	5000	1	10/12/2019 20:23	WG1361957

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	6970		102	1000	1	10/16/2019 21:34	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	16900		15.0	100	1	10/18/2019 13:34	WG1364591
Manganese	2950		0.250	5.00	1	10/18/2019 13:34	WG1364591

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	2070		0.287	0.678	1	10/16/2019 13:05	WG1363432
Ethane	19.7		0.296	1.29	1	10/16/2019 13:05	WG1363432
Ethene	U		0.422	1.27	1	10/16/2019 13:05	WG1363432

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.27	J J0	1.05	25.0	1	10/21/2019 11:04	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 11:04	WG1366365
Benzene	12.5		0.0896	0.500	1	10/21/2019 11:04	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 11:04	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 11:04	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 11:04	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 11:04	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 11:04	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 11:04	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 11:04	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 11:04	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 11:04	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 11:04	WG1366365
Chlorobenzene	U		0.140	0.500	1	10/21/2019 11:04	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 11:04	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 11:04	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 11:04	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 11:04	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 11:04	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 11:04	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 11:04	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 11:04	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 11:04	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 11:04	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 11:04	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 11:04	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 11:04	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 11:04	WG1366365
1,2-Dichloroethane	0.133	J	0.108	0.500	1	10/21/2019 11:04	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 11:04	WG1366365
cis-1,2-Dichloroethene	38.9		0.0933	0.500	1	10/21/2019 11:04	WG1366365
trans-1,2-Dichloroethene	0.492	J	0.152	0.500	1	10/21/2019 11:04	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 11:04	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 11:04	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 11:04	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 11:04	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 11:04	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 11:04	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 11:04	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 11:04	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 11:04	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 11:04	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 11:04	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 11:04	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 11:04	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 11:04	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 11:04	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 11:04	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 11:04	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 11:04	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 11:04	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 11:04	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 11:04	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 11:04	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 11:04	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 11:04	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 11:04	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 11:04	WG1366365
Toluene	4.38		0.412	0.500	1	10/21/2019 11:04	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 11:04	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 11:04	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 11:04	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 11:04	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 11:04	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 11:04	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 11:04	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 11:04	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 11:04	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 11:04	WG1366365
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 11:04	WG1366365
Vinyl chloride	20.3		0.118	0.500	1	10/21/2019 11:04	WG1366365
Xylenes, Total	U		0.316	1.50	1	10/21/2019 11:04	WG1366365
(S) Toluene-d8	*95.8*			*80.0-120*		*10/21/2019 11:04*	WG1366365
(S) 4-Bromofluorobenzene	*91.9*			*77.0-126*		*10/21/2019 11:04*	WG1366365
(S) 1,2-Dichloroethane-d4	*85.9*			*70.0-130*		*10/21/2019 11:04*	WG1366365

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	5750	B J	2710	20000	1	10/19/2019 17:53	WG1365100

Sample Narrative:

L1149387-09 WG1365100: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	222	B J P1	51.9	1000	1	10/12/2019 21:29	WG1361957
Nitrate	U	P1	22.7	100	1	10/12/2019 21:29	WG1361957
Sulfate	U		77.4	5000	1	10/12/2019 21:29	WG1361957

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	279	B J	102	1000	1	10/16/2019 23:27	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	32.9	J	15.0	100	1	10/18/2019 13:37	WG1364591
Manganese	2.37	B J	0.250	5.00	1	10/18/2019 13:37	WG1364591

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/16/2019 16:49	WG1363461
(S) a,a,a-Trifluorotoluene(FID)	*108*			*78.0-120*		*10/16/2019 16:49*	WG1363461

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	24.2		0.287	0.678	1	10/16/2019 13:07	WG1363432
Ethane	U		0.296	1.29	1	10/16/2019 13:07	WG1363432
Ethene	U		0.422	1.27	1	10/16/2019 13:07	WG1363432

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/21/2019 11:24	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 11:24	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 11:24	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 11:24	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 11:24	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 11:24	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 11:24	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 11:24	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 11:24	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 11:24	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 11:24	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 11:24	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 11:24	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/21/2019 11:24	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 11:24	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 11:24	WG1366365
Chloroform	0.200	J	0.0860	0.500	1	10/21/2019 11:24	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 11:24	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 11:24	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 11:24	WG1366365
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 11:24	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 11:24	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 11:24	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 11:24	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 11:24	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 11:24	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 11:24	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 11:24	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 11:24	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 11:24	WG1366365
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/21/2019 11:24	WG1366365
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 11:24	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 11:24	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 11:24	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 11:24	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 11:24	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 11:24	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 11:24	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 11:24	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 11:24	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 11:24	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 11:24	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 11:24	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 11:24	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 11:24	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 11:24	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 11:24	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 11:24	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 11:24	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 11:24	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 11:24	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 11:24	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 11:24	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 11:24	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 11:24	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 11:24	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 11:24	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 11:24	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 11:24	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 11:24	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 11:24	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 11:24	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 11:24	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 11:24	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 11:24	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 11:24	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 11:24	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 11:24	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 11:24	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 11:24	WG1366365
Vinyl chloride	U		0.118	0.500	1	10/21/2019 11:24	WG1366365
Xylenes, Total	U		0.316	1.50	1	10/21/2019 11:24	WG1366365
(S) Toluene-d8	*98.4*			*80.0-120*		*10/21/2019 11:24*	WG1366365
(S) 4-Bromofluorobenzene	*96.1*			*77.0-126*		*10/21/2019 11:24*	WG1366365
(S) 1,2-Dichloroethane-d4	*82.6*			*70.0-130*		*10/21/2019 11:24*	WG1366365

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/16/2019 13:22	WG1363461
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/16/2019 13:22*	WG1363461

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	U	J0	1.05	25.0	1	10/21/2019 08:27	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 08:27	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 08:27	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 08:27	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 08:27	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 08:27	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 08:27	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 08:27	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 08:27	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 08:27	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 08:27	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 08:27	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 08:27	WG1366365
Chlorobenzene	U		0.140	0.500	1	10/21/2019 08:27	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 08:27	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 08:27	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 08:27	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 08:27	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 08:27	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 08:27	WG1366365
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 08:27	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 08:27	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 08:27	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 08:27	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 08:27	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 08:27	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 08:27	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 08:27	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 08:27	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 08:27	WG1366365
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/21/2019 08:27	WG1366365
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 08:27	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 08:27	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 08:27	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 08:27	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 08:27	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 08:27	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 08:27	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 08:27	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 08:27	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 08:27	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 08:27	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 08:27	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 08:27	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 08:27	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 08:27	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 08:27	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 08:27	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methylene Chloride	U		1.07	2.50	1	10/21/2019 08:27	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 08:27	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 08:27	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 08:27	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 08:27	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 08:27	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 08:27	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 08:27	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 08:27	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 08:27	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 08:27	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 08:27	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 08:27	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 08:27	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 08:27	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 08:27	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 08:27	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 08:27	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 08:27	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 08:27	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 08:27	WG1366365
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 08:27	WG1366365
Vinyl chloride	U		0.118	0.500	1	10/21/2019 08:27	WG1366365
Xylenes, Total	U		0.316	1.50	1	10/21/2019 08:27	WG1366365
(S) Toluene-d8	*95.6*			*80.0-120*		*10/21/2019 08:27*	WG1366365
(S) 4-Bromofluorobenzene	*92.7*			*77.0-126*		*10/21/2019 08:27*	WG1366365
(S) 1,2-Dichloroethane-d4	*83.6*			*70.0-130*		*10/21/2019 08:27*	WG1366365

Method Blank (MB)

(MB) R3462775-1 10/19/19 11:13

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Alkalinity	4330	J	2710	20000

Sample Narrative:

BLANK: Endpoint pH 4.5

L1147285-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1147285-01 10/19/19 12:25 • (DUP) R3462775-3 10/19/19 12:34

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	100000	93700	1	6.64		20

Sample Narrative:

OS: Endpoint pH 4.5 HEADSPACE

DUP: Endpoint pH 4.5

L1149401-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1149401-01 10/19/19 18:01 • (DUP) R3462775-6 10/19/19 18:10

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	1060000	1080000	1	1.63		20

Sample Narrative:

OS: Endpoint pH 4.5

DUP: Endpoint pH 4.5

Laboratory Control Sample (LCS)

(LCS) R3462775-5 10/19/19 13:33

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Alkalinity	100000	98300	98.3	85.0-115	

Sample Narrative:

LCS: Endpoint pH 4.5

Method Blank (MB)

(MB) R3460615-1 10/12/19 12:19

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	79.3	J	51.9	1000
Nitrate	U		22.7	100
Sulfate	1390	J	77.4	5000

L1147951-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1147951-01 10/12/19 15:29 • (DUP) R3460615-3 10/12/19 15:44

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	5450	5430	1	0.384		15
Nitrate	396	379	1	4.44		15

L1149387-09 Original Sample (OS) • Duplicate (DUP)

(OS) L1149387-09 10/12/19 21:29 • (DUP) R3460615-6 10/12/19 21:45

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	222	109	1	68.4	J P1	15
Nitrate	U	41.0	1	200	J P1	15
Sulfate	U	0.000	1	0.000		15

Laboratory Control Sample (LCS)

(LCS) R3460615-2 10/12/19 12:35

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	39300	98.2	80.0-120	
Nitrate	8000	7950	99.4	80.0-120	
Sulfate	40000	39900	99.8	80.0-120	

L1147951-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1147951-02 10/12/19 16:01 • (MS) R3460615-4 10/12/19 16:17 • (MSD) R3460615-5 10/12/19 16:34

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	10700	60800	60700	100	100	1	80.0-120			0.0780	15
Nitrate	5000	416	5580	5580	103	103	1	80.0-120			0.147	15

L1147951-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1147951-02 10/12/19 16:01 • (MS) R3460615-4 10/12/19 16:17 • (MSD) R3460615-5 10/12/19 16:34

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Sulfate	50000	16100	65100	65000	97.9	97.8	1	80.0-120			0.0477	15

L1149387-09 Original Sample (OS) • Matrix Spike (MS)

(OS) L1149387-09 10/12/19 21:29 • (MS) R3460615-7 10/12/19 22:02

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	222	50000	99.5	1	80.0-120	
Nitrate	5000	U	5110	102	1	80.0-120	
Sulfate	50000	U	49700	99.5	1	80.0-120	

Method Blank (MB)

(MB) R3462022-1 10/16/19 18:09

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
TOC (Total Organic Carbon)	416	J	102	1000

L1149387-08 Original Sample (OS) • Duplicate (DUP)

(OS) L1149387-08 10/16/19 21:34 • (DUP) R3462022-3 10/16/19 21:57

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC	6970	7050	1	1.08		20

L1149591-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1149591-06 10/17/19 08:46 • (DUP) R3462022-9 10/17/19 09:03

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC	489	421	1	15.1	J	20

Laboratory Control Sample (LCS)

(LCS) R3462022-2 10/16/19 18:52

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TOC	75000	69000	92.0	85.0-115	

L1149591-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1149591-04 10/17/19 00:20 • (MS) R3462022-4 10/17/19 00:42 • (MSD) R3462022-5 10/17/19 01:04

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC	50000	5870	53200	54900	94.7	98.1	1	80.0-120			3.11	20

L1149851-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1149851-03 10/17/19 03:58 • (MS) R3462022-7 10/17/19 04:19 • (MSD) R3462022-8 10/17/19 04:40

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC	50000	2950	50000	49700	94.1	93.5	1	80.0-120			0.542	20

Method Blank (MB)

(MB) R3462523-1 10/18/19 12:28

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Iron	U		15.0	100
Manganese	1.01	J	0.250	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3462523-2 10/18/19 12:31 • (LCSD) R3462523-3 10/18/19 12:35

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Iron	5000	5180	5330	104	107	80.0-120			2.87	20
Manganese	50.0	51.0	52.4	102	105	80.0-120			2.72	20

L1149342-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1149342-02 10/18/19 12:38 • (MS) R3462523-5 10/18/19 12:44 • (MSD) R3462523-6 10/18/19 12:48

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	ug/l	%	%		%			%	%
Iron	5000	178	5450	5500	105	107	1	75.0-125			1.05	20
Manganese	50.0	44.5	95.2	95.9	101	103	1	75.0-125			0.734	20

Method Blank (MB)

(MB) R3461647-3 10/16/19 12:32

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Gasoline Range Organics-NWTPH	U		31.6	100
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*

Laboratory Control Sample (LCS)

(LCS) R3461647-2 10/16/19 11:32

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Gasoline Range Organics-NWTPH	5500	5400	98.2	70.0-124	
(S) a,a,a-Trifluorotoluene(FID)			*80.7*	*78.0-120*	

Method Blank (MB)

(MB) R3461663-1 10/16/19 13:45

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678

L1149196-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1149196-01 10/16/19 13:57 • (DUP) R3461663-2 10/16/19 14:21

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	535	528	1	1.34		20

L1149342-08 Original Sample (OS) • Duplicate (DUP)

(OS) L1149342-08 10/16/19 14:38 • (DUP) R3461663-3 10/16/19 15:28

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	384	387	1	0.623		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461663-4 10/16/19 15:39 • (LCSD) R3461663-5 10/16/19 15:42

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	73.4	76.5	108	113	85.0-115			4.17	20

Method Blank (MB)

(MB) R3461591-1 10/16/19 10:37

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1149371-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1149371-06 10/16/19 11:29 • (DUP) R3461591-2 10/16/19 12:00

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	1080	1130	1	4.95		20
Ethane	ND	0.000	1	0.000		20
Ethene	ND	0.000	1	0.000		20

L1149387-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1149387-04 10/16/19 13:29 • (DUP) R3461591-3 10/16/19 13:32

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	12.3	12.9	1	4.67		20
Ethane	U	0.000	1	0.000		20
Ethene	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461591-4 10/16/19 13:35 • (LCSD) R3461591-5 10/16/19 13:39

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	75.3	76.3	111	112	85.0-115			1.34	20
Ethane	129	133	129	103	100	85.0-115			2.40	20
Ethene	127	138	135	109	106	85.0-115			2.67	20

Method Blank (MB)

(MB) R3463753-2 10/21/19 08:08

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3463753-2 10/21/19 08:08

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*98.9*			*80.0-120*
(S) 4-Bromofluorobenzene	*92.7*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*83.6*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3463753-1 10/21/19 06:49

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	88.2	70.6	19.0-160	
Acrylonitrile	125	94.1	75.3	55.0-149	
Benzene	25.0	22.6	90.4	70.0-123	
Bromobenzene	25.0	24.4	97.6	73.0-121	
Bromodichloromethane	25.0	22.1	88.4	75.0-120	
Bromochloromethane	25.0	24.0	96.0	76.0-122	
Bromoform	25.0	22.6	90.4	68.0-132	
Bromomethane	25.0	19.1	76.4	10.0-160	
n-Butylbenzene	25.0	26.5	106	73.0-125	
sec-Butylbenzene	25.0	25.4	102	75.0-125	
tert-Butylbenzene	25.0	24.3	97.2	76.0-124	
Carbon disulfide	25.0	22.4	89.6	61.0-128	
Carbon tetrachloride	25.0	21.3	85.2	68.0-126	
Chlorobenzene	25.0	24.3	97.2	80.0-121	
Chlorodibromomethane	25.0	23.7	94.8	77.0-125	
Chloroethane	25.0	23.4	93.6	47.0-150	
Chloroform	25.0	22.0	88.0	73.0-120	
Chloromethane	25.0	20.1	80.4	41.0-142	
2-Chlorotoluene	25.0	24.2	96.8	76.0-123	
4-Chlorotoluene	25.0	23.4	93.6	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	20.3	81.2	58.0-134	
1,2-Dibromoethane	25.0	23.5	94.0	80.0-122	
Dibromomethane	25.0	22.3	89.2	80.0-120	
1,2-Dichlorobenzene	25.0	26.3	105	79.0-121	
1,3-Dichlorobenzene	25.0	26.7	107	79.0-120	
1,4-Dichlorobenzene	25.0	26.5	106	79.0-120	
Dichlorodifluoromethane	25.0	25.4	102	51.0-149	
1,1-Dichloroethane	25.0	21.3	85.2	70.0-126	
1,2-Dichloroethane	25.0	20.1	80.4	70.0-128	
1,1-Dichloroethene	25.0	25.6	102	71.0-124	
cis-1,2-Dichloroethene	25.0	24.1	96.4	73.0-120	
trans-1,2-Dichloroethene	25.0	23.2	92.8	73.0-120	
1,2-Dichloropropane	25.0	21.0	84.0	77.0-125	
1,1-Dichloropropene	25.0	23.7	94.8	74.0-126	
1,3-Dichloropropane	25.0	24.3	97.2	80.0-120	
cis-1,3-Dichloropropene	25.0	22.0	88.0	80.0-123	
trans-1,3-Dichloropropene	25.0	22.8	91.2	78.0-124	
trans-1,4-Dichloro-2-butene	25.0	14.8	59.2	33.0-144	
2,2-Dichloropropane	25.0	20.1	80.4	58.0-130	
Di-isopropyl ether	25.0	20.6	82.4	58.0-138	

Laboratory Control Sample (LCS)

(LCS) R3463753-1 10/21/19 06:49

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	23.6	94.4	79.0-123	
Hexachloro-1,3-butadiene	25.0	33.8	135	54.0-138	
2-Hexanone	125	98.0	78.4	67.0-149	
n-Hexane	25.0	20.8	83.2	57.0-133	
Iodomethane	125	98.7	79.0	33.0-147	
Isopropylbenzene	25.0	22.2	88.8	76.0-127	
p-Isopropyltoluene	25.0	26.5	106	76.0-125	
2-Butanone (MEK)	125	81.5	65.2	44.0-160	
Methylene Chloride	25.0	22.7	90.8	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	87.8	70.2	68.0-142	
Methyl tert-butyl ether	25.0	20.5	82.0	68.0-125	
Naphthalene	25.0	19.2	76.8	54.0-135	
n-Propylbenzene	25.0	22.8	91.2	77.0-124	
Styrene	25.0	24.4	97.6	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	23.8	95.2	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	20.3	81.2	65.0-130	
1,1,2-Trichlorotrifluoroethane	25.0	23.1	92.4	69.0-132	
Tetrachloroethene	25.0	25.2	101	72.0-132	
Toluene	25.0	23.7	94.8	79.0-120	
1,2,3-Trichlorobenzene	25.0	26.4	106	50.0-138	
1,2,4-Trichlorobenzene	25.0	28.9	116	57.0-137	
1,1,1-Trichloroethane	25.0	20.9	83.6	73.0-124	
1,1,2-Trichloroethane	25.0	23.4	93.6	80.0-120	
Trichloroethene	25.0	23.0	92.0	78.0-124	
Trichlorofluoromethane	25.0	25.7	103	59.0-147	
1,2,3-Trichloropropane	25.0	21.3	85.2	73.0-130	
1,2,4-Trimethylbenzene	25.0	24.0	96.0	76.0-121	
1,2,3-Trimethylbenzene	25.0	24.5	98.0	77.0-120	
1,3,5-Trimethylbenzene	25.0	23.3	93.2	76.0-122	
Vinyl acetate	125	92.6	74.1	11.0-160	
Vinyl chloride	25.0	25.2	101	67.0-131	
Xylenes, Total	75.0	71.6	95.5	79.0-123	
(S) Toluene-d8			*98.4*	*80.0-120*	
(S) 4-Bromofluorobenzene			*96.6*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*81.0*	*70.0-130*	

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
J	The identification of the analyte is acceptable; the reported value is an estimate.
J0	J0: The identification of the analyte is acceptable, but the reported concentration is an estimate. The calibration met method criteria.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

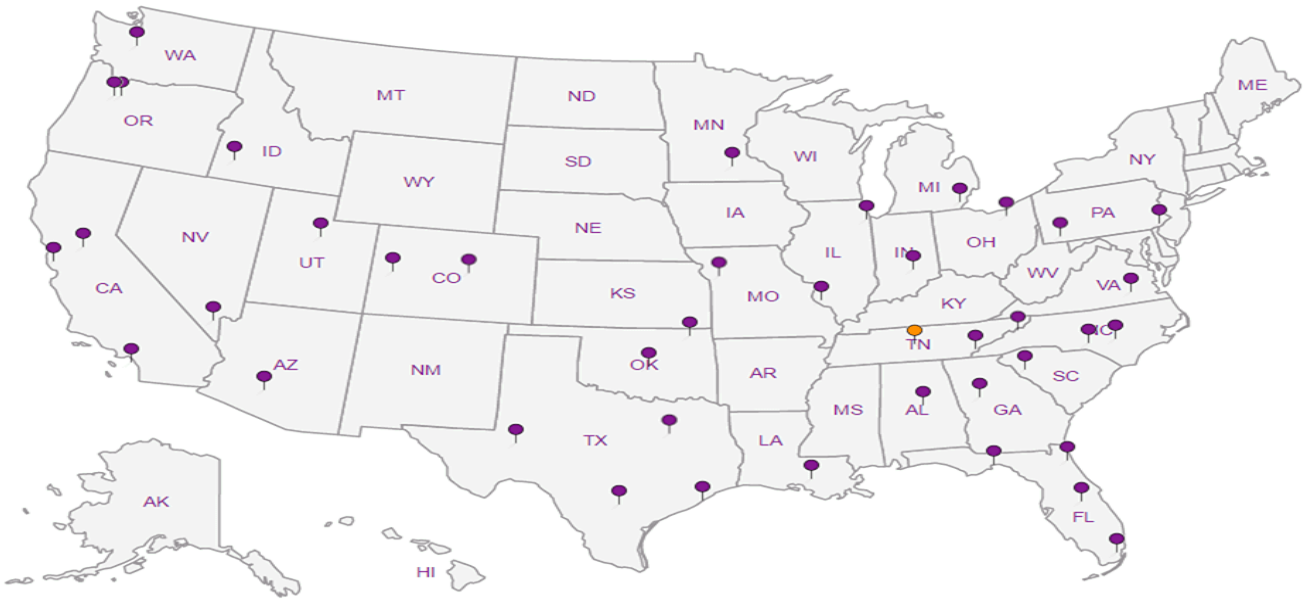
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



PES-Seattle

Billing Information: PES-Seattle

Report to: Bill Haldeman/Brian O'neal

Email To: on file

Project Description: American Linen

City/State Collected: Seattle, WA

Phone: on file

Fax:

Client Project # 1413.001.02.501E

Lab Project # PESENVSWA-ALP

Collected by (print): K. Zygas/B. Hecht/H. Cohen

Site/Facility ID # AMERICAN LINEN

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y X

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Pres Chk

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	**NO3,SO4,Chloride**48 hour hold	NWTPHGX	VOCs (V8260LLC)	Total Fe Mn 6020	TOC	Alkalinity	EEM (RSK175LL)	Remarks	Sample # (lab only)
MW-916-101119	Grab	GW	65	10/11/19	0800	9	X		X	X	X	X	X		-01
SMW-3-101119		GW	15		0945	3			X						02
MW128-101119		GW	65		1045	9	X		X	X	X	X	X		03
MW124-101119		GW	115		1111	11	X	X	X	X	X	X	X		04
MW-307-101119		GW	80		1135	12	X	X	X	X	X	X	X		05
MW-214-101119		GW	14		1215	3			X						06
MW-312-101119		GW	20		1350	9	X		X	X	X	X	X		07
MW-308-101119		GW	40		1455	9	X		X	X	X	X	X		08
EQ-101119	Grab	GW	—	10/11/19	1440	12	X	X	X	X	X	X	X		09
TRIP-101119	—	GW	—	10/11/19	1600	2		X	X						10

Chain of Custody Page ___ of ___

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# 1149357

J118

Acctnum: PESENVSWA

Template:

Prelogin:

TSR: Brian Ford

PB:

Shipped Via:

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____

Flow _____ Other _____

Samples returned via:
__ UPS __ FedEx __ Courier __ _____

Tracking # 1145 2227 4141

Sample Receipt Checklist
COC Seal Present/Intact: Y N NP
COC Signed/Accurate: Y N
Bottles arrive intact: Y N
Correct bottles used: Y N
Sufficient volume sent: Y N
If Applicable
VOA Zero Headspace: Y N
Preservation Correct/Checked: Y N

RAD SCREEN: <0.5 mR/hr

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR	If preservation required by Login: Date/Time
	10-11-19	1600			
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: °C Bottles Received: 5.6, 1.3.7 AS CK 76	
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature) Deborah Pinkston	Date: 10/12/19 Time: 8:45	Hold: Condition: NCF / OK

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 25, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1149851
Samples Received:	10/15/2019
Project Number:	1413.001.02.501E
Description:	
Site:	AMERICAN LINEN
Report To:	Brian O'Neal/Bill Haldeman 1215 Fourth Ave., Suite 1350 Seattle, WA 98161

Entire Report Reviewed By:

Brian Ford
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

Cp: Cover Page 1
Tc: Table of Contents 2
Ss: Sample Summary 3
Cn: Case Narrative 6
Sr: Sample Results 7
MW-190-101419 L1149851-01 7
MW-146-101419 L1149851-02 10
MW-309-101419 L1149851-03 13
MW-189-101419 L1149851-04 16
MW-154-101419 L1149851-05 19
MW-122-101419 L1149851-06 22
MW-111-101419 L1149851-07 25
MW-147-101419 L1149851-08 28
MW-161-101419 L1149851-09 31
MW-103-101419 L1149851-10 34
TB-101419 L1149851-11 36
Qc: Quality Control Summary 38
Wet Chemistry by Method 2320 B-2011 38
Wet Chemistry by Method 9056A 39
Wet Chemistry by Method 9060A 43
Metals (ICPMS) by Method 6020B 45
Volatile Organic Compounds (GC) by Method NWTPHGX 46
Volatile Organic Compounds (GC) by Method RSK175 48
Volatile Organic Compounds (GC/MS) by Method 8260C 51
Gl: Glossary of Terms 61
Al: Accreditations & Locations 62
Sc: Sample Chain of Custody 63

MW-190-101419 L1149851-01 GW

Collected by: KZ/HC/BH | Collected date/time: 10/14/19 09:10 | Received date/time: 10/15/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365104	1	10/18/19 11:14	10/18/19 11:14	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363086	1	10/15/19 22:42	10/15/19 22:42	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/17/19 03:19	10/17/19 03:19	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364629	1	10/20/19 13:40	10/21/19 11:10	LAT	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1364938	1	10/18/19 04:37	10/18/19 04:37	DWR	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1363432	1	10/16/19 13:10	10/16/19 13:10	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 11:44	10/21/19 11:44	BMB	Mt. Juliet, TN

MW-146-101419 L1149851-02 GW

Collected by: KZ/HC/BH | Collected date/time: 10/14/19 10:15 | Received date/time: 10/15/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365104	1	10/18/19 11:22	10/18/19 11:22	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363086	1	10/15/19 22:56	10/15/19 22:56	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/17/19 03:41	10/17/19 03:41	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364629	1	10/20/19 13:40	10/21/19 11:25	LAT	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1364938	1	10/18/19 05:01	10/18/19 05:01	DWR	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1363432	1	10/16/19 13:15	10/16/19 13:15	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 12:03	10/21/19 12:03	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1367719	100	10/23/19 01:49	10/23/19 01:49	TJJ	Mt. Juliet, TN

MW-309-101419 L1149851-03 GW

Collected by: KZ/HC/BH | Collected date/time: 10/14/19 10:35 | Received date/time: 10/15/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365104	1	10/18/19 11:37	10/18/19 11:37	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363086	1	10/15/19 23:54	10/15/19 23:54	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/17/19 03:58	10/17/19 03:58	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364629	1	10/20/19 13:40	10/21/19 11:29	LAT	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1363432	1	10/16/19 13:25	10/16/19 13:25	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 12:23	10/21/19 12:23	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1367719	1	10/23/19 02:10	10/23/19 02:10	TJJ	Mt. Juliet, TN

MW-189-101419 L1149851-04 GW

Collected by: KZ/HC/BH | Collected date/time: 10/14/19 11:30 | Received date/time: 10/15/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365104	1	10/18/19 11:44	10/18/19 11:44	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363086	1	10/16/19 00:08	10/16/19 00:08	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/17/19 04:56	10/17/19 04:56	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364629	1	10/20/19 13:40	10/21/19 11:32	LAT	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1364938	1	10/18/19 05:24	10/18/19 05:24	DWR	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1363432	1	10/16/19 13:27	10/16/19 13:27	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 12:43	10/21/19 12:43	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1367719	1	10/23/19 02:30	10/23/19 02:30	TJJ	Mt. Juliet, TN

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-154-101419 L1149851-05 GW

Collected by: KZ/HC/BH | Collected date/time: 10/14/19 12:05 | Received date/time: 10/15/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365104	1	10/18/19 11:52	10/18/19 11:52	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363086	1	10/16/19 00:23	10/16/19 00:23	ELN	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/17/19 05:16	10/17/19 05:16	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364629	1	10/20/19 13:40	10/21/19 11:58	LAT	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1364938	1	10/18/19 05:48	10/18/19 05:48	DWR	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364418	1	10/17/19 11:11	10/17/19 11:11	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 13:02	10/21/19 13:02	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1367719	1	10/23/19 02:50	10/23/19 02:50	TJJ	Mt. Juliet, TN

MW-122-101419 L1149851-06 GW

Collected by: KZ/HC/BH | Collected date/time: 10/14/19 12:05 | Received date/time: 10/15/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365104	1	10/18/19 11:59	10/18/19 11:59	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363090	1	10/15/19 16:07	10/15/19 16:07	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/17/19 05:34	10/17/19 05:34	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364629	1	10/20/19 13:40	10/21/19 12:02	LAT	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364418	1	10/17/19 11:14	10/17/19 11:14	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 13:22	10/21/19 13:22	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1367719	1	10/23/19 03:11	10/23/19 03:11	TJJ	Mt. Juliet, TN

MW-111-101419 L1149851-07 GW

Collected by: KZ/HC/BH | Collected date/time: 10/14/19 13:25 | Received date/time: 10/15/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365104	1	10/18/19 12:06	10/18/19 12:06	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363090	1	10/15/19 16:33	10/15/19 16:33	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364227	1	10/17/19 05:51	10/17/19 05:51	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364629	1	10/20/19 13:40	10/21/19 12:05	LAT	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364418	1	10/17/19 11:17	10/17/19 11:17	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 13:41	10/21/19 13:41	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1367719	1	10/23/19 03:31	10/23/19 03:31	TJJ	Mt. Juliet, TN

MW-147-101419 L1149851-08 GW

Collected by: KZ/HC/BH | Collected date/time: 10/14/19 13:55 | Received date/time: 10/15/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365104	1	10/18/19 12:13	10/18/19 12:13	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363090	1	10/15/19 17:38	10/15/19 17:38	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364260	5	10/17/19 16:35	10/17/19 16:35	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364629	1	10/20/19 13:40	10/21/19 12:09	LAT	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1364938	1	10/18/19 06:12	10/18/19 06:12	DWR	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364418	1	10/17/19 11:26	10/17/19 11:26	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1365165	10	10/18/19 13:08	10/18/19 13:08	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 14:01	10/21/19 14:01	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1367719	25	10/23/19 03:51	10/23/19 03:51	TJJ	Mt. Juliet, TN

MW-161-101419 L1149851-09 GW

Collected by: KZ/HC/BH | Collected date/time: 10/14/19 14:28 | Received date/time: 10/15/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365104	1	10/18/19 12:20	10/18/19 12:20	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363090	1	10/15/19 17:51	10/15/19 17:51	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364260	1	10/17/19 16:53	10/17/19 16:53	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364629	1	10/20/19 13:40	10/21/19 12:13	LAT	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1367521	1	10/23/19 02:14	10/23/19 02:14	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364418	1	10/17/19 13:20	10/17/19 13:20	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 14:21	10/21/19 14:21	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1367719	1	10/23/19 04:11	10/23/19 04:11	TJJ	Mt. Juliet, TN

MW-103-101419 L1149851-10 GW

Collected by: KZ/HC/BH | Collected date/time: 10/14/19 14:55 | Received date/time: 10/15/19 08:45

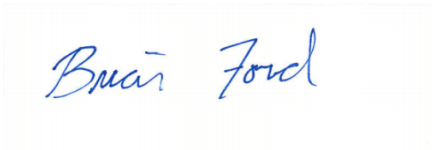
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1365104	1	10/18/19 12:27	10/18/19 12:27	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363090	1	10/15/19 18:04	10/15/19 18:04	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1364260	1	10/17/19 17:20	10/17/19 17:20	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364629	1	10/20/19 13:40	10/21/19 12:16	LAT	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364418	1	10/17/19 13:23	10/17/19 13:23	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1366365	1	10/21/19 14:40	10/21/19 14:40	BMB	Mt. Juliet, TN

TB-101419 L1149851-11 GW

Collected by: KZ/HC/BH | Collected date/time: 10/14/19 15:30 | Received date/time: 10/15/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1364938	1	10/18/19 01:02	10/18/19 01:02	DWR	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1368672	1	10/24/19 16:33	10/24/19 16:33	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369459	1	10/25/19 11:05	10/25/19 11:05	JAH	Mt. Juliet, TN

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	172000		2710	20000	1	10/18/2019 11:14	WG1365104

Sample Narrative:

L1149851-01 WG1365104: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	12800		51.9	1000	1	10/15/2019 22:42	WG1363086
Nitrate	U		22.7	100	1	10/15/2019 22:42	WG1363086
Sulfate	20300		77.4	5000	1	10/15/2019 22:42	WG1363086

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	10300		102	1000	1	10/17/2019 03:19	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	1850		15.0	100	1	10/21/2019 11:10	WG1364629
Manganese	406		0.250	5.00	1	10/21/2019 11:10	WG1364629

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/18/2019 04:37	WG1364938
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/18/2019 04:37*	WG1364938

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	428		0.287	0.678	1	10/16/2019 13:10	WG1363432
Ethane	6.87		0.296	1.29	1	10/16/2019 13:10	WG1363432
Ethene	U		0.422	1.27	1	10/16/2019 13:10	WG1363432

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/21/2019 11:44	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 11:44	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 11:44	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 11:44	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 11:44	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 11:44	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 11:44	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 11:44	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 11:44	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 11:44	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 11:44	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 11:44	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 11:44	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/21/2019 11:44	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 11:44	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 11:44	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 11:44	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 11:44	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 11:44	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 11:44	WG1366365
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 11:44	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 11:44	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 11:44	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 11:44	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 11:44	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 11:44	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 11:44	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 11:44	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 11:44	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 11:44	WG1366365
cis-1,2-Dichloroethene	7.78		0.0933	0.500	1	10/21/2019 11:44	WG1366365
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 11:44	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 11:44	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 11:44	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 11:44	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 11:44	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 11:44	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 11:44	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 11:44	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 11:44	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 11:44	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 11:44	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 11:44	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 11:44	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 11:44	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 11:44	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 11:44	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 11:44	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 11:44	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 11:44	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 11:44	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 11:44	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 11:44	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 11:44	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 11:44	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 11:44	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 11:44	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 11:44	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 11:44	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 11:44	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 11:44	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 11:44	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 11:44	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 11:44	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 11:44	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 11:44	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 11:44	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 11:44	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 11:44	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 11:44	WG1366365
Vinyl chloride	0.994		0.118	0.500	1	10/21/2019 11:44	WG1366365
Xylenes, Total	U		0.316	1.50	1	10/21/2019 11:44	WG1366365
(S) Toluene-d8	*96.6*			*80.0-120*		*10/21/2019 11:44*	WG1366365
(S) 4-Bromofluorobenzene	*94.2*			*77.0-126*		*10/21/2019 11:44*	WG1366365
(S) 1,2-Dichloroethane-d4	*85.9*			*70.0-130*		*10/21/2019 11:44*	WG1366365

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	338000		2710	20000	1	10/18/2019 11:22	WG1365104

Sample Narrative:
L1149851-02 WG1365104: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	23300		51.9	1000	1	10/15/2019 22:56	WG1363086
Nitrate	U		22.7	100	1	10/15/2019 22:56	WG1363086
Sulfate	20600		77.4	5000	1	10/15/2019 22:56	WG1363086

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	3630	B	102	1000	1	10/17/2019 03:41	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	2910		15.0	100	1	10/21/2019 11:25	WG1364629
Manganese	898		0.250	5.00	1	10/21/2019 11:25	WG1364629

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	1310		31.6	100	1	10/18/2019 05:01	WG1364938
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/18/2019 05:01*	WG1364938

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	6190		0.287	0.678	1	10/16/2019 13:15	WG1363432
Ethane	U		0.296	1.29	1	10/16/2019 13:15	WG1363432
Ethene	394		0.422	1.27	1	10/16/2019 13:15	WG1363432

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/21/2019 12:03	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 12:03	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 12:03	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 12:03	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 12:03	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 12:03	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 12:03	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 12:03	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 12:03	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 12:03	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 12:03	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 12:03	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 12:03	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/21/2019 12:03	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 12:03	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 12:03	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 12:03	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 12:03	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 12:03	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 12:03	WG1366365
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 12:03	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 12:03	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 12:03	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 12:03	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 12:03	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 12:03	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 12:03	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 12:03	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 12:03	WG1366365
1,1-Dichloroethene	2.83		0.188	0.500	1	10/21/2019 12:03	WG1366365
cis-1,2-Dichloroethene	1350		9.33	50.0	100	10/23/2019 01:49	WG1367719
trans-1,2-Dichloroethene	7.85		0.152	0.500	1	10/21/2019 12:03	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 12:03	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 12:03	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 12:03	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 12:03	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 12:03	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 12:03	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 12:03	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 12:03	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 12:03	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 12:03	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 12:03	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 12:03	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 12:03	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 12:03	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 12:03	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 12:03	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 12:03	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 12:03	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 12:03	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 12:03	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 12:03	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 12:03	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 12:03	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 12:03	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 12:03	WG1366365
Tetrachloroethene	2.03		0.199	0.500	1	10/21/2019 12:03	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 12:03	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 12:03	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 12:03	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 12:03	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 12:03	WG1366365
Trichloroethene	6.77		0.153	0.500	1	10/21/2019 12:03	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 12:03	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 12:03	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 12:03	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 12:03	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 12:03	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 12:03	WG1366365
Vinyl chloride	2830		11.8	50.0	100	10/23/2019 01:49	WG1367719
Xylenes, Total	U		0.316	1.50	1	10/21/2019 12:03	WG1366365
(S) Toluene-d8	*94.4*			*80.0-120*		*10/21/2019 12:03*	WG1366365
(S) Toluene-d8	*96.6*			*80.0-120*		*10/23/2019 01:49*	WG1367719
(S) 4-Bromofluorobenzene	*92.3*			*77.0-126*		*10/21/2019 12:03*	WG1366365
(S) 4-Bromofluorobenzene	*107*			*77.0-126*		*10/23/2019 01:49*	WG1367719
(S) 1,2-Dichloroethane-d4	*81.9*			*70.0-130*		*10/21/2019 12:03*	WG1366365
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/23/2019 01:49*	WG1367719

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	228000		2710	20000	1	10/18/2019 11:37	WG1365104

Sample Narrative:
L1149851-03 WG1365104: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	15100		51.9	1000	1	10/15/2019 23:54	WG1363086
Nitrate	U		22.7	100	1	10/15/2019 23:54	WG1363086
Sulfate	86500		77.4	5000	1	10/15/2019 23:54	WG1363086

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	2950	B	102	1000	1	10/17/2019 03:58	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	511		15.0	100	1	10/21/2019 11:29	WG1364629
Manganese	435		0.250	5.00	1	10/21/2019 11:29	WG1364629

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	105		0.287	0.678	1	10/16/2019 13:25	WG1363432
Ethane	U		0.296	1.29	1	10/16/2019 13:25	WG1363432
Ethene	U		0.422	1.27	1	10/16/2019 13:25	WG1363432

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	U	J0	1.05	25.0	1	10/21/2019 12:23	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 12:23	WG1366365
Benzene	0.295	J	0.0896	0.500	1	10/21/2019 12:23	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 12:23	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 12:23	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 12:23	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 12:23	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 12:23	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 12:23	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 12:23	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 12:23	WG1366365
Carbon disulfide	5.84		0.101	0.500	1	10/21/2019 12:23	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 12:23	WG1366365
Chlorobenzene	U		0.140	0.500	1	10/21/2019 12:23	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 12:23	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 12:23	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 12:23	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 12:23	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 12:23	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 12:23	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 12:23	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 12:23	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 12:23	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 12:23	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 12:23	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 12:23	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 12:23	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 12:23	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 12:23	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 12:23	WG1366365
cis-1,2-Dichloroethene	1.47		0.0933	0.500	1	10/23/2019 02:10	WG1367719
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 12:23	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 12:23	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 12:23	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 12:23	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 12:23	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 12:23	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 12:23	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 12:23	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 12:23	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 12:23	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 12:23	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 12:23	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 12:23	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 12:23	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 12:23	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 12:23	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 12:23	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 12:23	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 12:23	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 12:23	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 12:23	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 12:23	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 12:23	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 12:23	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 12:23	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 12:23	WG1366365
Tetrachloroethene	1.11		0.199	0.500	1	10/21/2019 12:23	WG1366365
Toluene	2.01		0.412	0.500	1	10/21/2019 12:23	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 12:23	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 12:23	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 12:23	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 12:23	WG1366365
Trichloroethene	0.497	J	0.153	0.500	1	10/21/2019 12:23	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 12:23	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 12:23	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 12:23	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 12:23	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 12:23	WG1366365
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 12:23	WG1366365
Vinyl chloride	6.37		0.118	0.500	1	10/23/2019 02:10	WG1367719
Xylenes, Total	U		0.316	1.50	1	10/21/2019 12:23	WG1366365
(S) Toluene-d8	*99.9*			*80.0-120*		*10/21/2019 12:23*	WG1366365
(S) Toluene-d8	*96.5*			*80.0-120*		*10/23/2019 02:10*	WG1367719
(S) 4-Bromofluorobenzene	*95.2*			*77.0-126*		*10/21/2019 12:23*	WG1366365
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/23/2019 02:10*	WG1367719

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*84.3*			*70.0-130*		*10/21/2019 12:23*	WG1366365
(S) 1,2-Dichloroethane-d4	*98.3*			*70.0-130*		*10/23/2019 02:10*	WG1367719

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	197000		2710	20000	1	10/18/2019 11:44	WG1365104

Sample Narrative:

L1149851-04 WG1365104: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	17100		51.9	1000	1	10/16/2019 00:08	WG1363086
Nitrate	U		22.7	100	1	10/16/2019 00:08	WG1363086
Sulfate	37200		77.4	5000	1	10/16/2019 00:08	WG1363086

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	3780	B	102	1000	1	10/17/2019 04:56	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	1330		15.0	100	1	10/21/2019 11:32	WG1364629
Manganese	838		0.250	5.00	1	10/21/2019 11:32	WG1364629

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/18/2019 05:24	WG1364938
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/18/2019 05:24*	WG1364938

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	203		0.287	0.678	1	10/16/2019 13:27	WG1363432
Ethane	U		0.296	1.29	1	10/16/2019 13:27	WG1363432
Ethene	69.9		0.422	1.27	1	10/16/2019 13:27	WG1363432

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/21/2019 12:43	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 12:43	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 12:43	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 12:43	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 12:43	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 12:43	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 12:43	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 12:43	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 12:43	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 12:43	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 12:43	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 12:43	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 12:43	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/21/2019 12:43	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 12:43	WG1366365
Chloroethane	0.362	J	0.141	2.50	1	10/21/2019 12:43	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 12:43	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 12:43	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 12:43	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 12:43	WG1366365
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 12:43	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 12:43	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 12:43	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 12:43	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 12:43	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 12:43	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 12:43	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 12:43	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 12:43	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 12:43	WG1366365
cis-1,2-Dichloroethene	2.23		0.0933	0.500	1	10/23/2019 02:30	WG1367719
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 12:43	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 12:43	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 12:43	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 12:43	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 12:43	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 12:43	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 12:43	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 12:43	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 12:43	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 12:43	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 12:43	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 12:43	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 12:43	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 12:43	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 12:43	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 12:43	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 12:43	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 12:43	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 12:43	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 12:43	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 12:43	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 12:43	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 12:43	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 12:43	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 12:43	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 12:43	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 12:43	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 12:43	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 12:43	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 12:43	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 12:43	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 12:43	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 12:43	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 12:43	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 12:43	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 12:43	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 12:43	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 12:43	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 12:43	WG1366365
Vinyl chloride	18.2		0.118	0.500	1	10/23/2019 02:30	WG1367719
Xylenes, Total	U		0.316	1.50	1	10/21/2019 12:43	WG1366365
(S) Toluene-d8	*96.3*			*80.0-120*		*10/21/2019 12:43*	WG1366365
(S) Toluene-d8	*95.3*			*80.0-120*		*10/23/2019 02:30*	WG1367719
(S) 4-Bromofluorobenzene	*91.4*			*77.0-126*		*10/21/2019 12:43*	WG1366365
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/23/2019 02:30*	WG1367719
(S) 1,2-Dichloroethane-d4	*83.1*			*70.0-130*		*10/21/2019 12:43*	WG1366365
(S) 1,2-Dichloroethane-d4	*98.2*			*70.0-130*		*10/23/2019 02:30*	WG1367719

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	186000		2710	20000	1	10/18/2019 11:52	WG1365104

Sample Narrative:
L1149851-05 WG1365104: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	18400		51.9	1000	1	10/16/2019 00:23	WG1363086
Nitrate	1580		22.7	100	1	10/16/2019 00:23	WG1363086
Sulfate	87800		77.4	5000	1	10/16/2019 00:23	WG1363086

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	1920	B	102	1000	1	10/17/2019 05:16	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	173		15.0	100	1	10/21/2019 11:58	WG1364629
Manganese	129		0.250	5.00	1	10/21/2019 11:58	WG1364629

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/18/2019 05:48	WG1364938
(S) a,a,a-Trifluorotoluene(FID)	*109*			*78.0-120*		*10/18/2019 05:48*	WG1364938

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	U		0.287	0.678	1	10/17/2019 11:11	WG1364418
Ethane	U		0.296	1.29	1	10/17/2019 11:11	WG1364418
Ethene	U		0.422	1.27	1	10/17/2019 11:11	WG1364418

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/21/2019 13:02	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 13:02	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 13:02	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 13:02	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 13:02	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 13:02	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 13:02	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 13:02	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 13:02	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 13:02	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 13:02	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 13:02	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 13:02	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/21/2019 13:02	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 13:02	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 13:02	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 13:02	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 13:02	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 13:02	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 13:02	WG1366365
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 13:02	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 13:02	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 13:02	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 13:02	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 13:02	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 13:02	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 13:02	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 13:02	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 13:02	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 13:02	WG1366365
cis-1,2-Dichloroethene	1.40		0.0933	0.500	1	10/23/2019 02:50	WG1367719
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 13:02	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 13:02	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 13:02	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 13:02	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 13:02	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 13:02	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 13:02	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 13:02	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 13:02	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 13:02	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 13:02	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 13:02	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 13:02	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 13:02	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 13:02	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 13:02	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 13:02	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 13:02	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 13:02	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 13:02	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 13:02	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 13:02	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 13:02	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 13:02	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 13:02	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 13:02	WG1366365
Tetrachloroethene	4.99		0.199	0.500	1	10/21/2019 13:02	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 13:02	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 13:02	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 13:02	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 13:02	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 13:02	WG1366365
Trichloroethene	0.445	J	0.153	0.500	1	10/21/2019 13:02	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 13:02	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 13:02	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 13:02	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 13:02	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 13:02	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 13:02	WG1366365
Vinyl chloride	U		0.118	0.500	1	10/23/2019 02:50	WG1367719
Xylenes, Total	U		0.316	1.50	1	10/21/2019 13:02	WG1366365
(S) Toluene-d8	*95.1*			*80.0-120*		*10/21/2019 13:02*	WG1366365
(S) Toluene-d8	*97.5*			*80.0-120*		*10/23/2019 02:50*	WG1367719
(S) 4-Bromofluorobenzene	*91.0*			*77.0-126*		*10/21/2019 13:02*	WG1366365
(S) 4-Bromofluorobenzene	*105*			*77.0-126*		*10/23/2019 02:50*	WG1367719
(S) 1,2-Dichloroethane-d4	*83.6*			*70.0-130*		*10/21/2019 13:02*	WG1366365
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/23/2019 02:50*	WG1367719

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	182000		2710	20000	1	10/18/2019 11:59	WG1365104

Sample Narrative:

L1149851-06 WG1365104: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	7800		51.9	1000	1	10/15/2019 16:07	WG1363090
Nitrate	58.4	J	22.7	100	1	10/15/2019 16:07	WG1363090
Sulfate	5820		77.4	5000	1	10/15/2019 16:07	WG1363090

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	1190	B	102	1000	1	10/17/2019 05:34	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	348		15.0	100	1	10/21/2019 12:02	WG1364629
Manganese	212		0.250	5.00	1	10/21/2019 12:02	WG1364629

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	U		0.287	0.678	1	10/17/2019 11:14	WG1364418
Ethane	U		0.296	1.29	1	10/17/2019 11:14	WG1364418
Ethene	U		0.422	1.27	1	10/17/2019 11:14	WG1364418

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	U	J0	1.05	25.0	1	10/21/2019 13:22	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 13:22	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 13:22	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 13:22	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 13:22	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 13:22	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 13:22	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 13:22	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 13:22	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 13:22	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 13:22	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 13:22	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 13:22	WG1366365
Chlorobenzene	U		0.140	0.500	1	10/21/2019 13:22	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 13:22	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 13:22	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 13:22	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 13:22	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 13:22	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 13:22	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 13:22	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 13:22	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 13:22	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 13:22	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 13:22	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 13:22	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 13:22	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 13:22	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 13:22	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 13:22	WG1366365
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/23/2019 03:11	WG1367719
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 13:22	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 13:22	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 13:22	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 13:22	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 13:22	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 13:22	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 13:22	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 13:22	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 13:22	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 13:22	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 13:22	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 13:22	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 13:22	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 13:22	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 13:22	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 13:22	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 13:22	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 13:22	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 13:22	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 13:22	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 13:22	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 13:22	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 13:22	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 13:22	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 13:22	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 13:22	WG1366365
Tetrachloroethene	0.223	J	0.199	0.500	1	10/21/2019 13:22	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 13:22	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 13:22	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 13:22	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 13:22	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 13:22	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 13:22	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 13:22	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 13:22	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 13:22	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 13:22	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 13:22	WG1366365
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 13:22	WG1366365
Vinyl chloride	U		0.118	0.500	1	10/23/2019 03:11	WG1367719
Xylenes, Total	U		0.316	1.50	1	10/21/2019 13:22	WG1366365
(S) Toluene-d8	*99.6*			*80.0-120*		*10/21/2019 13:22*	WG1366365
(S) Toluene-d8	*95.7*			*80.0-120*		*10/23/2019 03:11*	WG1367719
(S) 4-Bromofluorobenzene	*93.7*			*77.0-126*		*10/21/2019 13:22*	WG1366365
(S) 4-Bromofluorobenzene	*108*			*77.0-126*		*10/23/2019 03:11*	WG1367719

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*83.3*			*70.0-130*		*10/21/2019 13:22*	WG1366365
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*		*10/23/2019 03:11*	WG1367719

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	222000		2710	20000	1	10/18/2019 12:06	WG1365104

Sample Narrative:

L1149851-07 WG1365104: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	29100		51.9	1000	1	10/15/2019 16:33	WG1363090
Nitrate	U		22.7	100	1	10/15/2019 16:33	WG1363090
Sulfate	7700		77.4	5000	1	10/15/2019 16:33	WG1363090

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	1970	B	102	1000	1	10/17/2019 05:51	WG1364227

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	159		15.0	100	1	10/21/2019 12:05	WG1364629
Manganese	229		0.250	5.00	1	10/21/2019 12:05	WG1364629

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	324		0.287	0.678	1	10/17/2019 11:17	WG1364418
Ethane	20.9		0.296	1.29	1	10/17/2019 11:17	WG1364418
Ethene	20.1		0.422	1.27	1	10/17/2019 11:17	WG1364418

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	1.25	J J0	1.05	25.0	1	10/21/2019 13:41	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 13:41	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 13:41	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 13:41	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 13:41	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 13:41	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 13:41	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 13:41	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 13:41	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 13:41	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 13:41	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 13:41	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 13:41	WG1366365
Chlorobenzene	U		0.140	0.500	1	10/21/2019 13:41	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 13:41	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 13:41	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 13:41	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 13:41	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 13:41	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 13:41	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 13:41	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 13:41	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 13:41	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 13:41	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 13:41	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 13:41	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 13:41	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 13:41	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 13:41	WG1366365
1,1-Dichloroethene	U		0.188	0.500	1	10/21/2019 13:41	WG1366365
cis-1,2-Dichloroethene	0.413	J	0.0933	0.500	1	10/23/2019 03:31	WG1367719
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 13:41	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 13:41	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 13:41	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 13:41	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 13:41	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 13:41	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 13:41	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 13:41	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 13:41	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 13:41	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 13:41	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 13:41	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 13:41	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 13:41	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 13:41	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 13:41	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 13:41	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 13:41	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 13:41	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 13:41	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 13:41	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 13:41	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 13:41	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 13:41	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 13:41	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 13:41	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 13:41	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 13:41	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 13:41	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 13:41	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 13:41	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 13:41	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 13:41	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 13:41	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 13:41	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 13:41	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 13:41	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 13:41	WG1366365
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 13:41	WG1366365
Vinyl chloride	8.63		0.118	0.500	1	10/23/2019 03:31	WG1367719
Xylenes, Total	U		0.316	1.50	1	10/21/2019 13:41	WG1366365
(S) Toluene-d8	*97.1*			*80.0-120*		*10/21/2019 13:41*	WG1366365
(S) Toluene-d8	*94.2*			*80.0-120*		*10/23/2019 03:31*	WG1367719
(S) 4-Bromofluorobenzene	*90.6*			*77.0-126*		*10/21/2019 13:41*	WG1366365
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/23/2019 03:31*	WG1367719

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*81.7*			*70.0-130*		*10/21/2019 13:41*	WG1366365
(S) 1,2-Dichloroethane-d4	*108*			*70.0-130*		*10/23/2019 03:31*	WG1367719

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	339000		2710	20000	1	10/18/2019 12:13	WG1365104

Sample Narrative:
L1149851-08 WG1365104: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	23200		51.9	1000	1	10/15/2019 17:38	WG1363090
Nitrate	U		22.7	100	1	10/15/2019 17:38	WG1363090
Sulfate	28000		77.4	5000	1	10/15/2019 17:38	WG1363090

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	6700	B	510	5000	5	10/17/2019 16:35	WG1364260

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	9370		15.0	100	1	10/21/2019 12:09	WG1364629
Manganese	919		0.250	5.00	1	10/21/2019 12:09	WG1364629

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Gasoline Range Organics-NWTPH	513		31.6	100	1	10/18/2019 06:12	WG1364938
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/18/2019 06:12*	WG1364938

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	7830		2.87	6.78	10	10/18/2019 13:08	WG1365165
Ethane	2.94		0.296	1.29	1	10/17/2019 11:26	WG1364418
Ethene	457		0.422	1.27	1	10/17/2019 11:26	WG1364418

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	U	J0	1.05	25.0	1	10/21/2019 14:01	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 14:01	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 14:01	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 14:01	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 14:01	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 14:01	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 14:01	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 14:01	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 14:01	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 14:01	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 14:01	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 14:01	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 14:01	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/21/2019 14:01	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 14:01	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 14:01	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 14:01	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 14:01	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 14:01	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 14:01	WG1366365
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 14:01	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 14:01	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 14:01	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 14:01	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 14:01	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 14:01	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 14:01	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 14:01	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 14:01	WG1366365
1,1-Dichloroethene	1.92		0.188	0.500	1	10/21/2019 14:01	WG1366365
cis-1,2-Dichloroethene	597		2.33	12.5	25	10/23/2019 03:51	WG1367719
trans-1,2-Dichloroethene	2.91		0.152	0.500	1	10/21/2019 14:01	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 14:01	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 14:01	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 14:01	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 14:01	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 14:01	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 14:01	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 14:01	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 14:01	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 14:01	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 14:01	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 14:01	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 14:01	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 14:01	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 14:01	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 14:01	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 14:01	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 14:01	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 14:01	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 14:01	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 14:01	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 14:01	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 14:01	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 14:01	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 14:01	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 14:01	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 14:01	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 14:01	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 14:01	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 14:01	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 14:01	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 14:01	WG1366365
Trichloroethene	3.38		0.153	0.500	1	10/21/2019 14:01	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 14:01	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 14:01	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 14:01	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 14:01	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 14:01	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 14:01	WG1366365
Vinyl chloride	1410		2.95	12.5	25	10/23/2019 03:51	WG1367719
Xylenes, Total	U		0.316	1.50	1	10/21/2019 14:01	WG1366365
(S) Toluene-d8	*98.9*			*80.0-120*		*10/21/2019 14:01*	WG1366365
(S) Toluene-d8	*96.4*			*80.0-120*		*10/23/2019 03:51*	WG1367719
(S) 4-Bromofluorobenzene	*95.6*			*77.0-126*		*10/21/2019 14:01*	WG1366365
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/23/2019 03:51*	WG1367719
(S) 1,2-Dichloroethane-d4	*81.8*			*70.0-130*		*10/21/2019 14:01*	WG1366365
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*		*10/23/2019 03:51*	WG1367719

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	289000		2710	20000	1	10/18/2019 12:20	WG1365104

Sample Narrative:

L1149851-09 WG1365104: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	26000		51.9	1000	1	10/15/2019 17:51	WG1363090
Nitrate	U		22.7	100	1	10/15/2019 17:51	WG1363090
Sulfate	14400		77.4	5000	1	10/15/2019 17:51	WG1363090

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	1280	B	102	1000	1	10/17/2019 16:53	WG1364260

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	1390		15.0	100	1	10/21/2019 12:13	WG1364629
Manganese	737		0.250	5.00	1	10/21/2019 12:13	WG1364629

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	54.7	B J	31.6	100	1	10/23/2019 02:14	WG1367521
(S) a,a,a-Trifluorotoluene(FID)	*103*			*78.0-120*		*10/23/2019 02:14*	WG1367521

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	226		0.287	0.678	1	10/17/2019 13:20	WG1364418
Ethane	U		0.296	1.29	1	10/17/2019 13:20	WG1364418
Ethene	U		0.422	1.27	1	10/17/2019 13:20	WG1364418

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/21/2019 14:21	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 14:21	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 14:21	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 14:21	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 14:21	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 14:21	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 14:21	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 14:21	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 14:21	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 14:21	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 14:21	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 14:21	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 14:21	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/21/2019 14:21	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 14:21	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 14:21	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 14:21	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 14:21	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 14:21	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 14:21	WG1366365
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 14:21	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 14:21	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 14:21	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 14:21	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 14:21	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 14:21	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 14:21	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 14:21	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 14:21	WG1366365
1,1-Dichloroethene	0.451	J	0.188	0.500	1	10/21/2019 14:21	WG1366365
cis-1,2-Dichloroethene	1.30		0.0933	0.500	1	10/23/2019 04:11	WG1367719
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/21/2019 14:21	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 14:21	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 14:21	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 14:21	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 14:21	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 14:21	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 14:21	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 14:21	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 14:21	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 14:21	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 14:21	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 14:21	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 14:21	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 14:21	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 14:21	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 14:21	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 14:21	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 14:21	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 14:21	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 14:21	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 14:21	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 14:21	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 14:21	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 14:21	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 14:21	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 14:21	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 14:21	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 14:21	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 14:21	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 14:21	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 14:21	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 14:21	WG1366365
Trichloroethene	0.978		0.153	0.500	1	10/21/2019 14:21	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 14:21	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 14:21	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 14:21	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 14:21	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 14:21	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 14:21	WG1366365
Vinyl chloride	U		0.118	0.500	1	10/23/2019 04:11	WG1367719
Xylenes, Total	U		0.316	1.50	1	10/21/2019 14:21	WG1366365
(S) Toluene-d8	*97.1*			*80.0-120*		*10/21/2019 14:21*	WG1366365
(S) Toluene-d8	*94.4*			*80.0-120*		*10/23/2019 04:11*	WG1367719
(S) 4-Bromofluorobenzene	*90.8*			*77.0-126*		*10/21/2019 14:21*	WG1366365
(S) 4-Bromofluorobenzene	*104*			*77.0-126*		*10/23/2019 04:11*	WG1367719
(S) 1,2-Dichloroethane-d4	*80.7*			*70.0-130*		*10/21/2019 14:21*	WG1366365
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/23/2019 04:11*	WG1367719

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	302000		2710	20000	1	10/18/2019 12:27	WG1365104

Sample Narrative:

L1149851-10 WG1365104: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	27400		51.9	1000	1	10/15/2019 18:04	WG1363090
Nitrate	U		22.7	100	1	10/15/2019 18:04	WG1363090
Sulfate	25000		77.4	5000	1	10/15/2019 18:04	WG1363090

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	1550	B	102	1000	1	10/17/2019 17:20	WG1364260

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	948		15.0	100	1	10/21/2019 12:16	WG1364629
Manganese	870		0.250	5.00	1	10/21/2019 12:16	WG1364629

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	166		0.287	0.678	1	10/17/2019 13:23	WG1364418
Ethane	17.7		0.296	1.29	1	10/17/2019 13:23	WG1364418
Ethene	13.8		0.422	1.27	1	10/17/2019 13:23	WG1364418

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	U	J0	1.05	25.0	1	10/21/2019 14:40	WG1366365
Acrylonitrile	U	J0	0.873	5.00	1	10/21/2019 14:40	WG1366365
Benzene	U		0.0896	0.500	1	10/21/2019 14:40	WG1366365
Bromobenzene	U		0.133	0.500	1	10/21/2019 14:40	WG1366365
Bromodichloromethane	U		0.0800	0.500	1	10/21/2019 14:40	WG1366365
Bromochloromethane	U		0.145	0.500	1	10/21/2019 14:40	WG1366365
Bromoform	U		0.186	0.500	1	10/21/2019 14:40	WG1366365
Bromomethane	U	J0	0.157	2.50	1	10/21/2019 14:40	WG1366365
n-Butylbenzene	U		0.143	0.500	1	10/21/2019 14:40	WG1366365
sec-Butylbenzene	U		0.134	0.500	1	10/21/2019 14:40	WG1366365
tert-Butylbenzene	U		0.183	0.500	1	10/21/2019 14:40	WG1366365
Carbon disulfide	U		0.101	0.500	1	10/21/2019 14:40	WG1366365
Carbon tetrachloride	U		0.159	0.500	1	10/21/2019 14:40	WG1366365
Chlorobenzene	U		0.140	0.500	1	10/21/2019 14:40	WG1366365
Chlorodibromomethane	U		0.128	0.500	1	10/21/2019 14:40	WG1366365
Chloroethane	U		0.141	2.50	1	10/21/2019 14:40	WG1366365
Chloroform	U		0.0860	0.500	1	10/21/2019 14:40	WG1366365
Chloromethane	U		0.153	1.25	1	10/21/2019 14:40	WG1366365
2-Chlorotoluene	U		0.111	0.500	1	10/21/2019 14:40	WG1366365
4-Chlorotoluene	U		0.0972	0.500	1	10/21/2019 14:40	WG1366365

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/21/2019 14:40	WG1366365
1,2-Dibromoethane	U		0.193	0.500	1	10/21/2019 14:40	WG1366365
Dibromomethane	U		0.117	0.500	1	10/21/2019 14:40	WG1366365
1,2-Dichlorobenzene	U		0.101	0.500	1	10/21/2019 14:40	WG1366365
1,3-Dichlorobenzene	U		0.130	0.500	1	10/21/2019 14:40	WG1366365
1,4-Dichlorobenzene	U		0.121	0.500	1	10/21/2019 14:40	WG1366365
Dichlorodifluoromethane	U		0.127	2.50	1	10/21/2019 14:40	WG1366365
1,1-Dichloroethane	U		0.114	0.500	1	10/21/2019 14:40	WG1366365
1,2-Dichloroethane	U		0.108	0.500	1	10/21/2019 14:40	WG1366365
1,1-Dichloroethene	1.08		0.188	0.500	1	10/21/2019 14:40	WG1366365
cis-1,2-Dichloroethene	91.7		0.0933	0.500	1	10/21/2019 14:40	WG1366365
trans-1,2-Dichloroethene	0.158	J	0.152	0.500	1	10/21/2019 14:40	WG1366365
1,2-Dichloropropane	U		0.190	0.500	1	10/21/2019 14:40	WG1366365
1,1-Dichloropropene	U		0.128	0.500	1	10/21/2019 14:40	WG1366365
1,3-Dichloropropane	U		0.147	1.00	1	10/21/2019 14:40	WG1366365
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/21/2019 14:40	WG1366365
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/21/2019 14:40	WG1366365
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/21/2019 14:40	WG1366365
2,2-Dichloropropane	U		0.0929	0.500	1	10/21/2019 14:40	WG1366365
Di-isopropyl ether	U		0.0924	0.500	1	10/21/2019 14:40	WG1366365
Ethylbenzene	U		0.158	0.500	1	10/21/2019 14:40	WG1366365
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/21/2019 14:40	WG1366365
2-Hexanone	U	J0	0.757	5.00	1	10/21/2019 14:40	WG1366365
n-Hexane	U		0.305	5.00	1	10/21/2019 14:40	WG1366365
Iodomethane	U	J0	0.377	10.0	1	10/21/2019 14:40	WG1366365
Isopropylbenzene	U		0.126	0.500	1	10/21/2019 14:40	WG1366365
p-Isopropyltoluene	U		0.138	0.500	1	10/21/2019 14:40	WG1366365
2-Butanone (MEK)	U	J0	1.28	5.00	1	10/21/2019 14:40	WG1366365
Methylene Chloride	U		1.07	2.50	1	10/21/2019 14:40	WG1366365
4-Methyl-2-pentanone (MIBK)	U	J0	0.823	5.00	1	10/21/2019 14:40	WG1366365
Methyl tert-butyl ether	U		0.102	0.500	1	10/21/2019 14:40	WG1366365
Naphthalene	U	J0	0.174	2.50	1	10/21/2019 14:40	WG1366365
n-Propylbenzene	U		0.162	0.500	1	10/21/2019 14:40	WG1366365
Styrene	U		0.117	0.500	1	10/21/2019 14:40	WG1366365
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/21/2019 14:40	WG1366365
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/21/2019 14:40	WG1366365
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/21/2019 14:40	WG1366365
Tetrachloroethene	U		0.199	0.500	1	10/21/2019 14:40	WG1366365
Toluene	U		0.412	0.500	1	10/21/2019 14:40	WG1366365
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/21/2019 14:40	WG1366365
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/21/2019 14:40	WG1366365
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/21/2019 14:40	WG1366365
1,1,2-Trichloroethane	U		0.186	0.500	1	10/21/2019 14:40	WG1366365
Trichloroethene	U		0.153	0.500	1	10/21/2019 14:40	WG1366365
Trichlorofluoromethane	U		0.130	2.50	1	10/21/2019 14:40	WG1366365
1,2,3-Trichloropropane	U		0.247	2.50	1	10/21/2019 14:40	WG1366365
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/21/2019 14:40	WG1366365
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/21/2019 14:40	WG1366365
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/21/2019 14:40	WG1366365
Vinyl acetate	U	J0	0.645	5.00	1	10/21/2019 14:40	WG1366365
Vinyl chloride	51.8		0.118	0.500	1	10/21/2019 14:40	WG1366365
Xylenes, Total	U		0.316	1.50	1	10/21/2019 14:40	WG1366365
(S) Toluene-d8	*95.4*			*80.0-120*		*10/21/2019 14:40*	WG1366365
(S) 4-Bromofluorobenzene	*89.6*			*77.0-126*		*10/21/2019 14:40*	WG1366365
(S) 1,2-Dichloroethane-d4	*82.6*			*70.0-130*		*10/21/2019 14:40*	WG1366365

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/18/2019 01:02	WG1364938
(S) a,a,a-Trifluorotoluene(FID)	*108*			*78.0-120*		*10/18/2019 01:02*	WG1364938

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	1.29	J	1.05	25.0	1	10/25/2019 11:05	WG1369459
Acrylonitrile	U		0.873	5.00	1	10/24/2019 16:33	WG1368672
Benzene	U		0.0896	0.500	1	10/24/2019 16:33	WG1368672
Bromobenzene	U		0.133	0.500	1	10/24/2019 16:33	WG1368672
Bromodichloromethane	U		0.0800	0.500	1	10/24/2019 16:33	WG1368672
Bromochloromethane	U		0.145	0.500	1	10/24/2019 16:33	WG1368672
Bromoform	U		0.186	0.500	1	10/24/2019 16:33	WG1368672
Bromomethane	U		0.157	2.50	1	10/24/2019 16:33	WG1368672
n-Butylbenzene	U		0.143	0.500	1	10/24/2019 16:33	WG1368672
sec-Butylbenzene	U		0.134	0.500	1	10/24/2019 16:33	WG1368672
tert-Butylbenzene	U		0.183	0.500	1	10/24/2019 16:33	WG1368672
Carbon disulfide	U		0.101	0.500	1	10/24/2019 16:33	WG1368672
Carbon tetrachloride	U		0.159	0.500	1	10/24/2019 16:33	WG1368672
Chlorobenzene	U		0.140	0.500	1	10/24/2019 16:33	WG1368672
Chlorodibromomethane	U		0.128	0.500	1	10/24/2019 16:33	WG1368672
Chloroethane	U	J0	0.141	2.50	1	10/24/2019 16:33	WG1368672
Chloroform	U		0.0860	0.500	1	10/24/2019 16:33	WG1368672
Chloromethane	U		0.153	1.25	1	10/24/2019 16:33	WG1368672
2-Chlorotoluene	U		0.111	0.500	1	10/24/2019 16:33	WG1368672
4-Chlorotoluene	U		0.0972	0.500	1	10/24/2019 16:33	WG1368672
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/24/2019 16:33	WG1368672
1,2-Dibromoethane	U		0.193	0.500	1	10/24/2019 16:33	WG1368672
Dibromomethane	U		0.117	0.500	1	10/24/2019 16:33	WG1368672
1,2-Dichlorobenzene	U		0.101	0.500	1	10/24/2019 16:33	WG1368672
1,3-Dichlorobenzene	U		0.130	0.500	1	10/24/2019 16:33	WG1368672
1,4-Dichlorobenzene	U		0.121	0.500	1	10/24/2019 16:33	WG1368672
Dichlorodifluoromethane	U		0.127	2.50	1	10/24/2019 16:33	WG1368672
1,1-Dichloroethane	U		0.114	0.500	1	10/24/2019 16:33	WG1368672
1,2-Dichloroethane	U		0.108	0.500	1	10/24/2019 16:33	WG1368672
1,1-Dichloroethene	U		0.188	0.500	1	10/24/2019 16:33	WG1368672
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/24/2019 16:33	WG1368672
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/24/2019 16:33	WG1368672
1,2-Dichloropropane	U		0.190	0.500	1	10/24/2019 16:33	WG1368672
1,1-Dichloropropene	U		0.128	0.500	1	10/24/2019 16:33	WG1368672
1,3-Dichloropropane	U		0.147	1.00	1	10/24/2019 16:33	WG1368672
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/24/2019 16:33	WG1368672
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/24/2019 16:33	WG1368672
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/24/2019 16:33	WG1368672
2,2-Dichloropropane	U		0.0929	0.500	1	10/24/2019 16:33	WG1368672
Di-isopropyl ether	U		0.0924	0.500	1	10/24/2019 16:33	WG1368672
Ethylbenzene	U		0.158	0.500	1	10/24/2019 16:33	WG1368672
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/24/2019 16:33	WG1368672
2-Hexanone	U		0.757	5.00	1	10/24/2019 16:33	WG1368672
n-Hexane	U		0.305	5.00	1	10/24/2019 16:33	WG1368672
Iodomethane	U		0.377	10.0	1	10/24/2019 16:33	WG1368672
Isopropylbenzene	U		0.126	0.500	1	10/24/2019 16:33	WG1368672
p-Isopropyltoluene	U		0.138	0.500	1	10/24/2019 16:33	WG1368672
2-Butanone (MEK)	U		1.28	5.00	1	10/24/2019 16:33	WG1368672

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methylene Chloride	U		1.07	2.50	1	10/24/2019 16:33	WG1368672
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/24/2019 16:33	WG1368672
Methyl tert-butyl ether	U		0.102	0.500	1	10/24/2019 16:33	WG1368672
Naphthalene	U		0.174	2.50	1	10/24/2019 16:33	WG1368672
n-Propylbenzene	U		0.162	0.500	1	10/24/2019 16:33	WG1368672
Styrene	U		0.117	0.500	1	10/24/2019 16:33	WG1368672
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/24/2019 16:33	WG1368672
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/24/2019 16:33	WG1368672
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/24/2019 16:33	WG1368672
Tetrachloroethene	U		0.199	0.500	1	10/24/2019 16:33	WG1368672
Toluene	U		0.412	0.500	1	10/24/2019 16:33	WG1368672
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/24/2019 16:33	WG1368672
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/24/2019 16:33	WG1368672
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/24/2019 16:33	WG1368672
1,1,2-Trichloroethane	U		0.186	0.500	1	10/24/2019 16:33	WG1368672
Trichloroethene	U		0.153	0.500	1	10/24/2019 16:33	WG1368672
Trichlorofluoromethane	U		0.130	2.50	1	10/24/2019 16:33	WG1368672
1,2,3-Trichloropropane	U		0.247	2.50	1	10/24/2019 16:33	WG1368672
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/24/2019 16:33	WG1368672
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/24/2019 16:33	WG1368672
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/24/2019 16:33	WG1368672
Vinyl acetate	U	J4	0.645	5.00	1	10/24/2019 16:33	WG1368672
Vinyl chloride	U		0.118	0.500	1	10/24/2019 16:33	WG1368672
Xylenes, Total	U		0.316	1.50	1	10/24/2019 16:33	WG1368672
(S) Toluene-d8	*105*			*80.0-120*		*10/24/2019 16:33*	WG1368672
(S) Toluene-d8	*97.2*			*80.0-120*		*10/25/2019 11:05*	WG1369459
(S) 4-Bromofluorobenzene	*99.0*			*77.0-126*		*10/24/2019 16:33*	WG1368672
(S) 4-Bromofluorobenzene	*106*			*77.0-126*		*10/25/2019 11:05*	WG1369459
(S) 1,2-Dichloroethane-d4	*100*			*70.0-130*		*10/24/2019 16:33*	WG1368672
(S) 1,2-Dichloroethane-d4	*98.7*			*70.0-130*		*10/25/2019 11:05*	WG1369459

Method Blank (MB)

(MB) R3462708-1 10/18/19 10:07

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Alkalinity	3710	J	2710	20000

Sample Narrative:

BLANK: Endpoint pH 4.5

L1147295-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1147295-01 10/18/19 10:17 • (DUP) R3462708-2 10/18/19 10:27

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	168000	168000	1	0.177		20

Sample Narrative:

OS: Endpoint pH 4.5 HEADSPACE

DUP: Endpoint pH 4.5

L1149977-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1149977-02 10/18/19 12:40 • (DUP) R3462708-4 10/18/19 12:54

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	41000	40700	1	0.520		20

Sample Narrative:

OS: Endpoint pH 4.5 HEADSPACE

DUP: Endpoint pH 4.5

Laboratory Control Sample (LCS)

(LCS) R3462708-3 10/18/19 11:28

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Alkalinity	100000	99200	99.2	85.0-115	

Sample Narrative:

LCS: Endpoint pH 4.5

Method Blank (MB)

(MB) R3461441-1 10/15/19 14:23

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	U		51.9	1000
Nitrate	U		22.7	100
Sulfate	U		77.4	5000

L1149795-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1149795-01 10/15/19 16:27 • (DUP) R3461441-3 10/15/19 16:42

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	22700	22600	1	0.451		15
Nitrate	ND	0.000	1	0.000		15
Sulfate	56400	56500	1	0.179		15

L1149841-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1149841-01 10/15/19 22:13 • (DUP) R3461441-6 10/15/19 22:28

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	14000	13900	1	0.362		15
Nitrate	137	133	1	2.88		15
Sulfate	184000	184000	1	0.128	E	15

Laboratory Control Sample (LCS)

(LCS) R3461441-2 10/15/19 14:37

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	39400	98.5	80.0-120	
Nitrate	8000	8120	101	80.0-120	
Sulfate	40000	40700	102	80.0-120	

L1149811-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1149811-01 10/15/19 16:56 • (MS) R3461441-4 10/15/19 17:11 • (MSD) R3461441-5 10/15/19 17:25

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	236000	274000	275000	76.0	76.6	1	80.0-120	E V	E V	0.106	15
Nitrate	5000	1280	6260	6360	99.6	102	1	80.0-120			1.62	15
Sulfate	50000	15400	65900	65700	101	101	1	80.0-120			0.364	15

L1149851-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1149851-02 10/15/19 22:56 • (MS) R3461441-7 10/15/19 23:11

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	23300	72800	99.1	1	80.0-120	
Nitrate	5000	U	4920	98.3	1	80.0-120	
Sulfate	50000	20600	70400	99.6	1	80.0-120	

Method Blank (MB)

(MB) R3461431-1 10/15/19 09:38

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	61.6	J	51.9	1000
Nitrate	U		22.7	100
Sulfate	107	J	77.4	5000

L1149872-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1149872-02 10/15/19 15:14 • (DUP) R3461431-3 10/15/19 15:28

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	45800	46100	1	0.661		15
Nitrate	7420	7470	1	0.687		15
Sulfate	23000	23100	1	0.167		15

L1149851-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1149851-06 10/15/19 16:07 • (DUP) R3461431-5 10/15/19 16:20

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	7800	7500	1	3.90		15
Nitrate	58.4	55.7	1	4.73	J	15
Sulfate	5820	5840	1	0.295		15

Laboratory Control Sample (LCS)

(LCS) R3461431-2 10/15/19 09:51

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	38700	96.7	80.0-120	
Nitrate	8000	8030	100	80.0-120	
Sulfate	40000	38900	97.3	80.0-120	

L1149872-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1149872-02 10/15/19 15:14 • (MS) R3461431-4 10/15/19 15:41

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	45800	92500	93.3	1	80.0-120	
Nitrate	5000	7420	12000	91.3	1	80.0-120	E
Sulfate	50000	23000	71100	96.2	1	80.0-120	

L1149851-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1149851-07 10/15/19 16:33 • (MS) R3461431-6 10/15/19 17:12 • (MSD) R3461431-7 10/15/19 17:25

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	29100	76400	76200	94.7	94.1	1	80.0-120			0.345	15
Nitrate	5000	U	4960	4970	99.3	99.4	1	80.0-120			0.111	15
Sulfate	50000	7700	56500	56100	97.5	96.9	1	80.0-120			0.571	15

Method Blank (MB)

(MB) R3462022-1 10/16/19 18:09

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
TOC (Total Organic Carbon)	416	J	102	1000

L1149387-08 Original Sample (OS) • Duplicate (DUP)

(OS) L1149387-08 10/16/19 21:34 • (DUP) R3462022-3 10/16/19 21:57

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC	6970	7050	1	1.08		20

L1149591-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1149591-06 10/17/19 08:46 • (DUP) R3462022-9 10/17/19 09:03

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC	489	421	1	15.1	J	20

Laboratory Control Sample (LCS)

(LCS) R3462022-2 10/16/19 18:52

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TOC	75000	69000	92.0	85.0-115	

L1149591-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1149591-04 10/17/19 00:20 • (MS) R3462022-4 10/17/19 00:42 • (MSD) R3462022-5 10/17/19 01:04

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC	50000	5870	53200	54900	94.7	98.1	1	80.0-120			3.11	20

L1149851-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1149851-03 10/17/19 03:58 • (MS) R3462022-7 10/17/19 04:19 • (MSD) R3462022-8 10/17/19 04:40

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC	50000	2950	50000	49700	94.1	93.5	1	80.0-120			0.542	20

Method Blank (MB)

(MB) R3462318-1 10/17/19 14:53

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
TOC (Total Organic Carbon)	422	J	102	1000

L1150179-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1150179-01 10/17/19 17:59 • (DUP) R3462318-3 10/17/19 18:20

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC	1500	1460	1	2.78		20

L1150179-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1150179-07 10/17/19 22:20 • (DUP) R3462318-6 10/17/19 22:46

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC	130000	127000	5	2.26		20

Laboratory Control Sample (LCS)

(LCS) R3462318-2 10/17/19 15:36

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TOC	75000	69500	92.6	85.0-115	

L1150179-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150179-04 10/17/19 20:40 • (MS) R3462318-4 10/17/19 21:01 • (MSD) R3462318-5 10/17/19 21:22

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC	50000	ND	47200	48700	93.1	96.1	1	80.0-120			3.17	20

L1150234-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150234-01 10/18/19 01:16 • (MS) R3462318-7 10/18/19 01:39 • (MSD) R3462318-8 10/18/19 02:01

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC	50000	7380	55600	55000	96.4	95.2	1	80.0-120			1.01	20

Method Blank (MB)

(MB) R3463127-1 10/21/19 10:59

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Iron	U		15.0	100
Manganese	0.540	J	0.250	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3463127-2 10/21/19 11:03 • (LCSD) R3463127-3 10/21/19 11:07

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Iron	5000	5110	5090	102	102	80.0-120			0.334	20
Manganese	50.0	50.9	50.0	102	100	80.0-120			1.71	20

L1149851-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1149851-01 10/21/19 11:10 • (MS) R3463127-5 10/21/19 11:18 • (MSD) R3463127-6 10/21/19 11:21

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Iron	5000	1850	7050	6940	104	102	1	75.0-125			1.61	20

Method Blank (MB)

(MB) R3463331-2 10/18/19 00:25

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Gasoline Range Organics-NWTPH	U		31.6	100
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*

Laboratory Control Sample (LCS)

(LCS) R3463331-1 10/17/19 23:14

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Gasoline Range Organics-NWTPH	5500	5340	97.1	70.0-124	
(S) a,a,a-Trifluorotoluene(FID)			*83.7*	*78.0-120*	

Method Blank (MB)

(MB) R3464239-3 10/23/19 01:29

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Gasoline Range Organics-NWTPH	62.3	J	31.6	100
(S) a,a,a-Trifluorotoluene(FID)	*104*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3464239-1 10/23/19 00:19 • (LCSD) R3464239-2 10/23/19 00:41

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Gasoline Range Organics-NWTPH	5500	6540	6030	119	110	70.0-124			8.11	20
(S) a,a,a-Trifluorotoluene(FID)				*107*	*106*	*78.0-120*				

Method Blank (MB)

(MB) R3461591-1 10/16/19 10:37

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1149371-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1149371-06 10/16/19 11:29 • (DUP) R3461591-2 10/16/19 12:00

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	1080	1130	1	4.95		20
Ethane	ND	0.000	1	0.000		20
Ethene	ND	0.000	1	0.000		20

L1149387-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1149387-04 10/16/19 13:29 • (DUP) R3461591-3 10/16/19 13:32

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	12.3	12.9	1	4.67		20
Ethane	U	0.000	1	0.000		20
Ethene	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3461591-4 10/16/19 13:35 • (LCSD) R3461591-5 10/16/19 13:39

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	75.3	76.3	111	112	85.0-115			1.34	20
Ethane	129	133	129	103	100	85.0-115			2.40	20
Ethene	127	138	135	109	106	85.0-115			2.67	20

Method Blank (MB)

(MB) R3462073-1 10/17/19 10:48

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1149851-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1149851-07 10/17/19 11:17 • (DUP) R3462073-2 10/17/19 13:16

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	324	319	1	1.78		20
Ethane	20.9	19.8	1	5.28		20
Ethene	20.1	19.4	1	3.31		20

L1150060-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1150060-01 10/17/19 13:25 • (DUP) R3462073-3 10/17/19 13:56

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	1720	1730	1	0.724		20
Ethane	97.1	98.5	1	1.46		20
Ethene	197	199	1	1.02		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3462073-4 10/17/19 14:02 • (LCSD) R3462073-5 10/17/19 14:06

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	70.5	71.5	104	106	85.0-115			1.46	20
Ethane	129	127	128	98.6	98.9	85.0-115			0.256	20
Ethene	127	133	133	104	105	85.0-115			0.285	20

Method Blank (MB)

(MB) R3462507-1 10/18/19 13:05

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678

L1150336-08 Original Sample (OS) • Duplicate (DUP)

(OS) L1150336-08 10/18/19 13:10 • (DUP) R3462507-2 10/18/19 13:33

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	20.2	22.0	1	8.39		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3462507-5 10/18/19 13:50 • (LCSD) R3462507-6 10/18/19 13:56

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	72.3	71.6	107	106	85.0-115			0.913	20

L1150339-10 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150339-10 10/18/19 13:42 • (MS) R3462507-3 10/18/19 13:45 • (MSD) R3462507-4 10/18/19 13:47

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	ug/l	%	%		%			%	%
Methane	67.8	10400	10600	11000	19.7	74.1	10	85.0-115	V	V	3.43	20

Method Blank (MB)

(MB) R3463753-2 10/21/19 08:08

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3463753-2 10/21/19 08:08

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*98.9*			*80.0-120*
(S) 4-Bromofluorobenzene	*92.7*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*83.6*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3463753-1 10/21/19 06:49

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	88.2	70.6	19.0-160	
Acrylonitrile	125	94.1	75.3	55.0-149	
Benzene	25.0	22.6	90.4	70.0-123	
Bromobenzene	25.0	24.4	97.6	73.0-121	
Bromodichloromethane	25.0	22.1	88.4	75.0-120	
Bromochloromethane	25.0	24.0	96.0	76.0-122	
Bromoform	25.0	22.6	90.4	68.0-132	
Bromomethane	25.0	19.1	76.4	10.0-160	
n-Butylbenzene	25.0	26.5	106	73.0-125	
sec-Butylbenzene	25.0	25.4	102	75.0-125	
tert-Butylbenzene	25.0	24.3	97.2	76.0-124	
Carbon disulfide	25.0	22.4	89.6	61.0-128	
Carbon tetrachloride	25.0	21.3	85.2	68.0-126	
Chlorobenzene	25.0	24.3	97.2	80.0-121	
Chlorodibromomethane	25.0	23.7	94.8	77.0-125	
Chloroethane	25.0	23.4	93.6	47.0-150	
Chloroform	25.0	22.0	88.0	73.0-120	
Chloromethane	25.0	20.1	80.4	41.0-142	
2-Chlorotoluene	25.0	24.2	96.8	76.0-123	
4-Chlorotoluene	25.0	23.4	93.6	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	20.3	81.2	58.0-134	
1,2-Dibromoethane	25.0	23.5	94.0	80.0-122	
Dibromomethane	25.0	22.3	89.2	80.0-120	
1,2-Dichlorobenzene	25.0	26.3	105	79.0-121	
1,3-Dichlorobenzene	25.0	26.7	107	79.0-120	
1,4-Dichlorobenzene	25.0	26.5	106	79.0-120	
Dichlorodifluoromethane	25.0	25.4	102	51.0-149	
1,1-Dichloroethane	25.0	21.3	85.2	70.0-126	
1,2-Dichloroethane	25.0	20.1	80.4	70.0-128	
1,1-Dichloroethene	25.0	25.6	102	71.0-124	
cis-1,2-Dichloroethene	25.0	24.1	96.4	73.0-120	
trans-1,2-Dichloroethene	25.0	23.2	92.8	73.0-120	
1,2-Dichloropropane	25.0	21.0	84.0	77.0-125	
1,1-Dichloropropene	25.0	23.7	94.8	74.0-126	
1,3-Dichloropropane	25.0	24.3	97.2	80.0-120	
cis-1,3-Dichloropropene	25.0	22.0	88.0	80.0-123	
trans-1,3-Dichloropropene	25.0	22.8	91.2	78.0-124	
trans-1,4-Dichloro-2-butene	25.0	14.8	59.2	33.0-144	
2,2-Dichloropropane	25.0	20.1	80.4	58.0-130	
Di-isopropyl ether	25.0	20.6	82.4	58.0-138	

Laboratory Control Sample (LCS)

(LCS) R3463753-1 10/21/19 06:49

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	23.6	94.4	79.0-123	
Hexachloro-1,3-butadiene	25.0	33.8	135	54.0-138	
2-Hexanone	125	98.0	78.4	67.0-149	
n-Hexane	25.0	20.8	83.2	57.0-133	
Iodomethane	125	98.7	79.0	33.0-147	
Isopropylbenzene	25.0	22.2	88.8	76.0-127	
p-Isopropyltoluene	25.0	26.5	106	76.0-125	
2-Butanone (MEK)	125	81.5	65.2	44.0-160	
Methylene Chloride	25.0	22.7	90.8	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	87.8	70.2	68.0-142	
Methyl tert-butyl ether	25.0	20.5	82.0	68.0-125	
Naphthalene	25.0	19.2	76.8	54.0-135	
n-Propylbenzene	25.0	22.8	91.2	77.0-124	
Styrene	25.0	24.4	97.6	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	23.8	95.2	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	20.3	81.2	65.0-130	
1,1,2-Trichlorotrifluoroethane	25.0	23.1	92.4	69.0-132	
Tetrachloroethene	25.0	25.2	101	72.0-132	
Toluene	25.0	23.7	94.8	79.0-120	
1,2,3-Trichlorobenzene	25.0	26.4	106	50.0-138	
1,2,4-Trichlorobenzene	25.0	28.9	116	57.0-137	
1,1,1-Trichloroethane	25.0	20.9	83.6	73.0-124	
1,1,2-Trichloroethane	25.0	23.4	93.6	80.0-120	
Trichloroethene	25.0	23.0	92.0	78.0-124	
Trichlorofluoromethane	25.0	25.7	103	59.0-147	
1,2,3-Trichloropropane	25.0	21.3	85.2	73.0-130	
1,2,4-Trimethylbenzene	25.0	24.0	96.0	76.0-121	
1,2,3-Trimethylbenzene	25.0	24.5	98.0	77.0-120	
1,3,5-Trimethylbenzene	25.0	23.3	93.2	76.0-122	
Vinyl acetate	125	92.6	74.1	11.0-160	
Vinyl chloride	25.0	25.2	101	67.0-131	
Xylenes, Total	75.0	71.6	95.5	79.0-123	
(S) Toluene-d8			*98.4*	*80.0-120*	
(S) 4-Bromofluorobenzene			*96.6*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*81.0*	*70.0-130*	

Method Blank (MB)

(MB) R3464659-2 10/23/19 00:07

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
cis-1,2-Dichloroethene	U		0.0933	0.500
Vinyl chloride	U		0.118	0.500
(S) Toluene-d8	*95.1*			*80.0-120*
(S) 4-Bromofluorobenzene	*102*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*101*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3464659-1 10/22/19 23:26

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
cis-1,2-Dichloroethene	25.0	22.4	89.6	73.0-120	
Vinyl chloride	25.0	24.8	99.2	67.0-131	
(S) Toluene-d8			*95.6*	*80.0-120*	
(S) 4-Bromofluorobenzene			*109*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*105*	*70.0-130*	

Method Blank (MB)

(MB) R3464761-2 10/24/19 10:35

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500
Ethylbenzene	U		0.158	0.500

Method Blank (MB)

(MB) R3464761-2 10/24/19 10:35

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	0.232	J	0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	0.162	J	0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*107*			*80.0-120*
(S) 4-Bromofluorobenzene	*101*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*95.5*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3464761-1 10/24/19 09:38

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acrylonitrile	125	94.6	75.7	55.0-149	
Benzene	25.0	22.2	88.8	70.0-123	
Bromobenzene	25.0	24.4	97.6	73.0-121	
Bromodichloromethane	25.0	25.0	100	75.0-120	
Bromochloromethane	25.0	22.9	91.6	76.0-122	
Bromoform	25.0	25.9	104	68.0-132	
Bromomethane	25.0	22.3	89.2	10.0-160	
n-Butylbenzene	25.0	23.1	92.4	73.0-125	
sec-Butylbenzene	25.0	23.2	92.8	75.0-125	
tert-Butylbenzene	25.0	24.8	99.2	76.0-124	
Carbon disulfide	25.0	23.5	94.0	61.0-128	
Carbon tetrachloride	25.0	26.1	104	68.0-126	
Chlorobenzene	25.0	22.9	91.6	80.0-121	
Chlorodibromomethane	25.0	24.8	99.2	77.0-125	
Chloroethane	25.0	20.3	81.2	47.0-150	
Chloroform	25.0	24.2	96.8	73.0-120	
Chloromethane	25.0	24.0	96.0	41.0-142	
2-Chlorotoluene	25.0	26.0	104	76.0-123	
4-Chlorotoluene	25.0	25.9	104	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	24.2	96.8	58.0-134	
1,2-Dibromoethane	25.0	23.0	92.0	80.0-122	
Dibromomethane	25.0	22.1	88.4	80.0-120	
1,2-Dichlorobenzene	25.0	22.7	90.8	79.0-121	
1,3-Dichlorobenzene	25.0	22.4	89.6	79.0-120	
1,4-Dichlorobenzene	25.0	22.8	91.2	79.0-120	
Dichlorodifluoromethane	25.0	29.0	116	51.0-149	
1,1-Dichloroethane	25.0	23.6	94.4	70.0-126	
1,2-Dichloroethane	25.0	22.1	88.4	70.0-128	
1,1-Dichloroethene	25.0	24.2	96.8	71.0-124	
cis-1,2-Dichloroethene	25.0	23.9	95.6	73.0-120	
trans-1,2-Dichloroethene	25.0	23.4	93.6	73.0-120	
1,2-Dichloropropane	25.0	23.4	93.6	77.0-125	
1,1-Dichloropropene	25.0	24.8	99.2	74.0-126	
1,3-Dichloropropane	25.0	22.7	90.8	80.0-120	
cis-1,3-Dichloropropene	25.0	24.9	99.6	80.0-123	
trans-1,3-Dichloropropene	25.0	24.2	96.8	78.0-124	
trans-1,4-Dichloro-2-butene	25.0	22.4	89.6	33.0-144	
2,2-Dichloropropane	25.0	31.6	126	58.0-130	
Di-isopropyl ether	25.0	23.2	92.8	58.0-138	
Ethylbenzene	25.0	22.5	90.0	79.0-123	

Laboratory Control Sample (LCS)

(LCS) R3464761-1 10/24/19 09:38

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Hexachloro-1,3-butadiene	25.0	33.3	133	54.0-138	
2-Hexanone	125	114	91.2	67.0-149	
n-Hexane	25.0	32.0	128	57.0-133	
Iodomethane	125	125	100	33.0-147	
Isopropylbenzene	25.0	24.3	97.2	76.0-127	
p-Isopropyltoluene	25.0	23.4	93.6	76.0-125	
2-Butanone (MEK)	125	101	80.8	44.0-160	
Methylene Chloride	25.0	23.0	92.0	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	100	80.0	68.0-142	
Methyl tert-butyl ether	25.0	22.5	90.0	68.0-125	
Naphthalene	25.0	25.9	104	54.0-135	
n-Propylbenzene	25.0	25.7	103	77.0-124	
Styrene	25.0	23.4	93.6	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	23.9	95.6	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	25.4	102	65.0-130	
1,1,2-Trichlorotrifluoroethane	25.0	27.8	111	69.0-132	
Tetrachloroethene	25.0	26.8	107	72.0-132	
Toluene	25.0	22.5	90.0	79.0-120	
1,2,3-Trichlorobenzene	25.0	34.4	138	50.0-138	
1,2,4-Trichlorobenzene	25.0	31.2	125	57.0-137	
1,1,1-Trichloroethane	25.0	27.3	109	73.0-124	
1,1,2-Trichloroethane	25.0	22.8	91.2	80.0-120	
Trichloroethene	25.0	22.2	88.8	78.0-124	
Trichlorofluoromethane	25.0	28.2	113	59.0-147	
1,2,3-Trichloropropane	25.0	25.0	100	73.0-130	
1,2,4-Trimethylbenzene	25.0	23.4	93.6	76.0-121	
1,2,3-Trimethylbenzene	25.0	22.7	90.8	77.0-120	
1,3,5-Trimethylbenzene	25.0	26.7	107	76.0-122	
Vinyl acetate	125	228	182	11.0-160	J4
Vinyl chloride	25.0	20.7	82.8	67.0-131	
Xylenes, Total	75.0	69.5	92.7	79.0-123	
(S) Toluene-d8			*104*	*80.0-120*	
(S) 4-Bromofluorobenzene			*101*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*112*	*70.0-130*	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3465173-3 10/25/19 10:30

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Acetone	U		1.05	25.0
(S) Toluene-d8	*95.9*			*80.0-120*
(S) 4-Bromofluorobenzene	*104*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*97.9*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3465173-1 10/25/19 04:08 • (LCSD) R3465173-2 10/25/19 04:29

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Acetone	125	118	114	94.4	91.2	19.0-160			3.45	27
(S) Toluene-d8				*98.9*	*90.3*	*80.0-120*				
(S) 4-Bromofluorobenzene				*108*	*86.9*	*77.0-126*				
(S) 1,2-Dichloroethane-d4				*94.8*	*92.1*	*70.0-130*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J0	J0: The identification of the analyte is acceptable, but the reported concentration is an estimate. The calibration met method criteria.
J4	The associated batch QC was outside the established quality control range for accuracy.
V	The sample concentration is too high to evaluate accurate spike recoveries.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

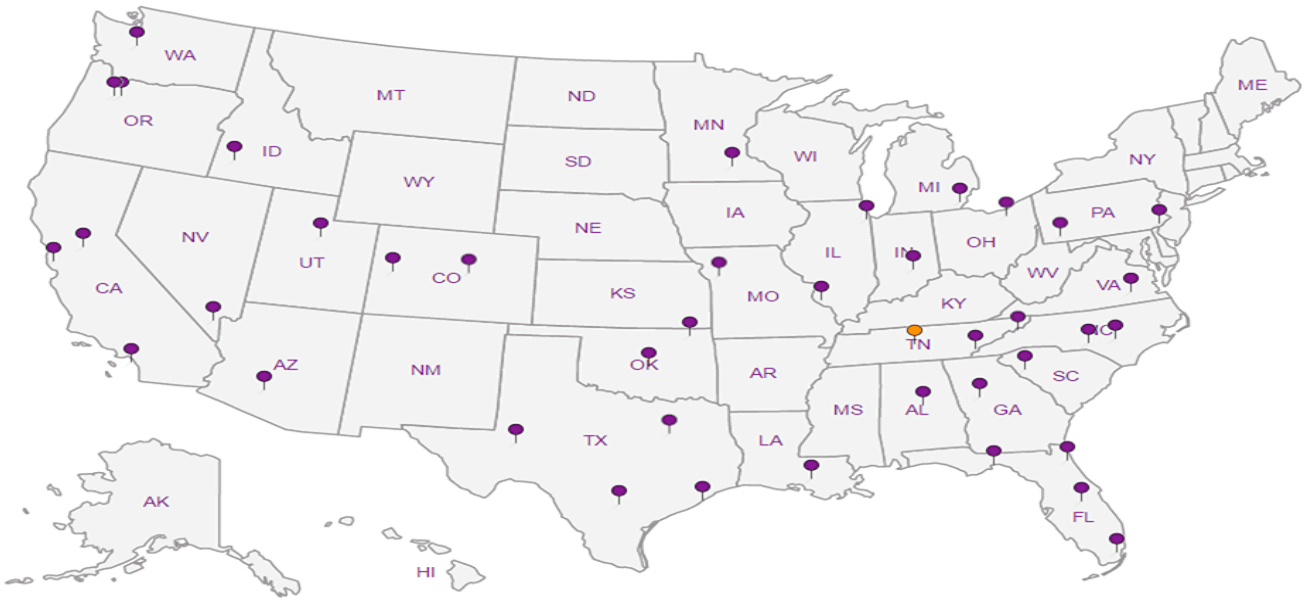
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



Chain of Custody Page 1 of 2

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# 1149851

E023

PES-Seattle	Billing Information: PES-Seattle
Report to: Bill Haldeman/Brian O'neal	Email To: on file
Project Description:	City/State Collected: Seattle, WA
Phone: on file Fax:	Client Project # 1413.001.02.501E
	Lab Project # PESENVSWA-ALP
Collected by (print): K. Ford/H. Coker/B. Haldeman	Site/Facility ID # AMERICAN LINEN
Collected by (signature):	P.O. #
Immediately Packed on Ice N ___ Y ___	Quote #

Rush? (Lab MUST Be Notified) Date Results Needed
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Acctnum: PESENVSWA
Template:
Prelogin:
TSR: Brian Ford
PB:
Shipped Via:

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	**NO3,SO4,Chloride**48 hour hold	NWTPHGX	VOCs (V8260LLC)	Total Fe Mn 6020	TOC	Alkalinity	EEM (RSK175LL)	Remarks	Sample # (lab only)
MW-190-101419	Grab	GW	83	10/14/19	0910	12	X	X	X	X	X	X	X		01
MW-146-101419		GW	43		1015	12	X	X	X	X	X	X	X		02
MW-309-101419		GW	67		1035	9	X	X	X	X	X	X	X		03
MW-189-101419		GW	53		1130	12	X	X	X	X	X	X	X		04
MW-154-101419		GW	32.5		1205	12	X	X	X	X	X	X	X		05
MW122-101419		GW	112		1205	9	X	X	X	X	X	X	X		06
MW111-101419		GW	75		1325	9	X	X	X	X	X	X	X		07
MW-147-101419		GW	75		1355	12	X	X	X	X	X	X	X		08
MW-161-101419		GW	125		1428	12	X	X	X	X	X	X	X		09
MW103-101419	↓	GW	108	↓	1455	9	X	X	X	X	X	X	X		10

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____
Flow _____ Other _____

Samples returned via:
__ UPS __ FedEx __ Courier _____

Tracking # 1203 5774 6562

Sample Receipt Checklist
COC Seal Present/Intact: __NP Y __N
COC Signed/Accurate: Y __N
Bottles arrive intact: Y __N
Correct bottles used: Y __N
Sufficient volume sent: Y __N
If Applicable
VOA Zero Headspace: __Y __N
Preservation Correct/Checked: Y __N
RAD SCREEN: <0.5 mR/hr

	Date:	Time:		
Relinquished by: (Signature)	10/14/19	1600	Received by: (Signature)	Trip Blank Received: Yes / No HCl / MeoH TBR
Relinquished by: (Signature)	Date:	Time:	Received by: (Signature)	Temp: °C 5.1+2=5.3 Bottles Received: 108
Relinquished by: (Signature)	Date:	Time:	Received for lab by: (Signature) Carol Kemp	Date: 10/15/19 Time: 8:45

If preservation required by Login: Date/Time

Hold: Condition: NCF / OK

Chain of Custody Page 2 of 2

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

PES-Seattle

Billing Information: PES-Seattle

Pres Chk

Report to: Bill Haldeman/Brian O'neal

Email To: on file

Project Description:

City/State Collected: Seattle, WA

Phone: on file
Fax:

Client Project # 1413.001.02.SOIE

Lab Project # PESENVSWA-ALP

Collected by (print): K. Zipp/H. Colvin/B. Hecht

Site/Facility ID # American Linen

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y ___

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Date Results Needed

Quote #

L# 149181

Table #

Acctnum: PESENVSWA

Template:

Prelogin:

TSR: Brian Ford

PB:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	**NO3,SO4,Chloride**48 hour hold	NWTPHGX	VOCs (V8260LLC)	Total Fe Mn 6020	TOC	Alkalinity	EEM (RSK175LL)	Remarks	Sample # (lab only)
TB-101419	—	GW	—	10-14-19	1530	1	X	X	X	X	X	X	X	Trip Blank	11
		GW													
		GW													
		GW													
		GW													
		GW													
		GW													
		GW													
		GW													
		GW													
		GW													

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____

Flow _____ Other _____

Samples returned via:
__ UPS __ FedEx __ Courier __ _____

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: NP Y N
COC Signed/Accurate: Y N
Bottles arrive intact: Y N
Correct bottles used: Y N
Sufficient volume sent: Y N
If Applicable
VOA Zero Headspace: Y N
Preservation Correct/Checked: Y N

RAD SCREEN: <0.5 mR/hr

	Date:	Time:		
Relinquished by : (Signature)	10/14/19	1600	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 5.1+.2=5.3 °C Bottles Received: 108
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/15/19 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / OK

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 29, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1150336
Samples Received:	10/16/2019
Project Number:	1413.001.02.501E
Description:	AMERICAN LINEN
Site:	AMERICAN LINEN
Report To:	Brian O'Neal/Bill Haldeman 1215 Fourth Ave., Suite 1350 Seattle, WA 98161

Entire Report Reviewed By:

Brian Ford

Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

Cp: Cover Page 1
Tc: Table of Contents 2
Ss: Sample Summary 3
Cn: Case Narrative 6
Sr: Sample Results 7
MW-917-101519 L1150336-01 7
MW109-101519 L1150336-02 9
MW-305-101519 L1150336-03 12
MW126-101519 L1150336-04 15
MW-306-101519 L1150336-05 17
W-MW-01-101519 L1150336-06 20
MW110-101519 L1150336-07 23
MW-153-101519 L1150336-08 26
MW-107-101519 L1150336-09 29
TB-101519 L1150336-10 32
Qc: Quality Control Summary 34
Wet Chemistry by Method 2320 B-2011 34
Wet Chemistry by Method 9056A 36
Wet Chemistry by Method 9060A 38
Metals (ICPMS) by Method 6020B 39
Volatile Organic Compounds (GC) by Method NWTPHGX 40
Volatile Organic Compounds (GC) by Method RSK175 41
Volatile Organic Compounds (GC/MS) by Method 8260C 43
Gl: Glossary of Terms 57
Al: Accreditations & Locations 58
Sc: Sample Chain of Custody 59

MW-917-101519 L1150336-01 GW

Collected by: KZ/BH/SM/HG | Collected date/time: 10/15/19 08:00 | Received date/time: 10/16/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366027	1	10/22/19 05:44	10/22/19 05:44	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363847	1	10/16/19 19:05	10/16/19 19:05	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365601	1	10/19/19 18:45	10/19/19 18:45	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364631	1	10/21/19 23:59	10/22/19 14:13	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364420	1	10/17/19 15:34	10/17/19 15:34	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1368527	1	10/24/19 05:08	10/24/19 05:08	ACG	Mt. Juliet, TN

MW109-101519 L1150336-02 GW

Collected by: KZ/BH/SM/HG | Collected date/time: 10/15/19 09:45 | Received date/time: 10/16/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366027	1	10/22/19 05:51	10/22/19 05:51	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363847	1	10/16/19 19:18	10/16/19 19:18	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365601	1	10/19/19 19:06	10/19/19 19:06	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364631	1	10/21/19 23:59	10/22/19 14:48	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364420	1	10/17/19 15:37	10/17/19 15:37	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1368527	1	10/24/19 05:29	10/24/19 05:29	ACG	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369128	20	10/24/19 20:51	10/24/19 20:51	ACG	Mt. Juliet, TN

MW-305-101519 L1150336-03 GW

Collected by: KZ/BH/SM/HG | Collected date/time: 10/15/19 10:10 | Received date/time: 10/16/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366027	1	10/22/19 05:58	10/22/19 05:58	LEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363847	1	10/16/19 19:31	10/16/19 19:31	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365601	1	10/19/19 19:28	10/19/19 19:28	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364631	1	10/21/19 23:59	10/22/19 14:52	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365317	1	10/18/19 14:44	10/18/19 14:44	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364420	1	10/17/19 16:04	10/17/19 16:04	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1368527	1	10/24/19 05:50	10/24/19 05:50	ACG	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369128	1	10/24/19 21:11	10/24/19 21:11	ACG	Mt. Juliet, TN

MW126-101519 L1150336-04 GW

Collected by: KZ/BH/SM/HG | Collected date/time: 10/15/19 11:00 | Received date/time: 10/16/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366029	1	10/21/19 23:52	10/21/19 23:52	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363847	1	10/16/19 19:44	10/16/19 19:44	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365601	1	10/19/19 21:17	10/19/19 21:17	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364631	1	10/21/19 23:59	10/22/19 14:55	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364420	1	10/17/19 15:42	10/17/19 15:42	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1368527	1	10/24/19 06:10	10/24/19 06:10	ACG	Mt. Juliet, TN

MW-306-101519 L1150336-05 GW

Collected by: KZ/BH/SM/HG | Collected date/time: 10/15/19 11:40 | Received date/time: 10/16/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366029	1	10/21/19 23:59	10/21/19 23:59	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363847	1	10/16/19 20:22	10/16/19 20:22	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365601	1	10/19/19 21:31	10/19/19 21:31	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364631	1	10/21/19 23:59	10/22/19 14:59	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365317	1	10/18/19 15:07	10/18/19 15:07	BMB	Mt. Juliet, TN

MW-306-101519 L1150336-05 GW

Collected by: KZ/BH/SM/HG | Collected date/time: 10/15/19 11:40 | Received date/time: 10/16/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC) by Method RSK175	WG1364420	1	10/17/19 15:44	10/17/19 15:44	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1368527	1	10/24/19 06:31	10/24/19 06:31	ACG	Mt. Juliet, TN

W-MW-01-101519 L1150336-06 GW

Collected by: KZ/BH/SM/HG | Collected date/time: 10/15/19 12:20 | Received date/time: 10/16/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366029	1	10/22/19 00:07	10/22/19 00:07	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363847	1	10/16/19 20:35	10/16/19 20:35	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365601	1	10/19/19 22:38	10/19/19 22:38	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364631	1	10/21/19 23:59	10/22/19 15:03	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365317	1	10/18/19 15:31	10/18/19 15:31	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364420	1	10/17/19 15:50	10/17/19 15:50	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1368527	1	10/24/19 06:52	10/24/19 06:52	ACG	Mt. Juliet, TN

MW110-101519 L1150336-07 GW

Collected by: KZ/BH/SM/HG | Collected date/time: 10/15/19 14:20 | Received date/time: 10/16/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366029	1	10/22/19 00:15	10/22/19 00:15	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363847	1	10/16/19 20:47	10/16/19 20:47	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365601	1	10/19/19 23:00	10/19/19 23:00	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364631	1	10/21/19 23:59	10/22/19 15:07	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364420	1	10/17/19 15:53	10/17/19 15:53	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1368527	1	10/24/19 07:12	10/24/19 07:12	ACG	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369128	50	10/24/19 21:32	10/24/19 21:32	ACG	Mt. Juliet, TN

MW-153-101519 L1150336-08 GW

Collected by: KZ/BH/SM/HG | Collected date/time: 10/15/19 14:25 | Received date/time: 10/16/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366029	1	10/22/19 00:22	10/22/19 00:22	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363847	1	10/16/19 21:00	10/16/19 21:00	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365601	1	10/19/19 23:20	10/19/19 23:20	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364631	1	10/21/19 23:59	10/22/19 15:10	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365317	1	10/18/19 18:42	10/18/19 18:42	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1365165	1	10/18/19 13:10	10/18/19 13:10	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/25/19 22:30	10/25/19 22:30	ADM	Mt. Juliet, TN

MW-107-101519 L1150336-09 GW

Collected by: KZ/BH/SM/HG | Collected date/time: 10/15/19 14:00 | Received date/time: 10/16/19 08:30

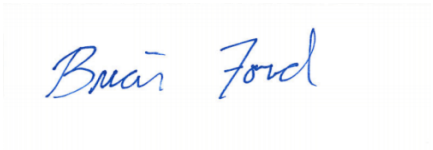
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366029	1	10/22/19 00:30	10/22/19 00:30	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1363847	1	10/16/19 21:13	10/16/19 21:13	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365601	1	10/19/19 23:45	10/19/19 23:45	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1364631	1	10/21/19 23:59	10/22/19 15:14	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365317	1	10/18/19 19:06	10/18/19 19:06	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1364420	1	10/17/19 15:55	10/17/19 15:55	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1365165	10	10/18/19 13:13	10/18/19 13:13	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/25/19 22:50	10/25/19 22:50	ADM	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1370146	10	10/27/19 15:29	10/27/19 15:29	ACG	Mt. Juliet, TN

TB-101519 L1150336-10 GW

Collected by	Collected date/time	Received date/time
KZ/BH/SM/HG	10/15/19 00:00	10/16/19 08:30

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365317	1	10/18/19 12:20	10/18/19 12:20	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1370189	1	10/26/19 14:49	10/26/19 14:49	ACG	Mt. Juliet, TN

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	200000		2710	20000	1	10/22/2019 05:44	WG1366027

Sample Narrative:
L1150336-01 WG1366027: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	7780		51.9	1000	1	10/16/2019 19:05	WG1363847
Nitrate	U		22.7	100	1	10/16/2019 19:05	WG1363847
Sulfate	3890	J	77.4	5000	1	10/16/2019 19:05	WG1363847

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	5050	B	102	1000	1	10/19/2019 18:45	WG1365601

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	388		15.0	100	1	10/22/2019 14:13	WG1364631
Manganese	327		0.250	5.00	1	10/22/2019 14:13	WG1364631

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	317		0.287	0.678	1	10/17/2019 15:34	WG1364420
Ethane	U		0.296	1.29	1	10/17/2019 15:34	WG1364420
Ethene	U		0.422	1.27	1	10/17/2019 15:34	WG1364420

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	1.34	J	1.05	25.0	1	10/24/2019 05:08	WG1368527
Acrylonitrile	U		0.873	5.00	1	10/24/2019 05:08	WG1368527
Benzene	U		0.0896	0.500	1	10/24/2019 05:08	WG1368527
Bromobenzene	U		0.133	0.500	1	10/24/2019 05:08	WG1368527
Bromodichloromethane	U		0.0800	0.500	1	10/24/2019 05:08	WG1368527
Bromochloromethane	U		0.145	0.500	1	10/24/2019 05:08	WG1368527
Bromoform	U		0.186	0.500	1	10/24/2019 05:08	WG1368527
Bromomethane	U		0.157	2.50	1	10/24/2019 05:08	WG1368527
n-Butylbenzene	U		0.143	0.500	1	10/24/2019 05:08	WG1368527
sec-Butylbenzene	U		0.134	0.500	1	10/24/2019 05:08	WG1368527
tert-Butylbenzene	U		0.183	0.500	1	10/24/2019 05:08	WG1368527
Carbon disulfide	U		0.101	0.500	1	10/24/2019 05:08	WG1368527
Carbon tetrachloride	U		0.159	0.500	1	10/24/2019 05:08	WG1368527
Chlorobenzene	U		0.140	0.500	1	10/24/2019 05:08	WG1368527
Chlorodibromomethane	U	J0	0.128	0.500	1	10/24/2019 05:08	WG1368527
Chloroethane	U		0.141	2.50	1	10/24/2019 05:08	WG1368527
Chloroform	U		0.0860	0.500	1	10/24/2019 05:08	WG1368527
Chloromethane	U		0.153	1.25	1	10/24/2019 05:08	WG1368527
2-Chlorotoluene	U		0.111	0.500	1	10/24/2019 05:08	WG1368527
4-Chlorotoluene	U		0.0972	0.500	1	10/24/2019 05:08	WG1368527

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/24/2019 05:08	WG1368527
1,2-Dibromoethane	U		0.193	0.500	1	10/24/2019 05:08	WG1368527
Dibromomethane	U		0.117	0.500	1	10/24/2019 05:08	WG1368527
1,2-Dichlorobenzene	U	J0	0.101	0.500	1	10/24/2019 05:08	WG1368527
1,3-Dichlorobenzene	U	J0 J4	0.130	0.500	1	10/24/2019 05:08	WG1368527
1,4-Dichlorobenzene	U	J0 J4	0.121	0.500	1	10/24/2019 05:08	WG1368527
Dichlorodifluoromethane	U		0.127	2.50	1	10/24/2019 05:08	WG1368527
1,1-Dichloroethane	U		0.114	0.500	1	10/24/2019 05:08	WG1368527
1,2-Dichloroethane	U		0.108	0.500	1	10/24/2019 05:08	WG1368527
1,1-Dichloroethene	U		0.188	0.500	1	10/24/2019 05:08	WG1368527
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/24/2019 05:08	WG1368527
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/24/2019 05:08	WG1368527
1,2-Dichloropropane	U		0.190	0.500	1	10/24/2019 05:08	WG1368527
1,1-Dichloropropene	U		0.128	0.500	1	10/24/2019 05:08	WG1368527
1,3-Dichloropropane	U	J0 J4	0.147	1.00	1	10/24/2019 05:08	WG1368527
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/24/2019 05:08	WG1368527
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/24/2019 05:08	WG1368527
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/24/2019 05:08	WG1368527
2,2-Dichloropropane	U		0.0929	0.500	1	10/24/2019 05:08	WG1368527
Di-isopropyl ether	U		0.0924	0.500	1	10/24/2019 05:08	WG1368527
Ethylbenzene	U		0.158	0.500	1	10/24/2019 05:08	WG1368527
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/24/2019 05:08	WG1368527
2-Hexanone	U		0.757	5.00	1	10/24/2019 05:08	WG1368527
n-Hexane	U	J0	0.305	5.00	1	10/24/2019 05:08	WG1368527
Iodomethane	U		0.377	10.0	1	10/24/2019 05:08	WG1368527
Isopropylbenzene	U		0.126	0.500	1	10/24/2019 05:08	WG1368527
p-Isopropyltoluene	U		0.138	0.500	1	10/24/2019 05:08	WG1368527
2-Butanone (MEK)	U		1.28	5.00	1	10/24/2019 05:08	WG1368527
Methylene Chloride	U		1.07	2.50	1	10/24/2019 05:08	WG1368527
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/24/2019 05:08	WG1368527
Methyl tert-butyl ether	U		0.102	0.500	1	10/24/2019 05:08	WG1368527
Naphthalene	U		0.174	2.50	1	10/24/2019 05:08	WG1368527
n-Propylbenzene	U		0.162	0.500	1	10/24/2019 05:08	WG1368527
Styrene	U		0.117	0.500	1	10/24/2019 05:08	WG1368527
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/24/2019 05:08	WG1368527
1,1,2,2-Tetrachloroethane	U	J0	0.130	0.500	1	10/24/2019 05:08	WG1368527
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/24/2019 05:08	WG1368527
Tetrachloroethene	U		0.199	0.500	1	10/24/2019 05:08	WG1368527
Toluene	U		0.412	0.500	1	10/24/2019 05:08	WG1368527
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/24/2019 05:08	WG1368527
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/24/2019 05:08	WG1368527
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/24/2019 05:08	WG1368527
1,1,2-Trichloroethane	U	J0 J4	0.186	0.500	1	10/24/2019 05:08	WG1368527
Trichloroethene	U		0.153	0.500	1	10/24/2019 05:08	WG1368527
Trichlorofluoromethane	U		0.130	2.50	1	10/24/2019 05:08	WG1368527
1,2,3-Trichloropropane	U		0.247	2.50	1	10/24/2019 05:08	WG1368527
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/24/2019 05:08	WG1368527
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/24/2019 05:08	WG1368527
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/24/2019 05:08	WG1368527
Vinyl acetate	U	J0	0.645	5.00	1	10/24/2019 05:08	WG1368527
Vinyl chloride	U		0.118	0.500	1	10/24/2019 05:08	WG1368527
Xylenes, Total	U		0.316	1.50	1	10/24/2019 05:08	WG1368527
(S) Toluene-d8	*99.4*			*80.0-120*		*10/24/2019 05:08*	WG1368527
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/24/2019 05:08*	WG1368527
(S) 1,2-Dichloroethane-d4	*114*			*70.0-130*		*10/24/2019 05:08*	WG1368527

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	628000		2710	20000	1	10/22/2019 05:51	WG1366027

Sample Narrative:
L1150336-02 WG1366027: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	13700		51.9	1000	1	10/16/2019 19:18	WG1363847
Nitrate	U		22.7	100	1	10/16/2019 19:18	WG1363847
Sulfate	9120		77.4	5000	1	10/16/2019 19:18	WG1363847

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	10400		102	1000	1	10/19/2019 19:06	WG1365601

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	14400		15.0	100	1	10/22/2019 14:48	WG1364631
Manganese	4100		0.250	5.00	1	10/22/2019 14:48	WG1364631

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	4950		0.287	0.678	1	10/17/2019 15:37	WG1364420
Ethane	25.6		0.296	1.29	1	10/17/2019 15:37	WG1364420
Ethene	6.99		0.422	1.27	1	10/17/2019 15:37	WG1364420

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	U		1.05	25.0	1	10/24/2019 05:29	WG1368527
Acrylonitrile	U		0.873	5.00	1	10/24/2019 05:29	WG1368527
Benzene	U		0.0896	0.500	1	10/24/2019 05:29	WG1368527
Bromobenzene	U		0.133	0.500	1	10/24/2019 05:29	WG1368527
Bromodichloromethane	U		0.0800	0.500	1	10/24/2019 05:29	WG1368527
Bromochloromethane	U		0.145	0.500	1	10/24/2019 05:29	WG1368527
Bromoform	U		0.186	0.500	1	10/24/2019 05:29	WG1368527
Bromomethane	U		0.157	2.50	1	10/24/2019 05:29	WG1368527
n-Butylbenzene	U		0.143	0.500	1	10/24/2019 05:29	WG1368527
sec-Butylbenzene	U		0.134	0.500	1	10/24/2019 05:29	WG1368527
tert-Butylbenzene	U		0.183	0.500	1	10/24/2019 05:29	WG1368527
Carbon disulfide	U		0.101	0.500	1	10/24/2019 05:29	WG1368527
Carbon tetrachloride	U		0.159	0.500	1	10/24/2019 05:29	WG1368527
Chlorobenzene	U		0.140	0.500	1	10/24/2019 05:29	WG1368527
Chlorodibromomethane	U	J0	0.128	0.500	1	10/24/2019 05:29	WG1368527
Chloroethane	U		0.141	2.50	1	10/24/2019 05:29	WG1368527
Chloroform	U		0.0860	0.500	1	10/24/2019 05:29	WG1368527
Chloromethane	U		0.153	1.25	1	10/24/2019 05:29	WG1368527
2-Chlorotoluene	U		0.111	0.500	1	10/24/2019 05:29	WG1368527
4-Chlorotoluene	U		0.0972	0.500	1	10/24/2019 05:29	WG1368527

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/24/2019 05:29	WG1368527
1,2-Dibromoethane	U		0.193	0.500	1	10/24/2019 05:29	WG1368527
Dibromomethane	U		0.117	0.500	1	10/24/2019 05:29	WG1368527
1,2-Dichlorobenzene	U	J0	0.101	0.500	1	10/24/2019 05:29	WG1368527
1,3-Dichlorobenzene	U	J0 J4	0.130	0.500	1	10/24/2019 05:29	WG1368527
1,4-Dichlorobenzene	U	J0 J4	0.121	0.500	1	10/24/2019 05:29	WG1368527
Dichlorodifluoromethane	U		0.127	2.50	1	10/24/2019 05:29	WG1368527
1,1-Dichloroethane	U		0.114	0.500	1	10/24/2019 05:29	WG1368527
1,2-Dichloroethane	U		0.108	0.500	1	10/24/2019 05:29	WG1368527
1,1-Dichloroethene	0.768		0.188	0.500	1	10/24/2019 05:29	WG1368527
cis-1,2-Dichloroethene	397		1.87	10.0	20	10/24/2019 20:51	WG1369128
trans-1,2-Dichloroethene	0.891		0.152	0.500	1	10/24/2019 05:29	WG1368527
1,2-Dichloropropane	U		0.190	0.500	1	10/24/2019 05:29	WG1368527
1,1-Dichloropropene	U		0.128	0.500	1	10/24/2019 05:29	WG1368527
1,3-Dichloropropane	U	J0 J4	0.147	1.00	1	10/24/2019 05:29	WG1368527
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/24/2019 05:29	WG1368527
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/24/2019 05:29	WG1368527
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/24/2019 05:29	WG1368527
2,2-Dichloropropane	U		0.0929	0.500	1	10/24/2019 05:29	WG1368527
Di-isopropyl ether	U		0.0924	0.500	1	10/24/2019 05:29	WG1368527
Ethylbenzene	U		0.158	0.500	1	10/24/2019 05:29	WG1368527
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/24/2019 05:29	WG1368527
2-Hexanone	U		0.757	5.00	1	10/24/2019 05:29	WG1368527
n-Hexane	U	J0	0.305	5.00	1	10/24/2019 05:29	WG1368527
Iodomethane	U		0.377	10.0	1	10/24/2019 05:29	WG1368527
Isopropylbenzene	U		0.126	0.500	1	10/24/2019 05:29	WG1368527
p-Isopropyltoluene	U		0.138	0.500	1	10/24/2019 05:29	WG1368527
2-Butanone (MEK)	U		1.28	5.00	1	10/24/2019 05:29	WG1368527
Methylene Chloride	U		1.07	2.50	1	10/24/2019 05:29	WG1368527
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/24/2019 05:29	WG1368527
Methyl tert-butyl ether	U		0.102	0.500	1	10/24/2019 05:29	WG1368527
Naphthalene	U		0.174	2.50	1	10/24/2019 05:29	WG1368527
n-Propylbenzene	U		0.162	0.500	1	10/24/2019 05:29	WG1368527
Styrene	U		0.117	0.500	1	10/24/2019 05:29	WG1368527
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/24/2019 05:29	WG1368527
1,1,2,2-Tetrachloroethane	U	J0	0.130	0.500	1	10/24/2019 05:29	WG1368527
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/24/2019 05:29	WG1368527
Tetrachloroethene	U		0.199	0.500	1	10/24/2019 05:29	WG1368527
Toluene	U		0.412	0.500	1	10/24/2019 05:29	WG1368527
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/24/2019 05:29	WG1368527
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/24/2019 05:29	WG1368527
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/24/2019 05:29	WG1368527
1,1,2-Trichloroethane	U	J0 J4	0.186	0.500	1	10/24/2019 05:29	WG1368527
Trichloroethene	1.03		0.153	0.500	1	10/24/2019 05:29	WG1368527
Trichlorofluoromethane	U		0.130	2.50	1	10/24/2019 05:29	WG1368527
1,2,3-Trichloropropane	U		0.247	2.50	1	10/24/2019 05:29	WG1368527
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/24/2019 05:29	WG1368527
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/24/2019 05:29	WG1368527
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/24/2019 05:29	WG1368527
Vinyl acetate	U	J0	0.645	5.00	1	10/24/2019 05:29	WG1368527
Vinyl chloride	109		0.118	0.500	1	10/24/2019 05:29	WG1368527
Xylenes, Total	U		0.316	1.50	1	10/24/2019 05:29	WG1368527
(S) Toluene-d8	*102*			*80.0-120*		*10/24/2019 05:29*	WG1368527
(S) Toluene-d8	*110*			*80.0-120*		*10/24/2019 20:51*	WG1369128
(S) 4-Bromofluorobenzene	*104*			*77.0-126*		*10/24/2019 05:29*	WG1368527
(S) 4-Bromofluorobenzene	*112*			*77.0-126*		*10/24/2019 20:51*	WG1369128

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*112*			*70.0-130*		*10/24/2019 05:29*	WG1368527
(S) 1,2-Dichloroethane-d4	*108*			*70.0-130*		*10/24/2019 20:51*	WG1369128

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	114000		2710	20000	1	10/22/2019 05:58	WG1366027

Sample Narrative:

L1150336-03 WG1366027: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	18000		51.9	1000	1	10/16/2019 19:31	WG1363847
Nitrate	1630		22.7	100	1	10/16/2019 19:31	WG1363847
Sulfate	28000		77.4	5000	1	10/16/2019 19:31	WG1363847

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	3340	B	102	1000	1	10/19/2019 19:28	WG1365601

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	2580		15.0	100	1	10/22/2019 14:52	WG1364631
Manganese	197		0.250	5.00	1	10/22/2019 14:52	WG1364631

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/18/2019 14:44	WG1365317
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/18/2019 14:44*	WG1365317

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	U		0.287	0.678	1	10/17/2019 16:04	WG1364420
Ethane	U		0.296	1.29	1	10/17/2019 16:04	WG1364420
Ethene	U		0.422	1.27	1	10/17/2019 16:04	WG1364420

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U		1.05	25.0	1	10/24/2019 05:50	WG1368527
Acrylonitrile	U		0.873	5.00	1	10/24/2019 05:50	WG1368527
Benzene	U		0.0896	0.500	1	10/24/2019 05:50	WG1368527
Bromobenzene	U		0.133	0.500	1	10/24/2019 05:50	WG1368527
Bromodichloromethane	U		0.0800	0.500	1	10/24/2019 05:50	WG1368527
Bromochloromethane	U		0.145	0.500	1	10/24/2019 05:50	WG1368527
Bromoform	U		0.186	0.500	1	10/24/2019 05:50	WG1368527
Bromomethane	U		0.157	2.50	1	10/24/2019 05:50	WG1368527
n-Butylbenzene	U		0.143	0.500	1	10/24/2019 05:50	WG1368527
sec-Butylbenzene	U		0.134	0.500	1	10/24/2019 05:50	WG1368527
tert-Butylbenzene	U		0.183	0.500	1	10/24/2019 05:50	WG1368527
Carbon disulfide	U		0.101	0.500	1	10/24/2019 05:50	WG1368527
Carbon tetrachloride	U		0.159	0.500	1	10/24/2019 05:50	WG1368527

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.140	0.500	1	10/24/2019 05:50	WG1368527
Chlorodibromomethane	U	J0	0.128	0.500	1	10/24/2019 05:50	WG1368527
Chloroethane	U		0.141	2.50	1	10/24/2019 05:50	WG1368527
Chloroform	U		0.0860	0.500	1	10/24/2019 05:50	WG1368527
Chloromethane	U		0.153	1.25	1	10/24/2019 05:50	WG1368527
2-Chlorotoluene	U		0.111	0.500	1	10/24/2019 05:50	WG1368527
4-Chlorotoluene	U		0.0972	0.500	1	10/24/2019 05:50	WG1368527
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/24/2019 05:50	WG1368527
1,2-Dibromoethane	U		0.193	0.500	1	10/24/2019 05:50	WG1368527
Dibromomethane	U		0.117	0.500	1	10/24/2019 05:50	WG1368527
1,2-Dichlorobenzene	U	J0	0.101	0.500	1	10/24/2019 05:50	WG1368527
1,3-Dichlorobenzene	U	J0 J4	0.130	0.500	1	10/24/2019 05:50	WG1368527
1,4-Dichlorobenzene	U	J0 J4	0.121	0.500	1	10/24/2019 05:50	WG1368527
Dichlorodifluoromethane	U		0.127	2.50	1	10/24/2019 05:50	WG1368527
1,1-Dichloroethane	U		0.114	0.500	1	10/24/2019 05:50	WG1368527
1,2-Dichloroethane	U		0.108	0.500	1	10/24/2019 05:50	WG1368527
1,1-Dichloroethene	U		0.188	0.500	1	10/24/2019 05:50	WG1368527
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/24/2019 21:11	WG1369128
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/24/2019 05:50	WG1368527
1,2-Dichloropropane	U		0.190	0.500	1	10/24/2019 05:50	WG1368527
1,1-Dichloropropene	U		0.128	0.500	1	10/24/2019 05:50	WG1368527
1,3-Dichloropropane	U	J0 J4	0.147	1.00	1	10/24/2019 05:50	WG1368527
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/24/2019 05:50	WG1368527
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/24/2019 05:50	WG1368527
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/24/2019 05:50	WG1368527
2,2-Dichloropropane	U		0.0929	0.500	1	10/24/2019 05:50	WG1368527
Di-isopropyl ether	U		0.0924	0.500	1	10/24/2019 05:50	WG1368527
Ethylbenzene	U		0.158	0.500	1	10/24/2019 05:50	WG1368527
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/24/2019 05:50	WG1368527
2-Hexanone	U		0.757	5.00	1	10/24/2019 05:50	WG1368527
n-Hexane	U	J0	0.305	5.00	1	10/24/2019 05:50	WG1368527
Iodomethane	U		0.377	10.0	1	10/24/2019 05:50	WG1368527
Isopropylbenzene	U		0.126	0.500	1	10/24/2019 05:50	WG1368527
p-Isopropyltoluene	U		0.138	0.500	1	10/24/2019 05:50	WG1368527
2-Butanone (MEK)	U		1.28	5.00	1	10/24/2019 05:50	WG1368527
Methylene Chloride	U		1.07	2.50	1	10/24/2019 05:50	WG1368527
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/24/2019 05:50	WG1368527
Methyl tert-butyl ether	U		0.102	0.500	1	10/24/2019 05:50	WG1368527
Naphthalene	U		0.174	2.50	1	10/24/2019 05:50	WG1368527
n-Propylbenzene	U		0.162	0.500	1	10/24/2019 05:50	WG1368527
Styrene	U		0.117	0.500	1	10/24/2019 05:50	WG1368527
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/24/2019 05:50	WG1368527
1,1,2,2-Tetrachloroethane	U	J0	0.130	0.500	1	10/24/2019 05:50	WG1368527
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/24/2019 05:50	WG1368527
Tetrachloroethene	U		0.199	0.500	1	10/24/2019 05:50	WG1368527
Toluene	U		0.412	0.500	1	10/24/2019 05:50	WG1368527
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/24/2019 05:50	WG1368527
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/24/2019 05:50	WG1368527
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/24/2019 05:50	WG1368527
1,1,2-Trichloroethane	U	J0 J4	0.186	0.500	1	10/24/2019 05:50	WG1368527
Trichloroethene	U		0.153	0.500	1	10/24/2019 05:50	WG1368527
Trichlorofluoromethane	U		0.130	2.50	1	10/24/2019 05:50	WG1368527
1,2,3-Trichloropropane	U		0.247	2.50	1	10/24/2019 05:50	WG1368527
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/24/2019 05:50	WG1368527
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/24/2019 05:50	WG1368527
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/24/2019 05:50	WG1368527

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U	J0	0.645	5.00	1	10/24/2019 05:50	WG1368527
Vinyl chloride	U		0.118	0.500	1	10/24/2019 05:50	WG1368527
Xylenes, Total	U		0.316	1.50	1	10/24/2019 05:50	WG1368527
(S) Toluene-d8	*101*			*80.0-120*		*10/24/2019 05:50*	WG1368527
(S) Toluene-d8	*112*			*80.0-120*		*10/24/2019 21:11*	WG1369128
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/24/2019 05:50*	WG1368527
(S) 4-Bromofluorobenzene	*116*			*77.0-126*		*10/24/2019 21:11*	WG1369128
(S) 1,2-Dichloroethane-d4	*113*			*70.0-130*		*10/24/2019 05:50*	WG1368527
(S) 1,2-Dichloroethane-d4	*107*			*70.0-130*		*10/24/2019 21:11*	WG1369128

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	210000		2710	20000	1	10/21/2019 23:52	WG1366029

Sample Narrative:
L1150336-04 WG1366029: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	7540		51.9	1000	1	10/16/2019 19:44	WG1363847
Nitrate	U		22.7	100	1	10/16/2019 19:44	WG1363847
Sulfate	3620	J	77.4	5000	1	10/16/2019 19:44	WG1363847

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	5120	B	102	1000	1	10/19/2019 21:17	WG1365601

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	407		15.0	100	1	10/22/2019 14:55	WG1364631
Manganese	335		0.250	5.00	1	10/22/2019 14:55	WG1364631

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	277		0.287	0.678	1	10/17/2019 15:42	WG1364420
Ethane	U		0.296	1.29	1	10/17/2019 15:42	WG1364420
Ethene	U		0.422	1.27	1	10/17/2019 15:42	WG1364420

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.30	J	1.05	25.0	1	10/24/2019 06:10	WG1368527
Acrylonitrile	U		0.873	5.00	1	10/24/2019 06:10	WG1368527
Benzene	U		0.0896	0.500	1	10/24/2019 06:10	WG1368527
Bromobenzene	U		0.133	0.500	1	10/24/2019 06:10	WG1368527
Bromodichloromethane	U		0.0800	0.500	1	10/24/2019 06:10	WG1368527
Bromochloromethane	U		0.145	0.500	1	10/24/2019 06:10	WG1368527
Bromoform	U		0.186	0.500	1	10/24/2019 06:10	WG1368527
Bromomethane	U		0.157	2.50	1	10/24/2019 06:10	WG1368527
n-Butylbenzene	U		0.143	0.500	1	10/24/2019 06:10	WG1368527
sec-Butylbenzene	U		0.134	0.500	1	10/24/2019 06:10	WG1368527
tert-Butylbenzene	U		0.183	0.500	1	10/24/2019 06:10	WG1368527
Carbon disulfide	U		0.101	0.500	1	10/24/2019 06:10	WG1368527
Carbon tetrachloride	U		0.159	0.500	1	10/24/2019 06:10	WG1368527
Chlorobenzene	U		0.140	0.500	1	10/24/2019 06:10	WG1368527
Chlorodibromomethane	U	J0	0.128	0.500	1	10/24/2019 06:10	WG1368527
Chloroethane	U		0.141	2.50	1	10/24/2019 06:10	WG1368527
Chloroform	U		0.0860	0.500	1	10/24/2019 06:10	WG1368527
Chloromethane	U		0.153	1.25	1	10/24/2019 06:10	WG1368527
2-Chlorotoluene	U		0.111	0.500	1	10/24/2019 06:10	WG1368527
4-Chlorotoluene	U		0.0972	0.500	1	10/24/2019 06:10	WG1368527

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/24/2019 06:10	WG1368527
1,2-Dibromoethane	U		0.193	0.500	1	10/24/2019 06:10	WG1368527
Dibromomethane	U		0.117	0.500	1	10/24/2019 06:10	WG1368527
1,2-Dichlorobenzene	U	J0	0.101	0.500	1	10/24/2019 06:10	WG1368527
1,3-Dichlorobenzene	U	J0 J4	0.130	0.500	1	10/24/2019 06:10	WG1368527
1,4-Dichlorobenzene	U	J0 J4	0.121	0.500	1	10/24/2019 06:10	WG1368527
Dichlorodifluoromethane	U		0.127	2.50	1	10/24/2019 06:10	WG1368527
1,1-Dichloroethane	U		0.114	0.500	1	10/24/2019 06:10	WG1368527
1,2-Dichloroethane	U		0.108	0.500	1	10/24/2019 06:10	WG1368527
1,1-Dichloroethene	U		0.188	0.500	1	10/24/2019 06:10	WG1368527
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/24/2019 06:10	WG1368527
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/24/2019 06:10	WG1368527
1,2-Dichloropropane	U		0.190	0.500	1	10/24/2019 06:10	WG1368527
1,1-Dichloropropene	U		0.128	0.500	1	10/24/2019 06:10	WG1368527
1,3-Dichloropropane	U	J0 J4	0.147	1.00	1	10/24/2019 06:10	WG1368527
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/24/2019 06:10	WG1368527
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/24/2019 06:10	WG1368527
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/24/2019 06:10	WG1368527
2,2-Dichloropropane	U		0.0929	0.500	1	10/24/2019 06:10	WG1368527
Di-isopropyl ether	U		0.0924	0.500	1	10/24/2019 06:10	WG1368527
Ethylbenzene	U		0.158	0.500	1	10/24/2019 06:10	WG1368527
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/24/2019 06:10	WG1368527
2-Hexanone	U		0.757	5.00	1	10/24/2019 06:10	WG1368527
n-Hexane	U	J0	0.305	5.00	1	10/24/2019 06:10	WG1368527
Iodomethane	U		0.377	10.0	1	10/24/2019 06:10	WG1368527
Isopropylbenzene	U		0.126	0.500	1	10/24/2019 06:10	WG1368527
p-Isopropyltoluene	U		0.138	0.500	1	10/24/2019 06:10	WG1368527
2-Butanone (MEK)	U		1.28	5.00	1	10/24/2019 06:10	WG1368527
Methylene Chloride	U		1.07	2.50	1	10/24/2019 06:10	WG1368527
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/24/2019 06:10	WG1368527
Methyl tert-butyl ether	U		0.102	0.500	1	10/24/2019 06:10	WG1368527
Naphthalene	U		0.174	2.50	1	10/24/2019 06:10	WG1368527
n-Propylbenzene	U		0.162	0.500	1	10/24/2019 06:10	WG1368527
Styrene	U		0.117	0.500	1	10/24/2019 06:10	WG1368527
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/24/2019 06:10	WG1368527
1,1,2,2-Tetrachloroethane	U	J0	0.130	0.500	1	10/24/2019 06:10	WG1368527
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/24/2019 06:10	WG1368527
Tetrachloroethene	U		0.199	0.500	1	10/24/2019 06:10	WG1368527
Toluene	U		0.412	0.500	1	10/24/2019 06:10	WG1368527
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/24/2019 06:10	WG1368527
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/24/2019 06:10	WG1368527
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/24/2019 06:10	WG1368527
1,1,2-Trichloroethane	U	J0 J4	0.186	0.500	1	10/24/2019 06:10	WG1368527
Trichloroethene	U		0.153	0.500	1	10/24/2019 06:10	WG1368527
Trichlorofluoromethane	U		0.130	2.50	1	10/24/2019 06:10	WG1368527
1,2,3-Trichloropropane	U		0.247	2.50	1	10/24/2019 06:10	WG1368527
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/24/2019 06:10	WG1368527
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/24/2019 06:10	WG1368527
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/24/2019 06:10	WG1368527
Vinyl acetate	U	J0	0.645	5.00	1	10/24/2019 06:10	WG1368527
Vinyl chloride	U		0.118	0.500	1	10/24/2019 06:10	WG1368527
Xylenes, Total	U		0.316	1.50	1	10/24/2019 06:10	WG1368527
(S) Toluene-d8	*99.8*			*80.0-120*		*10/24/2019 06:10*	WG1368527
(S) 4-Bromofluorobenzene	*104*			*77.0-126*		*10/24/2019 06:10*	WG1368527
(S) 1,2-Dichloroethane-d4	*114*			*70.0-130*		*10/24/2019 06:10*	WG1368527

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	187000		2710	20000	1	10/21/2019 23:59	WG1366029

Sample Narrative:

L1150336-05 WG1366029: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	8790		51.9	1000	1	10/16/2019 20:22	WG1363847
Nitrate	U		22.7	100	1	10/16/2019 20:22	WG1363847
Sulfate	80900		77.4	5000	1	10/16/2019 20:22	WG1363847

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	2320	B	102	1000	1	10/19/2019 21:31	WG1365601

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	3810		15.0	100	1	10/22/2019 14:59	WG1364631
Manganese	608		0.250	5.00	1	10/22/2019 14:59	WG1364631

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/18/2019 15:07	WG1365317
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/18/2019 15:07*	WG1365317

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	U		0.287	0.678	1	10/17/2019 15:44	WG1364420
Ethane	U		0.296	1.29	1	10/17/2019 15:44	WG1364420
Ethene	U		0.422	1.27	1	10/17/2019 15:44	WG1364420

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U		1.05	25.0	1	10/24/2019 06:31	WG1368527
Acrylonitrile	U		0.873	5.00	1	10/24/2019 06:31	WG1368527
Benzene	U		0.0896	0.500	1	10/24/2019 06:31	WG1368527
Bromobenzene	U		0.133	0.500	1	10/24/2019 06:31	WG1368527
Bromodichloromethane	U		0.0800	0.500	1	10/24/2019 06:31	WG1368527
Bromochloromethane	U		0.145	0.500	1	10/24/2019 06:31	WG1368527
Bromoform	U		0.186	0.500	1	10/24/2019 06:31	WG1368527
Bromomethane	U		0.157	2.50	1	10/24/2019 06:31	WG1368527
n-Butylbenzene	U		0.143	0.500	1	10/24/2019 06:31	WG1368527
sec-Butylbenzene	U		0.134	0.500	1	10/24/2019 06:31	WG1368527
tert-Butylbenzene	U		0.183	0.500	1	10/24/2019 06:31	WG1368527
Carbon disulfide	U		0.101	0.500	1	10/24/2019 06:31	WG1368527
Carbon tetrachloride	U		0.159	0.500	1	10/24/2019 06:31	WG1368527

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/24/2019 06:31	WG1368527
Chlorodibromomethane	U	J0	0.128	0.500	1	10/24/2019 06:31	WG1368527
Chloroethane	U		0.141	2.50	1	10/24/2019 06:31	WG1368527
Chloroform	U		0.0860	0.500	1	10/24/2019 06:31	WG1368527
Chloromethane	U		0.153	1.25	1	10/24/2019 06:31	WG1368527
2-Chlorotoluene	U		0.111	0.500	1	10/24/2019 06:31	WG1368527
4-Chlorotoluene	U		0.0972	0.500	1	10/24/2019 06:31	WG1368527
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/24/2019 06:31	WG1368527
1,2-Dibromoethane	U		0.193	0.500	1	10/24/2019 06:31	WG1368527
Dibromomethane	U		0.117	0.500	1	10/24/2019 06:31	WG1368527
1,2-Dichlorobenzene	U	J0	0.101	0.500	1	10/24/2019 06:31	WG1368527
1,3-Dichlorobenzene	U	J0 J4	0.130	0.500	1	10/24/2019 06:31	WG1368527
1,4-Dichlorobenzene	U	J0 J4	0.121	0.500	1	10/24/2019 06:31	WG1368527
Dichlorodifluoromethane	U		0.127	2.50	1	10/24/2019 06:31	WG1368527
1,1-Dichloroethane	U		0.114	0.500	1	10/24/2019 06:31	WG1368527
1,2-Dichloroethane	U		0.108	0.500	1	10/24/2019 06:31	WG1368527
1,1-Dichloroethene	U		0.188	0.500	1	10/24/2019 06:31	WG1368527
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/24/2019 06:31	WG1368527
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/24/2019 06:31	WG1368527
1,2-Dichloropropane	U		0.190	0.500	1	10/24/2019 06:31	WG1368527
1,1-Dichloropropene	U		0.128	0.500	1	10/24/2019 06:31	WG1368527
1,3-Dichloropropane	U	J0 J4	0.147	1.00	1	10/24/2019 06:31	WG1368527
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/24/2019 06:31	WG1368527
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/24/2019 06:31	WG1368527
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/24/2019 06:31	WG1368527
2,2-Dichloropropane	U		0.0929	0.500	1	10/24/2019 06:31	WG1368527
Di-isopropyl ether	U		0.0924	0.500	1	10/24/2019 06:31	WG1368527
Ethylbenzene	U		0.158	0.500	1	10/24/2019 06:31	WG1368527
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/24/2019 06:31	WG1368527
2-Hexanone	U		0.757	5.00	1	10/24/2019 06:31	WG1368527
n-Hexane	U	J0	0.305	5.00	1	10/24/2019 06:31	WG1368527
Iodomethane	U		0.377	10.0	1	10/24/2019 06:31	WG1368527
Isopropylbenzene	U		0.126	0.500	1	10/24/2019 06:31	WG1368527
p-Isopropyltoluene	U		0.138	0.500	1	10/24/2019 06:31	WG1368527
2-Butanone (MEK)	U		1.28	5.00	1	10/24/2019 06:31	WG1368527
Methylene Chloride	U		1.07	2.50	1	10/24/2019 06:31	WG1368527
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/24/2019 06:31	WG1368527
Methyl tert-butyl ether	U		0.102	0.500	1	10/24/2019 06:31	WG1368527
Naphthalene	U		0.174	2.50	1	10/24/2019 06:31	WG1368527
n-Propylbenzene	U		0.162	0.500	1	10/24/2019 06:31	WG1368527
Styrene	U		0.117	0.500	1	10/24/2019 06:31	WG1368527
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/24/2019 06:31	WG1368527
1,1,2,2-Tetrachloroethane	U	J0	0.130	0.500	1	10/24/2019 06:31	WG1368527
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/24/2019 06:31	WG1368527
Tetrachloroethene	U		0.199	0.500	1	10/24/2019 06:31	WG1368527
Toluene	U		0.412	0.500	1	10/24/2019 06:31	WG1368527
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/24/2019 06:31	WG1368527
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/24/2019 06:31	WG1368527
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/24/2019 06:31	WG1368527
1,1,2-Trichloroethane	U	J0 J4	0.186	0.500	1	10/24/2019 06:31	WG1368527
Trichloroethene	U		0.153	0.500	1	10/24/2019 06:31	WG1368527
Trichlorofluoromethane	U		0.130	2.50	1	10/24/2019 06:31	WG1368527
1,2,3-Trichloropropane	U		0.247	2.50	1	10/24/2019 06:31	WG1368527
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/24/2019 06:31	WG1368527
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/24/2019 06:31	WG1368527
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/24/2019 06:31	WG1368527

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U	J0	0.645	5.00	1	10/24/2019 06:31	WG1368527
Vinyl chloride	U		0.118	0.500	1	10/24/2019 06:31	WG1368527
Xylenes, Total	U		0.316	1.50	1	10/24/2019 06:31	WG1368527
(S) Toluene-d8	*99.6*			*80.0-120*		*10/24/2019 06:31*	WG1368527
(S) 4-Bromofluorobenzene	*105*			*77.0-126*		*10/24/2019 06:31*	WG1368527
(S) 1,2-Dichloroethane-d4	*114*			*70.0-130*		*10/24/2019 06:31*	WG1368527

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	239000		2710	20000	1	10/22/2019 00:07	WG1366029

Sample Narrative:

L1150336-06 WG1366029: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	31600		51.9	1000	1	10/16/2019 20:35	WG1363847
Nitrate	U		22.7	100	1	10/16/2019 20:35	WG1363847
Sulfate	73800		77.4	5000	1	10/16/2019 20:35	WG1363847

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	2490	B	102	1000	1	10/19/2019 22:38	WG1365601

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	1160		15.0	100	1	10/22/2019 15:03	WG1364631
Manganese	320		0.250	5.00	1	10/22/2019 15:03	WG1364631

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/18/2019 15:31	WG1365317
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/18/2019 15:31*	WG1365317

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	384		0.287	0.678	1	10/17/2019 15:50	WG1364420
Ethane	U		0.296	1.29	1	10/17/2019 15:50	WG1364420
Ethene	U		0.422	1.27	1	10/17/2019 15:50	WG1364420

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U		1.05	25.0	1	10/24/2019 06:52	WG1368527
Acrylonitrile	U		0.873	5.00	1	10/24/2019 06:52	WG1368527
Benzene	U		0.0896	0.500	1	10/24/2019 06:52	WG1368527
Bromobenzene	U		0.133	0.500	1	10/24/2019 06:52	WG1368527
Bromodichloromethane	U		0.0800	0.500	1	10/24/2019 06:52	WG1368527
Bromochloromethane	U		0.145	0.500	1	10/24/2019 06:52	WG1368527
Bromoform	U		0.186	0.500	1	10/24/2019 06:52	WG1368527
Bromomethane	U		0.157	2.50	1	10/24/2019 06:52	WG1368527
n-Butylbenzene	U		0.143	0.500	1	10/24/2019 06:52	WG1368527
sec-Butylbenzene	U		0.134	0.500	1	10/24/2019 06:52	WG1368527
tert-Butylbenzene	U		0.183	0.500	1	10/24/2019 06:52	WG1368527
Carbon disulfide	U		0.101	0.500	1	10/24/2019 06:52	WG1368527
Carbon tetrachloride	U		0.159	0.500	1	10/24/2019 06:52	WG1368527

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/24/2019 06:52	WG1368527
Chlorodibromomethane	U	J0	0.128	0.500	1	10/24/2019 06:52	WG1368527
Chloroethane	U		0.141	2.50	1	10/24/2019 06:52	WG1368527
Chloroform	U		0.0860	0.500	1	10/24/2019 06:52	WG1368527
Chloromethane	U		0.153	1.25	1	10/24/2019 06:52	WG1368527
2-Chlorotoluene	U		0.111	0.500	1	10/24/2019 06:52	WG1368527
4-Chlorotoluene	U		0.0972	0.500	1	10/24/2019 06:52	WG1368527
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/24/2019 06:52	WG1368527
1,2-Dibromoethane	U		0.193	0.500	1	10/24/2019 06:52	WG1368527
Dibromomethane	U		0.117	0.500	1	10/24/2019 06:52	WG1368527
1,2-Dichlorobenzene	U	J0	0.101	0.500	1	10/24/2019 06:52	WG1368527
1,3-Dichlorobenzene	U	J0 J4	0.130	0.500	1	10/24/2019 06:52	WG1368527
1,4-Dichlorobenzene	U	J0 J4	0.121	0.500	1	10/24/2019 06:52	WG1368527
Dichlorodifluoromethane	U		0.127	2.50	1	10/24/2019 06:52	WG1368527
1,1-Dichloroethane	U		0.114	0.500	1	10/24/2019 06:52	WG1368527
1,2-Dichloroethane	U		0.108	0.500	1	10/24/2019 06:52	WG1368527
1,1-Dichloroethene	U		0.188	0.500	1	10/24/2019 06:52	WG1368527
cis-1,2-Dichloroethene	0.408	J	0.0933	0.500	1	10/24/2019 06:52	WG1368527
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/24/2019 06:52	WG1368527
1,2-Dichloropropane	U		0.190	0.500	1	10/24/2019 06:52	WG1368527
1,1-Dichloropropene	U		0.128	0.500	1	10/24/2019 06:52	WG1368527
1,3-Dichloropropane	U	J0 J4	0.147	1.00	1	10/24/2019 06:52	WG1368527
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/24/2019 06:52	WG1368527
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/24/2019 06:52	WG1368527
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/24/2019 06:52	WG1368527
2,2-Dichloropropane	U		0.0929	0.500	1	10/24/2019 06:52	WG1368527
Di-isopropyl ether	U		0.0924	0.500	1	10/24/2019 06:52	WG1368527
Ethylbenzene	U		0.158	0.500	1	10/24/2019 06:52	WG1368527
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/24/2019 06:52	WG1368527
2-Hexanone	U		0.757	5.00	1	10/24/2019 06:52	WG1368527
n-Hexane	U	J0	0.305	5.00	1	10/24/2019 06:52	WG1368527
Iodomethane	U		0.377	10.0	1	10/24/2019 06:52	WG1368527
Isopropylbenzene	U		0.126	0.500	1	10/24/2019 06:52	WG1368527
p-Isopropyltoluene	U		0.138	0.500	1	10/24/2019 06:52	WG1368527
2-Butanone (MEK)	U		1.28	5.00	1	10/24/2019 06:52	WG1368527
Methylene Chloride	U		1.07	2.50	1	10/24/2019 06:52	WG1368527
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/24/2019 06:52	WG1368527
Methyl tert-butyl ether	U		0.102	0.500	1	10/24/2019 06:52	WG1368527
Naphthalene	U		0.174	2.50	1	10/24/2019 06:52	WG1368527
n-Propylbenzene	U		0.162	0.500	1	10/24/2019 06:52	WG1368527
Styrene	U		0.117	0.500	1	10/24/2019 06:52	WG1368527
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/24/2019 06:52	WG1368527
1,1,2,2-Tetrachloroethane	U	J0	0.130	0.500	1	10/24/2019 06:52	WG1368527
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/24/2019 06:52	WG1368527
Tetrachloroethene	U		0.199	0.500	1	10/24/2019 06:52	WG1368527
Toluene	U		0.412	0.500	1	10/24/2019 06:52	WG1368527
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/24/2019 06:52	WG1368527
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/24/2019 06:52	WG1368527
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/24/2019 06:52	WG1368527
1,1,2-Trichloroethane	U	J0 J4	0.186	0.500	1	10/24/2019 06:52	WG1368527
Trichloroethene	0.350	J	0.153	0.500	1	10/24/2019 06:52	WG1368527
Trichlorofluoromethane	U		0.130	2.50	1	10/24/2019 06:52	WG1368527
1,2,3-Trichloropropane	U		0.247	2.50	1	10/24/2019 06:52	WG1368527
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/24/2019 06:52	WG1368527
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/24/2019 06:52	WG1368527
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/24/2019 06:52	WG1368527

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U	J0	0.645	5.00	1	10/24/2019 06:52	WG1368527
Vinyl chloride	7.36		0.118	0.500	1	10/24/2019 06:52	WG1368527
Xylenes, Total	U		0.316	1.50	1	10/24/2019 06:52	WG1368527
(S) Toluene-d8	*99.4*			*80.0-120*		*10/24/2019 06:52*	WG1368527
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/24/2019 06:52*	WG1368527
(S) 1,2-Dichloroethane-d4	*113*			*70.0-130*		*10/24/2019 06:52*	WG1368527

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	465000		2710	20000	1	10/22/2019 00:15	WG1366029

Sample Narrative:

L1150336-07 WG1366029: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	19300		51.9	1000	1	10/16/2019 20:47	WG1363847
Nitrate	U		22.7	100	1	10/16/2019 20:47	WG1363847
Sulfate	73200		77.4	5000	1	10/16/2019 20:47	WG1363847

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	7050		102	1000	1	10/19/2019 23:00	WG1365601

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	1290		15.0	100	1	10/22/2019 15:07	WG1364631
Manganese	3430		0.250	5.00	1	10/22/2019 15:07	WG1364631

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	5020		0.287	0.678	1	10/17/2019 15:53	WG1364420
Ethane	U		0.296	1.29	1	10/17/2019 15:53	WG1364420
Ethene	U		0.422	1.27	1	10/17/2019 15:53	WG1364420

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.11	J	1.05	25.0	1	10/24/2019 07:12	WG1368527
Acrylonitrile	U		0.873	5.00	1	10/24/2019 07:12	WG1368527
Benzene	0.233	J	0.0896	0.500	1	10/24/2019 07:12	WG1368527
Bromobenzene	U		0.133	0.500	1	10/24/2019 07:12	WG1368527
Bromodichloromethane	U		0.0800	0.500	1	10/24/2019 07:12	WG1368527
Bromochloromethane	U		0.145	0.500	1	10/24/2019 07:12	WG1368527
Bromoform	U		0.186	0.500	1	10/24/2019 07:12	WG1368527
Bromomethane	U		0.157	2.50	1	10/24/2019 07:12	WG1368527
n-Butylbenzene	U		0.143	0.500	1	10/24/2019 07:12	WG1368527
sec-Butylbenzene	U		0.134	0.500	1	10/24/2019 07:12	WG1368527
tert-Butylbenzene	U		0.183	0.500	1	10/24/2019 07:12	WG1368527
Carbon disulfide	U		0.101	0.500	1	10/24/2019 07:12	WG1368527
Carbon tetrachloride	U		0.159	0.500	1	10/24/2019 07:12	WG1368527
Chlorobenzene	U		0.140	0.500	1	10/24/2019 07:12	WG1368527
Chlorodibromomethane	U	J0	0.128	0.500	1	10/24/2019 07:12	WG1368527
Chloroethane	U		0.141	2.50	1	10/24/2019 07:12	WG1368527
Chloroform	U		0.0860	0.500	1	10/24/2019 07:12	WG1368527
Chloromethane	U		0.153	1.25	1	10/24/2019 07:12	WG1368527
2-Chlorotoluene	U		0.111	0.500	1	10/24/2019 07:12	WG1368527
4-Chlorotoluene	U		0.0972	0.500	1	10/24/2019 07:12	WG1368527

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/24/2019 07:12	WG1368527
1,2-Dibromoethane	U		0.193	0.500	1	10/24/2019 07:12	WG1368527
Dibromomethane	U		0.117	0.500	1	10/24/2019 07:12	WG1368527
1,2-Dichlorobenzene	U	J0	0.101	0.500	1	10/24/2019 07:12	WG1368527
1,3-Dichlorobenzene	U	J0 J4	0.130	0.500	1	10/24/2019 07:12	WG1368527
1,4-Dichlorobenzene	U	J0 J4	0.121	0.500	1	10/24/2019 07:12	WG1368527
Dichlorodifluoromethane	U		0.127	2.50	1	10/24/2019 07:12	WG1368527
1,1-Dichloroethane	U		0.114	0.500	1	10/24/2019 07:12	WG1368527
1,2-Dichloroethane	U		0.108	0.500	1	10/24/2019 07:12	WG1368527
1,1-Dichloroethene	5.01		0.188	0.500	1	10/24/2019 07:12	WG1368527
cis-1,2-Dichloroethene	574		4.67	25.0	50	10/24/2019 21:32	WG1369128
trans-1,2-Dichloroethene	3.86		0.152	0.500	1	10/24/2019 07:12	WG1368527
1,2-Dichloropropane	U		0.190	0.500	1	10/24/2019 07:12	WG1368527
1,1-Dichloropropene	U		0.128	0.500	1	10/24/2019 07:12	WG1368527
1,3-Dichloropropane	U	J0 J4	0.147	1.00	1	10/24/2019 07:12	WG1368527
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/24/2019 07:12	WG1368527
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/24/2019 07:12	WG1368527
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/24/2019 07:12	WG1368527
2,2-Dichloropropane	U		0.0929	0.500	1	10/24/2019 07:12	WG1368527
Di-isopropyl ether	U		0.0924	0.500	1	10/24/2019 07:12	WG1368527
Ethylbenzene	U		0.158	0.500	1	10/24/2019 07:12	WG1368527
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/24/2019 07:12	WG1368527
2-Hexanone	U		0.757	5.00	1	10/24/2019 07:12	WG1368527
n-Hexane	U	J0	0.305	5.00	1	10/24/2019 07:12	WG1368527
Iodomethane	U		0.377	10.0	1	10/24/2019 07:12	WG1368527
Isopropylbenzene	U		0.126	0.500	1	10/24/2019 07:12	WG1368527
p-Isopropyltoluene	U		0.138	0.500	1	10/24/2019 07:12	WG1368527
2-Butanone (MEK)	U		1.28	5.00	1	10/24/2019 07:12	WG1368527
Methylene Chloride	U		1.07	2.50	1	10/24/2019 07:12	WG1368527
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/24/2019 07:12	WG1368527
Methyl tert-butyl ether	U		0.102	0.500	1	10/24/2019 07:12	WG1368527
Naphthalene	U		0.174	2.50	1	10/24/2019 07:12	WG1368527
n-Propylbenzene	U		0.162	0.500	1	10/24/2019 07:12	WG1368527
Styrene	U		0.117	0.500	1	10/24/2019 07:12	WG1368527
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/24/2019 07:12	WG1368527
1,1,2,2-Tetrachloroethane	U	J0	0.130	0.500	1	10/24/2019 07:12	WG1368527
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/24/2019 07:12	WG1368527
Tetrachloroethene	1180		9.95	25.0	50	10/24/2019 21:32	WG1369128
Toluene	U		0.412	0.500	1	10/24/2019 07:12	WG1368527
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/24/2019 07:12	WG1368527
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/24/2019 07:12	WG1368527
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/24/2019 07:12	WG1368527
1,1,2-Trichloroethane	U	J0 J4	0.186	0.500	1	10/24/2019 07:12	WG1368527
Trichloroethene	498		7.65	25.0	50	10/24/2019 21:32	WG1369128
Trichlorofluoromethane	U		0.130	2.50	1	10/24/2019 07:12	WG1368527
1,2,3-Trichloropropane	U		0.247	2.50	1	10/24/2019 07:12	WG1368527
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/24/2019 07:12	WG1368527
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/24/2019 07:12	WG1368527
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/24/2019 07:12	WG1368527
Vinyl acetate	U	J0	0.645	5.00	1	10/24/2019 07:12	WG1368527
Vinyl chloride	0.853		0.118	0.500	1	10/24/2019 07:12	WG1368527
Xylenes, Total	U		0.316	1.50	1	10/24/2019 07:12	WG1368527
(S) Toluene-d8	*98.6*			*80.0-120*		*10/24/2019 07:12*	WG1368527
(S) Toluene-d8	*112*			*80.0-120*		*10/24/2019 21:32*	WG1369128
(S) 4-Bromofluorobenzene	*107*			*77.0-126*		*10/24/2019 07:12*	WG1368527
(S) 4-Bromofluorobenzene	*112*			*77.0-126*		*10/24/2019 21:32*	WG1369128

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
(S) 1,2-Dichloroethane-d4	*114*			*70.0-130*		*10/24/2019 07:12*	WG1368527
(S) 1,2-Dichloroethane-d4	*110*			*70.0-130*		*10/24/2019 21:32*	WG1369128

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	174000		2710	20000	1	10/22/2019 00:22	WG1366029

Sample Narrative:

L1150336-08 WG1366029: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	10500		51.9	1000	1	10/16/2019 21:00	WG1363847
Nitrate	U		22.7	100	1	10/16/2019 21:00	WG1363847
Sulfate	8290		77.4	5000	1	10/16/2019 21:00	WG1363847

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	2320	B	102	1000	1	10/19/2019 23:20	WG1365601

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	6770		15.0	100	1	10/22/2019 15:10	WG1364631
Manganese	420		0.250	5.00	1	10/22/2019 15:10	WG1364631

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/18/2019 18:42	WG1365317
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/18/2019 18:42*	WG1365317

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	20.2		0.287	0.678	1	10/18/2019 13:10	WG1365165
Ethane	U		0.296	1.29	1	10/18/2019 13:10	WG1365165
Ethene	U		0.422	1.27	1	10/18/2019 13:10	WG1365165

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/25/2019 22:30	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/25/2019 22:30	WG1369955
Benzene	U		0.0896	0.500	1	10/25/2019 22:30	WG1369955
Bromobenzene	U	J0	0.133	0.500	1	10/25/2019 22:30	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/25/2019 22:30	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/25/2019 22:30	WG1369955
Bromoform	U		0.186	0.500	1	10/25/2019 22:30	WG1369955
Bromomethane	U		0.157	2.50	1	10/25/2019 22:30	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/25/2019 22:30	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/25/2019 22:30	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/25/2019 22:30	WG1369955
Carbon disulfide	U		0.101	0.500	1	10/25/2019 22:30	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/25/2019 22:30	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/25/2019 22:30	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/25/2019 22:30	WG1369955
Chloroethane	U		0.141	2.50	1	10/25/2019 22:30	WG1369955
Chloroform	U		0.0860	0.500	1	10/25/2019 22:30	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/25/2019 22:30	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/25/2019 22:30	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/25/2019 22:30	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/25/2019 22:30	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/25/2019 22:30	WG1369955
Dibromomethane	U		0.117	0.500	1	10/25/2019 22:30	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/25/2019 22:30	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/25/2019 22:30	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/25/2019 22:30	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/25/2019 22:30	WG1369955
1,1-Dichloroethane	U		0.114	0.500	1	10/25/2019 22:30	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/25/2019 22:30	WG1369955
1,1-Dichloroethene	U		0.188	0.500	1	10/25/2019 22:30	WG1369955
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/25/2019 22:30	WG1369955
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/25/2019 22:30	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/25/2019 22:30	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/25/2019 22:30	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/25/2019 22:30	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/25/2019 22:30	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/25/2019 22:30	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/25/2019 22:30	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/25/2019 22:30	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/25/2019 22:30	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/25/2019 22:30	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/25/2019 22:30	WG1369955
2-Hexanone	U		0.757	5.00	1	10/25/2019 22:30	WG1369955
n-Hexane	U		0.305	5.00	1	10/25/2019 22:30	WG1369955
Iodomethane	U		0.377	10.0	1	10/25/2019 22:30	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/25/2019 22:30	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/25/2019 22:30	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/25/2019 22:30	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/25/2019 22:30	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/25/2019 22:30	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/25/2019 22:30	WG1369955
Naphthalene	U		0.174	2.50	1	10/25/2019 22:30	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/25/2019 22:30	WG1369955
Styrene	U		0.117	0.500	1	10/25/2019 22:30	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/25/2019 22:30	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/25/2019 22:30	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/25/2019 22:30	WG1369955
Tetrachloroethene	U		0.199	0.500	1	10/25/2019 22:30	WG1369955
Toluene	U		0.412	0.500	1	10/25/2019 22:30	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/25/2019 22:30	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/25/2019 22:30	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/25/2019 22:30	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/25/2019 22:30	WG1369955
Trichloroethene	U		0.153	0.500	1	10/25/2019 22:30	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/25/2019 22:30	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/25/2019 22:30	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/25/2019 22:30	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/25/2019 22:30	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/25/2019 22:30	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/25/2019 22:30	WG1369955
Vinyl chloride	U		0.118	0.500	1	10/25/2019 22:30	WG1369955
Xylenes, Total	U		0.316	1.50	1	10/25/2019 22:30	WG1369955
(S) Toluene-d8	*112*			*80.0-120*		*10/25/2019 22:30*	WG1369955
(S) 4-Bromofluorobenzene	*113*			*77.0-126*		*10/25/2019 22:30*	WG1369955
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*		*10/25/2019 22:30*	WG1369955

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	667000		2710	20000	1	10/22/2019 00:30	WG1366029

Sample Narrative:

L1150336-09 WG1366029: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	26100		51.9	1000	1	10/16/2019 21:13	WG1363847
Nitrate	U		22.7	100	1	10/16/2019 21:13	WG1363847
Sulfate	68700		77.4	5000	1	10/16/2019 21:13	WG1363847

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	11300		102	1000	1	10/19/2019 23:45	WG1365601

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	4600		15.0	100	1	10/22/2019 15:14	WG1364631
Manganese	1170		0.250	5.00	1	10/22/2019 15:14	WG1364631

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	365		31.6	100	1	10/18/2019 19:06	WG1365317
(S) a,a,a-Trifluorotoluene(FID)	*108*			*78.0-120*		*10/18/2019 19:06*	WG1365317

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	12900		2.87	6.78	10	10/18/2019 13:13	WG1365165
Ethane	34.1		0.296	1.29	1	10/17/2019 15:55	WG1364420
Ethene	29.6		0.422	1.27	1	10/17/2019 15:55	WG1364420

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.21	J J0	1.05	25.0	1	10/25/2019 22:50	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/25/2019 22:50	WG1369955
Benzene	0.167	J	0.0896	0.500	1	10/25/2019 22:50	WG1369955
Bromobenzene	U	J0	0.133	0.500	1	10/25/2019 22:50	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/25/2019 22:50	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/25/2019 22:50	WG1369955
Bromoform	U		0.186	0.500	1	10/25/2019 22:50	WG1369955
Bromomethane	U		0.157	2.50	1	10/25/2019 22:50	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/25/2019 22:50	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/25/2019 22:50	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/25/2019 22:50	WG1369955
Carbon disulfide	0.342	J	0.101	0.500	1	10/25/2019 22:50	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/25/2019 22:50	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/25/2019 22:50	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/25/2019 22:50	WG1369955
Chloroethane	3.45		0.141	2.50	1	10/25/2019 22:50	WG1369955
Chloroform	U		0.0860	0.500	1	10/25/2019 22:50	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/25/2019 22:50	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/25/2019 22:50	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/25/2019 22:50	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/25/2019 22:50	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/25/2019 22:50	WG1369955
Dibromomethane	U		0.117	0.500	1	10/25/2019 22:50	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/25/2019 22:50	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/25/2019 22:50	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/25/2019 22:50	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/25/2019 22:50	WG1369955
1,1-Dichloroethane	U		0.114	0.500	1	10/25/2019 22:50	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/25/2019 22:50	WG1369955
1,1-Dichloroethene	3.27		0.188	0.500	1	10/25/2019 22:50	WG1369955
cis-1,2-Dichloroethene	333		0.933	5.00	10	10/27/2019 15:29	WG1370146
trans-1,2-Dichloroethene	7.04		0.152	0.500	1	10/25/2019 22:50	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/25/2019 22:50	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/25/2019 22:50	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/25/2019 22:50	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/25/2019 22:50	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/25/2019 22:50	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/25/2019 22:50	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/25/2019 22:50	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/25/2019 22:50	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/25/2019 22:50	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/25/2019 22:50	WG1369955
2-Hexanone	U		0.757	5.00	1	10/25/2019 22:50	WG1369955
n-Hexane	U		0.305	5.00	1	10/25/2019 22:50	WG1369955
Iodomethane	U		0.377	10.0	1	10/25/2019 22:50	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/25/2019 22:50	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/25/2019 22:50	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/25/2019 22:50	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/25/2019 22:50	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/25/2019 22:50	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/25/2019 22:50	WG1369955
Naphthalene	U		0.174	2.50	1	10/25/2019 22:50	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/25/2019 22:50	WG1369955
Styrene	U		0.117	0.500	1	10/25/2019 22:50	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/25/2019 22:50	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/25/2019 22:50	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/25/2019 22:50	WG1369955
Tetrachloroethene	41.7		0.199	0.500	1	10/25/2019 22:50	WG1369955
Toluene	0.572		0.412	0.500	1	10/25/2019 22:50	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/25/2019 22:50	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/25/2019 22:50	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/25/2019 22:50	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/25/2019 22:50	WG1369955
Trichloroethene	138		0.153	0.500	1	10/25/2019 22:50	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/25/2019 22:50	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/25/2019 22:50	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/25/2019 22:50	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/25/2019 22:50	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/25/2019 22:50	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/25/2019 22:50	WG1369955
Vinyl chloride	216		1.18	5.00	10	10/27/2019 15:29	WG1370146
Xylenes, Total	U		0.316	1.50	1	10/25/2019 22:50	WG1369955
(S) Toluene-d8	*111*			*80.0-120*		*10/25/2019 22:50*	WG1369955
(S) Toluene-d8	*95.1*			*80.0-120*		*10/27/2019 15:29*	WG1370146
(S) 4-Bromofluorobenzene	*112*			*77.0-126*		*10/25/2019 22:50*	WG1369955
(S) 4-Bromofluorobenzene	*92.2*			*77.0-126*		*10/27/2019 15:29*	WG1370146
(S) 1,2-Dichloroethane-d4	*104*			*70.0-130*		*10/25/2019 22:50*	WG1369955
(S) 1,2-Dichloroethane-d4	*101*			*70.0-130*		*10/27/2019 15:29*	WG1370146

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/18/2019 12:20	WG1365317
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/18/2019 12:20*	WG1365317

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	U		1.05	25.0	1	10/26/2019 14:49	WG1370189
Acrylonitrile	U		0.873	5.00	1	10/26/2019 14:49	WG1370189
Benzene	U		0.0896	0.500	1	10/26/2019 14:49	WG1370189
Bromobenzene	U		0.133	0.500	1	10/26/2019 14:49	WG1370189
Bromodichloromethane	U		0.0800	0.500	1	10/26/2019 14:49	WG1370189
Bromochloromethane	U		0.145	0.500	1	10/26/2019 14:49	WG1370189
Bromoform	U		0.186	0.500	1	10/26/2019 14:49	WG1370189
Bromomethane	U	J0	0.157	2.50	1	10/26/2019 14:49	WG1370189
n-Butylbenzene	U		0.143	0.500	1	10/26/2019 14:49	WG1370189
sec-Butylbenzene	U		0.134	0.500	1	10/26/2019 14:49	WG1370189
tert-Butylbenzene	U		0.183	0.500	1	10/26/2019 14:49	WG1370189
Carbon disulfide	0.146	J	0.101	0.500	1	10/26/2019 14:49	WG1370189
Carbon tetrachloride	U		0.159	0.500	1	10/26/2019 14:49	WG1370189
Chlorobenzene	U		0.140	0.500	1	10/26/2019 14:49	WG1370189
Chlorodibromomethane	U		0.128	0.500	1	10/26/2019 14:49	WG1370189
Chloroethane	U		0.141	2.50	1	10/26/2019 14:49	WG1370189
Chloroform	U		0.0860	0.500	1	10/26/2019 14:49	WG1370189
Chloromethane	U		0.153	1.25	1	10/26/2019 14:49	WG1370189
2-Chlorotoluene	U		0.111	0.500	1	10/26/2019 14:49	WG1370189
4-Chlorotoluene	U		0.0972	0.500	1	10/26/2019 14:49	WG1370189
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/26/2019 14:49	WG1370189
1,2-Dibromoethane	U		0.193	0.500	1	10/26/2019 14:49	WG1370189
Dibromomethane	U		0.117	0.500	1	10/26/2019 14:49	WG1370189
1,2-Dichlorobenzene	U		0.101	0.500	1	10/26/2019 14:49	WG1370189
1,3-Dichlorobenzene	U		0.130	0.500	1	10/26/2019 14:49	WG1370189
1,4-Dichlorobenzene	U		0.121	0.500	1	10/26/2019 14:49	WG1370189
Dichlorodifluoromethane	U		0.127	2.50	1	10/26/2019 14:49	WG1370189
1,1-Dichloroethane	U		0.114	0.500	1	10/26/2019 14:49	WG1370189
1,2-Dichloroethane	U		0.108	0.500	1	10/26/2019 14:49	WG1370189
1,1-Dichloroethene	U		0.188	0.500	1	10/26/2019 14:49	WG1370189
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/26/2019 14:49	WG1370189
trans-1,2-Dichloroethene	0.365	J	0.152	0.500	1	10/26/2019 14:49	WG1370189
1,2-Dichloropropane	U		0.190	0.500	1	10/26/2019 14:49	WG1370189
1,1-Dichloropropene	U		0.128	0.500	1	10/26/2019 14:49	WG1370189
1,3-Dichloropropane	U		0.147	1.00	1	10/26/2019 14:49	WG1370189
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/26/2019 14:49	WG1370189
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/26/2019 14:49	WG1370189
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/26/2019 14:49	WG1370189
2,2-Dichloropropane	U		0.0929	0.500	1	10/26/2019 14:49	WG1370189
Di-isopropyl ether	U		0.0924	0.500	1	10/26/2019 14:49	WG1370189
Ethylbenzene	U		0.158	0.500	1	10/26/2019 14:49	WG1370189
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/26/2019 14:49	WG1370189
2-Hexanone	U		0.757	5.00	1	10/26/2019 14:49	WG1370189
n-Hexane	U		0.305	5.00	1	10/26/2019 14:49	WG1370189
Iodomethane	U	J0	0.377	10.0	1	10/26/2019 14:49	WG1370189
Isopropylbenzene	U	J0	0.126	0.500	1	10/26/2019 14:49	WG1370189
p-Isopropyltoluene	U		0.138	0.500	1	10/26/2019 14:49	WG1370189
2-Butanone (MEK)	U		1.28	5.00	1	10/26/2019 14:49	WG1370189

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methylene Chloride	U		1.07	2.50	1	10/26/2019 14:49	WG1370189
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/26/2019 14:49	WG1370189
Methyl tert-butyl ether	U		0.102	0.500	1	10/26/2019 14:49	WG1370189
Naphthalene	0.910	B J	0.174	2.50	1	10/26/2019 14:49	WG1370189
n-Propylbenzene	U		0.162	0.500	1	10/26/2019 14:49	WG1370189
Styrene	U		0.117	0.500	1	10/26/2019 14:49	WG1370189
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/26/2019 14:49	WG1370189
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/26/2019 14:49	WG1370189
1,1,2-Trichlorotrifluoroethane	U	J0	0.164	0.500	1	10/26/2019 14:49	WG1370189
Tetrachloroethene	U		0.199	0.500	1	10/26/2019 14:49	WG1370189
Toluene	U		0.412	0.500	1	10/26/2019 14:49	WG1370189
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/26/2019 14:49	WG1370189
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/26/2019 14:49	WG1370189
1,1,1-Trichloroethane	U	J0	0.0940	0.500	1	10/26/2019 14:49	WG1370189
1,1,2-Trichloroethane	U		0.186	0.500	1	10/26/2019 14:49	WG1370189
Trichloroethene	U	J0	0.153	0.500	1	10/26/2019 14:49	WG1370189
Trichlorofluoromethane	U		0.130	2.50	1	10/26/2019 14:49	WG1370189
1,2,3-Trichloropropane	U		0.247	2.50	1	10/26/2019 14:49	WG1370189
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/26/2019 14:49	WG1370189
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/26/2019 14:49	WG1370189
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/26/2019 14:49	WG1370189
Vinyl acetate	U		0.645	5.00	1	10/26/2019 14:49	WG1370189
Vinyl chloride	U		0.118	0.500	1	10/26/2019 14:49	WG1370189
Xylenes, Total	U		0.316	1.50	1	10/26/2019 14:49	WG1370189
(S) Toluene-d8	*97.4*			*80.0-120*		*10/26/2019 14:49*	WG1370189
(S) 4-Bromofluorobenzene	*94.4*			*77.0-126*		*10/26/2019 14:49*	WG1370189
(S) 1,2-Dichloroethane-d4	*97.1*			*70.0-130*		*10/26/2019 14:49*	WG1370189

Method Blank (MB)

(MB) R3463464-1 10/22/19 02:58

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Alkalinity	3910	J	2710	20000

Sample Narrative:

BLANK: Endpoint pH 4.5

L1149909-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1149909-01 10/22/19 03:44 • (DUP) R3463464-2 10/22/19 03:51

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	369000	368000	1	0.0475		20

Sample Narrative:

OS: Endpoint pH 4.5 headspace

DUP: Endpoint pH 4.5

L1150335-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1150335-01 10/22/19 05:21 • (DUP) R3463464-4 10/22/19 05:28

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	532000	533000	1	0.296		20

Sample Narrative:

OS: Endpoint pH 4.5 headspace

DUP: Endpoint pH 4.5

Laboratory Control Sample (LCS)

(LCS) R3463464-3 10/22/19 04:14

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Alkalinity	100000	103000	103	85.0-115	

Sample Narrative:

LCS: Endpoint pH 4.5

Method Blank (MB)

(MB) R3463428-1 10/21/19 21:12

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Alkalinity	4460	J	2710	20000

Sample Narrative:

BLANK: Endpoint pH 4.5

L1150748-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1150748-01 10/21/19 23:29 • (DUP) R3463428-2 10/21/19 23:37

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	50300	50300	1	0.0876		20

Sample Narrative:

OS: Endpoint pH 4.5 headspace

DUP: Endpoint pH 4.5

L1150748-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1150748-06 10/22/19 02:05 • (DUP) R3463428-4 10/22/19 02:13

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	33700	33600	1	0.291		20

Sample Narrative:

OS: Endpoint pH 4.5 headspace

DUP: Endpoint pH 4.5

Laboratory Control Sample (LCS)

(LCS) R3463428-3 10/22/19 00:37

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Alkalinity	100000	101000	101	85.0-115	

Sample Narrative:

LCS: Endpoint pH 4.5

Method Blank (MB)

(MB) R3461831-1 10/16/19 10:40

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	U		51.9	1000
Nitrate	U		22.7	100
Sulfate	86.7	J	77.4	5000

L1150320-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1150320-06 10/16/19 15:41 • (DUP) R3461831-3 10/16/19 15:54

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	10000	9910	1	1.39		15
Nitrate	49.4	47.0	1	4.98	J	15
Sulfate	15300	15200	1	1.07		15

L1150339-10 Original Sample (OS) • Duplicate (DUP)

(OS) L1150339-10 10/16/19 21:26 • (DUP) R3461831-5 10/16/19 21:38

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	72100	72300	1	0.176		15
Nitrate	U	0.000	1	0.000		15

Laboratory Control Sample (LCS)

(LCS) R3461831-2 10/16/19 10:53

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	39800	99.5	80.0-120	
Nitrate	8000	8190	102	80.0-120	
Sulfate	40000	40300	101	80.0-120	

L1150320-09 Original Sample (OS) • Matrix Spike (MS)

(OS) L1150320-09 10/16/19 16:06 • (MS) R3461831-4 10/16/19 16:19

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	26500	75200	97.5	1	80.0-120	
Nitrate	5000	211	5210	100	1	80.0-120	

L1150320-09 Original Sample (OS) • Matrix Spike (MS)

(OS) L1150320-09 10/16/19 16:06 • (MS) R3461831-4 10/16/19 16:19

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Sulfate	50000	45400	93100	95.4	1	80.0-120	

L1150339-10 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150339-10 10/16/19 21:26 • (MS) R3461831-6 10/16/19 21:51 • (MSD) R3461831-7 10/16/19 22:04

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	72100	118000	118000	92.0	91.2	1	80.0-120	E	E	0.350	15
Nitrate	5000	U	5080	5060	102	101	1	80.0-120			0.483	15

Method Blank (MB)

(MB) R3462895-1 10/19/19 12:52

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
TOC (Total Organic Carbon)	581	J	102	1000

L1150336-03 Original Sample (OS) • Duplicate (DUP)

(OS) L1150336-03 10/19/19 19:28 • (DUP) R3462895-3 10/19/19 19:42

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	3340	3330	1	0.450		20

L1150336-09 Original Sample (OS) • Duplicate (DUP)

(OS) L1150336-09 10/19/19 23:45 • (DUP) R3462895-6 10/20/19 00:08

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	11300	11200	1	0.979		20

Laboratory Control Sample (LCS)

(LCS) R3462895-2 10/19/19 13:37

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TOC (Total Organic Carbon)	75000	68400	91.2	85.0-115	

L1150336-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150336-05 10/19/19 21:31 • (MS) R3462895-4 10/19/19 21:54 • (MSD) R3462895-5 10/19/19 22:16

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	2320	50000	48000	95.4	91.4	1	80.0-120			4.08	20

L1150505-08 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150505-08 10/20/19 02:35 • (MS) R3462895-7 10/20/19 02:53 • (MSD) R3462895-8 10/20/19 03:20

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	843	47200	46900	92.8	92.0	1	80.0-120			0.829	20

Method Blank (MB)

(MB) R3463726-1 10/22/19 14:02

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Iron	U		15.0	100
Manganese	0.261	J	0.250	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3463726-2 10/22/19 14:05 • (LCSD) R3463726-3 10/22/19 14:09

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Iron	5000	4950	5110	99.0	102	80.0-120			3.11	20
Manganese	50.0	48.7	50.4	97.4	101	80.0-120			3.49	20

L1150336-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150336-01 10/22/19 14:13 • (MS) R3463726-5 10/22/19 14:20 • (MSD) R3463726-6 10/22/19 14:24

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Iron	5000	388	5490	5310	102	98.5	1	75.0-125			3.27	20
Manganese	50.0	327	385	372	117	90.5	1	75.0-125			3.44	20

Method Blank (MB)

(MB) R3462806-3 10/18/19 11:29

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Gasoline Range Organics-NWTPH	U		31.6	100
(S) a,a,a-Trifluorotoluene(FID)	*108*			*78.0-120*

Laboratory Control Sample (LCS)

(LCS) R3462806-2 10/18/19 10:41

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Gasoline Range Organics-NWTPH	5500	5940	108	70.0-124	
(S) a,a,a-Trifluorotoluene(FID)			*86.7*	*78.0-120*	

Method Blank (MB)

(MB) R3462155-1 10/17/19 14:17

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1150299-08 Original Sample (OS) • Duplicate (DUP)

(OS) L1150299-08 10/17/19 14:54 • (DUP) R3462155-2 10/17/19 15:03

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	247	242	1	2.20		20
Ethane	U	0.000	1	0.000		20
Ethene	U	0.000	1	0.000		20

L1150336-03 Original Sample (OS) • Duplicate (DUP)

(OS) L1150336-03 10/17/19 16:04 • (DUP) R3462155-4 10/17/19 16:09

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	U	0.000	1	0.000		20
Ethane	U	0.000	1	0.000		20
Ethene	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3462155-3 10/17/19 16:00 • (LCSD) R3462155-5 10/17/19 16:12

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	73.1	69.7	108	103	85.0-115			4.87	20
Ethane	129	129	127	100	98.1	85.0-115			1.96	20
Ethene	127	136	133	107	104	85.0-115			2.30	20

Method Blank (MB)

(MB) R3462507-1 10/18/19 13:05

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1150336-08 Original Sample (OS) • Duplicate (DUP)

(OS) L1150336-08 10/18/19 13:10 • (DUP) R3462507-2 10/18/19 13:33

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	20.2	22.0	1	8.39		20
Ethane	U	0.000	1	0.000		20
Ethene	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3462507-5 10/18/19 13:50 • (LCSD) R3462507-6 10/18/19 13:56

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	72.3	71.6	107	106	85.0-115			0.913	20
Ethane	129	127	127	98.2	98.7	85.0-115			0.516	20
Ethene	127	133	133	105	105	85.0-115			0.356	20

L1150339-10 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150339-10 10/18/19 13:42 • (MS) R3462507-3 10/18/19 13:45 • (MSD) R3462507-4 10/18/19 13:47

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	ug/l	%	%		%			%	%
Methane	67.8	10400	10600	11000	19.7	74.1	10	85.0-115	V	V	3.43	20
Ethane	129	380	1800	1480	110	85.0	10	85.0-115			19.6	20
Ethene	127	741	2220	1900	116	91.0	10	85.0-115	J5		15.6	20

Method Blank (MB)

(MB) R3464735-2 10/23/19 22:46

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U	J0	0.101	0.500
1,3-Dichlorobenzene	U	J0	0.130	0.500
1,4-Dichlorobenzene	U	J0	0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U	J0	0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3464735-2 10/23/19 22:46

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	0.419	J	0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U	J0	0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	0.220	J	0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U	J0	0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	0.169	J	0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U	J0	0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U	J0	0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*102*			*80.0-120*
(S) 4-Bromofluorobenzene	*105*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3464735-1 10/23/19 22:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	102	81.6	19.0-160	
Acrylonitrile	125	108	86.4	55.0-149	
Benzene	25.0	21.5	86.0	70.0-123	
Bromobenzene	25.0	20.0	80.0	73.0-121	
Bromodichloromethane	25.0	24.5	98.0	75.0-120	
Bromochloromethane	25.0	23.0	92.0	76.0-122	
Bromoform	25.0	22.5	90.0	68.0-132	
Bromomethane	25.0	23.5	94.0	10.0-160	
n-Butylbenzene	25.0	21.2	84.8	73.0-125	
sec-Butylbenzene	25.0	21.6	86.4	75.0-125	
tert-Butylbenzene	25.0	22.4	89.6	76.0-124	
Carbon disulfide	25.0	22.0	88.0	61.0-128	
Carbon tetrachloride	25.0	27.9	112	68.0-126	
Chlorobenzene	25.0	20.5	82.0	80.0-121	
Chlorodibromomethane	25.0	19.5	78.0	77.0-125	
Chloroethane	25.0	23.4	93.6	47.0-150	
Chloroform	25.0	22.8	91.2	73.0-120	
Chloromethane	25.0	20.5	82.0	41.0-142	
2-Chlorotoluene	25.0	20.6	82.4	76.0-123	
4-Chlorotoluene	25.0	20.6	82.4	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	20.9	83.6	58.0-134	
1,2-Dibromoethane	25.0	20.3	81.2	80.0-122	
Dibromomethane	25.0	23.6	94.4	80.0-120	
1,2-Dichlorobenzene	25.0	19.9	79.6	79.0-121	J0
1,3-Dichlorobenzene	25.0	19.5	78.0	79.0-120	J0 J4
1,4-Dichlorobenzene	25.0	19.7	78.8	79.0-120	J0 J4
Dichlorodifluoromethane	25.0	22.8	91.2	51.0-149	
1,1-Dichloroethane	25.0	22.9	91.6	70.0-126	
1,2-Dichloroethane	25.0	21.4	85.6	70.0-128	
1,1-Dichloroethene	25.0	22.8	91.2	71.0-124	
cis-1,2-Dichloroethene	25.0	22.4	89.6	73.0-120	
trans-1,2-Dichloroethene	25.0	21.6	86.4	73.0-120	
1,2-Dichloropropane	25.0	22.1	88.4	77.0-125	
1,1-Dichloropropene	25.0	24.7	98.8	74.0-126	
1,3-Dichloropropane	25.0	19.5	78.0	80.0-120	J0 J4
cis-1,3-Dichloropropene	25.0	23.0	92.0	80.0-123	
trans-1,3-Dichloropropene	25.0	20.5	82.0	78.0-124	
trans-1,4-Dichloro-2-butene	25.0	17.9	71.6	33.0-144	J0
2,2-Dichloropropane	25.0	21.4	85.6	58.0-130	
Di-isopropyl ether	25.0	20.5	82.0	58.0-138	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS)

(LCS) R3464735-1 10/23/19 22:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	20.6	82.4	79.0-123	
Hexachloro-1,3-butadiene	25.0	23.9	95.6	54.0-138	
2-Hexanone	125	109	87.2	67.0-149	
n-Hexane	25.0	18.7	74.8	57.0-133	J0
Iodomethane	125	112	89.6	33.0-147	
Isopropylbenzene	25.0	21.4	85.6	76.0-127	
p-Isopropyltoluene	25.0	22.6	90.4	76.0-125	
2-Butanone (MEK)	125	114	91.2	44.0-160	
Methylene Chloride	25.0	20.8	83.2	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	101	80.8	68.0-142	
Methyl tert-butyl ether	25.0	21.8	87.2	68.0-125	
Naphthalene	25.0	20.7	82.8	54.0-135	
n-Propylbenzene	25.0	20.8	83.2	77.0-124	
Styrene	25.0	21.5	86.0	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	20.9	83.6	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	18.2	72.8	65.0-130	J0
1,1,2-Trichlorotrifluoroethane	25.0	20.5	82.0	69.0-132	
Tetrachloroethene	25.0	21.9	87.6	72.0-132	
Toluene	25.0	20.3	81.2	79.0-120	
1,2,3-Trichlorobenzene	25.0	21.2	84.8	50.0-138	
1,2,4-Trichlorobenzene	25.0	20.6	82.4	57.0-137	
1,1,1-Trichloroethane	25.0	26.2	105	73.0-124	
1,1,2-Trichloroethane	25.0	19.2	76.8	80.0-120	J0 J4
Trichloroethene	25.0	25.9	104	78.0-124	
Trichlorofluoromethane	25.0	27.8	111	59.0-147	
1,2,3-Trichloropropane	25.0	21.1	84.4	73.0-130	
1,2,4-Trimethylbenzene	25.0	20.0	80.0	76.0-121	
1,2,3-Trimethylbenzene	25.0	20.3	81.2	77.0-120	
1,3,5-Trimethylbenzene	25.0	20.7	82.8	76.0-122	
Vinyl acetate	125	59.9	47.9	11.0-160	J0
Vinyl chloride	25.0	23.6	94.4	67.0-131	
Xylenes, Total	75.0	60.9	81.2	79.0-123	
(S) Toluene-d8			*96.8*	*80.0-120*	
(S) 4-Bromofluorobenzene			*102*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*109*	*70.0-130*	

Method Blank (MB)

(MB) R3464910-2 10/24/19 18:25

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
cis-1,2-Dichloroethene	U		0.0933	0.500
Tetrachloroethene	U		0.199	0.500
Trichloroethene	U		0.153	0.500
(S) Toluene-d8	*113*			*80.0-120*
(S) 4-Bromofluorobenzene	*114*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*104*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3464910-1 10/24/19 17:04

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
cis-1,2-Dichloroethene	25.0	22.8	91.2	73.0-120	
Tetrachloroethene	25.0	25.5	102	72.0-132	
Trichloroethene	25.0	25.0	100	78.0-124	
(S) Toluene-d8			*111*	*80.0-120*	
(S) 4-Bromofluorobenzene			*110*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*109*	*70.0-130*	

Method Blank (MB)

(MB) R3465284-3 10/25/19 21:00

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3465284-3 10/25/19 21:00

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	0.238	J	0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,2,4-Trimethylbenzene	U		0.123	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*113*			*80.0-120*
(S) 4-Bromofluorobenzene	*114*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3465284-1 10/25/19 19:59

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	94.6	75.7	19.0-160	
Acrylonitrile	125	128	102	55.0-149	
Benzene	25.0	23.6	94.4	70.0-123	
Bromobenzene	25.0	20.2	80.8	73.0-121	
Bromodichloromethane	25.0	25.0	100	75.0-120	
Bromochloromethane	25.0	27.5	110	76.0-122	
Bromoform	25.0	30.8	123	68.0-132	
Bromomethane	25.0	26.6	106	10.0-160	
n-Butylbenzene	25.0	22.6	90.4	73.0-125	
sec-Butylbenzene	25.0	22.5	90.0	75.0-125	
tert-Butylbenzene	25.0	24.8	99.2	76.0-124	
Carbon disulfide	25.0	23.7	94.8	61.0-128	
Carbon tetrachloride	25.0	29.8	119	68.0-126	
Chlorobenzene	25.0	26.6	106	80.0-121	
Chlorodibromomethane	25.0	30.2	121	77.0-125	
Chloroethane	25.0	25.9	104	47.0-150	
Chloroform	25.0	23.2	92.8	73.0-120	
Chloromethane	25.0	21.7	86.8	41.0-142	
2-Chlorotoluene	25.0	21.7	86.8	76.0-123	
4-Chlorotoluene	25.0	21.9	87.6	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	26.6	106	58.0-134	
1,2-Dibromoethane	25.0	25.7	103	80.0-122	
Dibromomethane	25.0	25.7	103	80.0-120	
1,2-Dichlorobenzene	25.0	26.6	106	79.0-121	
1,3-Dichlorobenzene	25.0	25.6	102	79.0-120	
1,4-Dichlorobenzene	25.0	23.7	94.8	79.0-120	
trans-1,4-Dichloro-2-butene	25.0	18.8	75.2	33.0-144	
Dichlorodifluoromethane	25.0	22.3	89.2	51.0-149	
1,1-Dichloroethane	25.0	24.4	97.6	70.0-126	
1,2-Dichloroethane	25.0	23.8	95.2	70.0-128	
1,1-Dichloroethene	25.0	26.6	106	71.0-124	
cis-1,2-Dichloroethene	25.0	25.5	102	73.0-120	
trans-1,2-Dichloroethene	25.0	25.6	102	73.0-120	
1,2-Dichloropropane	25.0	23.7	94.8	77.0-125	
1,1-Dichloropropene	25.0	25.3	101	74.0-126	
1,3-Dichloropropane	25.0	24.5	98.0	80.0-120	
cis-1,3-Dichloropropene	25.0	25.2	101	80.0-123	
trans-1,3-Dichloropropene	25.0	25.9	104	78.0-124	
2,2-Dichloropropane	25.0	26.8	107	58.0-130	
Di-isopropyl ether	25.0	25.1	100	58.0-138	

Laboratory Control Sample (LCS)

(LCS) R3465284-1 10/25/19 19:59

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	25.7	103	79.0-123	
Hexachloro-1,3-butadiene	25.0	25.6	102	54.0-138	
2-Hexanone	125	132	106	67.0-149	
n-Hexane	25.0	23.9	95.6	57.0-133	
Iodomethane	125	145	116	33.0-147	
Isopropylbenzene	25.0	28.4	114	76.0-127	
p-Isopropyltoluene	25.0	24.2	96.8	76.0-125	
2-Butanone (MEK)	125	119	95.2	44.0-160	
Methylene Chloride	25.0	23.2	92.8	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	133	106	68.0-142	
Methyl tert-butyl ether	25.0	26.0	104	68.0-125	
Naphthalene	25.0	25.7	103	54.0-135	
n-Propylbenzene	25.0	22.0	88.0	77.0-124	
Styrene	25.0	28.2	113	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	30.2	121	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	20.9	83.6	65.0-130	
Tetrachloroethene	25.0	29.2	117	72.0-132	
Toluene	25.0	25.2	101	79.0-120	
1,1,2-Trichlorotrifluoroethane	25.0	27.8	111	69.0-132	
1,2,3-Trichlorobenzene	25.0	27.0	108	50.0-138	
1,2,4-Trichlorobenzene	25.0	26.3	105	57.0-137	
1,1,1-Trichloroethane	25.0	28.2	113	73.0-124	
1,1,2-Trichloroethane	25.0	25.8	103	80.0-120	
Trichloroethene	25.0	28.0	112	78.0-124	
Trichlorofluoromethane	25.0	27.9	112	59.0-147	
1,2,3-Trichloropropane	25.0	22.6	90.4	73.0-130	
1,2,3-Trimethylbenzene	25.0	22.7	90.8	77.0-120	
1,2,4-Trimethylbenzene	25.0	22.3	89.2	76.0-121	
1,3,5-Trimethylbenzene	25.0	23.0	92.0	76.0-122	
Vinyl acetate	125	134	107	11.0-160	
Vinyl chloride	25.0	26.1	104	67.0-131	
Xylenes, Total	75.0	80.7	108	79.0-123	
(S) Toluene-d8			*112*	*80.0-120*	
(S) 4-Bromofluorobenzene			*109*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*107*	*70.0-130*	

Method Blank (MB)

(MB) R3465605-3 10/27/19 09:18

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
cis-1,2-Dichloroethene	U		0.0933	0.500
Vinyl chloride	U		0.118	0.500
(S) Toluene-d8	*96.6*			*80.0-120*
(S) 4-Bromofluorobenzene	*92.5*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3465605-1 10/27/19 08:19 • (LCSD) R3465605-2 10/27/19 08:38

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
cis-1,2-Dichloroethene	25.0	23.1	22.9	92.4	91.6	73.0-120			0.870	20
Vinyl chloride	25.0	29.8	30.8	119	123	67.0-131			3.30	20
(S) Toluene-d8				*97.5*	*92.4*	*80.0-120*				
(S) 4-Bromofluorobenzene				*96.1*	*91.1*	*77.0-126*				
(S) 1,2-Dichloroethane-d4				*101*	*103*	*70.0-130*				

Method Blank (MB)

(MB) R3465451-2 10/26/19 12:44

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3465451-2 10/26/19 12:44

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	0.982	J	0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	0.356	J	0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*95.5*			*80.0-120*
(S) 4-Bromofluorobenzene	*92.7*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*100*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3465451-1 10/26/19 12:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	146	117	19.0-160	
Acrylonitrile	125	168	134	55.0-149	
Benzene	25.0	23.8	95.2	70.0-123	
Bromobenzene	25.0	27.7	111	73.0-121	
Bromodichloromethane	25.0	23.4	93.6	75.0-120	
Bromochloromethane	25.0	26.6	106	76.0-122	
Bromoform	25.0	24.6	98.4	68.0-132	
Bromomethane	25.0	16.1	64.4	10.0-160	
n-Butylbenzene	25.0	29.4	118	73.0-125	
sec-Butylbenzene	25.0	26.3	105	75.0-125	
tert-Butylbenzene	25.0	24.7	98.8	76.0-124	
Carbon disulfide	25.0	22.7	90.8	61.0-128	
Carbon tetrachloride	25.0	21.5	86.0	68.0-126	
Chlorobenzene	25.0	24.1	96.4	80.0-121	
Chlorodibromomethane	25.0	24.8	99.2	77.0-125	
Chloroethane	25.0	28.4	114	47.0-150	
Chloroform	25.0	22.7	90.8	73.0-120	
Chloromethane	25.0	25.8	103	41.0-142	
2-Chlorotoluene	25.0	26.9	108	76.0-123	
4-Chlorotoluene	25.0	26.6	106	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	25.6	102	58.0-134	
1,2-Dibromoethane	25.0	25.6	102	80.0-122	
Dibromomethane	25.0	26.4	106	80.0-120	
1,2-Dichlorobenzene	25.0	27.8	111	79.0-121	
1,3-Dichlorobenzene	25.0	28.5	114	79.0-120	
1,4-Dichlorobenzene	25.0	27.8	111	79.0-120	
Dichlorodifluoromethane	25.0	22.5	90.0	51.0-149	
1,1-Dichloroethane	25.0	27.6	110	70.0-126	
1,2-Dichloroethane	25.0	28.4	114	70.0-128	
1,1-Dichloroethene	25.0	24.2	96.8	71.0-124	
cis-1,2-Dichloroethene	25.0	24.0	96.0	73.0-120	
trans-1,2-Dichloroethene	25.0	22.5	90.0	73.0-120	
1,2-Dichloropropane	25.0	29.5	118	77.0-125	
1,1-Dichloropropene	25.0	24.6	98.4	74.0-126	
1,3-Dichloropropane	25.0	27.0	108	80.0-120	
cis-1,3-Dichloropropene	25.0	24.9	99.6	80.0-123	
trans-1,3-Dichloropropene	25.0	26.8	107	78.0-124	
trans-1,4-Dichloro-2-butene	25.0	33.7	135	33.0-144	
2,2-Dichloropropane	25.0	23.0	92.0	58.0-130	
Di-isopropyl ether	25.0	29.5	118	58.0-138	

Laboratory Control Sample (LCS)

(LCS) R3465451-1 10/26/19 12:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	22.5	90.0	79.0-123	
Hexachloro-1,3-butadiene	25.0	31.4	126	54.0-138	
2-Hexanone	125	172	138	67.0-149	
n-Hexane	25.0	29.8	119	57.0-133	
Iodomethane	125	104	83.2	33.0-147	
Isopropylbenzene	25.0	21.3	85.2	76.0-127	
p-Isopropyltoluene	25.0	27.1	108	76.0-125	
2-Butanone (MEK)	125	139	111	44.0-160	
Methylene Chloride	25.0	22.5	90.0	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	142	114	68.0-142	
Methyl tert-butyl ether	25.0	25.3	101	68.0-125	
Naphthalene	25.0	23.9	95.6	54.0-135	
n-Propylbenzene	25.0	25.2	101	77.0-124	
Styrene	25.0	23.9	95.6	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	23.3	93.2	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	25.9	104	65.0-130	
1,1,2-Trichlorotrifluoroethane	25.0	21.4	85.6	69.0-132	
Tetrachloroethene	25.0	22.9	91.6	72.0-132	
Toluene	25.0	23.7	94.8	79.0-120	
1,2,3-Trichlorobenzene	25.0	27.3	109	50.0-138	
1,2,4-Trichlorobenzene	25.0	30.0	120	57.0-137	
1,1,1-Trichloroethane	25.0	21.4	85.6	73.0-124	
1,1,2-Trichloroethane	25.0	24.5	98.0	80.0-120	
Trichloroethene	25.0	22.2	88.8	78.0-124	
Trichlorofluoromethane	25.0	26.9	108	59.0-147	
1,2,3-Trichloropropane	25.0	26.0	104	73.0-130	
1,2,4-Trimethylbenzene	25.0	25.9	104	76.0-121	
1,2,3-Trimethylbenzene	25.0	26.6	106	77.0-120	
1,3,5-Trimethylbenzene	25.0	25.0	100	76.0-122	
Vinyl acetate	125	164	131	11.0-160	
Vinyl chloride	25.0	32.6	130	67.0-131	
Xylenes, Total	75.0	68.0	90.7	79.0-123	
(S) Toluene-d8			*93.8*	*80.0-120*	
(S) 4-Bromofluorobenzene			*91.0*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*101*	*70.0-130*	

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

MDL	Method Detection Limit.
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J0	J0: The identification of the analyte is acceptable, but the reported concentration is an estimate. The calibration met method criteria.
J4	The associated batch QC was outside the established quality control range for accuracy.
J5	The sample matrix interfered with the ability to make any accurate determination; spike value is high.
V	The sample concentration is too high to evaluate accurate spike recoveries.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

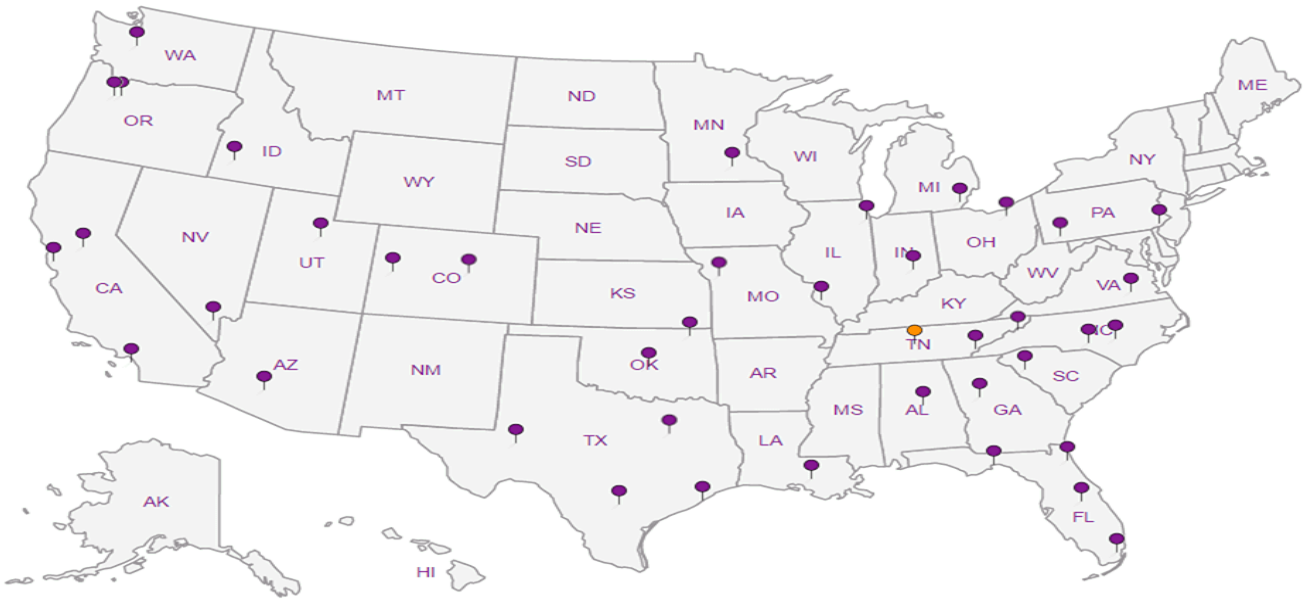
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



PES-Seattle

Billing Information: PES-Seattle

Pres Chk

Report to: Bill Haldeman/Brian O'neal

Email To: on file

Project Description: American Liner

City/State Collected: Seattle, WA

Phone: on file

Fax:

Client Project # 1413.001.02.501E

Lab Project # PESENVSWA-ALP

Collected by (print): K.Eggs/B.Heeht/H.Cohen/S.McKern

Site/Facility ID # American Liner

P.O. #

Collected by (signature): K Eggs

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

No. of Cntrs

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	**NO3,SO4,Chloride**48 hour hold	NWTPHGX	VOCs (V8260LLC)	Total Fe Mn 6020	TOC	Alkalinity	EEM (RSK175LL)	Remarks	Sample # (lab only)
MW-917-101519	Grab	GW	90	10/15/19	800	9	X		X	X	X	X	X		-01
MW109-101519		GW	40		945	9	X		X	X	X	X	X		02
MW-305-101519		GW	30		1010	9	X	X	X	X	X	X	X		03
MW126-101519		GW	90		1100	9	X		X	X	X	X	X		04
MW-306-101519		GW	50		1140	9	X	X	X	X	X	X	X		05
W-MW-01-101519		GW	75		1220	9	X	X	X	X	X	X	X		06
~~MW-15~~ MW110-101519		GW	40		1420	9	X		X	X	X	X	X		07
MW-153-101519		GW	125		1425	12	X	X	X	X	X	X	X		08
MW107-101519	↓	GW	40		1400	12	X	X	X	X	X	X	X		09
TB-101519	—	GW	—	10/15/19	—	1		X	X					Trip Blank	10

Chain of Custody Page 1 of ___

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L # L1150336

Tab G091

Acctnum: PESENVSWA

Template:

Prelogin:

TSR: Brian Ford

PB:

Shipped Via:

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____

Flow _____ Other _____

Samples returned via:
__ UPS __ FedEx __ Courier __ _____

Tracking # 1803 5774 6584

Sample Receipt Checklist

COC Seal Present/Intact:	NP	Y N
COC Signed/Accurate:		Y N
Bottles arrive intact:		Y N
Correct bottles used:		Y N
Sufficient volume sent:		Y N
If Applicable		
VOA Zero Headspace:		Y N
Preservation Correct/Checked:		Y N

SCREEN: <0.5 mR/hr

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
	10-15-19	1630	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)

Trip Blank Received: Yes / No HCL / MeOH TBR

Temp: 2.0-1=1.9 °C Bottles Received: 90

Date: 10/16/19 Time: 8:30

If preservation required by Login: Date/Time

Hold:

Condition: NCF / OK

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 29, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1150936
Samples Received:	10/17/2019
Project Number:	1413.001.02.501E
Description:	American Linen
Site:	AMERICAN LINEN
Report To:	Brian O'Neal/Bill Haldeman
	1215 Fourth Ave., Suite 1350
	Seattle, WA 98161

Entire Report Reviewed By:

Brian Ford

Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

Cp: Cover Page 1

Tc: Table of Contents 2

Ss: Sample Summary 3

Cn: Case Narrative 5

Sr: Sample Results 6

MW-155-101619 L1150936-01 6

MW-158A-101619 L1150936-02 9

MW-142-101619 L1150936-03 12

MW-148-101619 L1150936-04 15

EQ-101619 L1150936-05 18

MW-157-101619 L1150936-06 21

MW-143-101619 L1150936-07 24

TRIP-101619 L1150936-08 27

Qc: Quality Control Summary 29

Wet Chemistry by Method 2320 B-2011 29

Wet Chemistry by Method 9056A 30

Wet Chemistry by Method 9060A 32

Metals (ICPMS) by Method 6020B 33

Volatile Organic Compounds (GC) by Method NWTPHGX 34

Volatile Organic Compounds (GC) by Method RSK175 35

Volatile Organic Compounds (GC/MS) by Method 8260C 37

Gl: Glossary of Terms 46

Al: Accreditations & Locations 47

Sc: Sample Chain of Custody 48

MW-155-101619 L1150936-01 GW

Collected by: BH/KB/SM | Collected date/time: 10/16/19 10:15 | Received date/time: 10/17/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366946	1	10/22/19 16:15	10/22/19 16:15	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1364616	1	10/17/19 16:54	10/17/19 16:54	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365383	1	10/18/19 21:14	10/18/19 21:14	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1366325	1	10/23/19 07:45	10/23/19 14:11	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365594	1	10/19/19 04:53	10/19/19 04:53	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1365164	1	10/18/19 11:50	10/18/19 11:50	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/25/19 23:11	10/25/19 23:11	ADM	Mt. Juliet, TN

MW-158A-101619 L1150936-02 GW

Collected by: BH/KB/SM | Collected date/time: 10/16/19 10:30 | Received date/time: 10/17/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366946	1	10/22/19 16:21	10/22/19 16:21	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1364616	1	10/17/19 17:58	10/17/19 17:58	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365383	1	10/18/19 22:18	10/18/19 22:18	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1366325	1	10/23/19 07:45	10/23/19 14:47	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365594	1	10/19/19 05:17	10/19/19 05:17	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1365164	1	10/18/19 11:52	10/18/19 11:52	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/25/19 23:31	10/25/19 23:31	ADM	Mt. Juliet, TN

MW-142-101619 L1150936-03 GW

Collected by: BH/KB/SM | Collected date/time: 10/16/19 10:55 | Received date/time: 10/17/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366946	1	10/22/19 16:38	10/22/19 16:38	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1364616	1	10/17/19 18:11	10/17/19 18:11	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365383	1	10/18/19 22:37	10/18/19 22:37	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1366325	1	10/23/19 07:45	10/23/19 14:51	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365594	1	10/19/19 05:41	10/19/19 05:41	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1365164	1	10/18/19 11:54	10/18/19 11:54	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/25/19 23:51	10/25/19 23:51	ADM	Mt. Juliet, TN

MW-148-101619 L1150936-04 GW

Collected by: BH/KB/SM | Collected date/time: 10/16/19 12:05 | Received date/time: 10/17/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366946	1	10/22/19 16:45	10/22/19 16:45	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1364616	1	10/17/19 18:23	10/17/19 18:23	ST	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1364616	5	10/17/19 18:36	10/17/19 18:36	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365383	1	10/19/19 00:24	10/19/19 00:24	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1366325	1	10/23/19 07:45	10/23/19 14:54	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365594	1	10/19/19 06:05	10/19/19 06:05	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1365164	1	10/18/19 11:57	10/18/19 11:57	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/26/19 00:12	10/26/19 00:12	ADM	Mt. Juliet, TN

EQ-101619 L1150936-05 GW

Collected by: BH/KB/SM | Collected date/time: 10/16/19 12:45 | Received date/time: 10/17/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366946	1	10/22/19 16:54	10/22/19 16:54	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1364616	1	10/17/19 18:49	10/17/19 18:49	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365383	1	10/19/19 00:41	10/19/19 00:41	VRP	Mt. Juliet, TN

EQ-101619 L1150936-05 GW

Collected by: BH/KB/SM | Collected date/time: 10/16/19 12:45 | Received date/time: 10/17/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Metals (ICPMS) by Method 6020B	WG1366325	1	10/23/19 07:45	10/23/19 14:58	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365594	1	10/19/19 06:29	10/19/19 06:29	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1365164	1	10/18/19 12:01	10/18/19 12:01	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/26/19 00:32	10/26/19 00:32	ADM	Mt. Juliet, TN

MW-157-101619 L1150936-06 GW

Collected by: BH/KB/SM | Collected date/time: 10/16/19 13:38 | Received date/time: 10/17/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366946	1	10/22/19 17:03	10/22/19 17:03	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1364616	1	10/17/19 19:02	10/17/19 19:02	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365383	1	10/19/19 01:45	10/19/19 01:45	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1366325	1	10/23/19 07:45	10/23/19 15:02	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365594	1	10/19/19 06:53	10/19/19 06:53	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1365164	1	10/18/19 12:04	10/18/19 12:04	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/26/19 00:52	10/26/19 00:52	ADM	Mt. Juliet, TN

MW-143-101619 L1150936-07 GW

Collected by: BH/KB/SM | Collected date/time: 10/16/19 14:45 | Received date/time: 10/17/19 08:45

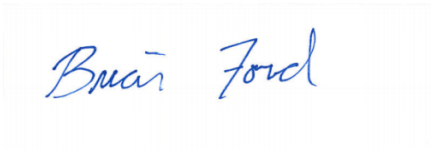
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1366946	1	10/22/19 17:10	10/22/19 17:10	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1364616	1	10/17/19 19:14	10/17/19 19:14	ST	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1365383	1	10/19/19 02:08	10/19/19 02:08	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1366325	1	10/23/19 07:45	10/23/19 15:05	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365594	1	10/19/19 07:17	10/19/19 07:17	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1365165	1	10/18/19 13:25	10/18/19 13:25	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/26/19 01:13	10/26/19 01:13	ADM	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1370146	200	10/27/19 15:49	10/27/19 15:49	ACG	Mt. Juliet, TN

TRIP-101619 L1150936-08 GW

Collected by: BH/KB/SM | Collected date/time: 10/16/19 15:40 | Received date/time: 10/17/19 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1365594	1	10/19/19 04:05	10/19/19 04:05	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1370189	1	10/26/19 15:08	10/26/19 15:08	ACG	Mt. Juliet, TN

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Sample Delivery Group (SDG) Narrative

The following analysis were performed from an unpreserved, insufficiently or inadequately preserved sample.

Lab Sample ID	Project Sample ID	Method
L1150936-01	MW-155-101619	9060A

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	267000		2710	20000	1	10/22/2019 16:15	WG1366946

Sample Narrative:
L1150936-01 WG1366946: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	16100		51.9	1000	1	10/17/2019 16:54	WG1364616
Nitrate	4120		22.7	100	1	10/17/2019 16:54	WG1364616
Sulfate	94300		77.4	5000	1	10/17/2019 16:54	WG1364616

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	3660	B	102	1000	1	10/18/2019 21:14	WG1365383

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	119		15.0	100	1	10/23/2019 14:11	WG1366325
Manganese	71.6		0.250	5.00	1	10/23/2019 14:11	WG1366325

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/19/2019 04:53	WG1365594
(S) a,a,a-Trifluorotoluene(FID)	*108*			*78.0-120*		*10/19/2019 04:53*	WG1365594

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	36.1		0.287	0.678	1	10/18/2019 11:50	WG1365164
Ethane	17.5		0.296	1.29	1	10/18/2019 11:50	WG1365164
Ethene	U		0.422	1.27	1	10/18/2019 11:50	WG1365164

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.06	J JO	1.05	25.0	1	10/25/2019 23:11	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/25/2019 23:11	WG1369955
Benzene	U		0.0896	0.500	1	10/25/2019 23:11	WG1369955
Bromobenzene	U	JO	0.133	0.500	1	10/25/2019 23:11	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/25/2019 23:11	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/25/2019 23:11	WG1369955
Bromoform	U		0.186	0.500	1	10/25/2019 23:11	WG1369955
Bromomethane	U		0.157	2.50	1	10/25/2019 23:11	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/25/2019 23:11	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/25/2019 23:11	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/25/2019 23:11	WG1369955
Carbon disulfide	U		0.101	0.500	1	10/25/2019 23:11	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/25/2019 23:11	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/25/2019 23:11	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/25/2019 23:11	WG1369955
Chloroethane	U		0.141	2.50	1	10/25/2019 23:11	WG1369955
Chloroform	U		0.0860	0.500	1	10/25/2019 23:11	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/25/2019 23:11	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/25/2019 23:11	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/25/2019 23:11	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/25/2019 23:11	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/25/2019 23:11	WG1369955
Dibromomethane	U		0.117	0.500	1	10/25/2019 23:11	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/25/2019 23:11	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/25/2019 23:11	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/25/2019 23:11	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/25/2019 23:11	WG1369955
1,1-Dichloroethane	U		0.114	0.500	1	10/25/2019 23:11	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/25/2019 23:11	WG1369955
1,1-Dichloroethene	U		0.188	0.500	1	10/25/2019 23:11	WG1369955
cis-1,2-Dichloroethene	36.2		0.0933	0.500	1	10/25/2019 23:11	WG1369955
trans-1,2-Dichloroethene	0.160	J	0.152	0.500	1	10/25/2019 23:11	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/25/2019 23:11	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/25/2019 23:11	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/25/2019 23:11	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/25/2019 23:11	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/25/2019 23:11	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/25/2019 23:11	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/25/2019 23:11	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/25/2019 23:11	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/25/2019 23:11	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/25/2019 23:11	WG1369955
2-Hexanone	U		0.757	5.00	1	10/25/2019 23:11	WG1369955
n-Hexane	U		0.305	5.00	1	10/25/2019 23:11	WG1369955
Iodomethane	U		0.377	10.0	1	10/25/2019 23:11	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/25/2019 23:11	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/25/2019 23:11	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/25/2019 23:11	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/25/2019 23:11	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/25/2019 23:11	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/25/2019 23:11	WG1369955
Naphthalene	U		0.174	2.50	1	10/25/2019 23:11	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/25/2019 23:11	WG1369955
Styrene	U		0.117	0.500	1	10/25/2019 23:11	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/25/2019 23:11	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/25/2019 23:11	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/25/2019 23:11	WG1369955
Tetrachloroethene	121		0.199	0.500	1	10/25/2019 23:11	WG1369955
Toluene	U		0.412	0.500	1	10/25/2019 23:11	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/25/2019 23:11	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/25/2019 23:11	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/25/2019 23:11	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/25/2019 23:11	WG1369955
Trichloroethene	27.6		0.153	0.500	1	10/25/2019 23:11	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/25/2019 23:11	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/25/2019 23:11	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/25/2019 23:11	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/25/2019 23:11	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/25/2019 23:11	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/25/2019 23:11	WG1369955
Vinyl chloride	U		0.118	0.500	1	10/25/2019 23:11	WG1369955
Xylenes, Total	U		0.316	1.50	1	10/25/2019 23:11	WG1369955
(S) Toluene-d8	*110*			*80.0-120*		*10/25/2019 23:11*	WG1369955
(S) 4-Bromofluorobenzene	*113*			*77.0-126*		*10/25/2019 23:11*	WG1369955
(S) 1,2-Dichloroethane-d4	*104*			*70.0-130*		*10/25/2019 23:11*	WG1369955

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	327000		2710	20000	1	10/22/2019 16:21	WG1366946

Sample Narrative:

L1150936-02 WG1366946: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	24500		51.9	1000	1	10/17/2019 17:58	WG1364616
Nitrate	33.0	J	22.7	100	1	10/17/2019 17:58	WG1364616
Sulfate	20400		77.4	5000	1	10/17/2019 17:58	WG1364616

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	4460	B	102	1000	1	10/18/2019 22:18	WG1365383

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	5460		15.0	100	1	10/23/2019 14:47	WG1366325
Manganese	350		0.250	5.00	1	10/23/2019 14:47	WG1366325

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/19/2019 05:17	WG1365594
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/19/2019 05:17*	WG1365594

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	115		0.287	0.678	1	10/18/2019 11:52	WG1365164
Ethane	20.1		0.296	1.29	1	10/18/2019 11:52	WG1365164
Ethene	7.24		0.422	1.27	1	10/18/2019 11:52	WG1365164

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	U	J0	1.05	25.0	1	10/25/2019 23:31	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/25/2019 23:31	WG1369955
Benzene	U		0.0896	0.500	1	10/25/2019 23:31	WG1369955
Bromobenzene	U	J0	0.133	0.500	1	10/25/2019 23:31	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/25/2019 23:31	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/25/2019 23:31	WG1369955
Bromoform	U		0.186	0.500	1	10/25/2019 23:31	WG1369955
Bromomethane	U		0.157	2.50	1	10/25/2019 23:31	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/25/2019 23:31	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/25/2019 23:31	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/25/2019 23:31	WG1369955
Carbon disulfide	U		0.101	0.500	1	10/25/2019 23:31	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/25/2019 23:31	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/25/2019 23:31	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/25/2019 23:31	WG1369955
Chloroethane	U		0.141	2.50	1	10/25/2019 23:31	WG1369955
Chloroform	U		0.0860	0.500	1	10/25/2019 23:31	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/25/2019 23:31	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/25/2019 23:31	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/25/2019 23:31	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/25/2019 23:31	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/25/2019 23:31	WG1369955
Dibromomethane	U		0.117	0.500	1	10/25/2019 23:31	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/25/2019 23:31	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/25/2019 23:31	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/25/2019 23:31	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/25/2019 23:31	WG1369955
1,1-Dichloroethane	U		0.114	0.500	1	10/25/2019 23:31	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/25/2019 23:31	WG1369955
1,1-Dichloroethene	U		0.188	0.500	1	10/25/2019 23:31	WG1369955
cis-1,2-Dichloroethene	0.848		0.0933	0.500	1	10/25/2019 23:31	WG1369955
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/25/2019 23:31	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/25/2019 23:31	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/25/2019 23:31	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/25/2019 23:31	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/25/2019 23:31	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/25/2019 23:31	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/25/2019 23:31	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/25/2019 23:31	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/25/2019 23:31	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/25/2019 23:31	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/25/2019 23:31	WG1369955
2-Hexanone	U		0.757	5.00	1	10/25/2019 23:31	WG1369955
n-Hexane	U		0.305	5.00	1	10/25/2019 23:31	WG1369955
Iodomethane	U		0.377	10.0	1	10/25/2019 23:31	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/25/2019 23:31	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/25/2019 23:31	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/25/2019 23:31	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/25/2019 23:31	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/25/2019 23:31	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/25/2019 23:31	WG1369955
Naphthalene	U		0.174	2.50	1	10/25/2019 23:31	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/25/2019 23:31	WG1369955
Styrene	U		0.117	0.500	1	10/25/2019 23:31	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/25/2019 23:31	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/25/2019 23:31	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/25/2019 23:31	WG1369955
Tetrachloroethene	U		0.199	0.500	1	10/25/2019 23:31	WG1369955
Toluene	U		0.412	0.500	1	10/25/2019 23:31	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/25/2019 23:31	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/25/2019 23:31	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/25/2019 23:31	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/25/2019 23:31	WG1369955
Trichloroethene	0.318	J	0.153	0.500	1	10/25/2019 23:31	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/25/2019 23:31	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/25/2019 23:31	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/25/2019 23:31	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/25/2019 23:31	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/25/2019 23:31	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/25/2019 23:31	WG1369955
Vinyl chloride	2.18		0.118	0.500	1	10/25/2019 23:31	WG1369955
Xylenes, Total	U		0.316	1.50	1	10/25/2019 23:31	WG1369955
(S) Toluene-d8	*110*			*80.0-120*		*10/25/2019 23:31*	WG1369955
(S) 4-Bromofluorobenzene	*111*			*77.0-126*		*10/25/2019 23:31*	WG1369955
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/25/2019 23:31*	WG1369955

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	812000		2710	20000	1	10/22/2019 16:38	WG1366946

Sample Narrative:
L1150936-03 WG1366946: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	14900		51.9	1000	1	10/17/2019 18:11	WG1364616
Nitrate	U		22.7	100	1	10/17/2019 18:11	WG1364616
Sulfate	15900		77.4	5000	1	10/17/2019 18:11	WG1364616

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	4760	B	102	1000	1	10/18/2019 22:37	WG1365383

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	5400		15.0	100	1	10/23/2019 14:51	WG1366325
Manganese	3440		0.250	5.00	1	10/23/2019 14:51	WG1366325

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/19/2019 05:41	WG1365594
(S) a,a,a-Trifluorotoluene(FID)	*108*			*78.0-120*		*10/19/2019 05:41*	WG1365594

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	766		0.287	0.678	1	10/18/2019 11:54	WG1365164
Ethane	47.8		0.296	1.29	1	10/18/2019 11:54	WG1365164
Ethene	U		0.422	1.27	1	10/18/2019 11:54	WG1365164

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.46	J J0	1.05	25.0	1	10/25/2019 23:51	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/25/2019 23:51	WG1369955
Benzene	0.380	J	0.0896	0.500	1	10/25/2019 23:51	WG1369955
Bromobenzene	U	J0	0.133	0.500	1	10/25/2019 23:51	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/25/2019 23:51	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/25/2019 23:51	WG1369955
Bromoform	U		0.186	0.500	1	10/25/2019 23:51	WG1369955
Bromomethane	U		0.157	2.50	1	10/25/2019 23:51	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/25/2019 23:51	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/25/2019 23:51	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/25/2019 23:51	WG1369955
Carbon disulfide	U		0.101	0.500	1	10/25/2019 23:51	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/25/2019 23:51	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/25/2019 23:51	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/25/2019 23:51	WG1369955
Chloroethane	U		0.141	2.50	1	10/25/2019 23:51	WG1369955
Chloroform	U		0.0860	0.500	1	10/25/2019 23:51	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/25/2019 23:51	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/25/2019 23:51	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/25/2019 23:51	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/25/2019 23:51	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/25/2019 23:51	WG1369955
Dibromomethane	U		0.117	0.500	1	10/25/2019 23:51	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/25/2019 23:51	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/25/2019 23:51	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/25/2019 23:51	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/25/2019 23:51	WG1369955
1,1-Dichloroethane	U		0.114	0.500	1	10/25/2019 23:51	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/25/2019 23:51	WG1369955
1,1-Dichloroethene	U		0.188	0.500	1	10/25/2019 23:51	WG1369955
cis-1,2-Dichloroethene	50.4		0.0933	0.500	1	10/25/2019 23:51	WG1369955
trans-1,2-Dichloroethene	0.282	J	0.152	0.500	1	10/25/2019 23:51	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/25/2019 23:51	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/25/2019 23:51	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/25/2019 23:51	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/25/2019 23:51	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/25/2019 23:51	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/25/2019 23:51	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/25/2019 23:51	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/25/2019 23:51	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/25/2019 23:51	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/25/2019 23:51	WG1369955
2-Hexanone	U		0.757	5.00	1	10/25/2019 23:51	WG1369955
n-Hexane	U		0.305	5.00	1	10/25/2019 23:51	WG1369955
Iodomethane	U		0.377	10.0	1	10/25/2019 23:51	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/25/2019 23:51	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/25/2019 23:51	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/25/2019 23:51	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/25/2019 23:51	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/25/2019 23:51	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/25/2019 23:51	WG1369955
Naphthalene	U		0.174	2.50	1	10/25/2019 23:51	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/25/2019 23:51	WG1369955
Styrene	U		0.117	0.500	1	10/25/2019 23:51	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/25/2019 23:51	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/25/2019 23:51	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/25/2019 23:51	WG1369955
Tetrachloroethene	U		0.199	0.500	1	10/25/2019 23:51	WG1369955
Toluene	U		0.412	0.500	1	10/25/2019 23:51	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/25/2019 23:51	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/25/2019 23:51	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/25/2019 23:51	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/25/2019 23:51	WG1369955
Trichloroethene	0.360	J	0.153	0.500	1	10/25/2019 23:51	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/25/2019 23:51	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/25/2019 23:51	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/25/2019 23:51	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/25/2019 23:51	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/25/2019 23:51	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/25/2019 23:51	WG1369955
Vinyl chloride	11.3		0.118	0.500	1	10/25/2019 23:51	WG1369955
Xylenes, Total	U		0.316	1.50	1	10/25/2019 23:51	WG1369955
(S) Toluene-d8	*112*			*80.0-120*		*10/25/2019 23:51*	WG1369955
(S) 4-Bromofluorobenzene	*112*			*77.0-126*		*10/25/2019 23:51*	WG1369955
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*		*10/25/2019 23:51*	WG1369955

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	163000		2710	20000	1	10/22/2019 16:45	WG1366946

Sample Narrative:

L1150936-04 WG1366946: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	18000		51.9	1000	1	10/17/2019 18:23	WG1364616
Nitrate	32.6	J	22.7	100	1	10/17/2019 18:23	WG1364616
Sulfate	198000		387	25000	5	10/17/2019 18:36	WG1364616

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	4480	B	102	1000	1	10/19/2019 00:24	WG1365383

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	2240		15.0	100	1	10/23/2019 14:54	WG1366325
Manganese	498		0.250	5.00	1	10/23/2019 14:54	WG1366325

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/19/2019 06:05	WG1365594
(S) a,a,a-Trifluorotoluene(FID)	*108*			*78.0-120*		*10/19/2019 06:05*	WG1365594

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	2050		0.287	0.678	1	10/18/2019 11:57	WG1365164
Ethane	6.03		0.296	1.29	1	10/18/2019 11:57	WG1365164
Ethene	U		0.422	1.27	1	10/18/2019 11:57	WG1365164

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	U	J0	1.05	25.0	1	10/26/2019 00:12	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/26/2019 00:12	WG1369955
Benzene	U		0.0896	0.500	1	10/26/2019 00:12	WG1369955
Bromobenzene	U	J0	0.133	0.500	1	10/26/2019 00:12	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/26/2019 00:12	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/26/2019 00:12	WG1369955
Bromoform	U		0.186	0.500	1	10/26/2019 00:12	WG1369955
Bromomethane	U		0.157	2.50	1	10/26/2019 00:12	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/26/2019 00:12	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/26/2019 00:12	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/26/2019 00:12	WG1369955
Carbon disulfide	U		0.101	0.500	1	10/26/2019 00:12	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/26/2019 00:12	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/26/2019 00:12	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/26/2019 00:12	WG1369955
Chloroethane	U		0.141	2.50	1	10/26/2019 00:12	WG1369955
Chloroform	U		0.0860	0.500	1	10/26/2019 00:12	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/26/2019 00:12	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/26/2019 00:12	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/26/2019 00:12	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/26/2019 00:12	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/26/2019 00:12	WG1369955
Dibromomethane	U		0.117	0.500	1	10/26/2019 00:12	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/26/2019 00:12	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/26/2019 00:12	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/26/2019 00:12	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/26/2019 00:12	WG1369955
1,1-Dichloroethane	U		0.114	0.500	1	10/26/2019 00:12	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/26/2019 00:12	WG1369955
1,1-Dichloroethene	U		0.188	0.500	1	10/26/2019 00:12	WG1369955
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/26/2019 00:12	WG1369955
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/26/2019 00:12	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/26/2019 00:12	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/26/2019 00:12	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/26/2019 00:12	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/26/2019 00:12	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/26/2019 00:12	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/26/2019 00:12	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/26/2019 00:12	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/26/2019 00:12	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/26/2019 00:12	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/26/2019 00:12	WG1369955
2-Hexanone	U		0.757	5.00	1	10/26/2019 00:12	WG1369955
n-Hexane	U		0.305	5.00	1	10/26/2019 00:12	WG1369955
Iodomethane	U		0.377	10.0	1	10/26/2019 00:12	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/26/2019 00:12	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/26/2019 00:12	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/26/2019 00:12	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/26/2019 00:12	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/26/2019 00:12	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/26/2019 00:12	WG1369955
Naphthalene	U		0.174	2.50	1	10/26/2019 00:12	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/26/2019 00:12	WG1369955
Styrene	U		0.117	0.500	1	10/26/2019 00:12	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/26/2019 00:12	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/26/2019 00:12	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/26/2019 00:12	WG1369955
Tetrachloroethene	U		0.199	0.500	1	10/26/2019 00:12	WG1369955
Toluene	U		0.412	0.500	1	10/26/2019 00:12	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/26/2019 00:12	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/26/2019 00:12	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/26/2019 00:12	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/26/2019 00:12	WG1369955
Trichloroethene	U		0.153	0.500	1	10/26/2019 00:12	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/26/2019 00:12	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/26/2019 00:12	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/26/2019 00:12	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/26/2019 00:12	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/26/2019 00:12	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/26/2019 00:12	WG1369955
Vinyl chloride	0.463	J	0.118	0.500	1	10/26/2019 00:12	WG1369955
Xylenes, Total	U		0.316	1.50	1	10/26/2019 00:12	WG1369955
(S) Toluene-d8	*110*			*80.0-120*		*10/26/2019 00:12*	WG1369955
(S) 4-Bromofluorobenzene	*110*			*77.0-126*		*10/26/2019 00:12*	WG1369955
(S) 1,2-Dichloroethane-d4	*104*			*70.0-130*		*10/26/2019 00:12*	WG1369955

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	11100	B J	2710	20000	1	10/22/2019 16:54	WG1366946

Sample Narrative:

L1150936-05 WG1366946: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	405	B J	51.9	1000	1	10/17/2019 18:49	WG1364616
Nitrate	U		22.7	100	1	10/17/2019 18:49	WG1364616
Sulfate	129	B J	77.4	5000	1	10/17/2019 18:49	WG1364616

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	418	B J	102	1000	1	10/19/2019 00:41	WG1365383

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	17.9	J	15.0	100	1	10/23/2019 14:58	WG1366325
Manganese	0.655	J	0.250	5.00	1	10/23/2019 14:58	WG1366325

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/19/2019 06:29	WG1365594
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/19/2019 06:29*	WG1365594

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	U		0.287	0.678	1	10/18/2019 12:01	WG1365164
Ethane	U		0.296	1.29	1	10/18/2019 12:01	WG1365164
Ethene	U		0.422	1.27	1	10/18/2019 12:01	WG1365164

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.84	J JO	1.05	25.0	1	10/26/2019 00:32	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/26/2019 00:32	WG1369955
Benzene	U		0.0896	0.500	1	10/26/2019 00:32	WG1369955
Bromobenzene	U	JO	0.133	0.500	1	10/26/2019 00:32	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/26/2019 00:32	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/26/2019 00:32	WG1369955
Bromoform	U		0.186	0.500	1	10/26/2019 00:32	WG1369955
Bromomethane	U		0.157	2.50	1	10/26/2019 00:32	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/26/2019 00:32	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/26/2019 00:32	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/26/2019 00:32	WG1369955
Carbon disulfide	U		0.101	0.500	1	10/26/2019 00:32	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/26/2019 00:32	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/26/2019 00:32	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/26/2019 00:32	WG1369955
Chloroethane	U		0.141	2.50	1	10/26/2019 00:32	WG1369955
Chloroform	0.385	J	0.0860	0.500	1	10/26/2019 00:32	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/26/2019 00:32	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/26/2019 00:32	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/26/2019 00:32	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/26/2019 00:32	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/26/2019 00:32	WG1369955
Dibromomethane	U		0.117	0.500	1	10/26/2019 00:32	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/26/2019 00:32	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/26/2019 00:32	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/26/2019 00:32	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/26/2019 00:32	WG1369955
1,1-Dichloroethane	U		0.114	0.500	1	10/26/2019 00:32	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/26/2019 00:32	WG1369955
1,1-Dichloroethene	U		0.188	0.500	1	10/26/2019 00:32	WG1369955
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/26/2019 00:32	WG1369955
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/26/2019 00:32	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/26/2019 00:32	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/26/2019 00:32	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/26/2019 00:32	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/26/2019 00:32	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/26/2019 00:32	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/26/2019 00:32	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/26/2019 00:32	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/26/2019 00:32	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/26/2019 00:32	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/26/2019 00:32	WG1369955
2-Hexanone	U		0.757	5.00	1	10/26/2019 00:32	WG1369955
n-Hexane	U		0.305	5.00	1	10/26/2019 00:32	WG1369955
Iodomethane	U		0.377	10.0	1	10/26/2019 00:32	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/26/2019 00:32	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/26/2019 00:32	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/26/2019 00:32	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/26/2019 00:32	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/26/2019 00:32	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/26/2019 00:32	WG1369955
Naphthalene	U		0.174	2.50	1	10/26/2019 00:32	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/26/2019 00:32	WG1369955
Styrene	U		0.117	0.500	1	10/26/2019 00:32	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/26/2019 00:32	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/26/2019 00:32	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/26/2019 00:32	WG1369955
Tetrachloroethene	U		0.199	0.500	1	10/26/2019 00:32	WG1369955
Toluene	U		0.412	0.500	1	10/26/2019 00:32	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/26/2019 00:32	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/26/2019 00:32	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/26/2019 00:32	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/26/2019 00:32	WG1369955
Trichloroethene	U		0.153	0.500	1	10/26/2019 00:32	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/26/2019 00:32	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/26/2019 00:32	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/26/2019 00:32	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/26/2019 00:32	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/26/2019 00:32	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/26/2019 00:32	WG1369955
Vinyl chloride	U		0.118	0.500	1	10/26/2019 00:32	WG1369955
Xylenes, Total	U		0.316	1.50	1	10/26/2019 00:32	WG1369955
(S) Toluene-d8	*112*			*80.0-120*		*10/26/2019 00:32*	WG1369955
(S) 4-Bromofluorobenzene	*113*			*77.0-126*		*10/26/2019 00:32*	WG1369955
(S) 1,2-Dichloroethane-d4	*106*			*70.0-130*		*10/26/2019 00:32*	WG1369955

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	408000		2710	20000	1	10/22/2019 17:03	WG1366946

Sample Narrative:

L1150936-06 WG1366946: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	22800		51.9	1000	1	10/17/2019 19:02	WG1364616
Nitrate	441		22.7	100	1	10/17/2019 19:02	WG1364616
Sulfate	5720		77.4	5000	1	10/17/2019 19:02	WG1364616

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	7170		102	1000	1	10/19/2019 01:45	WG1365383

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	1680		15.0	100	1	10/23/2019 15:02	WG1366325
Manganese	403		0.250	5.00	1	10/23/2019 15:02	WG1366325

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/19/2019 06:53	WG1365594
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*		*10/19/2019 06:53*	WG1365594

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	4670		0.287	0.678	1	10/18/2019 12:04	WG1365164
Ethane	78.6		0.296	1.29	1	10/18/2019 12:04	WG1365164
Ethene	U		0.422	1.27	1	10/18/2019 12:04	WG1365164

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/26/2019 00:52	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/26/2019 00:52	WG1369955
Benzene	U		0.0896	0.500	1	10/26/2019 00:52	WG1369955
Bromobenzene	U	J0	0.133	0.500	1	10/26/2019 00:52	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/26/2019 00:52	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/26/2019 00:52	WG1369955
Bromoform	U		0.186	0.500	1	10/26/2019 00:52	WG1369955
Bromomethane	U		0.157	2.50	1	10/26/2019 00:52	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/26/2019 00:52	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/26/2019 00:52	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/26/2019 00:52	WG1369955
Carbon disulfide	U		0.101	0.500	1	10/26/2019 00:52	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/26/2019 00:52	WG1369955

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/26/2019 00:52	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/26/2019 00:52	WG1369955
Chloroethane	U		0.141	2.50	1	10/26/2019 00:52	WG1369955
Chloroform	U		0.0860	0.500	1	10/26/2019 00:52	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/26/2019 00:52	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/26/2019 00:52	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/26/2019 00:52	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/26/2019 00:52	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/26/2019 00:52	WG1369955
Dibromomethane	U		0.117	0.500	1	10/26/2019 00:52	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/26/2019 00:52	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/26/2019 00:52	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/26/2019 00:52	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/26/2019 00:52	WG1369955
1,1-Dichloroethane	U		0.114	0.500	1	10/26/2019 00:52	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/26/2019 00:52	WG1369955
1,1-Dichloroethene	U		0.188	0.500	1	10/26/2019 00:52	WG1369955
cis-1,2-Dichloroethene	0.188	J	0.0933	0.500	1	10/26/2019 00:52	WG1369955
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/26/2019 00:52	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/26/2019 00:52	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/26/2019 00:52	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/26/2019 00:52	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/26/2019 00:52	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/26/2019 00:52	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/26/2019 00:52	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/26/2019 00:52	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/26/2019 00:52	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/26/2019 00:52	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/26/2019 00:52	WG1369955
2-Hexanone	U		0.757	5.00	1	10/26/2019 00:52	WG1369955
n-Hexane	U		0.305	5.00	1	10/26/2019 00:52	WG1369955
Iodomethane	U		0.377	10.0	1	10/26/2019 00:52	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/26/2019 00:52	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/26/2019 00:52	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/26/2019 00:52	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/26/2019 00:52	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/26/2019 00:52	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/26/2019 00:52	WG1369955
Naphthalene	U		0.174	2.50	1	10/26/2019 00:52	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/26/2019 00:52	WG1369955
Styrene	0.141	J	0.117	0.500	1	10/26/2019 00:52	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/26/2019 00:52	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/26/2019 00:52	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/26/2019 00:52	WG1369955
Tetrachloroethene	U		0.199	0.500	1	10/26/2019 00:52	WG1369955
Toluene	0.561		0.412	0.500	1	10/26/2019 00:52	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/26/2019 00:52	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/26/2019 00:52	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/26/2019 00:52	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/26/2019 00:52	WG1369955
Trichloroethene	U		0.153	0.500	1	10/26/2019 00:52	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/26/2019 00:52	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/26/2019 00:52	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/26/2019 00:52	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/26/2019 00:52	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/26/2019 00:52	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/26/2019 00:52	WG1369955
Vinyl chloride	U		0.118	0.500	1	10/26/2019 00:52	WG1369955
Xylenes, Total	U		0.316	1.50	1	10/26/2019 00:52	WG1369955
(S) Toluene-d8	*112*			*80.0-120*		*10/26/2019 00:52*	WG1369955
(S) 4-Bromofluorobenzene	*112*			*77.0-126*		*10/26/2019 00:52*	WG1369955
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*		*10/26/2019 00:52*	WG1369955

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	518000		2710	20000	1	10/22/2019 17:10	WG1366946

Sample Narrative:

L1150936-07 WG1366946: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	35800		51.9	1000	1	10/17/2019 19:14	WG1364616
Nitrate	U		22.7	100	1	10/17/2019 19:14	WG1364616
Sulfate	67700		77.4	5000	1	10/17/2019 19:14	WG1364616

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	20900		102	1000	1	10/19/2019 02:08	WG1365383

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	8540		15.0	100	1	10/23/2019 15:05	WG1366325
Manganese	2090		0.250	5.00	1	10/23/2019 15:05	WG1366325

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	2000		31.6	100	1	10/19/2019 07:17	WG1365594
(S) a,a,a-Trifluorotoluene(FID)	*109*			*78.0-120*		*10/19/2019 07:17*	WG1365594

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	5780		0.287	0.678	1	10/18/2019 13:25	WG1365165
Ethane	62.6		0.296	1.29	1	10/18/2019 13:25	WG1365165
Ethene	110		0.422	1.27	1	10/18/2019 13:25	WG1365165

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.18	J J0	1.05	25.0	1	10/26/2019 01:13	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/26/2019 01:13	WG1369955
Benzene	0.211	J	0.0896	0.500	1	10/26/2019 01:13	WG1369955
Bromobenzene	U	J0	0.133	0.500	1	10/26/2019 01:13	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/26/2019 01:13	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/26/2019 01:13	WG1369955
Bromoform	U		0.186	0.500	1	10/26/2019 01:13	WG1369955
Bromomethane	U		0.157	2.50	1	10/26/2019 01:13	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/26/2019 01:13	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/26/2019 01:13	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/26/2019 01:13	WG1369955
Carbon disulfide	U		0.101	0.500	1	10/26/2019 01:13	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/26/2019 01:13	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/26/2019 01:13	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/26/2019 01:13	WG1369955
Chloroethane	U		0.141	2.50	1	10/26/2019 01:13	WG1369955
Chloroform	U		0.0860	0.500	1	10/26/2019 01:13	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/26/2019 01:13	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/26/2019 01:13	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/26/2019 01:13	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/26/2019 01:13	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/26/2019 01:13	WG1369955
Dibromomethane	U		0.117	0.500	1	10/26/2019 01:13	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/26/2019 01:13	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/26/2019 01:13	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/26/2019 01:13	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/26/2019 01:13	WG1369955
1,1-Dichloroethane	U		0.114	0.500	1	10/26/2019 01:13	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/26/2019 01:13	WG1369955
1,1-Dichloroethene	8.47		0.188	0.500	1	10/26/2019 01:13	WG1369955
cis-1,2-Dichloroethene	2510		18.7	100	200	10/27/2019 15:49	WG1370146
trans-1,2-Dichloroethene	11.0		0.152	0.500	1	10/26/2019 01:13	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/26/2019 01:13	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/26/2019 01:13	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/26/2019 01:13	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/26/2019 01:13	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/26/2019 01:13	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/26/2019 01:13	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/26/2019 01:13	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/26/2019 01:13	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/26/2019 01:13	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/26/2019 01:13	WG1369955
2-Hexanone	U		0.757	5.00	1	10/26/2019 01:13	WG1369955
n-Hexane	U		0.305	5.00	1	10/26/2019 01:13	WG1369955
Iodomethane	U		0.377	10.0	1	10/26/2019 01:13	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/26/2019 01:13	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/26/2019 01:13	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/26/2019 01:13	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/26/2019 01:13	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/26/2019 01:13	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/26/2019 01:13	WG1369955
Naphthalene	U		0.174	2.50	1	10/26/2019 01:13	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/26/2019 01:13	WG1369955
Styrene	U		0.117	0.500	1	10/26/2019 01:13	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/26/2019 01:13	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/26/2019 01:13	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/26/2019 01:13	WG1369955
Tetrachloroethene	2.35		0.199	0.500	1	10/26/2019 01:13	WG1369955
Toluene	U		0.412	0.500	1	10/26/2019 01:13	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/26/2019 01:13	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/26/2019 01:13	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/26/2019 01:13	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/26/2019 01:13	WG1369955
Trichloroethene	28.0		0.153	0.500	1	10/26/2019 01:13	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/26/2019 01:13	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/26/2019 01:13	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/26/2019 01:13	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/26/2019 01:13	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/26/2019 01:13	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/26/2019 01:13	WG1369955
Vinyl chloride	1180		23.6	100	200	10/27/2019 15:49	WG1370146
Xylenes, Total	U		0.316	1.50	1	10/26/2019 01:13	WG1369955
(S) Toluene-d8	*111*			*80.0-120*		*10/26/2019 01:13*	WG1369955
(S) Toluene-d8	*94.2*			*80.0-120*		*10/27/2019 15:49*	WG1370146
(S) 4-Bromofluorobenzene	*112*			*77.0-126*		*10/26/2019 01:13*	WG1369955
(S) 4-Bromofluorobenzene	*92.6*			*77.0-126*		*10/27/2019 15:49*	WG1370146
(S) 1,2-Dichloroethane-d4	*105*			*70.0-130*		*10/26/2019 01:13*	WG1369955
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/27/2019 15:49*	WG1370146

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/19/2019 04:05	WG1365594
(S) a,a,a-Trifluorotoluene(FID)	*108*			*78.0-120*		*10/19/2019 04:05*	WG1365594

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	1.29	J	1.05	25.0	1	10/26/2019 15:08	WG1370189
Acrylonitrile	U		0.873	5.00	1	10/26/2019 15:08	WG1370189
Benzene	U		0.0896	0.500	1	10/26/2019 15:08	WG1370189
Bromobenzene	U		0.133	0.500	1	10/26/2019 15:08	WG1370189
Bromodichloromethane	U		0.0800	0.500	1	10/26/2019 15:08	WG1370189
Bromochloromethane	U		0.145	0.500	1	10/26/2019 15:08	WG1370189
Bromoform	U		0.186	0.500	1	10/26/2019 15:08	WG1370189
Bromomethane	U	J0	0.157	2.50	1	10/26/2019 15:08	WG1370189
n-Butylbenzene	U		0.143	0.500	1	10/26/2019 15:08	WG1370189
sec-Butylbenzene	U		0.134	0.500	1	10/26/2019 15:08	WG1370189
tert-Butylbenzene	U		0.183	0.500	1	10/26/2019 15:08	WG1370189
Carbon disulfide	U		0.101	0.500	1	10/26/2019 15:08	WG1370189
Carbon tetrachloride	U		0.159	0.500	1	10/26/2019 15:08	WG1370189
Chlorobenzene	U		0.140	0.500	1	10/26/2019 15:08	WG1370189
Chlorodibromomethane	U		0.128	0.500	1	10/26/2019 15:08	WG1370189
Chloroethane	U		0.141	2.50	1	10/26/2019 15:08	WG1370189
Chloroform	U		0.0860	0.500	1	10/26/2019 15:08	WG1370189
Chloromethane	U		0.153	1.25	1	10/26/2019 15:08	WG1370189
2-Chlorotoluene	U		0.111	0.500	1	10/26/2019 15:08	WG1370189
4-Chlorotoluene	U		0.0972	0.500	1	10/26/2019 15:08	WG1370189
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/26/2019 15:08	WG1370189
1,2-Dibromoethane	U		0.193	0.500	1	10/26/2019 15:08	WG1370189
Dibromomethane	U		0.117	0.500	1	10/26/2019 15:08	WG1370189
1,2-Dichlorobenzene	U		0.101	0.500	1	10/26/2019 15:08	WG1370189
1,3-Dichlorobenzene	U		0.130	0.500	1	10/26/2019 15:08	WG1370189
1,4-Dichlorobenzene	U		0.121	0.500	1	10/26/2019 15:08	WG1370189
Dichlorodifluoromethane	U		0.127	2.50	1	10/26/2019 15:08	WG1370189
1,1-Dichloroethane	U		0.114	0.500	1	10/26/2019 15:08	WG1370189
1,2-Dichloroethane	U		0.108	0.500	1	10/26/2019 15:08	WG1370189
1,1-Dichloroethene	U		0.188	0.500	1	10/26/2019 15:08	WG1370189
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/26/2019 15:08	WG1370189
trans-1,2-Dichloroethene	0.228	J	0.152	0.500	1	10/26/2019 15:08	WG1370189
1,2-Dichloropropane	U		0.190	0.500	1	10/26/2019 15:08	WG1370189
1,1-Dichloropropene	U		0.128	0.500	1	10/26/2019 15:08	WG1370189
1,3-Dichloropropane	U		0.147	1.00	1	10/26/2019 15:08	WG1370189
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/26/2019 15:08	WG1370189
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/26/2019 15:08	WG1370189
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/26/2019 15:08	WG1370189
2,2-Dichloropropane	U		0.0929	0.500	1	10/26/2019 15:08	WG1370189
Di-isopropyl ether	U		0.0924	0.500	1	10/26/2019 15:08	WG1370189
Ethylbenzene	U		0.158	0.500	1	10/26/2019 15:08	WG1370189
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/26/2019 15:08	WG1370189
2-Hexanone	U		0.757	5.00	1	10/26/2019 15:08	WG1370189
n-Hexane	U		0.305	5.00	1	10/26/2019 15:08	WG1370189
Iodomethane	U	J0	0.377	10.0	1	10/26/2019 15:08	WG1370189
Isopropylbenzene	U	J0	0.126	0.500	1	10/26/2019 15:08	WG1370189
p-Isopropyltoluene	U		0.138	0.500	1	10/26/2019 15:08	WG1370189
2-Butanone (MEK)	U		1.28	5.00	1	10/26/2019 15:08	WG1370189

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methylene Chloride	U		1.07	2.50	1	10/26/2019 15:08	WG1370189
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/26/2019 15:08	WG1370189
Methyl tert-butyl ether	U		0.102	0.500	1	10/26/2019 15:08	WG1370189
Naphthalene	U		0.174	2.50	1	10/26/2019 15:08	WG1370189
n-Propylbenzene	U		0.162	0.500	1	10/26/2019 15:08	WG1370189
Styrene	U		0.117	0.500	1	10/26/2019 15:08	WG1370189
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/26/2019 15:08	WG1370189
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/26/2019 15:08	WG1370189
1,1,2-Trichlorotrifluoroethane	U	J0	0.164	0.500	1	10/26/2019 15:08	WG1370189
Tetrachloroethene	U		0.199	0.500	1	10/26/2019 15:08	WG1370189
Toluene	U		0.412	0.500	1	10/26/2019 15:08	WG1370189
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/26/2019 15:08	WG1370189
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/26/2019 15:08	WG1370189
1,1,1-Trichloroethane	U	J0	0.0940	0.500	1	10/26/2019 15:08	WG1370189
1,1,2-Trichloroethane	U		0.186	0.500	1	10/26/2019 15:08	WG1370189
Trichloroethene	U	J0	0.153	0.500	1	10/26/2019 15:08	WG1370189
Trichlorofluoromethane	U		0.130	2.50	1	10/26/2019 15:08	WG1370189
1,2,3-Trichloropropane	U		0.247	2.50	1	10/26/2019 15:08	WG1370189
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/26/2019 15:08	WG1370189
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/26/2019 15:08	WG1370189
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/26/2019 15:08	WG1370189
Vinyl acetate	U		0.645	5.00	1	10/26/2019 15:08	WG1370189
Vinyl chloride	U		0.118	0.500	1	10/26/2019 15:08	WG1370189
Xylenes, Total	U		0.316	1.50	1	10/26/2019 15:08	WG1370189
(S) Toluene-d8	*97.0*			*80.0-120*		*10/26/2019 15:08*	WG1370189
(S) 4-Bromofluorobenzene	*91.4*			*77.0-126*		*10/26/2019 15:08*	WG1370189
(S) 1,2-Dichloroethane-d4	*98.3*			*70.0-130*		*10/26/2019 15:08*	WG1370189

Method Blank (MB)

(MB) R3463802-1 10/22/19 15:00

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Alkalinity	3840	J	2710	20000

Sample Narrative:

BLANK: Endpoint pH 4.5

L1150905-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1150905-05 10/22/19 15:19 • (DUP) R3463802-3 10/22/19 15:27

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	284000	286000	1	0.672		20

Sample Narrative:

OS: Endpoint pH 4.5

DUP: Endpoint pH 4.5

Laboratory Control Sample (LCS)

(LCS) R3463802-5 10/22/19 16:29

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Alkalinity	100000	102000	102	85.0-115	

Sample Narrative:

LCS: Endpoint pH 4.5

Method Blank (MB)

(MB) R3462289-1 10/17/19 10:45

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	112	J	51.9	1000
Nitrate	U		22.7	100
Sulfate	80.2	J	77.4	5000

L1150920-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1150920-01 10/17/19 16:16 • (DUP) R3462289-3 10/17/19 16:28

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	234000	232000	1	0.799	E	15
Nitrate	241	240	1	0.541		15
Sulfate	2280	2250	1	1.21	J	15

L1151015-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1151015-06 10/17/19 21:48 • (DUP) R3462289-6 10/17/19 22:00

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	55600	54400	1	2.09		15
Nitrate	U	0.000	1	0.000		15
Sulfate	4790	4690	1	2.08	J	15

Laboratory Control Sample (LCS)

(LCS) R3462289-2 10/17/19 10:57

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	39000	97.4	80.0-120	
Nitrate	8000	7870	98.4	80.0-120	
Sulfate	40000	39000	97.6	80.0-120	

L1150936-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150936-01 10/17/19 16:54 • (MS) R3462289-4 10/17/19 17:07 • (MSD) R3462289-5 10/17/19 17:20

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	16100	65200	64700	98.3	97.3	1	80.0-120			0.762	15
Nitrate	5000	4120	8920	8880	96.1	95.2	1	80.0-120			0.503	15
Sulfate	50000	94300	137000	139000	85.5	88.6	1	80.0-120	E	E	1.15	15

L1151015-06 Original Sample (OS) • Matrix Spike (MS)

(OS) L1151015-06 10/17/19 21:48 • (MS) R3462289-7 10/17/19 22:13

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	55600	102000	92.5	1	80.0-120	E
Nitrate	5000	U	4880	97.6	1	80.0-120	
Sulfate	50000	4790	53300	96.9	1	80.0-120	

Method Blank (MB)

(MB) R3462716-1 10/18/19 13:21

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
TOC (Total Organic Carbon)	666	J	102	1000

L1150675-03 Original Sample (OS) • Duplicate (DUP)

(OS) L1150675-03 10/18/19 15:46 • (DUP) R3462716-3 10/18/19 16:05

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	26200	26000	1	0.958		20

L1150936-03 Original Sample (OS) • Duplicate (DUP)

(OS) L1150936-03 10/18/19 22:37 • (DUP) R3462716-6 10/18/19 22:57

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	4760	4610	1	3.35		20

Laboratory Control Sample (LCS)

(LCS) R3462716-2 10/18/19 14:02

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TOC (Total Organic Carbon)	75000	67000	89.4	85.0-115	

L1150936-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150936-01 10/18/19 21:14 • (MS) R3462716-4 10/18/19 21:37 • (MSD) R3462716-5 10/18/19 21:59

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	3660	50800	50900	94.3	94.4	1	80.0-120			0.118	20

L1150936-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150936-05 10/19/19 00:41 • (MS) R3462716-7 10/19/19 01:05 • (MSD) R3462716-8 10/19/19 01:27

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	418	48800	47400	96.7	94.0	1	80.0-120			2.79	20

Method Blank (MB)

(MB) R3464170-1 10/23/19 14:00

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Iron	U		15.0	100
Manganese	U		0.250	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3464170-2 10/23/19 14:03 • (LCSD) R3464170-3 10/23/19 14:07

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Iron	5000	5010	5250	100	105	80.0-120			4.59	20
Manganese	50.0	49.4	52.4	98.7	105	80.0-120			5.91	20

L1150936-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150936-01 10/23/19 14:11 • (MS) R3464170-5 10/23/19 14:18 • (MSD) R3464170-6 10/23/19 14:21

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	ug/l	%	%		%			%	%
Iron	5000	119	5280	5440	103	107	1	75.0-125			2.98	20
Manganese	50.0	71.6	122	124	101	106	1	75.0-125			1.86	20

Method Blank (MB)

(MB) R3464595-2 10/19/19 03:41

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Gasoline Range Organics-NWTPH	U		31.6	100
(S) a,a,a-Trifluorotoluene(FID)	*107*			*78.0-120*

Laboratory Control Sample (LCS)

(LCS) R3464595-1 10/19/19 02:53

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Gasoline Range Organics-NWTPH	5500	6120	111	70.0-124	
(S) a,a,a-Trifluorotoluene(FID)			*92.0*	*78.0-120*	

Method Blank (MB)

(MB) R3462472-1 10/18/19 10:58

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1150860-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1150860-01 10/18/19 11:07 • (DUP) R3462472-2 10/18/19 11:42

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Methane	ND	0.000	1	0.000		20
Ethane	ND	0.000	1	0.000		20
Ethene	ND	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3462472-3 10/18/19 12:53 • (LCSD) R3462472-4 10/18/19 12:56

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Methane	67.8	70.5	71.7	104	106	85.0-115			1.72	20
Ethane	129	126	130	97.5	101	85.0-115			3.61	20
Ethene	127	132	136	104	107	85.0-115			2.99	20

Method Blank (MB)

(MB) R3462507-1 10/18/19 13:05

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1150336-08 Original Sample (OS) • Duplicate (DUP)

(OS) L1150336-08 10/18/19 13:10 • (DUP) R3462507-2 10/18/19 13:33

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	20.2	22.0	1	8.39		20
Ethane	U	0.000	1	0.000		20
Ethene	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3462507-5 10/18/19 13:50 • (LCSD) R3462507-6 10/18/19 13:56

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	72.3	71.6	107	106	85.0-115			0.913	20
Ethane	129	127	127	98.2	98.7	85.0-115			0.516	20
Ethene	127	133	133	105	105	85.0-115			0.356	20

L1150339-10 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1150339-10 10/18/19 13:42 • (MS) R3462507-3 10/18/19 13:45 • (MSD) R3462507-4 10/18/19 13:47

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	ug/l	%	%		%			%	%
Methane	67.8	10400	10600	11000	19.7	74.1	10	85.0-115	V	V	3.43	20
Ethane	129	380	1800	1480	110	85.0	10	85.0-115			19.6	20
Ethene	127	741	2220	1900	116	91.0	10	85.0-115	J5		15.6	20

Method Blank (MB)

(MB) R3465284-3 10/25/19 21:00

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3465284-3 10/25/19 21:00

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	0.238	J	0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,2,4-Trimethylbenzene	U		0.123	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*113*			*80.0-120*
(S) 4-Bromofluorobenzene	*114*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3465284-1 10/25/19 19:59

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	94.6	75.7	19.0-160	
Acrylonitrile	125	128	102	55.0-149	
Benzene	25.0	23.6	94.4	70.0-123	
Bromobenzene	25.0	20.2	80.8	73.0-121	
Bromodichloromethane	25.0	25.0	100	75.0-120	
Bromochloromethane	25.0	27.5	110	76.0-122	
Bromoform	25.0	30.8	123	68.0-132	
Bromomethane	25.0	26.6	106	10.0-160	
n-Butylbenzene	25.0	22.6	90.4	73.0-125	
sec-Butylbenzene	25.0	22.5	90.0	75.0-125	
tert-Butylbenzene	25.0	24.8	99.2	76.0-124	
Carbon disulfide	25.0	23.7	94.8	61.0-128	
Carbon tetrachloride	25.0	29.8	119	68.0-126	
Chlorobenzene	25.0	26.6	106	80.0-121	
Chlorodibromomethane	25.0	30.2	121	77.0-125	
Chloroethane	25.0	25.9	104	47.0-150	
Chloroform	25.0	23.2	92.8	73.0-120	
Chloromethane	25.0	21.7	86.8	41.0-142	
2-Chlorotoluene	25.0	21.7	86.8	76.0-123	
4-Chlorotoluene	25.0	21.9	87.6	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	26.6	106	58.0-134	
1,2-Dibromoethane	25.0	25.7	103	80.0-122	
Dibromomethane	25.0	25.7	103	80.0-120	
1,2-Dichlorobenzene	25.0	26.6	106	79.0-121	
1,3-Dichlorobenzene	25.0	25.6	102	79.0-120	
1,4-Dichlorobenzene	25.0	23.7	94.8	79.0-120	
trans-1,4-Dichloro-2-butene	25.0	18.8	75.2	33.0-144	
Dichlorodifluoromethane	25.0	22.3	89.2	51.0-149	
1,1-Dichloroethane	25.0	24.4	97.6	70.0-126	
1,2-Dichloroethane	25.0	23.8	95.2	70.0-128	
1,1-Dichloroethene	25.0	26.6	106	71.0-124	
cis-1,2-Dichloroethene	25.0	25.5	102	73.0-120	
trans-1,2-Dichloroethene	25.0	25.6	102	73.0-120	
1,2-Dichloropropane	25.0	23.7	94.8	77.0-125	
1,1-Dichloropropene	25.0	25.3	101	74.0-126	
1,3-Dichloropropane	25.0	24.5	98.0	80.0-120	
cis-1,3-Dichloropropene	25.0	25.2	101	80.0-123	
trans-1,3-Dichloropropene	25.0	25.9	104	78.0-124	
2,2-Dichloropropane	25.0	26.8	107	58.0-130	
Di-isopropyl ether	25.0	25.1	100	58.0-138	

Laboratory Control Sample (LCS)

(LCS) R3465284-1 10/25/19 19:59

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	25.7	103	79.0-123	
Hexachloro-1,3-butadiene	25.0	25.6	102	54.0-138	
2-Hexanone	125	132	106	67.0-149	
n-Hexane	25.0	23.9	95.6	57.0-133	
Iodomethane	125	145	116	33.0-147	
Isopropylbenzene	25.0	28.4	114	76.0-127	
p-Isopropyltoluene	25.0	24.2	96.8	76.0-125	
2-Butanone (MEK)	125	119	95.2	44.0-160	
Methylene Chloride	25.0	23.2	92.8	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	133	106	68.0-142	
Methyl tert-butyl ether	25.0	26.0	104	68.0-125	
Naphthalene	25.0	25.7	103	54.0-135	
n-Propylbenzene	25.0	22.0	88.0	77.0-124	
Styrene	25.0	28.2	113	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	30.2	121	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	20.9	83.6	65.0-130	
Tetrachloroethene	25.0	29.2	117	72.0-132	
Toluene	25.0	25.2	101	79.0-120	
1,1,2-Trichlorotrifluoroethane	25.0	27.8	111	69.0-132	
1,2,3-Trichlorobenzene	25.0	27.0	108	50.0-138	
1,2,4-Trichlorobenzene	25.0	26.3	105	57.0-137	
1,1,1-Trichloroethane	25.0	28.2	113	73.0-124	
1,1,2-Trichloroethane	25.0	25.8	103	80.0-120	
Trichloroethene	25.0	28.0	112	78.0-124	
Trichlorofluoromethane	25.0	27.9	112	59.0-147	
1,2,3-Trichloropropane	25.0	22.6	90.4	73.0-130	
1,2,3-Trimethylbenzene	25.0	22.7	90.8	77.0-120	
1,2,4-Trimethylbenzene	25.0	22.3	89.2	76.0-121	
1,3,5-Trimethylbenzene	25.0	23.0	92.0	76.0-122	
Vinyl acetate	125	134	107	11.0-160	
Vinyl chloride	25.0	26.1	104	67.0-131	
Xylenes, Total	75.0	80.7	108	79.0-123	
(S) Toluene-d8			*112*	*80.0-120*	
(S) 4-Bromofluorobenzene			*109*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*107*	*70.0-130*	

Method Blank (MB)

(MB) R3465605-3 10/27/19 09:18

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
cis-1,2-Dichloroethene	U		0.0933	0.500
Vinyl chloride	U		0.118	0.500
(S) Toluene-d8	*96.6*			*80.0-120*
(S) 4-Bromofluorobenzene	*92.5*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3465605-1 10/27/19 08:19 • (LCSD) R3465605-2 10/27/19 08:38

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
cis-1,2-Dichloroethene	25.0	23.1	22.9	92.4	91.6	73.0-120			0.870	20
Vinyl chloride	25.0	29.8	30.8	119	123	67.0-131			3.30	20
(S) Toluene-d8				*97.5*	*92.4*	*80.0-120*				
(S) 4-Bromofluorobenzene				*96.1*	*91.1*	*77.0-126*				
(S) 1,2-Dichloroethane-d4				*101*	*103*	*70.0-130*				

Method Blank (MB)

(MB) R3465451-2 10/26/19 12:44

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3465451-2 10/26/19 12:44

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	0.982	J	0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	0.356	J	0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*95.5*			*80.0-120*
(S) 4-Bromofluorobenzene	*92.7*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*100*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3465451-1 10/26/19 12:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	146	117	19.0-160	
Acrylonitrile	125	168	134	55.0-149	
Benzene	25.0	23.8	95.2	70.0-123	
Bromobenzene	25.0	27.7	111	73.0-121	
Bromodichloromethane	25.0	23.4	93.6	75.0-120	
Bromochloromethane	25.0	26.6	106	76.0-122	
Bromoform	25.0	24.6	98.4	68.0-132	
Bromomethane	25.0	16.1	64.4	10.0-160	
n-Butylbenzene	25.0	29.4	118	73.0-125	
sec-Butylbenzene	25.0	26.3	105	75.0-125	
tert-Butylbenzene	25.0	24.7	98.8	76.0-124	
Carbon disulfide	25.0	22.7	90.8	61.0-128	
Carbon tetrachloride	25.0	21.5	86.0	68.0-126	
Chlorobenzene	25.0	24.1	96.4	80.0-121	
Chlorodibromomethane	25.0	24.8	99.2	77.0-125	
Chloroethane	25.0	28.4	114	47.0-150	
Chloroform	25.0	22.7	90.8	73.0-120	
Chloromethane	25.0	25.8	103	41.0-142	
2-Chlorotoluene	25.0	26.9	108	76.0-123	
4-Chlorotoluene	25.0	26.6	106	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	25.6	102	58.0-134	
1,2-Dibromoethane	25.0	25.6	102	80.0-122	
Dibromomethane	25.0	26.4	106	80.0-120	
1,2-Dichlorobenzene	25.0	27.8	111	79.0-121	
1,3-Dichlorobenzene	25.0	28.5	114	79.0-120	
1,4-Dichlorobenzene	25.0	27.8	111	79.0-120	
Dichlorodifluoromethane	25.0	22.5	90.0	51.0-149	
1,1-Dichloroethane	25.0	27.6	110	70.0-126	
1,2-Dichloroethane	25.0	28.4	114	70.0-128	
1,1-Dichloroethene	25.0	24.2	96.8	71.0-124	
cis-1,2-Dichloroethene	25.0	24.0	96.0	73.0-120	
trans-1,2-Dichloroethene	25.0	22.5	90.0	73.0-120	
1,2-Dichloropropane	25.0	29.5	118	77.0-125	
1,1-Dichloropropene	25.0	24.6	98.4	74.0-126	
1,3-Dichloropropane	25.0	27.0	108	80.0-120	
cis-1,3-Dichloropropene	25.0	24.9	99.6	80.0-123	
trans-1,3-Dichloropropene	25.0	26.8	107	78.0-124	
trans-1,4-Dichloro-2-butene	25.0	33.7	135	33.0-144	
2,2-Dichloropropane	25.0	23.0	92.0	58.0-130	
Di-isopropyl ether	25.0	29.5	118	58.0-138	

Laboratory Control Sample (LCS)

(LCS) R3465451-1 10/26/19 12:05

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	22.5	90.0	79.0-123	
Hexachloro-1,3-butadiene	25.0	31.4	126	54.0-138	
2-Hexanone	125	172	138	67.0-149	
n-Hexane	25.0	29.8	119	57.0-133	
Iodomethane	125	104	83.2	33.0-147	
Isopropylbenzene	25.0	21.3	85.2	76.0-127	
p-Isopropyltoluene	25.0	27.1	108	76.0-125	
2-Butanone (MEK)	125	139	111	44.0-160	
Methylene Chloride	25.0	22.5	90.0	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	142	114	68.0-142	
Methyl tert-butyl ether	25.0	25.3	101	68.0-125	
Naphthalene	25.0	23.9	95.6	54.0-135	
n-Propylbenzene	25.0	25.2	101	77.0-124	
Styrene	25.0	23.9	95.6	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	23.3	93.2	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	25.9	104	65.0-130	
1,1,2-Trichlorotrifluoroethane	25.0	21.4	85.6	69.0-132	
Tetrachloroethene	25.0	22.9	91.6	72.0-132	
Toluene	25.0	23.7	94.8	79.0-120	
1,2,3-Trichlorobenzene	25.0	27.3	109	50.0-138	
1,2,4-Trichlorobenzene	25.0	30.0	120	57.0-137	
1,1,1-Trichloroethane	25.0	21.4	85.6	73.0-124	
1,1,2-Trichloroethane	25.0	24.5	98.0	80.0-120	
Trichloroethene	25.0	22.2	88.8	78.0-124	
Trichlorofluoromethane	25.0	26.9	108	59.0-147	
1,2,3-Trichloropropane	25.0	26.0	104	73.0-130	
1,2,4-Trimethylbenzene	25.0	25.9	104	76.0-121	
1,2,3-Trimethylbenzene	25.0	26.6	106	77.0-120	
1,3,5-Trimethylbenzene	25.0	25.0	100	76.0-122	
Vinyl acetate	125	164	131	11.0-160	
Vinyl chloride	25.0	32.6	130	67.0-131	
Xylenes, Total	75.0	68.0	90.7	79.0-123	
(S) Toluene-d8			*93.8*	*80.0-120*	
(S) 4-Bromofluorobenzene			*91.0*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*101*	*70.0-130*	

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J0	J0: The identification of the analyte is acceptable, but the reported concentration is an estimate. The calibration met method criteria.
J5	The sample matrix interfered with the ability to make any accurate determination; spike value is high.
V	The sample concentration is too high to evaluate accurate spike recoveries.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

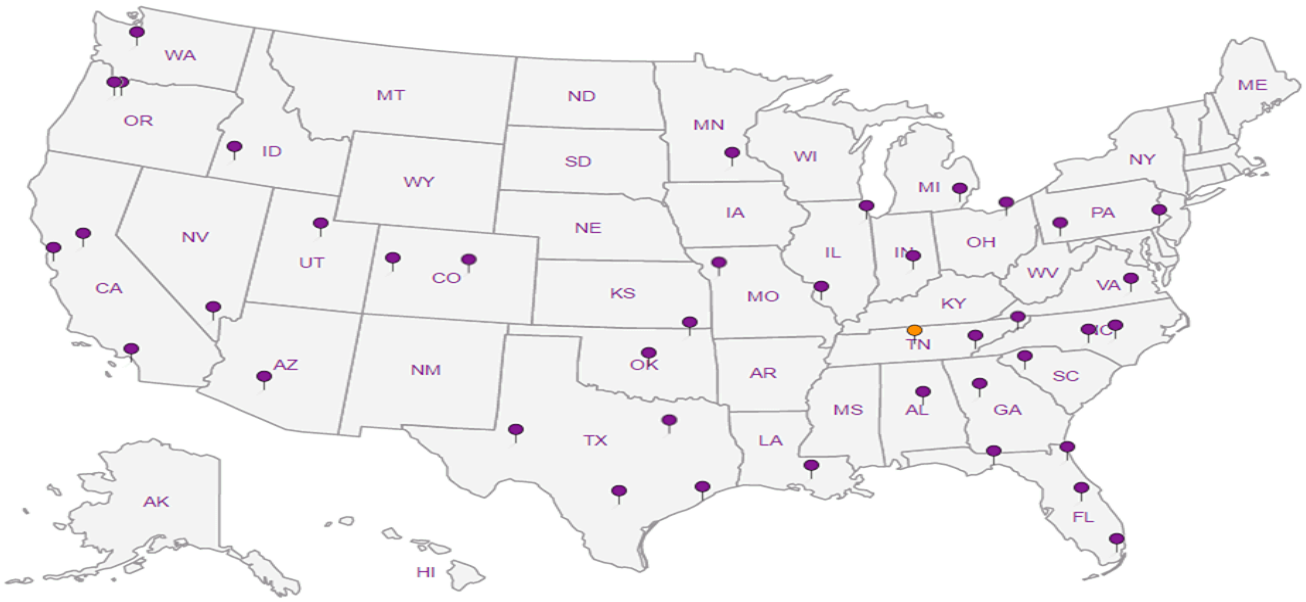
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



PES-Seattle

Billing Information: PES-Seattle

Pres Chk

Report to: Bill Haldeman/Brian O'neal

Email To: on file

Project Description: American Linen

City/State Collected: Seattle, WA

Phone: on file

Fax:

Client Project # 1413.004.02.SOIE

Lab Project # PESENVSWA-ALP

Collected by (print): Ben H./Kaves B./Shannon M./Sean

Site/Facility ID # American Linen

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed: STAT

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	**NO3,SO4,Chloride**48 hour hold	NWTPHGX	VOCs (V8260LLC)	Total Fe Mn 6020	TOC	Alkalinity	EEM (RSK175LL)				Remarks	Sample # (lab only)
MW-155-101619	Grab	GW	27	10/16/19	1015	12	X	X	X	X	X	X	X					-01
MW-158A-101619		GW	95		1030	12	X	X	X	X	X	X	X					-02
MW-142-101619		GW	45		1055	12	X	X	X	X	X	X	X					-03
MW-148-101619		GW	75		1205	12	X	X	X	X	X	X	X					-04
EQ-101619		GW	—		1245	12	X	X	X	X	X	X	X					-05
MW-157-101619		GW	75		1338	12	X	X	X	X	X	X	X					-06
MW-143-101619		GW	75		1445	12	X	X	X	X	X	X	X					-07
TRIP-101619		GW	—		1540	1		X	X									-08
BSH 10-16-19		GW																
		GW																

Chain of Custody Page 1 of 1

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# 1150936

G124

Acctnum: PESENVSWA

Template:

Prelogin:

TSR: Brian Ford

PB:

Shipped Via:

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____

Flow _____ Other _____

Samples returned via:
__ UPS __ FedEx __ Courier __ _____

Tracking # 1203 5974 6573

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: __Y ✓N
BAD SURFACE: <0.5 mR/hr

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR	If preservation required by Login: Date/Time
	10-16-19	16:30		1	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: .3+0=.3 °C Bottles Received: 84	10/17/19 @ 1050
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/17/19 Time: 8:45	Hold: / Condition: NCF / OK

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 29, 2019

PES Environmental, Inc.- WA

Sample Delivery Group:	L1151401
Samples Received:	10/18/2019
Project Number:	1413.001.02.501E
Description:	American Linen
Site:	1413.001.02.501E
Report To:	Brian O'Neal/Bill Haldeman 1215 Fourth Ave., Suite 1350 Seattle, WA 98161

Entire Report Reviewed By:

Brian Ford

Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.

Cp: Cover Page 1

Tc: Table of Contents 2

Ss: Sample Summary 3

Cn: Case Narrative 5

Sr: Sample Results 6

MW-918-101719 L1151401-01 6

MW-156-101719 L1151401-02 9

MW-9-101719 L1151401-03 12

MW-120-101719 L1151401-04 15

MW-160-101719 L1151401-05 18

MW-127-101719 L1151401-06 21

TRIP BLANK-101719 L1151401-07 24

Qc: Quality Control Summary 26

Wet Chemistry by Method 2320 B-2011 26

Wet Chemistry by Method 9056A 27

Wet Chemistry by Method 9060A 29

Metals (ICPMS) by Method 6020B 30

Volatile Organic Compounds (GC) by Method NWTPHGX 31

Volatile Organic Compounds (GC) by Method RSK175 34

Volatile Organic Compounds (GC/MS) by Method 8260C 35

Gl: Glossary of Terms 43

Al: Accreditations & Locations 44

Sc: Sample Chain of Custody 45

MW-918-101719 L1151401-01 GW

Collected by: K. Zygas | Collected date/time: 10/17/19 08:30 | Received date/time: 10/18/19 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1367736	1	10/23/19 19:22	10/23/19 19:22	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1365245	1	10/18/19 18:09	10/18/19 18:09	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1365245	5	10/19/19 09:09	10/19/19 09:09	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1367168	1	10/22/19 18:09	10/22/19 18:09	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1366327	1	10/22/19 19:53	10/23/19 09:24	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1367716	1	10/23/19 17:20	10/23/19 17:20	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1366961	1	10/22/19 05:44	10/22/19 05:44	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/26/19 01:33	10/26/19 01:33	ADM	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1370146	1	10/27/19 16:09	10/27/19 16:09	ACG	Mt. Juliet, TN

MW-156-101719 L1151401-02 GW

Collected by: K. Zygas | Collected date/time: 10/17/19 09:40 | Received date/time: 10/18/19 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1367736	1	10/23/19 19:29	10/23/19 19:29	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1365245	1	10/18/19 18:26	10/18/19 18:26	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1367168	1	10/22/19 18:32	10/22/19 18:32	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1366327	1	10/22/19 19:53	10/23/19 09:28	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1367716	10	10/23/19 23:15	10/23/19 23:15	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1366961	1	10/22/19 05:47	10/22/19 05:47	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	10	10/26/19 01:53	10/26/19 01:53	ADM	Mt. Juliet, TN

MW-9-101719 L1151401-03 GW

Collected by: K. Zygas | Collected date/time: 10/17/19 10:20 | Received date/time: 10/18/19 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1367736	1	10/23/19 19:35	10/23/19 19:35	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1365245	1	10/18/19 18:58	10/18/19 18:58	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1367168	1	10/22/19 18:51	10/22/19 18:51	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1366327	1	10/22/19 19:53	10/23/19 09:31	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1367716	1	10/23/19 17:42	10/23/19 17:42	BMB	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1366961	1	10/22/19 05:51	10/22/19 05:51	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/26/19 02:14	10/26/19 02:14	ADM	Mt. Juliet, TN

MW-120-101719 L1151401-04 GW

Collected by: K. Zygas | Collected date/time: 10/17/19 12:35 | Received date/time: 10/18/19 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1367736	1	10/23/19 19:42	10/23/19 19:42	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1365245	1	10/18/19 19:15	10/18/19 19:15	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1365245	5	10/19/19 09:25	10/19/19 09:25	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1367168	1	10/22/19 19:53	10/22/19 19:53	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1366327	1	10/22/19 19:53	10/23/19 09:35	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1369652	1	10/26/19 16:56	10/26/19 16:56	ACG	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1366961	1	10/22/19 06:06	10/22/19 06:06	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1370146	1	10/27/19 16:28	10/27/19 16:28	ACG	Mt. Juliet, TN

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-160-101719 L1151401-05 GW

Collected by: K. Zygas | Collected date/time: 10/17/19 12:45 | Received date/time: 10/18/19 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1367736	1	10/23/19 19:49	10/23/19 19:49	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1365245	1	10/18/19 19:31	10/18/19 19:31	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1367168	1	10/22/19 20:09	10/22/19 20:09	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1366327	1	10/22/19 19:53	10/23/19 09:39	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1368064	1	10/24/19 19:35	10/24/19 19:35	ADM	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1366961	1	10/22/19 06:11	10/22/19 06:11	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/26/19 02:54	10/26/19 02:54	ADM	Mt. Juliet, TN

MW-127-101719 L1151401-06 GW

Collected by: K. Zygas | Collected date/time: 10/17/19 14:22 | Received date/time: 10/18/19 09:00

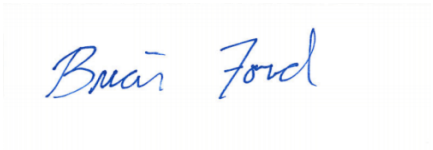
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 2320 B-2011	WG1367736	1	10/23/19 19:57	10/23/19 19:57	GB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG1365245	1	10/18/19 20:21	10/18/19 20:21	LDC	Mt. Juliet, TN
Wet Chemistry by Method 9060A	WG1367168	1	10/22/19 22:04	10/22/19 22:04	VRP	Mt. Juliet, TN
Metals (ICPMS) by Method 6020B	WG1366327	1	10/22/19 19:53	10/23/19 09:42	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1368064	1	10/24/19 19:58	10/24/19 19:58	ADM	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method RSK175	WG1366961	1	10/22/19 06:13	10/22/19 06:13	DAH	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/26/19 03:15	10/26/19 03:15	ADM	Mt. Juliet, TN

TRIP BLANK-101719 L1151401-07 GW

Collected by: K. Zygas | Collected date/time: 10/17/19 00:00 | Received date/time: 10/18/19 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC) by Method NWTPHGX	WG1368064	1	10/24/19 18:47	10/24/19 18:47	ADM	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260C	WG1369955	1	10/25/19 21:50	10/25/19 21:50	ADM	Mt. Juliet, TN

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.



Brian Ford
Project Manager

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	264000		2710	20000	1	10/23/2019 19:22	WG1367736

Sample Narrative:
L1151401-01 WG1367736: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	22000		51.9	1000	1	10/18/2019 18:09	WG1365245
Nitrate	473		22.7	100	1	10/18/2019 18:09	WG1365245
Sulfate	120000		387	25000	5	10/19/2019 09:09	WG1365245

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	3680	B	102	1000	1	10/22/2019 18:09	WG1367168

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	930		15.0	100	1	10/23/2019 09:24	WG1366327
Manganese	637		0.250	5.00	1	10/23/2019 09:24	WG1366327

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	113	B	31.6	100	1	10/23/2019 17:20	WG1367716
(S) a,a,a-Trifluorotoluene(FID)	*103*			*78.0-120*		*10/23/2019 17:20*	WG1367716

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	43.9		0.287	0.678	1	10/22/2019 05:44	WG1366961
Ethane	U		0.296	1.29	1	10/22/2019 05:44	WG1366961
Ethene	U		0.422	1.27	1	10/22/2019 05:44	WG1366961

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	1.20	J J0	1.05	25.0	1	10/26/2019 01:33	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/26/2019 01:33	WG1369955
Benzene	U		0.0896	0.500	1	10/26/2019 01:33	WG1369955
Bromobenzene	U	J0	0.133	0.500	1	10/26/2019 01:33	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/26/2019 01:33	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/26/2019 01:33	WG1369955
Bromoform	U		0.186	0.500	1	10/26/2019 01:33	WG1369955
Bromomethane	U		0.157	2.50	1	10/26/2019 01:33	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/26/2019 01:33	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/26/2019 01:33	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/26/2019 01:33	WG1369955
Carbon disulfide	U		0.101	0.500	1	10/26/2019 01:33	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/26/2019 01:33	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/26/2019 01:33	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/26/2019 01:33	WG1369955
Chloroethane	U		0.141	2.50	1	10/26/2019 01:33	WG1369955
Chloroform	U		0.0860	0.500	1	10/26/2019 01:33	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/26/2019 01:33	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/26/2019 01:33	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/26/2019 01:33	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/26/2019 01:33	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/26/2019 01:33	WG1369955
Dibromomethane	U		0.117	0.500	1	10/26/2019 01:33	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/26/2019 01:33	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/26/2019 01:33	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/26/2019 01:33	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/26/2019 01:33	WG1369955
1,1-Dichloroethane	1.29		0.114	0.500	1	10/26/2019 01:33	WG1369955
1,2-Dichloroethane	0.485	J	0.108	0.500	1	10/26/2019 01:33	WG1369955
1,1-Dichloroethene	0.478	J	0.188	0.500	1	10/26/2019 01:33	WG1369955
cis-1,2-Dichloroethene	49.8		0.0933	0.500	1	10/27/2019 16:09	WG1370146
trans-1,2-Dichloroethene	0.243	J	0.152	0.500	1	10/26/2019 01:33	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/26/2019 01:33	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/26/2019 01:33	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/26/2019 01:33	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/26/2019 01:33	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/26/2019 01:33	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/26/2019 01:33	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/26/2019 01:33	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/26/2019 01:33	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/26/2019 01:33	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/26/2019 01:33	WG1369955
2-Hexanone	U		0.757	5.00	1	10/26/2019 01:33	WG1369955
n-Hexane	U		0.305	5.00	1	10/26/2019 01:33	WG1369955
Iodomethane	U		0.377	10.0	1	10/26/2019 01:33	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/26/2019 01:33	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/26/2019 01:33	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/26/2019 01:33	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/26/2019 01:33	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/26/2019 01:33	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/26/2019 01:33	WG1369955
Naphthalene	U		0.174	2.50	1	10/26/2019 01:33	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/26/2019 01:33	WG1369955
Styrene	U		0.117	0.500	1	10/26/2019 01:33	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/26/2019 01:33	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/26/2019 01:33	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/26/2019 01:33	WG1369955
Tetrachloroethene	73.9		0.199	0.500	1	10/26/2019 01:33	WG1369955
Toluene	U		0.412	0.500	1	10/26/2019 01:33	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/26/2019 01:33	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/26/2019 01:33	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/26/2019 01:33	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/26/2019 01:33	WG1369955
Trichloroethene	26.9		0.153	0.500	1	10/26/2019 01:33	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/26/2019 01:33	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/26/2019 01:33	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/26/2019 01:33	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/26/2019 01:33	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/26/2019 01:33	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/26/2019 01:33	WG1369955
Vinyl chloride	2.25		0.118	0.500	1	10/27/2019 16:09	WG1370146
Xylenes, Total	U		0.316	1.50	1	10/26/2019 01:33	WG1369955
(S) Toluene-d8	*112*			*80.0-120*		*10/26/2019 01:33*	WG1369955
(S) Toluene-d8	*92.6*			*80.0-120*		*10/27/2019 16:09*	WG1370146
(S) 4-Bromofluorobenzene	*112*			*77.0-126*		*10/26/2019 01:33*	WG1369955
(S) 4-Bromofluorobenzene	*90.8*			*77.0-126*		*10/27/2019 16:09*	WG1370146
(S) 1,2-Dichloroethane-d4	*109*			*70.0-130*		*10/26/2019 01:33*	WG1369955
(S) 1,2-Dichloroethane-d4	*106*			*70.0-130*		*10/27/2019 16:09*	WG1370146

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	633000		2710	20000	1	10/23/2019 19:29	WG1367736

Sample Narrative:

L1151401-02 WG1367736: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	46000		51.9	1000	1	10/18/2019 18:26	WG1365245
Nitrate	U		22.7	100	1	10/18/2019 18:26	WG1365245
Sulfate	83300		77.4	5000	1	10/18/2019 18:26	WG1365245

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	19300		102	1000	1	10/22/2019 18:32	WG1367168

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	3440		15.0	100	1	10/23/2019 09:28	WG1366327
Manganese	3830		0.250	5.00	1	10/23/2019 09:28	WG1366327

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Gasoline Range Organics-NWTPH	1450	B	316	1000	10	10/23/2019 23:15	WG1367716
(S) a,a,a-Trifluorotoluene(FID)	*103*			*78.0-120*		*10/23/2019 23:15*	WG1367716

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	2490		0.287	0.678	1	10/22/2019 05:47	WG1366961
Ethane	179		0.296	1.29	1	10/22/2019 05:47	WG1366961
Ethene	U		0.422	1.27	1	10/22/2019 05:47	WG1366961

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	12.9	J J0	10.5	250	10	10/26/2019 01:53	WG1369955
Acrylonitrile	U		8.73	50.0	10	10/26/2019 01:53	WG1369955
Benzene	U		0.896	5.00	10	10/26/2019 01:53	WG1369955
Bromobenzene	U	J0	1.33	5.00	10	10/26/2019 01:53	WG1369955
Bromodichloromethane	U		0.800	5.00	10	10/26/2019 01:53	WG1369955
Bromochloromethane	U		1.45	5.00	10	10/26/2019 01:53	WG1369955
Bromoform	U		1.86	5.00	10	10/26/2019 01:53	WG1369955
Bromomethane	U		1.57	25.0	10	10/26/2019 01:53	WG1369955
n-Butylbenzene	U		1.43	5.00	10	10/26/2019 01:53	WG1369955
sec-Butylbenzene	U		1.34	5.00	10	10/26/2019 01:53	WG1369955
tert-Butylbenzene	U		1.83	5.00	10	10/26/2019 01:53	WG1369955
Carbon disulfide	U		1.01	5.00	10	10/26/2019 01:53	WG1369955
Carbon tetrachloride	U		1.59	5.00	10	10/26/2019 01:53	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		1.40	5.00	10	10/26/2019 01:53	WG1369955
Chlorodibromomethane	U		1.28	5.00	10	10/26/2019 01:53	WG1369955
Chloroethane	U		1.41	25.0	10	10/26/2019 01:53	WG1369955
Chloroform	U		0.860	5.00	10	10/26/2019 01:53	WG1369955
Chloromethane	U	J0	1.53	12.5	10	10/26/2019 01:53	WG1369955
2-Chlorotoluene	U		1.11	5.00	10	10/26/2019 01:53	WG1369955
4-Chlorotoluene	U		0.972	5.00	10	10/26/2019 01:53	WG1369955
1,2-Dibromo-3-Chloropropane	U		3.25	25.0	10	10/26/2019 01:53	WG1369955
1,2-Dibromoethane	U		1.93	5.00	10	10/26/2019 01:53	WG1369955
Dibromomethane	U		1.17	5.00	10	10/26/2019 01:53	WG1369955
1,2-Dichlorobenzene	U		1.01	5.00	10	10/26/2019 01:53	WG1369955
1,3-Dichlorobenzene	U		1.30	5.00	10	10/26/2019 01:53	WG1369955
1,4-Dichlorobenzene	U		1.21	5.00	10	10/26/2019 01:53	WG1369955
Dichlorodifluoromethane	U		1.27	25.0	10	10/26/2019 01:53	WG1369955
1,1-Dichloroethane	U		1.14	5.00	10	10/26/2019 01:53	WG1369955
1,2-Dichloroethane	U		1.08	5.00	10	10/26/2019 01:53	WG1369955
1,1-Dichloroethene	6.70		1.88	5.00	10	10/26/2019 01:53	WG1369955
cis-1,2-Dichloroethene	1420		0.933	5.00	10	10/26/2019 01:53	WG1369955
trans-1,2-Dichloroethene	6.04		1.52	5.00	10	10/26/2019 01:53	WG1369955
1,2-Dichloropropane	U		1.90	5.00	10	10/26/2019 01:53	WG1369955
1,1-Dichloropropene	U		1.28	5.00	10	10/26/2019 01:53	WG1369955
1,3-Dichloropropane	U		1.47	10.0	10	10/26/2019 01:53	WG1369955
cis-1,3-Dichloropropene	U		0.976	5.00	10	10/26/2019 01:53	WG1369955
trans-1,3-Dichloropropene	U		2.22	5.00	10	10/26/2019 01:53	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	2.57	50.0	10	10/26/2019 01:53	WG1369955
2,2-Dichloropropane	U		0.929	5.00	10	10/26/2019 01:53	WG1369955
Di-isopropyl ether	U		0.924	5.00	10	10/26/2019 01:53	WG1369955
Ethylbenzene	U		1.58	5.00	10	10/26/2019 01:53	WG1369955
Hexachloro-1,3-butadiene	U		1.57	10.0	10	10/26/2019 01:53	WG1369955
2-Hexanone	U		7.57	50.0	10	10/26/2019 01:53	WG1369955
n-Hexane	U		3.05	50.0	10	10/26/2019 01:53	WG1369955
Iodomethane	U		3.77	100	10	10/26/2019 01:53	WG1369955
Isopropylbenzene	U		1.26	5.00	10	10/26/2019 01:53	WG1369955
p-Isopropyltoluene	U		1.38	5.00	10	10/26/2019 01:53	WG1369955
2-Butanone (MEK)	U		12.8	50.0	10	10/26/2019 01:53	WG1369955
Methylene Chloride	U		10.7	25.0	10	10/26/2019 01:53	WG1369955
4-Methyl-2-pentanone (MIBK)	U		8.23	50.0	10	10/26/2019 01:53	WG1369955
Methyl tert-butyl ether	U		1.02	5.00	10	10/26/2019 01:53	WG1369955
Naphthalene	U		1.74	25.0	10	10/26/2019 01:53	WG1369955
n-Propylbenzene	U		1.62	5.00	10	10/26/2019 01:53	WG1369955
Styrene	U		1.17	5.00	10	10/26/2019 01:53	WG1369955
1,1,1,2-Tetrachloroethane	U		1.20	5.00	10	10/26/2019 01:53	WG1369955
1,1,2,2-Tetrachloroethane	U		1.30	5.00	10	10/26/2019 01:53	WG1369955
1,1,2-Trichlorotrifluoroethane	U		1.64	5.00	10	10/26/2019 01:53	WG1369955
Tetrachloroethene	682		1.99	5.00	10	10/26/2019 01:53	WG1369955
Toluene	U		4.12	5.00	10	10/26/2019 01:53	WG1369955
1,2,3-Trichlorobenzene	U		1.64	5.00	10	10/26/2019 01:53	WG1369955
1,2,4-Trichlorobenzene	U		3.55	5.00	10	10/26/2019 01:53	WG1369955
1,1,1-Trichloroethane	U		0.940	5.00	10	10/26/2019 01:53	WG1369955
1,1,2-Trichloroethane	U		1.86	5.00	10	10/26/2019 01:53	WG1369955
Trichloroethene	430		1.53	5.00	10	10/26/2019 01:53	WG1369955
Trichlorofluoromethane	U		1.30	25.0	10	10/26/2019 01:53	WG1369955
1,2,3-Trichloropropane	U		2.47	25.0	10	10/26/2019 01:53	WG1369955
1,2,4-Trimethylbenzene	1.36	J	1.23	5.00	10	10/26/2019 01:53	WG1369955
1,2,3-Trimethylbenzene	U		0.739	5.00	10	10/26/2019 01:53	WG1369955
1,3,5-Trimethylbenzene	U		1.24	5.00	10	10/26/2019 01:53	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		6.45	50.0	10	10/26/2019 01:53	WG1369955
Vinyl chloride	51.1		1.18	5.00	10	10/26/2019 01:53	WG1369955
Xylenes, Total	U		3.16	15.0	10	10/26/2019 01:53	WG1369955
(S) Toluene-d8	*111*			*80.0-120*		*10/26/2019 01:53*	WG1369955
(S) 4-Bromofluorobenzene	*111*			*77.0-126*		*10/26/2019 01:53*	WG1369955
(S) 1,2-Dichloroethane-d4	*108*			*70.0-130*		*10/26/2019 01:53*	WG1369955

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	612000		2710	20000	1	10/23/2019 19:35	WG1367736

Sample Narrative:

L1151401-03 WG1367736: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	20000		51.9	1000	1	10/18/2019 18:58	WG1365245
Nitrate	U		22.7	100	1	10/18/2019 18:58	WG1365245
Sulfate	U		77.4	5000	1	10/18/2019 18:58	WG1365245

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	4420	B	102	1000	1	10/22/2019 18:51	WG1367168

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	21600		15.0	100	1	10/23/2019 09:31	WG1366327
Manganese	3760		0.250	5.00	1	10/23/2019 09:31	WG1366327

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	62.0	B J	31.6	100	1	10/23/2019 17:42	WG1367716
(S) a,a,a-Trifluorotoluene(FID)	*103*			*78.0-120*		*10/23/2019 17:42*	WG1367716

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	1770		0.287	0.678	1	10/22/2019 05:51	WG1366961
Ethane	8.51		0.296	1.29	1	10/22/2019 05:51	WG1366961
Ethene	U		0.422	1.27	1	10/22/2019 05:51	WG1366961

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U	J0	1.05	25.0	1	10/26/2019 02:14	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/26/2019 02:14	WG1369955
Benzene	U		0.0896	0.500	1	10/26/2019 02:14	WG1369955
Bromobenzene	U	J0	0.133	0.500	1	10/26/2019 02:14	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/26/2019 02:14	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/26/2019 02:14	WG1369955
Bromoform	U		0.186	0.500	1	10/26/2019 02:14	WG1369955
Bromomethane	U		0.157	2.50	1	10/26/2019 02:14	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/26/2019 02:14	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/26/2019 02:14	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/26/2019 02:14	WG1369955
Carbon disulfide	U		0.101	0.500	1	10/26/2019 02:14	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/26/2019 02:14	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/26/2019 02:14	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/26/2019 02:14	WG1369955
Chloroethane	U		0.141	2.50	1	10/26/2019 02:14	WG1369955
Chloroform	U		0.0860	0.500	1	10/26/2019 02:14	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/26/2019 02:14	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/26/2019 02:14	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/26/2019 02:14	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/26/2019 02:14	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/26/2019 02:14	WG1369955
Dibromomethane	U		0.117	0.500	1	10/26/2019 02:14	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/26/2019 02:14	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/26/2019 02:14	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/26/2019 02:14	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/26/2019 02:14	WG1369955
1,1-Dichloroethane	U		0.114	0.500	1	10/26/2019 02:14	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/26/2019 02:14	WG1369955
1,1-Dichloroethene	U		0.188	0.500	1	10/26/2019 02:14	WG1369955
cis-1,2-Dichloroethene	0.786		0.0933	0.500	1	10/26/2019 02:14	WG1369955
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/26/2019 02:14	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/26/2019 02:14	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/26/2019 02:14	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/26/2019 02:14	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/26/2019 02:14	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/26/2019 02:14	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/26/2019 02:14	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/26/2019 02:14	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/26/2019 02:14	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/26/2019 02:14	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/26/2019 02:14	WG1369955
2-Hexanone	U		0.757	5.00	1	10/26/2019 02:14	WG1369955
n-Hexane	U		0.305	5.00	1	10/26/2019 02:14	WG1369955
Iodomethane	U		0.377	10.0	1	10/26/2019 02:14	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/26/2019 02:14	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/26/2019 02:14	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/26/2019 02:14	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/26/2019 02:14	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/26/2019 02:14	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/26/2019 02:14	WG1369955
Naphthalene	U		0.174	2.50	1	10/26/2019 02:14	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/26/2019 02:14	WG1369955
Styrene	U		0.117	0.500	1	10/26/2019 02:14	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/26/2019 02:14	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/26/2019 02:14	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/26/2019 02:14	WG1369955
Tetrachloroethene	U		0.199	0.500	1	10/26/2019 02:14	WG1369955
Toluene	U		0.412	0.500	1	10/26/2019 02:14	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/26/2019 02:14	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/26/2019 02:14	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/26/2019 02:14	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/26/2019 02:14	WG1369955
Trichloroethene	U		0.153	0.500	1	10/26/2019 02:14	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/26/2019 02:14	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/26/2019 02:14	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/26/2019 02:14	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/26/2019 02:14	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/26/2019 02:14	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/26/2019 02:14	WG1369955
Vinyl chloride	0.416	J	0.118	0.500	1	10/26/2019 02:14	WG1369955
Xylenes, Total	U		0.316	1.50	1	10/26/2019 02:14	WG1369955
(S) Toluene-d8	*110*			*80.0-120*		*10/26/2019 02:14*	WG1369955
(S) 4-Bromofluorobenzene	*115*			*77.0-126*		*10/26/2019 02:14*	WG1369955
(S) 1,2-Dichloroethane-d4	*108*			*70.0-130*		*10/26/2019 02:14*	WG1369955

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	264000		2710	20000	1	10/23/2019 19:42	WG1367736

Sample Narrative:

L1151401-04 WG1367736: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	22000		51.9	1000	1	10/18/2019 19:15	WG1365245
Nitrate	472		22.7	100	1	10/18/2019 19:15	WG1365245
Sulfate	119000		387	25000	5	10/19/2019 09:25	WG1365245

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	3640	B	102	1000	1	10/22/2019 19:53	WG1367168

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	937		15.0	100	1	10/23/2019 09:35	WG1366327
Manganese	637		0.250	5.00	1	10/23/2019 09:35	WG1366327

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	106	B	31.6	100	1	10/26/2019 16:56	WG1369652
(S) a,a,a-Trifluorotoluene(FID)	*96.8*			*78.0-120*		*10/26/2019 16:56*	WG1369652

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	86.4		0.287	0.678	1	10/22/2019 06:06	WG1366961
Ethane	U		0.296	1.29	1	10/22/2019 06:06	WG1366961
Ethene	U		0.422	1.27	1	10/22/2019 06:06	WG1366961

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	U		1.05	25.0	1	10/27/2019 16:28	WG1370146
Acrylonitrile	U		0.873	5.00	1	10/27/2019 16:28	WG1370146
Benzene	U		0.0896	0.500	1	10/27/2019 16:28	WG1370146
Bromobenzene	U		0.133	0.500	1	10/27/2019 16:28	WG1370146
Bromodichloromethane	U		0.0800	0.500	1	10/27/2019 16:28	WG1370146
Bromochloromethane	U		0.145	0.500	1	10/27/2019 16:28	WG1370146
Bromoform	U		0.186	0.500	1	10/27/2019 16:28	WG1370146
Bromomethane	U	J0	0.157	2.50	1	10/27/2019 16:28	WG1370146
n-Butylbenzene	U		0.143	0.500	1	10/27/2019 16:28	WG1370146
sec-Butylbenzene	U		0.134	0.500	1	10/27/2019 16:28	WG1370146
tert-Butylbenzene	U		0.183	0.500	1	10/27/2019 16:28	WG1370146
Carbon disulfide	U		0.101	0.500	1	10/27/2019 16:28	WG1370146
Carbon tetrachloride	U		0.159	0.500	1	10/27/2019 16:28	WG1370146

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/27/2019 16:28	WG1370146
Chlorodibromomethane	U		0.128	0.500	1	10/27/2019 16:28	WG1370146
Chloroethane	U		0.141	2.50	1	10/27/2019 16:28	WG1370146
Chloroform	U		0.0860	0.500	1	10/27/2019 16:28	WG1370146
Chloromethane	U		0.153	1.25	1	10/27/2019 16:28	WG1370146
2-Chlorotoluene	U		0.111	0.500	1	10/27/2019 16:28	WG1370146
4-Chlorotoluene	U		0.0972	0.500	1	10/27/2019 16:28	WG1370146
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/27/2019 16:28	WG1370146
1,2-Dibromoethane	U		0.193	0.500	1	10/27/2019 16:28	WG1370146
Dibromomethane	U		0.117	0.500	1	10/27/2019 16:28	WG1370146
1,2-Dichlorobenzene	U		0.101	0.500	1	10/27/2019 16:28	WG1370146
1,3-Dichlorobenzene	U		0.130	0.500	1	10/27/2019 16:28	WG1370146
1,4-Dichlorobenzene	U		0.121	0.500	1	10/27/2019 16:28	WG1370146
Dichlorodifluoromethane	U	J0	0.127	2.50	1	10/27/2019 16:28	WG1370146
1,1-Dichloroethane	1.52		0.114	0.500	1	10/27/2019 16:28	WG1370146
1,2-Dichloroethane	0.605		0.108	0.500	1	10/27/2019 16:28	WG1370146
1,1-Dichloroethene	0.552		0.188	0.500	1	10/27/2019 16:28	WG1370146
cis-1,2-Dichloroethene	48.8		0.0933	0.500	1	10/27/2019 16:28	WG1370146
trans-1,2-Dichloroethene	0.220	J	0.152	0.500	1	10/27/2019 16:28	WG1370146
1,2-Dichloropropane	1.12		0.190	0.500	1	10/27/2019 16:28	WG1370146
1,1-Dichloropropene	U		0.128	0.500	1	10/27/2019 16:28	WG1370146
1,3-Dichloropropane	U		0.147	1.00	1	10/27/2019 16:28	WG1370146
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/27/2019 16:28	WG1370146
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/27/2019 16:28	WG1370146
trans-1,4-Dichloro-2-butene	U		0.257	5.00	1	10/27/2019 16:28	WG1370146
2,2-Dichloropropane	U		0.0929	0.500	1	10/27/2019 16:28	WG1370146
Di-isopropyl ether	U		0.0924	0.500	1	10/27/2019 16:28	WG1370146
Ethylbenzene	U		0.158	0.500	1	10/27/2019 16:28	WG1370146
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/27/2019 16:28	WG1370146
2-Hexanone	U		0.757	5.00	1	10/27/2019 16:28	WG1370146
n-Hexane	U		0.305	5.00	1	10/27/2019 16:28	WG1370146
Iodomethane	U	J0	0.377	10.0	1	10/27/2019 16:28	WG1370146
Isopropylbenzene	U		0.126	0.500	1	10/27/2019 16:28	WG1370146
p-Isopropyltoluene	U		0.138	0.500	1	10/27/2019 16:28	WG1370146
2-Butanone (MEK)	U		1.28	5.00	1	10/27/2019 16:28	WG1370146
Methylene Chloride	U		1.07	2.50	1	10/27/2019 16:28	WG1370146
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/27/2019 16:28	WG1370146
Methyl tert-butyl ether	U		0.102	0.500	1	10/27/2019 16:28	WG1370146
Naphthalene	U		0.174	2.50	1	10/27/2019 16:28	WG1370146
n-Propylbenzene	U		0.162	0.500	1	10/27/2019 16:28	WG1370146
Styrene	U		0.117	0.500	1	10/27/2019 16:28	WG1370146
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/27/2019 16:28	WG1370146
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/27/2019 16:28	WG1370146
1,1,2-Trichlorotrifluoroethane	U	J0	0.164	0.500	1	10/27/2019 16:28	WG1370146
Tetrachloroethene	61.5		0.199	0.500	1	10/27/2019 16:28	WG1370146
Toluene	U		0.412	0.500	1	10/27/2019 16:28	WG1370146
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/27/2019 16:28	WG1370146
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/27/2019 16:28	WG1370146
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/27/2019 16:28	WG1370146
1,1,2-Trichloroethane	U		0.186	0.500	1	10/27/2019 16:28	WG1370146
Trichloroethene	22.3		0.153	0.500	1	10/27/2019 16:28	WG1370146
Trichlorofluoromethane	U		0.130	2.50	1	10/27/2019 16:28	WG1370146
1,2,3-Trichloropropane	U		0.247	2.50	1	10/27/2019 16:28	WG1370146
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/27/2019 16:28	WG1370146
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/27/2019 16:28	WG1370146
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/27/2019 16:28	WG1370146

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/27/2019 16:28	WG1370146
Vinyl chloride	2.31		0.118	0.500	1	10/27/2019 16:28	WG1370146
Xylenes, Total	U		0.316	1.50	1	10/27/2019 16:28	WG1370146
(S) Toluene-d8	*96.1*			*80.0-120*		*10/27/2019 16:28*	WG1370146
(S) 4-Bromofluorobenzene	*97.0*			*77.0-126*		*10/27/2019 16:28*	WG1370146
(S) 1,2-Dichloroethane-d4	*101*			*70.0-130*		*10/27/2019 16:28*	WG1370146

Wet Chemistry by Method 2320 B-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Alkalinity	183000		2710	20000	1	10/23/2019 19:49	WG1367736

Sample Narrative:

L1151401-05 WG1367736: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	8210		51.9	1000	1	10/18/2019 19:31	WG1365245
Nitrate	U		22.7	100	1	10/18/2019 19:31	WG1365245
Sulfate	2060	J	77.4	5000	1	10/18/2019 19:31	WG1365245

Wet Chemistry by Method 9060A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
TOC (Total Organic Carbon)	2310	B	102	1000	1	10/22/2019 20:09	WG1367168

Metals (ICPMS) by Method 6020B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Iron	10500		15.0	100	1	10/23/2019 09:39	WG1366327
Manganese	522		0.250	5.00	1	10/23/2019 09:39	WG1366327

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/24/2019 19:35	WG1368064
(S) a,a,a-Trifluorotoluene(FID)	*97.1*			*78.0-120*		*10/24/2019 19:35*	WG1368064

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methane	537		0.287	0.678	1	10/22/2019 06:11	WG1366961
Ethane	U		0.296	1.29	1	10/22/2019 06:11	WG1366961
Ethene	U		0.422	1.27	1	10/22/2019 06:11	WG1366961

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Acetone	3.26	J J0	1.05	25.0	1	10/26/2019 02:54	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/26/2019 02:54	WG1369955
Benzene	U		0.0896	0.500	1	10/26/2019 02:54	WG1369955
Bromobenzene	U	J0	0.133	0.500	1	10/26/2019 02:54	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/26/2019 02:54	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/26/2019 02:54	WG1369955
Bromoform	U		0.186	0.500	1	10/26/2019 02:54	WG1369955
Bromomethane	U		0.157	2.50	1	10/26/2019 02:54	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/26/2019 02:54	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/26/2019 02:54	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/26/2019 02:54	WG1369955
Carbon disulfide	U		0.101	0.500	1	10/26/2019 02:54	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/26/2019 02:54	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/26/2019 02:54	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/26/2019 02:54	WG1369955
Chloroethane	U		0.141	2.50	1	10/26/2019 02:54	WG1369955
Chloroform	U		0.0860	0.500	1	10/26/2019 02:54	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/26/2019 02:54	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/26/2019 02:54	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/26/2019 02:54	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/26/2019 02:54	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/26/2019 02:54	WG1369955
Dibromomethane	U		0.117	0.500	1	10/26/2019 02:54	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/26/2019 02:54	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/26/2019 02:54	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/26/2019 02:54	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/26/2019 02:54	WG1369955
1,1-Dichloroethane	U		0.114	0.500	1	10/26/2019 02:54	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/26/2019 02:54	WG1369955
1,1-Dichloroethene	U		0.188	0.500	1	10/26/2019 02:54	WG1369955
cis-1,2-Dichloroethene	0.445	J	0.0933	0.500	1	10/26/2019 02:54	WG1369955
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/26/2019 02:54	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/26/2019 02:54	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/26/2019 02:54	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/26/2019 02:54	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/26/2019 02:54	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/26/2019 02:54	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/26/2019 02:54	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/26/2019 02:54	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/26/2019 02:54	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/26/2019 02:54	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/26/2019 02:54	WG1369955
2-Hexanone	U		0.757	5.00	1	10/26/2019 02:54	WG1369955
n-Hexane	U		0.305	5.00	1	10/26/2019 02:54	WG1369955
Iodomethane	U		0.377	10.0	1	10/26/2019 02:54	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/26/2019 02:54	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/26/2019 02:54	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/26/2019 02:54	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/26/2019 02:54	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/26/2019 02:54	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/26/2019 02:54	WG1369955
Naphthalene	U		0.174	2.50	1	10/26/2019 02:54	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/26/2019 02:54	WG1369955
Styrene	U		0.117	0.500	1	10/26/2019 02:54	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/26/2019 02:54	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/26/2019 02:54	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/26/2019 02:54	WG1369955
Tetrachloroethene	U		0.199	0.500	1	10/26/2019 02:54	WG1369955
Toluene	U		0.412	0.500	1	10/26/2019 02:54	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/26/2019 02:54	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/26/2019 02:54	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/26/2019 02:54	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/26/2019 02:54	WG1369955
Trichloroethene	U		0.153	0.500	1	10/26/2019 02:54	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/26/2019 02:54	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/26/2019 02:54	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/26/2019 02:54	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/26/2019 02:54	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/26/2019 02:54	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/26/2019 02:54	WG1369955
Vinyl chloride	U		0.118	0.500	1	10/26/2019 02:54	WG1369955
Xylenes, Total	U		0.316	1.50	1	10/26/2019 02:54	WG1369955
(S) Toluene-d8	*113*			*80.0-120*		*10/26/2019 02:54*	WG1369955
(S) 4-Bromofluorobenzene	*112*			*77.0-126*		*10/26/2019 02:54*	WG1369955
(S) 1,2-Dichloroethane-d4	*111*			*70.0-130*		*10/26/2019 02:54*	WG1369955

Wet Chemistry by Method 2320 B-2011

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Alkalinity	133000		2710	20000	1	10/23/2019 19:57	WG1367736

Sample Narrative:

L1151401-06 WG1367736: Endpoint pH 4.5

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	27200		51.9	1000	1	10/18/2019 20:21	WG1365245
Nitrate	323		22.7	100	1	10/18/2019 20:21	WG1365245
Sulfate	71600		77.4	5000	1	10/18/2019 20:21	WG1365245

Wet Chemistry by Method 9060A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
TOC (Total Organic Carbon)	1900	B	102	1000	1	10/22/2019 22:04	WG1367168

Metals (ICPMS) by Method 6020B

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Iron	920		15.0	100	1	10/23/2019 09:42	WG1366327
Manganese	161		0.250	5.00	1	10/23/2019 09:42	WG1366327

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/24/2019 19:58	WG1368064
(S) a,a,a-Trifluorotoluene(FID)	*96.6*			*78.0-120*		*10/24/2019 19:58*	WG1368064

Volatile Organic Compounds (GC) by Method RSK175

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Methane	U		0.287	0.678	1	10/22/2019 06:13	WG1366961
Ethane	U		0.296	1.29	1	10/22/2019 06:13	WG1366961
Ethene	U		0.422	1.27	1	10/22/2019 06:13	WG1366961

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	1.43	J JO	1.05	25.0	1	10/26/2019 03:15	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/26/2019 03:15	WG1369955
Benzene	U		0.0896	0.500	1	10/26/2019 03:15	WG1369955
Bromobenzene	U	JO	0.133	0.500	1	10/26/2019 03:15	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/26/2019 03:15	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/26/2019 03:15	WG1369955
Bromoform	U		0.186	0.500	1	10/26/2019 03:15	WG1369955
Bromomethane	U		0.157	2.50	1	10/26/2019 03:15	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/26/2019 03:15	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/26/2019 03:15	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/26/2019 03:15	WG1369955
Carbon disulfide	U		0.101	0.500	1	10/26/2019 03:15	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/26/2019 03:15	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chlorobenzene	U		0.140	0.500	1	10/26/2019 03:15	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/26/2019 03:15	WG1369955
Chloroethane	U		0.141	2.50	1	10/26/2019 03:15	WG1369955
Chloroform	U		0.0860	0.500	1	10/26/2019 03:15	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/26/2019 03:15	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/26/2019 03:15	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/26/2019 03:15	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/26/2019 03:15	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/26/2019 03:15	WG1369955
Dibromomethane	U		0.117	0.500	1	10/26/2019 03:15	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/26/2019 03:15	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/26/2019 03:15	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/26/2019 03:15	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/26/2019 03:15	WG1369955
1,1-Dichloroethane	0.547		0.114	0.500	1	10/26/2019 03:15	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/26/2019 03:15	WG1369955
1,1-Dichloroethene	U		0.188	0.500	1	10/26/2019 03:15	WG1369955
cis-1,2-Dichloroethene	0.656		0.0933	0.500	1	10/26/2019 03:15	WG1369955
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/26/2019 03:15	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/26/2019 03:15	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/26/2019 03:15	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/26/2019 03:15	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/26/2019 03:15	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/26/2019 03:15	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/26/2019 03:15	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/26/2019 03:15	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/26/2019 03:15	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/26/2019 03:15	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/26/2019 03:15	WG1369955
2-Hexanone	U		0.757	5.00	1	10/26/2019 03:15	WG1369955
n-Hexane	U		0.305	5.00	1	10/26/2019 03:15	WG1369955
Iodomethane	U		0.377	10.0	1	10/26/2019 03:15	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/26/2019 03:15	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/26/2019 03:15	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/26/2019 03:15	WG1369955
Methylene Chloride	U		1.07	2.50	1	10/26/2019 03:15	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/26/2019 03:15	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/26/2019 03:15	WG1369955
Naphthalene	U		0.174	2.50	1	10/26/2019 03:15	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/26/2019 03:15	WG1369955
Styrene	U		0.117	0.500	1	10/26/2019 03:15	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/26/2019 03:15	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/26/2019 03:15	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/26/2019 03:15	WG1369955
Tetrachloroethene	U		0.199	0.500	1	10/26/2019 03:15	WG1369955
Toluene	U		0.412	0.500	1	10/26/2019 03:15	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/26/2019 03:15	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/26/2019 03:15	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/26/2019 03:15	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/26/2019 03:15	WG1369955
Trichloroethene	U		0.153	0.500	1	10/26/2019 03:15	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/26/2019 03:15	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/26/2019 03:15	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/26/2019 03:15	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/26/2019 03:15	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/26/2019 03:15	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Vinyl acetate	U		0.645	5.00	1	10/26/2019 03:15	WG1369955
Vinyl chloride	U		0.118	0.500	1	10/26/2019 03:15	WG1369955
Xylenes, Total	U		0.316	1.50	1	10/26/2019 03:15	WG1369955
(S) Toluene-d8	*112*			*80.0-120*		*10/26/2019 03:15*	WG1369955
(S) 4-Bromofluorobenzene	*112*			*77.0-126*		*10/26/2019 03:15*	WG1369955
(S) 1,2-Dichloroethane-d4	*112*			*70.0-130*		*10/26/2019 03:15*	WG1369955

Volatile Organic Compounds (GC) by Method NWTPHGX

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Gasoline Range Organics-NWTPH	U		31.6	100	1	10/24/2019 18:47	WG1368064
(S) a,a,a-Trifluorotoluene(FID)	*96.7*			*78.0-120*		*10/24/2019 18:47*	WG1368064

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Acetone	1.82	J J0	1.05	25.0	1	10/25/2019 21:50	WG1369955
Acrylonitrile	U		0.873	5.00	1	10/25/2019 21:50	WG1369955
Benzene	U		0.0896	0.500	1	10/25/2019 21:50	WG1369955
Bromobenzene	U	J0	0.133	0.500	1	10/25/2019 21:50	WG1369955
Bromodichloromethane	U		0.0800	0.500	1	10/25/2019 21:50	WG1369955
Bromochloromethane	U		0.145	0.500	1	10/25/2019 21:50	WG1369955
Bromoform	U		0.186	0.500	1	10/25/2019 21:50	WG1369955
Bromomethane	U		0.157	2.50	1	10/25/2019 21:50	WG1369955
n-Butylbenzene	U		0.143	0.500	1	10/25/2019 21:50	WG1369955
sec-Butylbenzene	U		0.134	0.500	1	10/25/2019 21:50	WG1369955
tert-Butylbenzene	U		0.183	0.500	1	10/25/2019 21:50	WG1369955
Carbon disulfide	0.167	J	0.101	0.500	1	10/25/2019 21:50	WG1369955
Carbon tetrachloride	U		0.159	0.500	1	10/25/2019 21:50	WG1369955
Chlorobenzene	U		0.140	0.500	1	10/25/2019 21:50	WG1369955
Chlorodibromomethane	U		0.128	0.500	1	10/25/2019 21:50	WG1369955
Chloroethane	U		0.141	2.50	1	10/25/2019 21:50	WG1369955
Chloroform	U		0.0860	0.500	1	10/25/2019 21:50	WG1369955
Chloromethane	U	J0	0.153	1.25	1	10/25/2019 21:50	WG1369955
2-Chlorotoluene	U		0.111	0.500	1	10/25/2019 21:50	WG1369955
4-Chlorotoluene	U		0.0972	0.500	1	10/25/2019 21:50	WG1369955
1,2-Dibromo-3-Chloropropane	U		0.325	2.50	1	10/25/2019 21:50	WG1369955
1,2-Dibromoethane	U		0.193	0.500	1	10/25/2019 21:50	WG1369955
Dibromomethane	U		0.117	0.500	1	10/25/2019 21:50	WG1369955
1,2-Dichlorobenzene	U		0.101	0.500	1	10/25/2019 21:50	WG1369955
1,3-Dichlorobenzene	U		0.130	0.500	1	10/25/2019 21:50	WG1369955
1,4-Dichlorobenzene	U		0.121	0.500	1	10/25/2019 21:50	WG1369955
Dichlorodifluoromethane	U		0.127	2.50	1	10/25/2019 21:50	WG1369955
1,1-Dichloroethane	U		0.114	0.500	1	10/25/2019 21:50	WG1369955
1,2-Dichloroethane	U		0.108	0.500	1	10/25/2019 21:50	WG1369955
1,1-Dichloroethene	U		0.188	0.500	1	10/25/2019 21:50	WG1369955
cis-1,2-Dichloroethene	U		0.0933	0.500	1	10/25/2019 21:50	WG1369955
trans-1,2-Dichloroethene	U		0.152	0.500	1	10/25/2019 21:50	WG1369955
1,2-Dichloropropane	U		0.190	0.500	1	10/25/2019 21:50	WG1369955
1,1-Dichloropropene	U		0.128	0.500	1	10/25/2019 21:50	WG1369955
1,3-Dichloropropane	U		0.147	1.00	1	10/25/2019 21:50	WG1369955
cis-1,3-Dichloropropene	U		0.0976	0.500	1	10/25/2019 21:50	WG1369955
trans-1,3-Dichloropropene	U		0.222	0.500	1	10/25/2019 21:50	WG1369955
trans-1,4-Dichloro-2-butene	U	J0	0.257	5.00	1	10/25/2019 21:50	WG1369955
2,2-Dichloropropane	U		0.0929	0.500	1	10/25/2019 21:50	WG1369955
Di-isopropyl ether	U		0.0924	0.500	1	10/25/2019 21:50	WG1369955
Ethylbenzene	U		0.158	0.500	1	10/25/2019 21:50	WG1369955
Hexachloro-1,3-butadiene	U		0.157	1.00	1	10/25/2019 21:50	WG1369955
2-Hexanone	U		0.757	5.00	1	10/25/2019 21:50	WG1369955
n-Hexane	U		0.305	5.00	1	10/25/2019 21:50	WG1369955
Iodomethane	U		0.377	10.0	1	10/25/2019 21:50	WG1369955
Isopropylbenzene	U		0.126	0.500	1	10/25/2019 21:50	WG1369955
p-Isopropyltoluene	U		0.138	0.500	1	10/25/2019 21:50	WG1369955
2-Butanone (MEK)	U		1.28	5.00	1	10/25/2019 21:50	WG1369955

Volatile Organic Compounds (GC/MS) by Method 8260C

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Methylene Chloride	U		1.07	2.50	1	10/25/2019 21:50	WG1369955
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00	1	10/25/2019 21:50	WG1369955
Methyl tert-butyl ether	U		0.102	0.500	1	10/25/2019 21:50	WG1369955
Naphthalene	U		0.174	2.50	1	10/25/2019 21:50	WG1369955
n-Propylbenzene	U		0.162	0.500	1	10/25/2019 21:50	WG1369955
Styrene	U		0.117	0.500	1	10/25/2019 21:50	WG1369955
1,1,1,2-Tetrachloroethane	U		0.120	0.500	1	10/25/2019 21:50	WG1369955
1,1,2,2-Tetrachloroethane	U		0.130	0.500	1	10/25/2019 21:50	WG1369955
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500	1	10/25/2019 21:50	WG1369955
Tetrachloroethene	U		0.199	0.500	1	10/25/2019 21:50	WG1369955
Toluene	U		0.412	0.500	1	10/25/2019 21:50	WG1369955
1,2,3-Trichlorobenzene	U		0.164	0.500	1	10/25/2019 21:50	WG1369955
1,2,4-Trichlorobenzene	U		0.355	0.500	1	10/25/2019 21:50	WG1369955
1,1,1-Trichloroethane	U		0.0940	0.500	1	10/25/2019 21:50	WG1369955
1,1,2-Trichloroethane	U		0.186	0.500	1	10/25/2019 21:50	WG1369955
Trichloroethene	U		0.153	0.500	1	10/25/2019 21:50	WG1369955
Trichlorofluoromethane	U		0.130	2.50	1	10/25/2019 21:50	WG1369955
1,2,3-Trichloropropane	U		0.247	2.50	1	10/25/2019 21:50	WG1369955
1,2,4-Trimethylbenzene	U		0.123	0.500	1	10/25/2019 21:50	WG1369955
1,2,3-Trimethylbenzene	U		0.0739	0.500	1	10/25/2019 21:50	WG1369955
1,3,5-Trimethylbenzene	U		0.124	0.500	1	10/25/2019 21:50	WG1369955
Vinyl acetate	U		0.645	5.00	1	10/25/2019 21:50	WG1369955
Vinyl chloride	U		0.118	0.500	1	10/25/2019 21:50	WG1369955
Xylenes, Total	U		0.316	1.50	1	10/25/2019 21:50	WG1369955
(S) Toluene-d8	*111*			*80.0-120*		*10/25/2019 21:50*	WG1369955
(S) 4-Bromofluorobenzene	*111*			*77.0-126*		*10/25/2019 21:50*	WG1369955
(S) 1,2-Dichloroethane-d4	*103*			*70.0-130*		*10/25/2019 21:50*	WG1369955

Method Blank (MB)

(MB) R3464297-1 10/23/19 17:06

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Alkalinity	4070	J	2710	20000

Sample Narrative:

BLANK: Endpoint pH 4.5

L1151324-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1151324-01 10/23/19 18:10 • (DUP) R3464297-3 10/23/19 18:19

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	33800	33900	1	0.182		20

Sample Narrative:

OS: Endpoint pH 4.5 HEADSPACE

DUP: Endpoint pH 4.5

L1151411-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1151411-01 10/23/19 20:20 • (DUP) R3464297-6 10/23/19 20:28

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Alkalinity	254000	255000	1	0.300		20

Sample Narrative:

OS: Endpoint pH 4.5 HEADSPACE

DUP: Endpoint pH 4.5

Laboratory Control Sample (LCS)

(LCS) R3464297-5 10/23/19 18:45

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Alkalinity	100000	101000	101	85.0-115	

Sample Narrative:

LCS: Endpoint pH 4.5

Method Blank (MB)

(MB) R3462678-1 10/18/19 10:14

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Chloride	U		51.9	1000
Nitrate	U		22.7	100
Sulfate	U		77.4	5000

L1151341-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1151341-01 10/18/19 15:58 • (DUP) R3462678-3 10/18/19 16:14

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Chloride	27100	27200	1	0.121		15
Nitrate	ND	0.000	1	0.000		15
Sulfate	13700	13700	1	0.281		15

L1151425-03 Original Sample (OS) • Duplicate (DUP)

(OS) L1151425-03 10/18/19 20:53 • (DUP) R3462678-6 10/18/19 21:10

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Chloride	4080	4020	1	1.56		15
Nitrate	389	384	1	1.40		15
Sulfate	1640	1640	1	0.189	J	15

Laboratory Control Sample (LCS)

(LCS) R3462678-2 10/18/19 10:30

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
	ug/l	ug/l	%	%	
Chloride	40000	38500	96.2	80.0-120	
Nitrate	8000	7800	97.5	80.0-120	
Sulfate	40000	39000	97.6	80.0-120	

L1151343-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1151343-01 10/18/19 17:04 • (MS) R3462678-4 10/18/19 17:20 • (MSD) R3462678-5 10/18/19 17:36

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	49200	97300	97200	96.2	96.1	1	80.0-120			0.0394	15
Nitrate	5000	364	5380	5450	100	102	1	80.0-120			1.17	15
Sulfate	50000	49900	97300	96700	94.8	93.5	1	80.0-120			0.648	15

L1151431-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L1151431-01 10/18/19 21:59 • (MS) R3462678-7 10/18/19 22:15

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	2100	51900	99.7	1	80.0-120	
Nitrate	5000	313	5360	101	1	80.0-120	
Sulfate	50000	9720	58800	98.1	1	80.0-120	

Method Blank (MB)

(MB) R3464154-1 10/22/19 12:38

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
TOC (Total Organic Carbon)	655	J	102	1000

L1151401-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1151401-05 10/22/19 20:09 • (DUP) R3464154-6 10/22/19 20:28

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	2310	2310	1	0.0433		20

L1151201-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1151201-07 10/23/19 12:52 • (DUP) R3464154-9 10/23/19 13:13

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
TOC (Total Organic Carbon)	2350000	2460000	50	4.24		20

Laboratory Control Sample (LCS)

(LCS) R3464154-2 10/22/19 13:23

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TOC (Total Organic Carbon)	75000	65900	87.9	85.0-115	

L1151401-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1151401-03 10/22/19 18:51 • (MS) R3464154-4 10/22/19 19:14 • (MSD) R3464154-5 10/22/19 19:36

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	4420	52000	54900	95.2	101	1	80.0-120			5.46	20

L1151445-14 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1151445-14 10/23/19 09:17 • (MS) R3464154-7 10/23/19 09:38 • (MSD) R3464154-8 10/23/19 10:00

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TOC (Total Organic Carbon)	50000	1130	49100	50800	95.9	99.3	1	80.0-120			3.37	20

Method Blank (MB)

(MB) R3463934-1 10/23/19 08:40

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Iron	U		15.0	100
Manganese	1.67	J	0.250	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3463934-2 10/23/19 08:44 • (LCSD) R3463934-3 10/23/19 08:47

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Iron	5000	5150	5280	103	106	80.0-120			2.59	20
Manganese	50.0	51.9	58.6	104	117	80.0-120			12.1	20

L1151538-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1151538-01 10/23/19 08:51 • (MS) R3463934-5 10/23/19 08:58 • (MSD) R3463934-6 10/23/19 09:02

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Iron	5000	U	4980	4850	99.5	97.0	1	75.0-125			2.51	20
Manganese	50.0	0.699	50.5	48.9	99.6	96.3	1	75.0-125			3.28	20

Method Blank (MB)

(MB) R3465055-2 10/23/19 15:50

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Gasoline Range Organics-NWTPH	75.8	J	31.6	100
(S) a,a,a-Trifluorotoluene(FID)	*103*			*78.0-120*

Laboratory Control Sample (LCS)

(LCS) R3465055-1 10/23/19 15:06

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Gasoline Range Organics-NWTPH	5500	5700	104	70.0-124	
(S) a,a,a-Trifluorotoluene(FID)			*99.3*	*78.0-120*	

L1151770-16 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1151770-16 10/23/19 22:31 • (MS) R3465055-3 10/23/19 23:38 • (MSD) R3465055-4 10/24/19 00:00

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Gasoline Range Organics-NWTPH	5500	ND	6580	5030	118	90.1	1	10.0-155		J3	26.7	21
(S) a,a,a-Trifluorotoluene(FID)					*107*	*104*		*78.0-120*				

Method Blank (MB)

(MB) R3464797-2 10/24/19 15:39

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Gasoline Range Organics-NWTPH	U		31.6	100
(S) a,a,a-Trifluorotoluene(FID)	*96.4*			*78.0-120*

Laboratory Control Sample (LCS)

(LCS) R3464797-1 10/24/19 14:52

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Gasoline Range Organics-NWTPH	5500	5930	108	70.0-124	
(S) a,a,a-Trifluorotoluene(FID)			*105*	*78.0-120*	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3465433-5 10/26/19 12:34

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Gasoline Range Organics-NWTPH	42.4	J	31.6	100
(S) a,a,a-Trifluorotoluene(FID)	*96.5*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3465433-3 10/26/19 11:33 • (LCSD) R3465433-4 10/26/19 11:53

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Gasoline Range Organics-NWTPH	5500	6070	6080	110	111	70.0-124			0.165	20
(S) a,a,a-Trifluorotoluene(FID)				*111*	*112*	*78.0-120*				

Method Blank (MB)

(MB) R3463455-1 10/22/19 05:14

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Methane	U		0.287	0.678
Ethane	U		0.296	1.29
Ethene	U		0.422	1.27

L1151856-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1151856-01 10/22/19 05:19 • (DUP) R3463455-2 10/22/19 06:08

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	ND	0.000	1	0.000		20
Ethane	ND	0.000	1	0.000		20
Ethene	ND	0.000	1	0.000		20

L1151877-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1151877-02 10/22/19 07:26 • (DUP) R3463455-3 10/22/19 07:31

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Methane	U	0.000	1	0.000		20
Ethane	U	0.000	1	0.000		20
Ethene	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3463455-4 10/22/19 07:34 • (LCSD) R3463455-5 10/22/19 07:37

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	%	%	%			%	%
Methane	67.8	70.4	73.0	104	108	85.0-115			3.61	20
Ethane	129	127	128	98.2	99.5	85.0-115			1.29	20
Ethene	127	133	133	104	105	85.0-115			0.727	20

Method Blank (MB)

(MB) R3465284-3 10/25/19 21:00

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	U		1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3465284-3 10/25/19 21:00

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	0.238	J	0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	U		0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
1,2,3-Trichlorobenzene	U		0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,2,4-Trimethylbenzene	U		0.123	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*113*			*80.0-120*
(S) 4-Bromofluorobenzene	*114*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*

Laboratory Control Sample (LCS)

(LCS) R3465284-1 10/25/19 19:59

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	125	94.6	75.7	19.0-160	
Acrylonitrile	125	128	102	55.0-149	
Benzene	25.0	23.6	94.4	70.0-123	
Bromobenzene	25.0	20.2	80.8	73.0-121	
Bromodichloromethane	25.0	25.0	100	75.0-120	
Bromochloromethane	25.0	27.5	110	76.0-122	
Bromoform	25.0	30.8	123	68.0-132	
Bromomethane	25.0	26.6	106	10.0-160	
n-Butylbenzene	25.0	22.6	90.4	73.0-125	
sec-Butylbenzene	25.0	22.5	90.0	75.0-125	
tert-Butylbenzene	25.0	24.8	99.2	76.0-124	
Carbon disulfide	25.0	23.7	94.8	61.0-128	
Carbon tetrachloride	25.0	29.8	119	68.0-126	
Chlorobenzene	25.0	26.6	106	80.0-121	
Chlorodibromomethane	25.0	30.2	121	77.0-125	
Chloroethane	25.0	25.9	104	47.0-150	
Chloroform	25.0	23.2	92.8	73.0-120	
Chloromethane	25.0	21.7	86.8	41.0-142	
2-Chlorotoluene	25.0	21.7	86.8	76.0-123	
4-Chlorotoluene	25.0	21.9	87.6	75.0-122	
1,2-Dibromo-3-Chloropropane	25.0	26.6	106	58.0-134	
1,2-Dibromoethane	25.0	25.7	103	80.0-122	
Dibromomethane	25.0	25.7	103	80.0-120	
1,2-Dichlorobenzene	25.0	26.6	106	79.0-121	
1,3-Dichlorobenzene	25.0	25.6	102	79.0-120	
1,4-Dichlorobenzene	25.0	23.7	94.8	79.0-120	
trans-1,4-Dichloro-2-butene	25.0	18.8	75.2	33.0-144	
Dichlorodifluoromethane	25.0	22.3	89.2	51.0-149	
1,1-Dichloroethane	25.0	24.4	97.6	70.0-126	
1,2-Dichloroethane	25.0	23.8	95.2	70.0-128	
1,1-Dichloroethene	25.0	26.6	106	71.0-124	
cis-1,2-Dichloroethene	25.0	25.5	102	73.0-120	
trans-1,2-Dichloroethene	25.0	25.6	102	73.0-120	
1,2-Dichloropropane	25.0	23.7	94.8	77.0-125	
1,1-Dichloropropene	25.0	25.3	101	74.0-126	
1,3-Dichloropropane	25.0	24.5	98.0	80.0-120	
cis-1,3-Dichloropropene	25.0	25.2	101	80.0-123	
trans-1,3-Dichloropropene	25.0	25.9	104	78.0-124	
2,2-Dichloropropane	25.0	26.8	107	58.0-130	
Di-isopropyl ether	25.0	25.1	100	58.0-138	

Laboratory Control Sample (LCS)

(LCS) R3465284-1 10/25/19 19:59

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	25.0	25.7	103	79.0-123	
Hexachloro-1,3-butadiene	25.0	25.6	102	54.0-138	
2-Hexanone	125	132	106	67.0-149	
n-Hexane	25.0	23.9	95.6	57.0-133	
Iodomethane	125	145	116	33.0-147	
Isopropylbenzene	25.0	28.4	114	76.0-127	
p-Isopropyltoluene	25.0	24.2	96.8	76.0-125	
2-Butanone (MEK)	125	119	95.2	44.0-160	
Methylene Chloride	25.0	23.2	92.8	67.0-120	
4-Methyl-2-pentanone (MIBK)	125	133	106	68.0-142	
Methyl tert-butyl ether	25.0	26.0	104	68.0-125	
Naphthalene	25.0	25.7	103	54.0-135	
n-Propylbenzene	25.0	22.0	88.0	77.0-124	
Styrene	25.0	28.2	113	73.0-130	
1,1,1,2-Tetrachloroethane	25.0	30.2	121	75.0-125	
1,1,2,2-Tetrachloroethane	25.0	20.9	83.6	65.0-130	
Tetrachloroethene	25.0	29.2	117	72.0-132	
Toluene	25.0	25.2	101	79.0-120	
1,1,2-Trichlorotrifluoroethane	25.0	27.8	111	69.0-132	
1,2,3-Trichlorobenzene	25.0	27.0	108	50.0-138	
1,2,4-Trichlorobenzene	25.0	26.3	105	57.0-137	
1,1,1-Trichloroethane	25.0	28.2	113	73.0-124	
1,1,2-Trichloroethane	25.0	25.8	103	80.0-120	
Trichloroethene	25.0	28.0	112	78.0-124	
Trichlorofluoromethane	25.0	27.9	112	59.0-147	
1,2,3-Trichloropropane	25.0	22.6	90.4	73.0-130	
1,2,3-Trimethylbenzene	25.0	22.7	90.8	77.0-120	
1,2,4-Trimethylbenzene	25.0	22.3	89.2	76.0-121	
1,3,5-Trimethylbenzene	25.0	23.0	92.0	76.0-122	
Vinyl acetate	125	134	107	11.0-160	
Vinyl chloride	25.0	26.1	104	67.0-131	
Xylenes, Total	75.0	80.7	108	79.0-123	
(S) Toluene-d8			*112*	*80.0-120*	
(S) 4-Bromofluorobenzene			*109*	*77.0-126*	
(S) 1,2-Dichloroethane-d4			*107*	*70.0-130*	

Method Blank (MB)

(MB) R3465605-3 10/27/19 09:18

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Acetone	1.11	J	1.05	25.0
Acrylonitrile	U		0.873	5.00
Benzene	U		0.0896	0.500
Bromobenzene	U		0.133	0.500
Bromodichloromethane	U		0.0800	0.500
Bromochloromethane	U		0.145	0.500
Bromoform	U		0.186	0.500
Bromomethane	U		0.157	2.50
n-Butylbenzene	U		0.143	0.500
sec-Butylbenzene	U		0.134	0.500
tert-Butylbenzene	U		0.183	0.500
Carbon disulfide	U		0.101	0.500
Carbon tetrachloride	U		0.159	0.500
Chlorobenzene	U		0.140	0.500
Chlorodibromomethane	U		0.128	0.500
Chloroethane	U		0.141	2.50
Chloroform	U		0.0860	0.500
Chloromethane	U		0.153	1.25
2-Chlorotoluene	U		0.111	0.500
4-Chlorotoluene	U		0.0972	0.500
1,2-Dibromo-3-Chloropropane	U		0.325	2.50
1,2-Dibromoethane	U		0.193	0.500
Dibromomethane	U		0.117	0.500
1,2-Dichlorobenzene	U		0.101	0.500
1,3-Dichlorobenzene	U		0.130	0.500
1,4-Dichlorobenzene	U		0.121	0.500
Dichlorodifluoromethane	U		0.127	2.50
1,1-Dichloroethane	U		0.114	0.500
1,2-Dichloroethane	U		0.108	0.500
1,1-Dichloroethene	U		0.188	0.500
cis-1,2-Dichloroethene	U		0.0933	0.500
trans-1,2-Dichloroethene	U		0.152	0.500
1,2-Dichloropropane	U		0.190	0.500
1,1-Dichloropropene	U		0.128	0.500
1,3-Dichloropropane	U		0.147	1.00
cis-1,3-Dichloropropene	U		0.0976	0.500
trans-1,3-Dichloropropene	U		0.222	0.500
trans-1,4-Dichloro-2-butene	U		0.257	5.00
2,2-Dichloropropane	U		0.0929	0.500
Di-isopropyl ether	U		0.0924	0.500

Method Blank (MB)

(MB) R3465605-3 10/27/19 09:18

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Ethylbenzene	U		0.158	0.500
Hexachloro-1,3-butadiene	U		0.157	1.00
2-Hexanone	U		0.757	5.00
n-Hexane	U		0.305	5.00
Iodomethane	U		0.377	10.0
Isopropylbenzene	U		0.126	0.500
p-Isopropyltoluene	U		0.138	0.500
2-Butanone (MEK)	U		1.28	5.00
Methylene Chloride	U		1.07	2.50
4-Methyl-2-pentanone (MIBK)	U		0.823	5.00
Methyl tert-butyl ether	U		0.102	0.500
Naphthalene	0.970	J	0.174	2.50
n-Propylbenzene	U		0.162	0.500
Styrene	U		0.117	0.500
1,1,1,2-Tetrachloroethane	U		0.120	0.500
1,1,2,2-Tetrachloroethane	U		0.130	0.500
1,1,2-Trichlorotrifluoroethane	U		0.164	0.500
Tetrachloroethene	U		0.199	0.500
Toluene	U		0.412	0.500
1,2,3-Trichlorobenzene	0.374	J	0.164	0.500
1,2,4-Trichlorobenzene	U		0.355	0.500
1,1,1-Trichloroethane	U		0.0940	0.500
1,1,2-Trichloroethane	U		0.186	0.500
Trichloroethene	U		0.153	0.500
Trichlorofluoromethane	U		0.130	2.50
1,2,3-Trichloropropane	U		0.247	2.50
1,2,4-Trimethylbenzene	U		0.123	0.500
1,2,3-Trimethylbenzene	U		0.0739	0.500
1,3,5-Trimethylbenzene	U		0.124	0.500
Vinyl acetate	U		0.645	5.00
Vinyl chloride	U		0.118	0.500
Xylenes, Total	U		0.316	1.50
(S) Toluene-d8	*96.6*			*80.0-120*
(S) 4-Bromofluorobenzene	*92.5*			*77.0-126*
(S) 1,2-Dichloroethane-d4	*102*			*70.0-130*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3465605-1 10/27/19 08:19 • (LCSD) R3465605-2 10/27/19 08:38

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	125	142	142	114	114	19.0-160			0.000	27
Acrylonitrile	125	171	164	137	131	55.0-149			4.18	20
Benzene	25.0	22.8	22.8	91.2	91.2	70.0-123			0.000	20
Bromobenzene	25.0	27.0	26.2	108	105	73.0-121			3.01	20
Bromodichloromethane	25.0	22.4	22.2	89.6	88.8	75.0-120			0.897	20
Bromochloromethane	25.0	25.7	25.3	103	101	76.0-122			1.57	20
Bromoform	25.0	24.1	21.5	96.4	86.0	68.0-132			11.4	20
Bromomethane	25.0	13.5	12.5	54.0	50.0	10.0-160			7.69	25
n-Butylbenzene	25.0	26.7	26.1	107	104	73.0-125			2.27	20
sec-Butylbenzene	25.0	25.0	24.2	100	96.8	75.0-125			3.25	20
tert-Butylbenzene	25.0	23.4	22.9	93.6	91.6	76.0-124			2.16	20
Carbon disulfide	25.0	20.4	20.6	81.6	82.4	61.0-128			0.976	20
Carbon tetrachloride	25.0	20.3	20.7	81.2	82.8	68.0-126			1.95	20
Chlorobenzene	25.0	23.7	22.2	94.8	88.8	80.0-121			6.54	20
Chlorodibromomethane	25.0	24.6	22.8	98.4	91.2	77.0-125			7.59	20
Chloroethane	25.0	25.8	26.5	103	106	47.0-150			2.68	20
Chloroform	25.0	22.0	22.0	88.0	88.0	73.0-120			0.000	20
Chloromethane	25.0	22.6	22.4	90.4	89.6	41.0-142			0.889	20
2-Chlorotoluene	25.0	26.3	25.1	105	100	76.0-123			4.67	20
4-Chlorotoluene	25.0	25.5	25.0	102	100	75.0-122			1.98	20
1,2-Dibromo-3-Chloropropane	25.0	24.8	23.2	99.2	92.8	58.0-134			6.67	20
1,2-Dibromoethane	25.0	25.5	23.2	102	92.8	80.0-122			9.45	20
Dibromomethane	25.0	25.9	25.4	104	102	80.0-120			1.95	20
1,2-Dichlorobenzene	25.0	27.2	26.4	109	106	79.0-121			2.99	20
1,3-Dichlorobenzene	25.0	27.3	26.5	109	106	79.0-120			2.97	20
1,4-Dichlorobenzene	25.0	26.2	25.8	105	103	79.0-120			1.54	20
Dichlorodifluoromethane	25.0	16.5	16.9	66.0	67.6	51.0-149			2.40	20
1,1-Dichloroethane	25.0	27.1	26.8	108	107	70.0-126			1.11	20
1,2-Dichloroethane	25.0	27.8	27.1	111	108	70.0-128			2.55	20
1,1-Dichloroethene	25.0	23.2	22.9	92.8	91.6	71.0-124			1.30	20
cis-1,2-Dichloroethene	25.0	23.1	22.9	92.4	91.6	73.0-120			0.870	20
trans-1,2-Dichloroethene	25.0	21.3	21.7	85.2	86.8	73.0-120			1.86	20
1,2-Dichloropropane	25.0	28.5	28.3	114	113	77.0-125			0.704	20
1,1-Dichloropropene	25.0	23.0	23.0	92.0	92.0	74.0-126			0.000	20
1,3-Dichloropropane	25.0	27.1	24.8	108	99.2	80.0-120			8.86	20
cis-1,3-Dichloropropene	25.0	23.5	22.9	94.0	91.6	80.0-123			2.59	20
trans-1,3-Dichloropropene	25.0	26.1	23.9	104	95.6	78.0-124			8.80	20
trans-1,4-Dichloro-2-butene	25.0	32.2	30.4	129	122	33.0-144			5.75	20
2,2-Dichloropropane	25.0	21.0	20.5	84.0	82.0	58.0-130			2.41	20
Di-isopropyl ether	25.0	29.2	28.5	117	114	58.0-138			2.43	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3465605-1 10/27/19 08:19 • (LCSD) R3465605-2 10/27/19 08:38

Analyte	Spike Amount ug/l	LCS Result ug/l	LCSD Result ug/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	25.0	22.4	20.4	89.6	81.6	79.0-123			9.35	20
Hexachloro-1,3-butadiene	25.0	28.1	28.8	112	115	54.0-138			2.46	20
2-Hexanone	125	179	165	143	132	67.0-149			8.14	20
n-Hexane	25.0	24.9	25.9	99.6	104	57.0-133			3.94	20
Iodomethane	125	79.6	92.5	63.7	74.0	33.0-147			15.0	26
Isopropylbenzene	25.0	21.1	20.1	84.4	80.4	76.0-127			4.85	20
p-Isopropyltoluene	25.0	25.2	25.0	101	100	76.0-125			0.797	20
2-Butanone (MEK)	125	145	141	116	113	44.0-160			2.80	20
Methylene Chloride	25.0	21.6	21.6	86.4	86.4	67.0-120			0.000	20
4-Methyl-2-pentanone (MIBK)	125	151	137	121	110	68.0-142			9.72	20
Methyl tert-butyl ether	25.0	24.2	23.5	96.8	94.0	68.0-125			2.94	20
Naphthalene	25.0	22.4	22.5	89.6	90.0	54.0-135			0.445	20
n-Propylbenzene	25.0	24.0	23.7	96.0	94.8	77.0-124			1.26	20
Styrene	25.0	23.1	22.4	92.4	89.6	73.0-130			3.08	20
1,1,1,2-Tetrachloroethane	25.0	23.9	21.7	95.6	86.8	75.0-125			9.65	20
1,1,2,2-Tetrachloroethane	25.0	25.8	23.5	103	94.0	65.0-130			9.33	20
1,1,2-Trichlorotrifluoroethane	25.0	18.1	19.2	72.4	76.8	69.0-132			5.90	20
Tetrachloroethene	25.0	22.6	21.2	90.4	84.8	72.0-132			6.39	20
Toluene	25.0	23.7	22.4	94.8	89.6	79.0-120			5.64	20
1,2,3-Trichlorobenzene	25.0	25.8	26.1	103	104	50.0-138			1.16	20
1,2,4-Trichlorobenzene	25.0	26.9	27.0	108	108	57.0-137			0.371	20
1,1,1-Trichloroethane	25.0	21.2	20.8	84.8	83.2	73.0-124			1.90	20
1,1,2-Trichloroethane	25.0	24.4	22.2	97.6	88.8	80.0-120			9.44	20
Trichloroethene	25.0	22.2	21.6	88.8	86.4	78.0-124			2.74	20
Trichlorofluoromethane	25.0	23.5	23.8	94.0	95.2	59.0-147			1.27	20
1,2,3-Trichloropropane	25.0	27.3	26.5	109	106	73.0-130			2.97	20
1,2,4-Trimethylbenzene	25.0	25.0	24.1	100	96.4	76.0-121			3.67	20
1,2,3-Trimethylbenzene	25.0	25.7	25.2	103	101	77.0-120			1.96	20
1,3,5-Trimethylbenzene	25.0	23.4	22.8	93.6	91.2	76.0-122			2.60	20
Vinyl acetate	125	117	106	93.6	84.8	11.0-160			9.87	20
Vinyl chloride	25.0	29.8	30.8	119	123	67.0-131			3.30	20
Xylenes, Total	75.0	67.3	63.1	89.7	84.1	79.0-123			6.44	20
(S) Toluene-d8				*97.5*	*92.4*	*80.0-120*				
(S) 4-Bromofluorobenzene				*96.1*	*91.1*	*77.0-126*				
(S) 1,2-Dichloroethane-d4				*101*	*103*	*70.0-130*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
J	The identification of the analyte is acceptable; the reported value is an estimate.
J0	J0: The identification of the analyte is acceptable, but the reported concentration is an estimate. The calibration met method criteria.
J3	The associated batch QC was outside the established quality control range for precision.

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

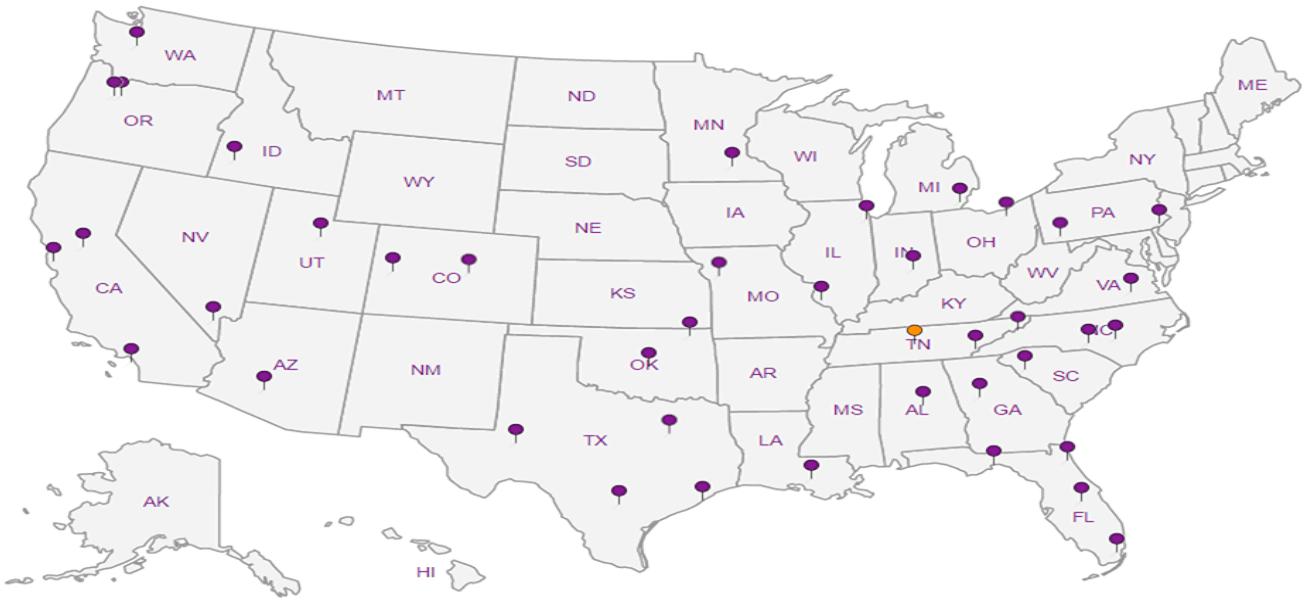
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



PES-Seattle

Billing Information: PES-Seattle

Report to: Bill Haldeman/Brian O'neal

Email To: on file

Project Description: AMERICAN LINEN

City/State Collected: Seattle, WA

Phone: on file
Fax:

Client Project # 1413.001.02.501E

Lab Project # PESENVSWA-ALP

Collected by (print): K. ZYGAS

Site/Facility ID # 1413.001.02.501E

P.O. #

Collected by (signature): K. Zygas

Immediately Packed on Ice N ___ Y X

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Date Results Needed

Quote #

Pres Chk

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	**NO3,SO4,Chloride**48 hour hold	NWTPHGX	VOCs (V8260LLC)	Total Fe Mn 6020 <2	TOC	Alkalinity <2	EEM (RSK175LL)	Remarks	Sample # (lab only)
MW-918-101719	GRAB	GW	45	10/17/19	0830	12	X	X	X	X	X	X	X		-01
MW-156-101719		GW	45		0940	12	X	X	X	X	X	X	X		02
MW-9-101719		GW	21		1020	12	X	X	X	X	X	X	X		03
MW120-101719		GW	45		1235	12	X	X	X	X	X	X	X		04
MW-160-101719		GW	123		1245	12	X	X	X	X	X	X	X		05
MW-127-101719	↓	GW	45		1422	12	X	X	X	X	X	X	X		06
TRIPBLANK-101719	—	GW	—	10/17/19	—	1		X	X						07
		GW													
		GW													
		GW													

Chain of Custody Page 1 of 1

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# L1151401

D107

Tab

Acctnum: PESENVSWA

Template:

Prelogin:

TSR: Brian Ford

PB:

Shipped Via:

* Matrix:
SS - Soil **AIR** - Air **F** - Filter
GW - Groundwater **B** - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____

Flow _____ Other _____

Samples returned via:
__ UPS __ FedEx __ Courier __ _____

Tracking # 127556008043

Sample Receipt Checklist
COC Seal Present/Intact: ___NP ___Y ___N
COC Signed/Accurate: ___Y ___N
Bottles arrive intact: ___Y ___N
Correct bottles used: ___Y ___N
Sufficient volume sent: ___Y ___N
If Applicable
VOA Zero Headspace: ___Y ___N
Preservation Correct/Checked: ___Y ___N
RAD SCREEN: <0.5 mR/hr

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCl / MeoH TBR	If preservation required by Login: Date/Time
K. Zygas	10/17/19	1600		1	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 5.7-2=5.5 °C Bottles Received: 12	
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/18/19 Time: 9:20	Hold: Condition: NCF / OK