

Caerus Oil and Gas

Sample Delivery Group: L1659927
Samples Received: 09/27/2023
Project Number:
Description: A18 495 Background Sampling
Site: A18 495 PAD
Report To: Jake J. / Brett M. / Blair R. / Andy V.
143 Diamond Avenue
Parachute, CO 81635

Entire Report Reviewed By:



Chris Ward
Project Manager

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

SAMPLE SUMMARY

20230926-NPRBG-(A18 495-SB01)@101 L1659927-01 Solid

Collected by: Tristan Schmalz
 Collected date/time: 09/26/23 09:40
 Received date/time: 09/27/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Calculated Results	WG2141468	1	10/02/23 13:02	10/02/23 13:02	ZSA	Mt. Juliet, TN
Wet Chemistry by Method 7199	WG2141745	1	09/29/23 12:25	10/03/23 06:31	SET	Mt. Juliet, TN
Wet Chemistry by Method 9045D	WG2141964	1	09/29/23 13:41	10/02/23 14:19	ARD	Mt. Juliet, TN
Wet Chemistry by Method 9050AMod	WG2142117	1	09/29/23 16:30	09/30/23 08:41	NTG	Mt. Juliet, TN
Metals (ICP) by Method 6010B-NE493 Ch 2	WG2144645	1	10/04/23 11:06	10/04/23 15:08	ZSA	Mt. Juliet, TN
Metals (ICPMS) by Method 6020	WG2142813	5	10/02/23 17:10	10/03/23 22:26	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG2142892	1	09/30/23 12:19	10/01/23 23:47	NCD	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG2142908	1	09/30/23 12:19	10/02/23 04:27	DWR	Mt. Juliet, TN
Semi-Volatile Organic Compounds (GC) by Method 8015M	WG2144048	1	10/03/23 16:52	10/04/23 05:16	KAP	Mt. Juliet, TN
Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM	WG2143684	1	10/03/23 12:56	10/04/23 10:11	JCH	Mt. Juliet, TN



20230926-NPRBG-(A18 495-SB02)@121 L1659927-02 Solid

Collected by: Tristan Schmalz
 Collected date/time: 09/26/23 10:16
 Received date/time: 09/27/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Calculated Results	WG2141468	1	10/02/23 13:53	10/02/23 13:53	ZSA	Mt. Juliet, TN
Wet Chemistry by Method 7199	WG2141745	1	09/29/23 12:25	10/03/23 06:36	SET	Mt. Juliet, TN
Wet Chemistry by Method 9045D	WG2141964	1	09/29/23 13:41	10/02/23 14:19	ARD	Mt. Juliet, TN
Wet Chemistry by Method 9050AMod	WG2142117	1	09/29/23 16:30	09/30/23 08:41	NTG	Mt. Juliet, TN
Metals (ICP) by Method 6010B-NE493 Ch 2	WG2144645	1	10/04/23 11:06	10/04/23 15:10	ZSA	Mt. Juliet, TN
Metals (ICPMS) by Method 6020	WG2142861	5	10/02/23 05:48	10/03/23 21:52	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG2142892	1	09/30/23 12:19	10/02/23 00:07	NCD	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG2142908	1	09/30/23 12:19	10/02/23 04:45	DWR	Mt. Juliet, TN
Semi-Volatile Organic Compounds (GC) by Method 8015M	WG2144048	1	10/03/23 16:52	10/04/23 03:24	KAP	Mt. Juliet, TN
Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM	WG2143684	1	10/03/23 12:56	10/04/23 07:32	JCH	Mt. Juliet, TN

20230926-NPRBG-(A18 495-SB01)@134 L1659927-03 Solid

Collected by: Tristan Schmalz
 Collected date/time: 09/26/23 11:22
 Received date/time: 09/27/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Calculated Results	WG2141468	1	10/02/23 13:11	10/02/23 13:11	ZSA	Mt. Juliet, TN
Wet Chemistry by Method 7199	WG2141745	1	09/29/23 12:25	10/03/23 06:41	SET	Mt. Juliet, TN
Wet Chemistry by Method 9045D	WG2141964	1	09/29/23 13:41	10/02/23 14:19	ARD	Mt. Juliet, TN
Wet Chemistry by Method 9050AMod	WG2142117	1	09/29/23 16:30	09/30/23 08:41	NTG	Mt. Juliet, TN
Metals (ICP) by Method 6010B-NE493 Ch 2	WG2144645	1	10/04/23 11:06	10/04/23 15:14	ZSA	Mt. Juliet, TN
Metals (ICPMS) by Method 6020	WG2142861	5	10/02/23 05:48	10/03/23 21:56	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG2142892	1	09/30/23 12:19	10/02/23 00:26	NCD	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG2142908	1	09/30/23 12:19	10/02/23 05:04	DWR	Mt. Juliet, TN
Semi-Volatile Organic Compounds (GC) by Method 8015M	WG2144048	1	10/03/23 16:52	10/04/23 05:02	KAP	Mt. Juliet, TN
Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM	WG2143684	1	10/03/23 12:56	10/04/23 07:50	JCH	Mt. Juliet, TN

20230926-NPRBG-(A18 495-SB03)@7 L1659927-04 Solid

Collected by: Tristan Schmalz
 Collected date/time: 09/26/23 11:56
 Received date/time: 09/27/23 09:00

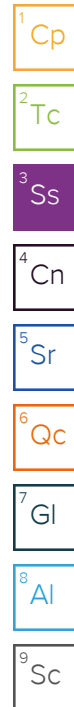
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Calculated Results	WG2141468	1	10/02/23 13:45	10/02/23 13:45	ZSA	Mt. Juliet, TN
Wet Chemistry by Method 7199	WG2141745	1	09/29/23 12:25	10/03/23 06:46	SET	Mt. Juliet, TN
Wet Chemistry by Method 9045D	WG2141964	1	09/29/23 13:41	10/02/23 14:19	ARD	Mt. Juliet, TN
Wet Chemistry by Method 9050AMod	WG2142117	1	09/29/23 16:30	09/30/23 08:41	NTG	Mt. Juliet, TN
Metals (ICP) by Method 6010B-NE493 Ch 2	WG2144645	1	10/04/23 11:06	10/04/23 15:16	ZSA	Mt. Juliet, TN
Metals (ICPMS) by Method 6020	WG2142861	5	10/02/23 05:48	10/03/23 21:59	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG2142892	1	09/30/23 12:19	10/02/23 00:45	NCD	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG2142908	1	09/30/23 12:19	10/02/23 05:23	DWR	Mt. Juliet, TN

SAMPLE SUMMARY

20230926-NPRBG-(A18 495-SB03)@7 L1659927-04 Solid

Collected by Tristan Schmalz Collected date/time 09/26/23 11:56 Received date/time 09/27/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Semi-Volatile Organic Compounds (GC) by Method 8015M	WG2144048	1	10/03/23 16:52	10/04/23 01:46	KAP	Mt. Juliet, TN
Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM	WG2143684	1	10/03/23 12:56	10/04/23 08:07	JCH	Mt. Juliet, TN



20230926-NPRBG-(A18 495-SB03)@13 L1659927-05 Solid

Collected by Tristan Schmalz Collected date/time 09/26/23 12:13 Received date/time 09/27/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Calculated Results	WG2141468	1	10/02/23 13:19	10/02/23 13:19	ZSA	Mt. Juliet, TN
Wet Chemistry by Method 7199	WG2141745	1	09/29/23 12:25	10/03/23 06:51	SET	Mt. Juliet, TN
Wet Chemistry by Method 9045D	WG2141964	1	09/29/23 13:41	10/02/23 14:19	ARD	Mt. Juliet, TN
Wet Chemistry by Method 9050AMod	WG2142117	1	09/29/23 16:30	09/30/23 08:41	NTG	Mt. Juliet, TN
Metals (ICP) by Method 6010B-NE493 Ch 2	WG2144645	1	10/04/23 11:06	10/04/23 15:19	ZSA	Mt. Juliet, TN
Metals (ICPMS) by Method 6020	WG2142813	5	10/02/23 17:10	10/03/23 22:29	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG2142892	1	09/30/23 12:19	10/02/23 01:04	NCD	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG2142908	1	09/30/23 12:19	10/02/23 05:41	DWR	Mt. Juliet, TN
Semi-Volatile Organic Compounds (GC) by Method 8015M	WG2144048	1	10/03/23 16:52	10/04/23 02:14	KAP	Mt. Juliet, TN
Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM	WG2143684	1	10/03/23 12:56	10/04/23 08:25	JCH	Mt. Juliet, TN

20230926-NPRBG-(A18 495-SB03)@21 L1659927-06 Solid

Collected by Tristan Schmalz Collected date/time 09/26/23 12:31 Received date/time 09/27/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Calculated Results	WG2141468	1	10/02/23 13:56	10/02/23 13:56	ZSA	Mt. Juliet, TN
Wet Chemistry by Method 7199	WG2141745	1	09/29/23 12:25	10/03/23 06:57	SET	Mt. Juliet, TN
Wet Chemistry by Method 9045D	WG2141964	1	09/29/23 13:41	10/02/23 14:19	ARD	Mt. Juliet, TN
Wet Chemistry by Method 9050AMod	WG2142117	1	09/29/23 16:30	09/30/23 08:41	NTG	Mt. Juliet, TN
Metals (ICP) by Method 6010B-NE493 Ch 2	WG2144645	1	10/04/23 11:06	10/04/23 15:22	ZSA	Mt. Juliet, TN
Metals (ICPMS) by Method 6020	WG2142813	5	10/02/23 17:10	10/03/23 22:33	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG2142892	1	09/30/23 12:19	10/02/23 01:24	NCD	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG2142908	1	09/30/23 12:19	10/02/23 06:00	DWR	Mt. Juliet, TN
Semi-Volatile Organic Compounds (GC) by Method 8015M	WG2144048	1	10/03/23 16:52	10/04/23 03:10	KAP	Mt. Juliet, TN
Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM	WG2143684	1	10/03/23 12:56	10/04/23 08:43	JCH	Mt. Juliet, TN

20230926-NPRBG-(A18 495-SB03)@43 L1659927-07 Solid

Collected by Tristan Schmalz Collected date/time 09/26/23 13:16 Received date/time 09/27/23 09:00

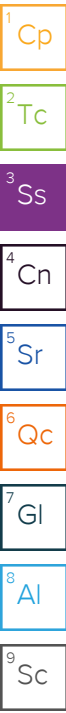
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Calculated Results	WG2141468	1	10/02/23 13:08	10/02/23 13:08	ZSA	Mt. Juliet, TN
Wet Chemistry by Method 7199	WG2141745	1	09/29/23 12:25	10/03/23 07:02	SET	Mt. Juliet, TN
Wet Chemistry by Method 9045D	WG2141964	1	09/29/23 13:41	10/02/23 14:19	ARD	Mt. Juliet, TN
Wet Chemistry by Method 9050AMod	WG2142117	1	09/29/23 16:30	09/30/23 08:41	NTG	Mt. Juliet, TN
Metals (ICP) by Method 6010B-NE493 Ch 2	WG2144645	1	10/04/23 11:06	10/04/23 15:25	ZSA	Mt. Juliet, TN
Metals (ICPMS) by Method 6020	WG2142828	5	10/03/23 12:21	10/04/23 20:17	JPD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG2142892	1	09/30/23 12:19	10/02/23 01:43	NCD	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG2142908	1	09/30/23 12:19	10/02/23 06:19	DWR	Mt. Juliet, TN
Semi-Volatile Organic Compounds (GC) by Method 8015M	WG2144048	1	10/03/23 16:52	10/04/23 03:38	KAP	Mt. Juliet, TN
Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM	WG2143684	1	10/03/23 12:56	10/04/23 09:00	JCH	Mt. Juliet, TN

SAMPLE SUMMARY

20230926-NPRBG-(A18 495-SB03)@54 L1659927-08 Solid

Collected by Tristan Schmalz
 Collected date/time 09/26/23 13:32
 Received date/time 09/27/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Calculated Results	WG2141468	1	10/02/23 13:47	10/02/23 13:47	ZSA	Mt. Juliet, TN
Wet Chemistry by Method 7199	WG2141745	1	09/29/23 12:25	10/03/23 07:07	SET	Mt. Juliet, TN
Wet Chemistry by Method 9045D	WG2141964	1	09/29/23 13:41	10/02/23 14:19	ARD	Mt. Juliet, TN
Wet Chemistry by Method 9050AMod	WG2142117	1	09/29/23 16:30	09/30/23 08:41	NTG	Mt. Juliet, TN
Metals (ICP) by Method 6010B-NE493 Ch 2	WG2144645	1	10/04/23 11:06	10/04/23 15:33	ZSA	Mt. Juliet, TN
Metals (ICPMS) by Method 6020	WG2142813	5	10/02/23 17:10	10/03/23 22:36	LD	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG2142892	1	09/30/23 12:19	10/02/23 02:03	NCD	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG2142908	1	09/30/23 12:19	10/02/23 06:38	DWR	Mt. Juliet, TN
Semi-Volatile Organic Compounds (GC) by Method 8015M	WG2144048	1	10/03/23 16:52	10/04/23 02:28	KAP	Mt. Juliet, TN
Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM	WG2143684	1	10/03/23 12:56	10/04/23 09:18	JCH	Mt. Juliet, TN



20230926-NPRBG-(A18 495-SB03)@65 L1659927-09 Solid

Collected by Tristan Schmalz
 Collected date/time 09/26/23 14:13
 Received date/time 09/27/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Calculated Results	WG2141468	1	10/02/23 13:50	10/02/23 13:50	ZSA	Mt. Juliet, TN
Wet Chemistry by Method 7199	WG2141745	1	09/29/23 12:25	10/03/23 07:17	SET	Mt. Juliet, TN
Wet Chemistry by Method 9045D	WG2141964	1	09/29/23 13:41	10/02/23 14:19	ARD	Mt. Juliet, TN
Wet Chemistry by Method 9050AMod	WG2142138	1	09/30/23 08:00	09/30/23 10:13	NTG	Mt. Juliet, TN
Metals (ICP) by Method 6010B-NE493 Ch 2	WG2144645	1	10/04/23 11:06	10/04/23 15:36	ZSA	Mt. Juliet, TN
Metals (ICPMS) by Method 6020	WG2142830	5	10/02/23 05:52	10/03/23 19:26	SJM	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG2142892	1	09/30/23 12:19	10/02/23 02:22	NCD	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG2142908	1	09/30/23 12:19	10/02/23 06:56	DWR	Mt. Juliet, TN
Semi-Volatile Organic Compounds (GC) by Method 8015M	WG2144048	1	10/03/23 16:52	10/04/23 04:34	KAP	Mt. Juliet, TN
Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM	WG2143684	1	10/03/23 12:56	10/04/23 09:36	JCH	Mt. Juliet, TN

20230926-NPRBG-(A18 495-SB03)@79 L1659927-10 Solid

Collected by Tristan Schmalz
 Collected date/time 09/26/23 14:59
 Received date/time 09/27/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Calculated Results	WG2141468	1	10/02/23 13:13	10/02/23 13:13	ZSA	Mt. Juliet, TN
Wet Chemistry by Method 7199	WG2141745	1	09/29/23 12:25	10/03/23 07:33	SET	Mt. Juliet, TN
Wet Chemistry by Method 9045D	WG2141976	1	10/01/23 15:30	10/01/23 15:45	BJM	Mt. Juliet, TN
Wet Chemistry by Method 9050AMod	WG2142138	1	09/30/23 08:00	09/30/23 10:13	NTG	Mt. Juliet, TN
Metals (ICP) by Method 6010B-NE493 Ch 2	WG2144645	1	10/04/23 11:06	10/04/23 15:39	ZSA	Mt. Juliet, TN
Metals (ICPMS) by Method 6020	WG2142830	5	10/02/23 05:52	10/03/23 19:38	SJM	Mt. Juliet, TN
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG2142892	1	09/30/23 12:19	10/02/23 02:41	NCD	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG2142908	1	09/30/23 12:19	10/02/23 07:15	DWR	Mt. Juliet, TN
Semi-Volatile Organic Compounds (GC) by Method 8015M	WG2144048	1	10/03/23 16:52	10/04/23 02:56	KAP	Mt. Juliet, TN
Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM	WG2143684	1	10/03/23 12:56	10/04/23 09:53	JCH	Mt. Juliet, TN

CASE NARRATIVE

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.



Chris Ward
Project Manager

¹ Cp

² Tc

³ Ss

⁴ Cn

⁵ Sr

⁶ Qc

⁷ Gl

⁸ Al

⁹ Sc

Calculated Results

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
Sodium Adsorption Ratio	2.88		1	10/02/2023 13:02	WG2141468

Wet Chemistry by Method 7199

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Hexavalent Chromium	U		0.255	1.00	1	10/03/2023 06:31	WG2141745

Wet Chemistry by Method 9045D

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
pH	8.14	<u>T8</u>	1	10/02/2023 14:19	WG2141964

Sample Narrative:

L1659927-01 WG2141964: 8.14 at 23.7C

Wet Chemistry by Method 9050AMod

Analyte	Result umhos/cm	Qualifier	RDL umhos/cm	Dilution	Analysis date / time	Batch
Specific Conductance	533		10.0	1	09/30/2023 08:41	WG2142117

Sample Narrative:

L1659927-01 WG2142117: at 25C

Metals (ICP) by Method 6010B-NE493 Ch 2

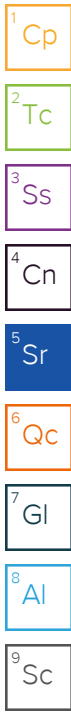
Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Hot Water Sol. Boron	0.193	<u>J</u>	0.0167	0.200	1	10/04/2023 15:08	WG2144645

Metals (ICPMS) by Method 6020

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Arsenic	3.73		0.100	1.00	5	10/03/2023 22:26	WG2142813
Barium	422		0.152	2.50	5	10/03/2023 22:26	WG2142813
Cadmium	0.657	<u>J</u>	0.0855	1.00	5	10/03/2023 22:26	WG2142813
Copper	11.8		0.132	5.00	5	10/03/2023 22:26	WG2142813
Lead	9.67		0.0990	2.00	5	10/03/2023 22:26	WG2142813
Nickel	15.3		0.197	2.50	5	10/03/2023 22:26	WG2142813
Selenium	0.589	<u>J</u>	0.180	2.50	5	10/03/2023 22:26	WG2142813
Silver	U		0.0865	0.500	5	10/03/2023 22:26	WG2142813
Zinc	53.0		0.740	25.0	5	10/03/2023 22:26	WG2142813

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.107		0.0217	0.100	1	10/01/2023 23:47	WG2142892
(S) a,a,a-Trifluorotoluene(FID)	85.9			77.0-120		10/01/2023 23:47	WG2142892



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

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Benzene	U		0.000467	0.00100	1	10/02/2023 04:27	WG2142908
Toluene	U		0.00130	0.00500	1	10/02/2023 04:27	WG2142908
Ethylbenzene	U		0.000737	0.00250	1	10/02/2023 04:27	WG2142908
Xylenes, Total	U		0.000880	0.00650	1	10/02/2023 04:27	WG2142908
1,2,4-Trimethylbenzene	U		0.00158	0.00500	1	10/02/2023 04:27	WG2142908
1,3,5-Trimethylbenzene	U		0.00200	0.00500	1	10/02/2023 04:27	WG2142908
(S) Toluene-d8	105			75.0-131		10/02/2023 04:27	WG2142908
(S) 4-Bromofluorobenzene	101			67.0-138		10/02/2023 04:27	WG2142908
(S) 1,2-Dichloroethane-d4	89.4			70.0-130		10/02/2023 04:27	WG2142908

Semi-Volatile Organic Compounds (GC) by Method 8015M

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
C10-C28 Diesel Range	26.9		1.61	4.00	1	10/04/2023 05:16	WG2144048
C28-C36 Motor Oil Range	96.8		0.274	4.00	1	10/04/2023 05:16	WG2144048
(S) o-Terphenyl	37.0			18.0-148		10/04/2023 05:16	WG2144048

Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Acenaphthene	U		0.00209	0.00600	1	10/04/2023 10:11	WG2143684
Anthracene	U		0.00230	0.00600	1	10/04/2023 10:11	WG2143684
Benzo(a)anthracene	U		0.00173	0.00600	1	10/04/2023 10:11	WG2143684
Benzo(b)fluoranthene	U		0.00153	0.00600	1	10/04/2023 10:11	WG2143684
Benzo(k)fluoranthene	U		0.00215	0.00600	1	10/04/2023 10:11	WG2143684
Benzo(a)pyrene	U		0.00179	0.00600	1	10/04/2023 10:11	WG2143684
Chrysene	U		0.00232	0.00600	1	10/04/2023 10:11	WG2143684
Dibenz(a,h)anthracene	U		0.00172	0.00600	1	10/04/2023 10:11	WG2143684
Fluoranthene	0.00404	U	0.00227	0.00600	1	10/04/2023 10:11	WG2143684
Fluorene	U		0.00205	0.00600	1	10/04/2023 10:11	WG2143684
Indeno(1,2,3-cd)pyrene	U		0.00181	0.00600	1	10/04/2023 10:11	WG2143684
1-Methylnaphthalene	U		0.00449	0.0200	1	10/04/2023 10:11	WG2143684
2-Methylnaphthalene	U		0.00427	0.0200	1	10/04/2023 10:11	WG2143684
Naphthalene	U		0.00408	0.0200	1	10/04/2023 10:11	WG2143684
Pyrene	0.00315	U	0.00200	0.00600	1	10/04/2023 10:11	WG2143684
(S) p-Terphenyl-d14	57.0			23.0-120		10/04/2023 10:11	WG2143684
(S) Nitrobenzene-d5	52.1			14.0-149		10/04/2023 10:11	WG2143684
(S) 2-Fluorobiphenyl	57.4			34.0-125		10/04/2023 10:11	WG2143684

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Calculated Results

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
Sodium Adsorption Ratio	3.55		1	10/02/2023 13:53	WG2141468

Wet Chemistry by Method 7199

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Hexavalent Chromium	U		0.255	1.00	1	10/03/2023 06:36	WG2141745

Wet Chemistry by Method 9045D

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
pH	7.89	<u>T8</u>	1	10/02/2023 14:19	WG2141964

Sample Narrative:

L1659927-02 WG2141964: 7.89 at 23.6C

Wet Chemistry by Method 9050AMod

Analyte	Result umhos/cm	Qualifier	RDL umhos/cm	Dilution	Analysis date / time	Batch
Specific Conductance	259		10.0	1	09/30/2023 08:41	WG2142117

Sample Narrative:

L1659927-02 WG2142117: at 25C

Metals (ICP) by Method 6010B-NE493 Ch 2

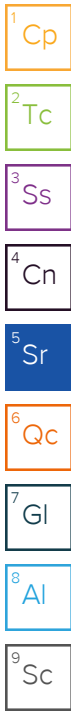
Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Hot Water Sol. Boron	0.183	<u>J</u>	0.0167	0.200	1	10/04/2023 15:10	WG2144645

Metals (ICPMS) by Method 6020

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Arsenic	4.79		0.100	1.00	5	10/03/2023 21:52	WG2142861
Barium	299		0.152	2.50	5	10/03/2023 21:52	WG2142861
Cadmium	0.107	<u>J</u>	0.0855	1.00	5	10/03/2023 21:52	WG2142861
Copper	13.5		0.132	5.00	5	10/03/2023 21:52	WG2142861
Lead	12.8		0.0990	2.00	5	10/03/2023 21:52	WG2142861
Nickel	34.0		0.197	2.50	5	10/03/2023 21:52	WG2142861
Selenium	0.328	<u>J</u>	0.180	2.50	5	10/03/2023 21:52	WG2142861
Silver	U		0.0865	0.500	5	10/03/2023 21:52	WG2142861
Zinc	44.9		0.740	25.0	5	10/03/2023 21:52	WG2142861

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0386	<u>J</u>	0.0217	0.100	1	10/02/2023 00:07	WG2142892
(S) a,a,a-Trifluorotoluene(FID)	87.6			77.0-120		10/02/2023 00:07	WG2142892



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

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Benzene	U		0.000467	0.00100	1	10/02/2023 04:45	WG2142908
Toluene	U		0.00130	0.00500	1	10/02/2023 04:45	WG2142908
Ethylbenzene	U		0.000737	0.00250	1	10/02/2023 04:45	WG2142908
Xylenes, Total	U		0.000880	0.00650	1	10/02/2023 04:45	WG2142908
1,2,4-Trimethylbenzene	U		0.00158	0.00500	1	10/02/2023 04:45	WG2142908
1,3,5-Trimethylbenzene	U		0.00200	0.00500	1	10/02/2023 04:45	WG2142908
(S) Toluene-d8	107			75.0-131		10/02/2023 04:45	WG2142908
(S) 4-Bromofluorobenzene	103			67.0-138		10/02/2023 04:45	WG2142908
(S) 1,2-Dichloroethane-d4	89.3			70.0-130		10/02/2023 04:45	WG2142908

Semi-Volatile Organic Compounds (GC) by Method 8015M

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
C10-C28 Diesel Range	U		1.61	4.00	1	10/04/2023 03:24	WG2144048
C28-C36 Motor Oil Range	U		0.274	4.00	1	10/04/2023 03:24	WG2144048
(S) o-Terphenyl	38.9			18.0-148		10/04/2023 03:24	WG2144048

Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Acenaphthene	U		0.00209	0.00600	1	10/04/2023 07:32	WG2143684
Anthracene	U		0.00230	0.00600	1	10/04/2023 07:32	WG2143684
Benzo(a)anthracene	U		0.00173	0.00600	1	10/04/2023 07:32	WG2143684
Benzo(b)fluoranthene	U		0.00153	0.00600	1	10/04/2023 07:32	WG2143684
Benzo(k)fluoranthene	U		0.00215	0.00600	1	10/04/2023 07:32	WG2143684
Benzo(a)pyrene	U		0.00179	0.00600	1	10/04/2023 07:32	WG2143684
Chrysene	U		0.00232	0.00600	1	10/04/2023 07:32	WG2143684
Dibenz(a,h)anthracene	U		0.00172	0.00600	1	10/04/2023 07:32	WG2143684
Fluoranthene	U		0.00227	0.00600	1	10/04/2023 07:32	WG2143684
Fluorene	U		0.00205	0.00600	1	10/04/2023 07:32	WG2143684
Indeno(1,2,3-cd)pyrene	U		0.00181	0.00600	1	10/04/2023 07:32	WG2143684
1-Methylnaphthalene	U		0.00449	0.0200	1	10/04/2023 07:32	WG2143684
2-Methylnaphthalene	U		0.00427	0.0200	1	10/04/2023 07:32	WG2143684
Naphthalene	U		0.00408	0.0200	1	10/04/2023 07:32	WG2143684
Pyrene	U		0.00200	0.00600	1	10/04/2023 07:32	WG2143684
(S) p-Terphenyl-d14	48.3			23.0-120		10/04/2023 07:32	WG2143684
(S) Nitrobenzene-d5	48.3			14.0-149		10/04/2023 07:32	WG2143684
(S) 2-Fluorobiphenyl	49.8			34.0-125		10/04/2023 07:32	WG2143684

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Calculated Results

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
Sodium Adsorption Ratio	1.83		1	10/02/2023 13:11	WG2141468

Wet Chemistry by Method 7199

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Hexavalent Chromium	U		0.255	1.00	1	10/03/2023 06:41	WG2141745

Wet Chemistry by Method 9045D

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
pH	7.91	<u>T8</u>	1	10/02/2023 14:19	WG2141964

Sample Narrative:

L1659927-03 WG2141964: 7.91 at 23.6C

Wet Chemistry by Method 9050AMod

Analyte	Result umhos/cm	Qualifier	RDL umhos/cm	Dilution	Analysis date / time	Batch
Specific Conductance	1210		10.0	1	09/30/2023 08:41	WG2142117

Sample Narrative:

L1659927-03 WG2142117: at 25C

Metals (ICP) by Method 6010B-NE493 Ch 2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Hot Water Sol. Boron	0.184	<u>J</u>	0.0167	0.200	1	10/04/2023 15:14	WG2144645

Metals (ICPMS) by Method 6020

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Arsenic	4.82		0.100	1.00	5	10/03/2023 21:56	WG2142861
Barium	619		0.152	2.50	5	10/03/2023 21:56	WG2142861
Cadmium	0.205	<u>J</u>	0.0855	1.00	5	10/03/2023 21:56	WG2142861
Copper	12.4		0.132	5.00	5	10/03/2023 21:56	WG2142861
Lead	8.80		0.0990	2.00	5	10/03/2023 21:56	WG2142861
Nickel	14.4		0.197	2.50	5	10/03/2023 21:56	WG2142861
Selenium	0.356	<u>J</u>	0.180	2.50	5	10/03/2023 21:56	WG2142861
Silver	U		0.0865	0.500	5	10/03/2023 21:56	WG2142861
Zinc	52.1		0.740	25.0	5	10/03/2023 21:56	WG2142861

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0349	<u>J</u>	0.0217	0.100	1	10/02/2023 00:26	WG2142892
(S) a,a,a-Trifluorotoluene(FID)	88.3			77.0-120		10/02/2023 00:26	WG2142892

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 8260B

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Benzene	U		0.000467	0.00100	1	10/02/2023 05:04	WG2142908
Toluene	U		0.00130	0.00500	1	10/02/2023 05:04	WG2142908
Ethylbenzene	U		0.000737	0.00250	1	10/02/2023 05:04	WG2142908
Xylenes, Total	U		0.000880	0.00650	1	10/02/2023 05:04	WG2142908
1,2,4-Trimethylbenzene	U		0.00158	0.00500	1	10/02/2023 05:04	WG2142908
1,3,5-Trimethylbenzene	U		0.00200	0.00500	1	10/02/2023 05:04	WG2142908
(S) Toluene-d8	107			75.0-131		10/02/2023 05:04	WG2142908
(S) 4-Bromofluorobenzene	103			67.0-138		10/02/2023 05:04	WG2142908
(S) 1,2-Dichloroethane-d4	86.7			70.0-130		10/02/2023 05:04	WG2142908

Semi-Volatile Organic Compounds (GC) by Method 8015M

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
C10-C28 Diesel Range	4.59		1.61	4.00	1	10/04/2023 05:02	WG2144048
C28-C36 Motor Oil Range	11.5		0.274	4.00	1	10/04/2023 05:02	WG2144048
(S) o-Terphenyl	42.9			18.0-148		10/04/2023 05:02	WG2144048

Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Acenaphthene	U		0.00209	0.00600	1	10/04/2023 07:50	WG2143684
Anthracene	U		0.00230	0.00600	1	10/04/2023 07:50	WG2143684
Benzo(a)anthracene	U		0.00173	0.00600	1	10/04/2023 07:50	WG2143684
Benzo(b)fluoranthene	U		0.00153	0.00600	1	10/04/2023 07:50	WG2143684
Benzo(k)fluoranthene	U		0.00215	0.00600	1	10/04/2023 07:50	WG2143684
Benzo(a)pyrene	U		0.00179	0.00600	1	10/04/2023 07:50	WG2143684
Chrysene	U		0.00232	0.00600	1	10/04/2023 07:50	WG2143684
Dibenz(a,h)anthracene	U		0.00172	0.00600	1	10/04/2023 07:50	WG2143684
Fluoranthene	U		0.00227	0.00600	1	10/04/2023 07:50	WG2143684
Fluorene	U		0.00205	0.00600	1	10/04/2023 07:50	WG2143684
Indeno(1,2,3-cd)pyrene	U		0.00181	0.00600	1	10/04/2023 07:50	WG2143684
1-Methylnaphthalene	U		0.00449	0.0200	1	10/04/2023 07:50	WG2143684
2-Methylnaphthalene	U		0.00427	0.0200	1	10/04/2023 07:50	WG2143684
Naphthalene	U		0.00408	0.0200	1	10/04/2023 07:50	WG2143684
Pyrene	U		0.00200	0.00600	1	10/04/2023 07:50	WG2143684
(S) p-Terphenyl-d14	57.3			23.0-120		10/04/2023 07:50	WG2143684
(S) Nitrobenzene-d5	55.6			14.0-149		10/04/2023 07:50	WG2143684
(S) 2-Fluorobiphenyl	58.3			34.0-125		10/04/2023 07:50	WG2143684

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Calculated Results

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
Sodium Adsorption Ratio	1.86		1	10/02/2023 13:45	WG2141468

Wet Chemistry by Method 7199

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Hexavalent Chromium	U		0.255	1.00	1	10/03/2023 06:46	WG2141745

Wet Chemistry by Method 9045D

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
pH	7.92	<u>T8</u>	1	10/02/2023 14:19	WG2141964

Sample Narrative:

L1659927-04 WG2141964: 7.92 at 23.3C

Wet Chemistry by Method 9050AMod

Analyte	Result umhos/cm	Qualifier	RDL umhos/cm	Dilution	Analysis date / time	Batch
Specific Conductance	260		10.0	1	09/30/2023 08:41	WG2142117

Sample Narrative:

L1659927-04 WG2142117: at 25C

Metals (ICP) by Method 6010B-NE493 Ch 2

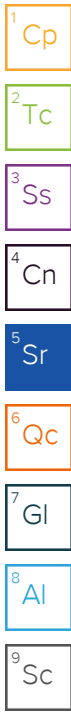
Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Hot Water Sol. Boron	0.0571	<u>J</u>	0.0167	0.200	1	10/04/2023 15:16	WG2144645

Metals (ICPMS) by Method 6020

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Arsenic	1.67		0.100	1.00	5	10/03/2023 21:59	WG2142861
Barium	316		0.152	2.50	5	10/03/2023 21:59	WG2142861
Cadmium	0.156	<u>J</u>	0.0855	1.00	5	10/03/2023 21:59	WG2142861
Copper	12.9		0.132	5.00	5	10/03/2023 21:59	WG2142861
Lead	17.3		0.0990	2.00	5	10/03/2023 21:59	WG2142861
Nickel	14.3		0.197	2.50	5	10/03/2023 21:59	WG2142861
Selenium	0.284	<u>J</u>	0.180	2.50	5	10/03/2023 21:59	WG2142861
Silver	U		0.0865	0.500	5	10/03/2023 21:59	WG2142861
Zinc	40.2		0.740	25.0	5	10/03/2023 21:59	WG2142861

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0284	<u>J</u>	0.0217	0.100	1	10/02/2023 00:45	WG2142892
(S) a,a,a-Trifluorotoluene(FID)	90.2			77.0-120		10/02/2023 00:45	WG2142892



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

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Benzene	U		0.000467	0.00100	1	10/02/2023 05:23	WG2142908
Toluene	U		0.00130	0.00500	1	10/02/2023 05:23	WG2142908
Ethylbenzene	U		0.000737	0.00250	1	10/02/2023 05:23	WG2142908
Xylenes, Total	U		0.000880	0.00650	1	10/02/2023 05:23	WG2142908
1,2,4-Trimethylbenzene	U		0.00158	0.00500	1	10/02/2023 05:23	WG2142908
1,3,5-Trimethylbenzene	U		0.00200	0.00500	1	10/02/2023 05:23	WG2142908
(S) Toluene-d8	106			75.0-131		10/02/2023 05:23	WG2142908
(S) 4-Bromofluorobenzene	101			67.0-138		10/02/2023 05:23	WG2142908
(S) 1,2-Dichloroethane-d4	87.6			70.0-130		10/02/2023 05:23	WG2142908

Semi-Volatile Organic Compounds (GC) by Method 8015M

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
C10-C28 Diesel Range	U		1.61	4.00	1	10/04/2023 01:46	WG2144048
C28-C36 Motor Oil Range	U		0.274	4.00	1	10/04/2023 01:46	WG2144048
(S) o-Terphenyl	43.1			18.0-148		10/04/2023 01:46	WG2144048

Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Acenaphthene	U		0.00209	0.00600	1	10/04/2023 08:07	WG2143684
Anthracene	U		0.00230	0.00600	1	10/04/2023 08:07	WG2143684
Benzo(a)anthracene	U		0.00173	0.00600	1	10/04/2023 08:07	WG2143684
Benzo(b)fluoranthene	U		0.00153	0.00600	1	10/04/2023 08:07	WG2143684
Benzo(k)fluoranthene	U		0.00215	0.00600	1	10/04/2023 08:07	WG2143684
Benzo(a)pyrene	U		0.00179	0.00600	1	10/04/2023 08:07	WG2143684
Chrysene	U		0.00232	0.00600	1	10/04/2023 08:07	WG2143684
Dibenz(a,h)anthracene	U		0.00172	0.00600	1	10/04/2023 08:07	WG2143684
Fluoranthene	U		0.00227	0.00600	1	10/04/2023 08:07	WG2143684
Fluorene	U		0.00205	0.00600	1	10/04/2023 08:07	WG2143684
Indeno(1,2,3-cd)pyrene	U		0.00181	0.00600	1	10/04/2023 08:07	WG2143684
1-Methylnaphthalene	U		0.00449	0.0200	1	10/04/2023 08:07	WG2143684
2-Methylnaphthalene	U		0.00427	0.0200	1	10/04/2023 08:07	WG2143684
Naphthalene	U		0.00408	0.0200	1	10/04/2023 08:07	WG2143684
Pyrene	U		0.00200	0.00600	1	10/04/2023 08:07	WG2143684
(S) p-Terphenyl-d14	66.0			23.0-120		10/04/2023 08:07	WG2143684
(S) Nitrobenzene-d5	58.8			14.0-149		10/04/2023 08:07	WG2143684
(S) 2-Fluorobiphenyl	62.0			34.0-125		10/04/2023 08:07	WG2143684

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Calculated Results

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
Sodium Adsorption Ratio	2.22		1	10/02/2023 13:19	WG2141468

Wet Chemistry by Method 7199

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Hexavalent Chromium	U		0.255	1.00	1	10/03/2023 06:51	WG2141745

Wet Chemistry by Method 9045D

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
pH	7.91	<u>T8</u>	1	10/02/2023 14:19	WG2141964

Sample Narrative:

L1659927-05 WG2141964: 7.91 at 23.1C

Wet Chemistry by Method 9050AMod

Analyte	Result umhos/cm	Qualifier	RDL umhos/cm	Dilution	Analysis date / time	Batch
Specific Conductance	238		10.0	1	09/30/2023 08:41	WG2142117

Sample Narrative:

L1659927-05 WG2142117: at 25C

Metals (ICP) by Method 6010B-NE493 Ch 2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Hot Water Sol. Boron	0.0541	<u>J</u>	0.0167	0.200	1	10/04/2023 15:19	WG2144645

Metals (ICPMS) by Method 6020

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Arsenic	5.80		0.100	1.00	5	10/03/2023 22:29	WG2142813
Barium	318		0.152	2.50	5	10/03/2023 22:29	WG2142813
Cadmium	0.196	<u>J</u>	0.0855	1.00	5	10/03/2023 22:29	WG2142813
Copper	14.3		0.132	5.00	5	10/03/2023 22:29	WG2142813
Lead	17.3		0.0990	2.00	5	10/03/2023 22:29	WG2142813
Nickel	17.6		0.197	2.50	5	10/03/2023 22:29	WG2142813
Selenium	0.304	<u>J</u>	0.180	2.50	5	10/03/2023 22:29	WG2142813
Silver	U		0.0865	0.500	5	10/03/2023 22:29	WG2142813
Zinc	43.7		0.740	25.0	5	10/03/2023 22:29	WG2142813

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0306	<u>J</u>	0.0217	0.100	1	10/02/2023 01:04	WG2142892
(S) a,a,a-Trifluorotoluene(FID)	88.7			77.0-120		10/02/2023 01:04	WG2142892

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 8260B

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Benzene	U		0.000467	0.00100	1	10/02/2023 05:41	WG2142908
Toluene	U		0.00130	0.00500	1	10/02/2023 05:41	WG2142908
Ethylbenzene	U		0.000737	0.00250	1	10/02/2023 05:41	WG2142908
Xylenes, Total	U		0.000880	0.00650	1	10/02/2023 05:41	WG2142908
1,2,4-Trimethylbenzene	U		0.00158	0.00500	1	10/02/2023 05:41	WG2142908
1,3,5-Trimethylbenzene	U		0.00200	0.00500	1	10/02/2023 05:41	WG2142908
(S) Toluene-d8	105			75.0-131		10/02/2023 05:41	WG2142908
(S) 4-Bromofluorobenzene	102			67.0-138		10/02/2023 05:41	WG2142908
(S) 1,2-Dichloroethane-d4	90.4			70.0-130		10/02/2023 05:41	WG2142908

Semi-Volatile Organic Compounds (GC) by Method 8015M

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
C10-C28 Diesel Range	U		1.61	4.00	1	10/04/2023 02:14	WG2144048
C28-C36 Motor Oil Range	U		0.274	4.00	1	10/04/2023 02:14	WG2144048
(S) o-Terphenyl	50.5			18.0-148		10/04/2023 02:14	WG2144048

Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Acenaphthene	U		0.00209	0.00600	1	10/04/2023 08:25	WG2143684
Anthracene	U		0.00230	0.00600	1	10/04/2023 08:25	WG2143684
Benzo(a)anthracene	U		0.00173	0.00600	1	10/04/2023 08:25	WG2143684
Benzo(b)fluoranthene	U		0.00153	0.00600	1	10/04/2023 08:25	WG2143684
Benzo(k)fluoranthene	U		0.00215	0.00600	1	10/04/2023 08:25	WG2143684
Benzo(a)pyrene	U		0.00179	0.00600	1	10/04/2023 08:25	WG2143684
Chrysene	U		0.00232	0.00600	1	10/04/2023 08:25	WG2143684
Dibenz(a,h)anthracene	U		0.00172	0.00600	1	10/04/2023 08:25	WG2143684
Fluoranthene	U		0.00227	0.00600	1	10/04/2023 08:25	WG2143684
Fluorene	U		0.00205	0.00600	1	10/04/2023 08:25	WG2143684
Indeno(1,2,3-cd)pyrene	U		0.00181	0.00600	1	10/04/2023 08:25	WG2143684
1-Methylnaphthalene	U		0.00449	0.0200	1	10/04/2023 08:25	WG2143684
2-Methylnaphthalene	U		0.00427	0.0200	1	10/04/2023 08:25	WG2143684
Naphthalene	U		0.00408	0.0200	1	10/04/2023 08:25	WG2143684
Pyrene	U		0.00200	0.00600	1	10/04/2023 08:25	WG2143684
(S) p-Terphenyl-d14	59.6			23.0-120		10/04/2023 08:25	WG2143684
(S) Nitrobenzene-d5	57.8			14.0-149		10/04/2023 08:25	WG2143684
(S) 2-Fluorobiphenyl	59.4			34.0-125		10/04/2023 08:25	WG2143684

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Calculated Results

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
Sodium Adsorption Ratio	3.96		1	10/02/2023 13:56	WG2141468

Wet Chemistry by Method 7199

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Hexavalent Chromium	U		0.255	1.00	1	10/03/2023 06:57	WG2141745

Wet Chemistry by Method 9045D

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
pH	7.94	<u>T8</u>	1	10/02/2023 14:19	WG2141964

Sample Narrative:

L1659927-06 WG2141964: 7.94 at 23.4C

Wet Chemistry by Method 9050AMod

Analyte	Result umhos/cm	Qualifier	RDL umhos/cm	Dilution	Analysis date / time	Batch
Specific Conductance	272		10.0	1	09/30/2023 08:41	WG2142117

Sample Narrative:

L1659927-06 WG2142117: at 25C

Metals (ICP) by Method 6010B-NE493 Ch 2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Hot Water Sol. Boron	0.202		0.0167	0.200	1	10/04/2023 15:22	WG2144645

Metals (ICPMS) by Method 6020

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Arsenic	4.45		0.100	1.00	5	10/03/2023 22:33	WG2142813
Barium	269		0.152	2.50	5	10/03/2023 22:33	WG2142813
Cadmium	0.104	<u>J</u>	0.0855	1.00	5	10/03/2023 22:33	WG2142813
Copper	12.1		0.132	5.00	5	10/03/2023 22:33	WG2142813
Lead	11.6		0.0990	2.00	5	10/03/2023 22:33	WG2142813
Nickel	33.1		0.197	2.50	5	10/03/2023 22:33	WG2142813
Selenium	0.387	<u>J</u>	0.180	2.50	5	10/03/2023 22:33	WG2142813
Silver	U		0.0865	0.500	5	10/03/2023 22:33	WG2142813
Zinc	44.7		0.740	25.0	5	10/03/2023 22:33	WG2142813

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0217	0.100	1	10/02/2023 01:24	WG2142892
(S) a,a,a-Trifluorotoluene(FID)	87.8			77.0-120		10/02/2023 01:24	WG2142892

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 8260B

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Benzene	U		0.000467	0.00100	1	10/02/2023 06:00	WG2142908
Toluene	U		0.00130	0.00500	1	10/02/2023 06:00	WG2142908
Ethylbenzene	U		0.000737	0.00250	1	10/02/2023 06:00	WG2142908
Xylenes, Total	U		0.000880	0.00650	1	10/02/2023 06:00	WG2142908
1,2,4-Trimethylbenzene	U		0.00158	0.00500	1	10/02/2023 06:00	WG2142908
1,3,5-Trimethylbenzene	U		0.00200	0.00500	1	10/02/2023 06:00	WG2142908
(S) Toluene-d8	106			75.0-131		10/02/2023 06:00	WG2142908
(S) 4-Bromofluorobenzene	103			67.0-138		10/02/2023 06:00	WG2142908
(S) 1,2-Dichloroethane-d4	90.4			70.0-130		10/02/2023 06:00	WG2142908

Semi-Volatile Organic Compounds (GC) by Method 8015M

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
C10-C28 Diesel Range	U		1.61	4.00	1	10/04/2023 03:10	WG2144048
C28-C36 Motor Oil Range	U		0.274	4.00	1	10/04/2023 03:10	WG2144048
(S) o-Terphenyl	43.3			18.0-148		10/04/2023 03:10	WG2144048

Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Acenaphthene	U		0.00209	0.00600	1	10/04/2023 08:43	WG2143684
Anthracene	U		0.00230	0.00600	1	10/04/2023 08:43	WG2143684
Benzo(a)anthracene	U		0.00173	0.00600	1	10/04/2023 08:43	WG2143684
Benzo(b)fluoranthene	U		0.00153	0.00600	1	10/04/2023 08:43	WG2143684
Benzo(k)fluoranthene	U		0.00215	0.00600	1	10/04/2023 08:43	WG2143684
Benzo(a)pyrene	U		0.00179	0.00600	1	10/04/2023 08:43	WG2143684
Chrysene	U		0.00232	0.00600	1	10/04/2023 08:43	WG2143684
Dibenz(a,h)anthracene	U		0.00172	0.00600	1	10/04/2023 08:43	WG2143684
Fluoranthene	U		0.00227	0.00600	1	10/04/2023 08:43	WG2143684
Fluorene	U		0.00205	0.00600	1	10/04/2023 08:43	WG2143684
Indeno(1,2,3-cd)pyrene	U		0.00181	0.00600	1	10/04/2023 08:43	WG2143684
1-Methylnaphthalene	U		0.00449	0.0200	1	10/04/2023 08:43	WG2143684
2-Methylnaphthalene	U		0.00427	0.0200	1	10/04/2023 08:43	WG2143684
Naphthalene	U		0.00408	0.0200	1	10/04/2023 08:43	WG2143684
Pyrene	U		0.00200	0.00600	1	10/04/2023 08:43	WG2143684
(S) p-Terphenyl-d14	49.4			23.0-120		10/04/2023 08:43	WG2143684
(S) Nitrobenzene-d5	50.0			14.0-149		10/04/2023 08:43	WG2143684
(S) 2-Fluorobiphenyl	50.2			34.0-125		10/04/2023 08:43	WG2143684

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Calculated Results

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
Sodium Adsorption Ratio	2.48		1	10/02/2023 13:08	WG2141468

Wet Chemistry by Method 7199

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Hexavalent Chromium	U		0.255	1.00	1	10/03/2023 07:02	WG2141745

Wet Chemistry by Method 9045D

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
pH	8.02	<u>T8</u>	1	10/02/2023 14:19	WG2141964

Sample Narrative:

L1659927-07 WG2141964: 8.02 at 23.4C

Wet Chemistry by Method 9050AMod

Analyte	Result umhos/cm	Qualifier	RDL umhos/cm	Dilution	Analysis date / time	Batch
Specific Conductance	251		10.0	1	09/30/2023 08:41	WG2142117

Sample Narrative:

L1659927-07 WG2142117: at 25C

Metals (ICP) by Method 6010B-NE493 Ch 2

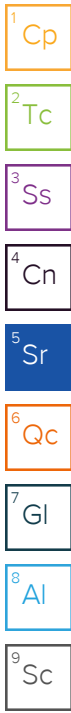
Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Hot Water Sol. Boron	0.0749	<u>J</u>	0.0167	0.200	1	10/04/2023 15:25	WG2144645

Metals (ICPMS) by Method 6020

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Arsenic	4.02		0.100	1.00	5	10/04/2023 20:17	WG2142828
Barium	192		0.152	2.50	5	10/04/2023 20:17	WG2142828
Cadmium	0.366	<u>J</u>	0.0855	1.00	5	10/04/2023 20:17	WG2142828
Copper	13.2		0.132	5.00	5	10/04/2023 20:17	WG2142828
Lead	12.0		0.0990	2.00	5	10/04/2023 20:17	WG2142828
Nickel	18.7		0.197	2.50	5	10/04/2023 20:17	WG2142828
Selenium	0.386	<u>J</u>	0.180	2.50	5	10/04/2023 20:17	WG2142828
Silver	U		0.0865	0.500	5	10/04/2023 20:17	WG2142828
Zinc	47.5		0.740	25.0	5	10/04/2023 20:17	WG2142828

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0469	<u>J</u>	0.0217	0.100	1	10/02/2023 01:43	WG2142892
(S) a,a,a-Trifluorotoluene(FID)	89.4			77.0-120		10/02/2023 01:43	WG2142892



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

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Benzene	U		0.000467	0.00100	1	10/02/2023 06:19	WG2142908
Toluene	U		0.00130	0.00500	1	10/02/2023 06:19	WG2142908
Ethylbenzene	U		0.000737	0.00250	1	10/02/2023 06:19	WG2142908
Xylenes, Total	U		0.000880	0.00650	1	10/02/2023 06:19	WG2142908
1,2,4-Trimethylbenzene	U		0.00158	0.00500	1	10/02/2023 06:19	WG2142908
1,3,5-Trimethylbenzene	U		0.00200	0.00500	1	10/02/2023 06:19	WG2142908
(S) Toluene-d8	108			75.0-131		10/02/2023 06:19	WG2142908
(S) 4-Bromofluorobenzene	102			67.0-138		10/02/2023 06:19	WG2142908
(S) 1,2-Dichloroethane-d4	86.8			70.0-130		10/02/2023 06:19	WG2142908

Semi-Volatile Organic Compounds (GC) by Method 8015M

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
C10-C28 Diesel Range	U		1.61	4.00	1	10/04/2023 03:38	WG2144048
C28-C36 Motor Oil Range	U		0.274	4.00	1	10/04/2023 03:38	WG2144048
(S) o-Terphenyl	41.0			18.0-148		10/04/2023 03:38	WG2144048

Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Acenaphthene	U		0.00209	0.00600	1	10/04/2023 09:00	WG2143684
Anthracene	U		0.00230	0.00600	1	10/04/2023 09:00	WG2143684
Benzo(a)anthracene	U		0.00173	0.00600	1	10/04/2023 09:00	WG2143684
Benzo(b)fluoranthene	U		0.00153	0.00600	1	10/04/2023 09:00	WG2143684
Benzo(k)fluoranthene	U		0.00215	0.00600	1	10/04/2023 09:00	WG2143684
Benzo(a)pyrene	U		0.00179	0.00600	1	10/04/2023 09:00	WG2143684
Chrysene	U		0.00232	0.00600	1	10/04/2023 09:00	WG2143684
Dibenz(a,h)anthracene	U		0.00172	0.00600	1	10/04/2023 09:00	WG2143684
Fluoranthene	U		0.00227	0.00600	1	10/04/2023 09:00	WG2143684
Fluorene	U		0.00205	0.00600	1	10/04/2023 09:00	WG2143684
Indeno(1,2,3-cd)pyrene	U		0.00181	0.00600	1	10/04/2023 09:00	WG2143684
1-Methylnaphthalene	U		0.00449	0.0200	1	10/04/2023 09:00	WG2143684
2-Methylnaphthalene	0.0116	U	0.00427	0.0200	1	10/04/2023 09:00	WG2143684
Naphthalene	0.00750	U	0.00408	0.0200	1	10/04/2023 09:00	WG2143684
Pyrene	U		0.00200	0.00600	1	10/04/2023 09:00	WG2143684
(S) p-Terphenyl-d14	51.1			23.0-120		10/04/2023 09:00	WG2143684
(S) Nitrobenzene-d5	50.7			14.0-149		10/04/2023 09:00	WG2143684
(S) 2-Fluorobiphenyl	51.4			34.0-125		10/04/2023 09:00	WG2143684

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Calculated Results

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
Sodium Adsorption Ratio	2.80		1	10/02/2023 13:47	WG2141468

Wet Chemistry by Method 7199

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Hexavalent Chromium	U		0.255	1.00	1	10/03/2023 07:07	WG2141745

Wet Chemistry by Method 9045D

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
pH	8.16	<u>T8</u>	1	10/02/2023 14:19	WG2141964

Sample Narrative:

L1659927-08 WG2141964: 8.16 at 23.6C

Wet Chemistry by Method 9050AMod

Analyte	Result umhos/cm	Qualifier	RDL umhos/cm	Dilution	Analysis date / time	Batch
Specific Conductance	279		10.0	1	09/30/2023 08:41	WG2142117

Sample Narrative:

L1659927-08 WG2142117: at 25C

Metals (ICP) by Method 6010B-NE493 Ch 2

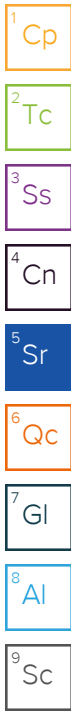
Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Hot Water Sol. Boron	0.0821	<u>J</u>	0.0167	0.200	1	10/04/2023 15:33	WG2144645

Metals (ICPMS) by Method 6020

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Arsenic	4.62		0.100	1.00	5	10/03/2023 22:36	WG2142813
Barium	374		0.152	2.50	5	10/03/2023 22:36	WG2142813
Cadmium	0.205	<u>J</u>	0.0855	1.00	5	10/03/2023 22:36	WG2142813
Copper	16.9		0.132	5.00	5	10/03/2023 22:36	WG2142813
Lead	13.6		0.0990	2.00	5	10/03/2023 22:36	WG2142813
Nickel	24.9		0.197	2.50	5	10/03/2023 22:36	WG2142813
Selenium	0.774	<u>J</u>	0.180	2.50	5	10/03/2023 22:36	WG2142813
Silver	U		0.0865	0.500	5	10/03/2023 22:36	WG2142813
Zinc	46.7		0.740	25.0	5	10/03/2023 22:36	WG2142813

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0267	<u>J</u>	0.0217	0.100	1	10/02/2023 02:03	WG2142892
(S) a,a,a-Trifluorotoluene(FID)	88.2			77.0-120		10/02/2023 02:03	WG2142892



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

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Benzene	U		0.000467	0.00100	1	10/02/2023 06:38	WG2142908
Toluene	U		0.00130	0.00500	1	10/02/2023 06:38	WG2142908
Ethylbenzene	U		0.000737	0.00250	1	10/02/2023 06:38	WG2142908
Xylenes, Total	U		0.000880	0.00650	1	10/02/2023 06:38	WG2142908
1,2,4-Trimethylbenzene	U		0.00158	0.00500	1	10/02/2023 06:38	WG2142908
1,3,5-Trimethylbenzene	U		0.00200	0.00500	1	10/02/2023 06:38	WG2142908
(S) Toluene-d8	105			75.0-131		10/02/2023 06:38	WG2142908
(S) 4-Bromofluorobenzene	102			67.0-138		10/02/2023 06:38	WG2142908
(S) 1,2-Dichloroethane-d4	91.3			70.0-130		10/02/2023 06:38	WG2142908

Semi-Volatile Organic Compounds (GC) by Method 8015M

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
C10-C28 Diesel Range	U		1.61	4.00	1	10/04/2023 02:28	WG2144048
C28-C36 Motor Oil Range	U		0.274	4.00	1	10/04/2023 02:28	WG2144048
(S) o-Terphenyl	29.1			18.0-148		10/04/2023 02:28	WG2144048

Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Acenaphthene	U		0.00209	0.00600	1	10/04/2023 09:18	WG2143684
Anthracene	U		0.00230	0.00600	1	10/04/2023 09:18	WG2143684
Benzo(a)anthracene	U		0.00173	0.00600	1	10/04/2023 09:18	WG2143684
Benzo(b)fluoranthene	U		0.00153	0.00600	1	10/04/2023 09:18	WG2143684
Benzo(k)fluoranthene	U		0.00215	0.00600	1	10/04/2023 09:18	WG2143684
Benzo(a)pyrene	U		0.00179	0.00600	1	10/04/2023 09:18	WG2143684
Chrysene	U		0.00232	0.00600	1	10/04/2023 09:18	WG2143684
Dibenz(a,h)anthracene	U		0.00172	0.00600	1	10/04/2023 09:18	WG2143684
Fluoranthene	U		0.00227	0.00600	1	10/04/2023 09:18	WG2143684
Fluorene	U		0.00205	0.00600	1	10/04/2023 09:18	WG2143684
Indeno(1,2,3-cd)pyrene	U		0.00181	0.00600	1	10/04/2023 09:18	WG2143684
1-Methylnaphthalene	U		0.00449	0.0200	1	10/04/2023 09:18	WG2143684
2-Methylnaphthalene	U		0.00427	0.0200	1	10/04/2023 09:18	WG2143684
Naphthalene	U		0.00408	0.0200	1	10/04/2023 09:18	WG2143684
Pyrene	U		0.00200	0.00600	1	10/04/2023 09:18	WG2143684
(S) p-Terphenyl-d14	53.3			23.0-120		10/04/2023 09:18	WG2143684
(S) Nitrobenzene-d5	51.7			14.0-149		10/04/2023 09:18	WG2143684
(S) 2-Fluorobiphenyl	54.0			34.0-125		10/04/2023 09:18	WG2143684

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Calculated Results

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
Sodium Adsorption Ratio	3.99		1	10/02/2023 13:50	WG2141468

Wet Chemistry by Method 7199

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Hexavalent Chromium	U		0.255	1.00	1	10/03/2023 07:17	WG2141745

Wet Chemistry by Method 9045D

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
pH	8.27	<u>T8</u>	1	10/02/2023 14:19	WG2141964

Sample Narrative:

L1659927-09 WG2141964: 8.27 at 23C

Wet Chemistry by Method 9050AMod

Analyte	Result umhos/cm	Qualifier	RDL umhos/cm	Dilution	Analysis date / time	Batch
Specific Conductance	453		10.0	1	09/30/2023 10:13	WG2142138

Sample Narrative:

L1659927-09 WG2142138: at 25C

Metals (ICP) by Method 6010B-NE493 Ch 2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Hot Water Sol. Boron	0.0883	<u>J</u>	0.0167	0.200	1	10/04/2023 15:36	WG2144645

Metals (ICPMS) by Method 6020

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Arsenic	2.01		0.100	1.00	5	10/03/2023 19:26	WG2142830
Barium	156		0.152	2.50	5	10/03/2023 19:26	WG2142830
Cadmium	0.228	<u>J</u>	0.0855	1.00	5	10/03/2023 19:26	WG2142830
Copper	16.0		0.132	5.00	5	10/03/2023 19:26	WG2142830
Lead	10.9		0.0990	2.00	5	10/03/2023 19:26	WG2142830
Nickel	20.4		0.197	2.50	5	10/03/2023 19:26	WG2142830
Selenium	0.429	<u>J</u>	0.180	2.50	5	10/03/2023 19:26	WG2142830
Silver	U		0.0865	0.500	5	10/03/2023 19:26	WG2142830
Zinc	49.5		0.740	25.0	5	10/03/2023 19:26	WG2142830

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0397	<u>J</u>	0.0217	0.100	1	10/02/2023 02:22	WG2142892
(S) a,a,a-Trifluorotoluene(FID)	89.7			77.0-120		10/02/2023 02:22	WG2142892

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 8260B

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Benzene	U		0.000467	0.00100	1	10/02/2023 06:56	WG2142908
Toluene	U		0.00130	0.00500	1	10/02/2023 06:56	WG2142908
Ethylbenzene	U		0.000737	0.00250	1	10/02/2023 06:56	WG2142908
Xylenes, Total	U		0.000880	0.00650	1	10/02/2023 06:56	WG2142908
1,2,4-Trimethylbenzene	U		0.00158	0.00500	1	10/02/2023 06:56	WG2142908
1,3,5-Trimethylbenzene	U		0.00200	0.00500	1	10/02/2023 06:56	WG2142908
(S) Toluene-d8	104			75.0-131		10/02/2023 06:56	WG2142908
(S) 4-Bromofluorobenzene	99.6			67.0-138		10/02/2023 06:56	WG2142908
(S) 1,2-Dichloroethane-d4	90.9			70.0-130		10/02/2023 06:56	WG2142908

Semi-Volatile Organic Compounds (GC) by Method 8015M

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
C10-C28 Diesel Range	U		1.61	4.00	1	10/04/2023 04:34	WG2144048
C28-C36 Motor Oil Range	U		0.274	4.00	1	10/04/2023 04:34	WG2144048
(S) o-Terphenyl	27.0			18.0-148		10/04/2023 04:34	WG2144048

Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Acenaphthene	U		0.00209	0.00600	1	10/04/2023 09:36	WG2143684
Anthracene	U		0.00230	0.00600	1	10/04/2023 09:36	WG2143684
Benzo(a)anthracene	U		0.00173	0.00600	1	10/04/2023 09:36	WG2143684
Benzo(b)fluoranthene	U		0.00153	0.00600	1	10/04/2023 09:36	WG2143684
Benzo(k)fluoranthene	U		0.00215	0.00600	1	10/04/2023 09:36	WG2143684
Benzo(a)pyrene	U		0.00179	0.00600	1	10/04/2023 09:36	WG2143684
Chrysene	U		0.00232	0.00600	1	10/04/2023 09:36	WG2143684
Dibenz(a,h)anthracene	U		0.00172	0.00600	1	10/04/2023 09:36	WG2143684
Fluoranthene	U		0.00227	0.00600	1	10/04/2023 09:36	WG2143684
Fluorene	U		0.00205	0.00600	1	10/04/2023 09:36	WG2143684
Indeno(1,2,3-cd)pyrene	U		0.00181	0.00600	1	10/04/2023 09:36	WG2143684
1-Methylnaphthalene	U		0.00449	0.0200	1	10/04/2023 09:36	WG2143684
2-Methylnaphthalene	U		0.00427	0.0200	1	10/04/2023 09:36	WG2143684
Naphthalene	U		0.00408	0.0200	1	10/04/2023 09:36	WG2143684
Pyrene	U		0.00200	0.00600	1	10/04/2023 09:36	WG2143684
(S) p-Terphenyl-d14	42.0			23.0-120		10/04/2023 09:36	WG2143684
(S) Nitrobenzene-d5	45.5			14.0-149		10/04/2023 09:36	WG2143684
(S) 2-Fluorobiphenyl	45.4			34.0-125		10/04/2023 09:36	WG2143684

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Calculated Results

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
Sodium Adsorption Ratio	3.70		1	10/02/2023 13:13	WG2141468

Wet Chemistry by Method 7199

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Hexavalent Chromium	U		0.255	1.00	1	10/03/2023 07:33	WG2141745

Wet Chemistry by Method 9045D

Analyte	Result	Qualifier	Dilution	Analysis date / time	Batch
pH	8.33	<u>T8</u>	1	10/01/2023 15:45	WG2141976

Sample Narrative:

L1659927-10 WG2141976: 8.33 at 22.2C

Wet Chemistry by Method 9050AMod

Analyte	Result umhos/cm	Qualifier	RDL umhos/cm	Dilution	Analysis date / time	Batch
Specific Conductance	394		10.0	1	09/30/2023 10:13	WG2142138

Sample Narrative:

L1659927-10 WG2142138: at 25C

Metals (ICP) by Method 6010B-NE493 Ch 2

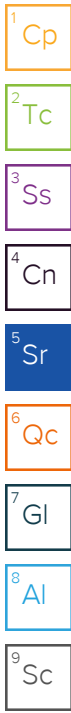
Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Hot Water Sol. Boron	0.0758	<u>J</u>	0.0167	0.200	1	10/04/2023 15:39	WG2144645

Metals (ICPMS) by Method 6020

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Arsenic	6.95		0.100	1.00	5	10/03/2023 19:38	WG2142830
Barium	178		0.152	2.50	5	10/03/2023 19:38	WG2142830
Cadmium	0.263	<u>J</u>	0.0855	1.00	5	10/03/2023 19:38	WG2142830
Copper	12.8		0.132	5.00	5	10/03/2023 19:38	WG2142830
Lead	11.0		0.0990	2.00	5	10/03/2023 19:38	WG2142830
Nickel	22.4		0.197	2.50	5	10/03/2023 19:38	WG2142830
Selenium	0.430	<u>J</u>	0.180	2.50	5	10/03/2023 19:38	WG2142830
Silver	U		0.0865	0.500	5	10/03/2023 19:38	WG2142830
Zinc	49.5		0.740	25.0	5	10/03/2023 19:38	WG2142830

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0330	<u>J</u>	0.0217	0.100	1	10/02/2023 02:41	WG2142892
(S) a,a,a-Trifluorotoluene(FID)	88.9			77.0-120		10/02/2023 02:41	WG2142892



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

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Benzene	U		0.000467	0.00100	1	10/02/2023 07:15	WG2142908
Toluene	U		0.00130	0.00500	1	10/02/2023 07:15	WG2142908
Ethylbenzene	U		0.000737	0.00250	1	10/02/2023 07:15	WG2142908
Xylenes, Total	U		0.000880	0.00650	1	10/02/2023 07:15	WG2142908
1,2,4-Trimethylbenzene	U		0.00158	0.00500	1	10/02/2023 07:15	WG2142908
1,3,5-Trimethylbenzene	U		0.00200	0.00500	1	10/02/2023 07:15	WG2142908
(S) Toluene-d8	104			75.0-131		10/02/2023 07:15	WG2142908
(S) 4-Bromofluorobenzene	101			67.0-138		10/02/2023 07:15	WG2142908
(S) 1,2-Dichloroethane-d4	87.3			70.0-130		10/02/2023 07:15	WG2142908

Semi-Volatile Organic Compounds (GC) by Method 8015M

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
C10-C28 Diesel Range	U		1.61	4.00	1	10/04/2023 02:56	WG2144048
C28-C36 Motor Oil Range	U		0.274	4.00	1	10/04/2023 02:56	WG2144048
(S) o-Terphenyl	15.6	<u>J2</u>		18.0-148		10/04/2023 02:56	WG2144048

Semi Volatile Organic Compounds (GC/MS) by Method 8270C-SIM

Analyte	Result mg/kg	Qualifier	MDL mg/kg	RDL mg/kg	Dilution	Analysis date / time	Batch
Acenaphthene	U		0.00209	0.00600	1	10/04/2023 09:53	WG2143684
Anthracene	U		0.00230	0.00600	1	10/04/2023 09:53	WG2143684
Benzo(a)anthracene	U		0.00173	0.00600	1	10/04/2023 09:53	WG2143684
Benzo(b)fluoranthene	U		0.00153	0.00600	1	10/04/2023 09:53	WG2143684
Benzo(k)fluoranthene	U		0.00215	0.00600	1	10/04/2023 09:53	WG2143684
Benzo(a)pyrene	U		0.00179	0.00600	1	10/04/2023 09:53	WG2143684
Chrysene	U		0.00232	0.00600	1	10/04/2023 09:53	WG2143684
Dibenz(a,h)anthracene	U		0.00172	0.00600	1	10/04/2023 09:53	WG2143684
Fluoranthene	U		0.00227	0.00600	1	10/04/2023 09:53	WG2143684
Fluorene	U		0.00205	0.00600	1	10/04/2023 09:53	WG2143684
Indeno(1,2,3-cd)pyrene	U		0.00181	0.00600	1	10/04/2023 09:53	WG2143684
1-Methylnaphthalene	U		0.00449	0.0200	1	10/04/2023 09:53	WG2143684
2-Methylnaphthalene	0.00898	<u>J2</u>	0.00427	0.0200	1	10/04/2023 09:53	WG2143684
Naphthalene	0.00448	<u>J2</u>	0.00408	0.0200	1	10/04/2023 09:53	WG2143684
Pyrene	U		0.00200	0.00600	1	10/04/2023 09:53	WG2143684
(S) p-Terphenyl-d14	59.6			23.0-120		10/04/2023 09:53	WG2143684
(S) Nitrobenzene-d5	55.5			14.0-149		10/04/2023 09:53	WG2143684
(S) 2-Fluorobiphenyl	58.7			34.0-125		10/04/2023 09:53	WG2143684

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Method Blank (MB)

(MB) R3980888-1 10/03/23 05:26

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
Hexavalent Chromium	U		0.255	1.00

¹Cp

²Tc

³Ss

⁴Cn

⁵Sr

⁶Qc

⁷Gl

⁸Al

⁹Sc

L1659579-14 Original Sample (OS) • Duplicate (DUP)

(OS) L1659579-14 10/03/23 05:39 • (DUP) R3980888-3 10/03/23 05:44

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Hexavalent Chromium	U	U	1	0.000		20

L1659927-08 Original Sample (OS) • Duplicate (DUP)

(OS) L1659927-08 10/03/23 07:07 • (DUP) R3980888-8 10/03/23 07:12

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Hexavalent Chromium	U	U	1	0.000		20

Laboratory Control Sample (LCS)

(LCS) R3980888-2 10/03/23 05:34

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
Hexavalent Chromium	10.0	9.05	90.5	80.0-120	

L1659701-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1659701-04 10/03/23 05:49 • (MS) R3980888-5 10/03/23 06:00 • (MSD) R3980888-6 10/03/23 06:05

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Hexavalent Chromium	20.0	U	18.4	13.7	92.1	68.6	1	75.0-125		J3 J6	29.2	20

L1659701-04 Original Sample (OS) • Matrix Spike (MS)

(OS) L1659701-04 10/03/23 05:49 • (MS) R3980888-7 10/03/23 06:10

Analyte	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Hexavalent Chromium	648	U	334	51.5	50	75.0-125	J6

L1659735-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1659735-01 10/02/23 14:19 • (DUP) R3980563-2 10/02/23 14:19

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	su	su		%		%
pH	7.41	7.44	1	0.404		1

Sample Narrative:

OS: 7.41 at 23.3C
 DUP: 7.44 at 23.3C

L1659927-03 Original Sample (OS) • Duplicate (DUP)

(OS) L1659927-03 10/02/23 14:19 • (DUP) R3980563-3 10/02/23 14:19

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	pH	su		%		%
pH	7.91	7.91	1	0.000		1

Sample Narrative:

OS: 7.91 at 23.6C
 DUP: 7.91 at 23.3C

Laboratory Control Sample (LCS)

(LCS) R3980563-1 10/02/23 14:19

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
	su	su	%	%	
pH	10.0	9.99	99.9	99.0-101	

Sample Narrative:

LCS: 9.99 at 21.6C

¹Cp

²Tc

³Ss

⁴Cn

⁵Sr

⁶Qc

⁷Gl

⁸Al

⁹Sc

L1660199-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1660199-01 10/01/23 15:45 • (DUP) R3980158-2 10/01/23 15:45

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	su	su		%		%
pH	5.00	5.01	1	0.200		1

Sample Narrative:

OS: 5 at 21.4C
DUP: 5.01 at 21.6C

L1660272-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1660272-01 10/01/23 15:45 • (DUP) R3980158-3 10/01/23 15:45

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	su	su		%		%
pH	8.03	8.02	1	0.125		1

Sample Narrative:

OS: 8.03 at 21.3C
DUP: 8.02 at 21.2C

Laboratory Control Sample (LCS)

(LCS) R3980158-1 10/01/23 15:45

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
	su	su	%	%	
pH	10.0	9.99	99.9	99.0-101	

Sample Narrative:

LCS: 9.99 at 20.9C

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Method Blank (MB)

(MB) R3979860-1 09/30/23 08:41

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
Specific Conductance	U		10.0	10.0

Sample Narrative:

BLANK: at 25C

L1659745-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1659745-05 09/30/23 08:41 • (DUP) R3979860-3 09/30/23 08:41

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Specific Conductance	651	655	1	0.613		20

Sample Narrative:

OS: at 25C
DUP: at 25C

L1659927-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1659927-07 09/30/23 08:41 • (DUP) R3979860-4 09/30/23 08:41

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Specific Conductance	251	249	1	0.761		20

Sample Narrative:

OS: at 25C
DUP: at 25C

Laboratory Control Sample (LCS)

(LCS) R3979860-2 09/30/23 08:41

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
Specific Conductance	732	718	98.1	85.0-115	

Sample Narrative:

LCS: at 25C

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Method Blank (MB)

(MB) R3979887-1 09/30/23 10:13

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
Specific Conductance	U		10.0	10.0

Sample Narrative:

BLANK: at 25C

L1660218-03 Original Sample (OS) • Duplicate (DUP)

(OS) L1660218-03 09/30/23 10:13 • (DUP) R3979887-3 09/30/23 10:13

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Specific Conductance	384	396	1	3.08		20

Sample Narrative:

OS: at 25C
DUP: at 25C

L1660218-13 Original Sample (OS) • Duplicate (DUP)

(OS) L1660218-13 09/30/23 10:13 • (DUP) R3979887-4 09/30/23 10:13

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Specific Conductance	219	229	1	4.56		20

Sample Narrative:

OS: at 25C
DUP: at 25C

Laboratory Control Sample (LCS)

(LCS) R3979887-2 09/30/23 10:13

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
Specific Conductance	732	745	102	85.0-115	

Sample Narrative:

LCS: at 25C

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Method Blank (MB)

(MB) R3982065-1 10/04/23 14:59

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Hot Water Sol. Boron	U		0.0167	0.200

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

(LCS) R3982065-2 10/04/23 15:02 • (LCSD) R3982065-3 10/04/23 15:05

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Hot Water Sol. Boron	1.00	1.08	1.11	108	111	80.0-120			3.07	20

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

Method Blank (MB)

(MB) R3981375-1 10/03/23 20:56

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Arsenic	U		0.100	1.00
Barium	U		0.152	2.50
Cadmium	U		0.0855	1.00
Copper	U		0.133	5.00
Lead	U		0.0990	2.00
Nickel	U		0.197	2.50
Selenium	U		0.180	2.50
Silver	U		0.0865	0.500
Zinc	U		0.740	25.0

¹Cp

²Tc

³Ss

⁴Cn

⁵Sr

⁶Qc

Laboratory Control Sample (LCS)

(LCS) R3981375-2 10/03/23 20:59

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
Arsenic	100	110	110	80.0-120	
Barium	100	109	109	80.0-120	
Cadmium	100	106	106	80.0-120	
Copper	100	102	102	80.0-120	
Lead	100	108	108	80.0-120	
Nickel	100	108	108	80.0-120	
Selenium	100	116	116	80.0-120	
Silver	20.0	23.3	117	80.0-120	
Zinc	100	104	104	80.0-120	

⁷Gl

⁸Al

⁹Sc

L1660639-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1660639-06 10/03/23 21:03 • (MS) R3981375-5 10/03/23 21:13 • (MSD) R3981375-6 10/03/23 21:16

Analyte	Spike Amount mg/kg	Original Result mg/kg	MS Result mg/kg	MSD Result mg/kg	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	100	6.76	110	96.0	104	89.2	5	75.0-125			13.9	20
Barium	100	14200	14100	12900	0.000	0.000	5	75.0-125	<u>E V</u>	<u>E V</u>	9.39	20
Cadmium	100	0.357	104	91.9	103	91.5	5	75.0-125			12.2	20
Copper	100	23.2	116	108	92.8	84.3	5	75.0-125			7.60	20
Lead	100	14.6	117	107	103	92.7	5	75.0-125			8.88	20
Nickel	100	17.4	119	104	102	86.9	5	75.0-125			13.2	20
Selenium	100	0.692	113	101	112	100	5	75.0-125	<u>E</u>	<u>E</u>	10.9	20
Silver	20.0	0.112	22.3	20.2	111	101	5	75.0-125			9.65	20
Zinc	100	65.2	169	145	104	80.0	5	75.0-125			15.1	20

Method Blank (MB)

(MB) R3982183-1 10/04/23 19:54

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Arsenic	U		0.100	1.00
Barium	U		0.152	2.50
Cadmium	U		0.0855	1.00
Copper	U		0.133	5.00
Lead	U		0.0990	2.00
Nickel	U		0.197	2.50
Selenium	U		0.180	2.50
Silver	U		0.0865	0.500
Zinc	U		0.740	25.0

¹Cp

²Tc

³Ss

⁴Cn

⁵Sr

⁶Qc

Laboratory Control Sample (LCS)

(LCS) R3982183-7 10/04/23 21:39

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
Arsenic	100	113	113	80.0-120	
Barium	100	101	101	80.0-120	
Cadmium	100	113	113	80.0-120	
Copper	100	100	100	80.0-120	
Lead	100	112	112	80.0-120	
Nickel	100	118	118	80.0-120	
Selenium	100	112	112	80.0-120	
Silver	20.0	21.9	109	80.0-120	
Zinc	100	107	107	80.0-120	

⁷Gl

⁸Al

⁹Sc

L1660898-11 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1660898-11 10/04/23 20:00 • (MS) R3982183-5 10/04/23 20:10 • (MSD) R3982183-6 10/04/23 20:13

Analyte	Spike Amount mg/kg	Original Result mg/kg	MS Result mg/kg	MSD Result mg/kg	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	100	2.13	86.6	98.8	84.5	96.6	5	75.0-125			13.1	20
Barium	100	264	361	407	96.8	142	5	75.0-125		J5	11.8	20
Cadmium	100	0.130	87.6	98.8	87.5	98.7	5	75.0-125			12.0	20
Copper	100	9.10	82.8	94.1	73.7	85.0	5	75.0-125	J6		12.8	20
Lead	100	10.4	92.4	106	82.0	95.5	5	75.0-125			13.6	20
Nickel	100	13.9	96.6	111	82.7	96.8	5	75.0-125			13.6	20
Selenium	100	0.547	89.4	97.2	88.9	96.7	5	75.0-125			8.36	20
Silver	20.0	U	16.3	19.1	81.7	95.5	5	75.0-125			15.6	20
Zinc	100	28.7	106	126	77.7	97.6	5	75.0-125			17.2	20

Method Blank (MB)

(MB) R3981786-1 10/03/23 18:56

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Arsenic	U		0.100	1.00
Barium	U		0.152	2.50
Cadmium	U		0.0855	1.00
Copper	U		0.133	5.00
Lead	U		0.0990	2.00
Nickel	U		0.197	2.50
Selenium	U		0.180	2.50
Silver	U		0.0865	0.500
Zinc	U		0.740	25.0

¹Cp

²Tc

³Ss

⁴Cn

⁵Sr

⁶Qc

Laboratory Control Sample (LCS)

(LCS) R3981786-2 10/03/23 18:59

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
Arsenic	100	100	100	80.0-120	
Barium	100	97.6	97.6	80.0-120	
Cadmium	100	98.0	98.0	80.0-120	
Copper	100	89.6	89.6	80.0-120	
Lead	100	95.0	95.0	80.0-120	
Nickel	100	98.6	98.6	80.0-120	
Selenium	100	107	107	80.0-120	
Silver	20.0	21.0	105	80.0-120	
Zinc	100	94.9	94.9	80.0-120	

⁷Gl

⁸Al

⁹Sc

L1660895-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1660895-01 10/03/23 19:03 • (MS) R3981786-5 10/03/23 19:13 • (MSD) R3981786-6 10/03/23 19:16

Analyte	Spike Amount mg/kg	Original Result mg/kg	MS Result mg/kg	MSD Result mg/kg	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	100	19.1	106	103	86.9	83.9	5	75.0-125			2.87	20
Cadmium	100	0.474	94.0	88.4	93.5	87.9	5	75.0-125			6.18	20
Copper	100	23.0	106	98.0	83.3	75.0	5	75.0-125			8.16	20
Lead	100	15.3	107	98.0	91.7	82.8	5	75.0-125			8.68	20
Nickel	100	18.4	104	100	86.0	81.8	5	75.0-125			4.11	20
Selenium	100	0.968	103	99.0	102	98.0	5	75.0-125	E	E	3.73	20
Silver	20.0	0.107	20.2	19.1	101	94.9	5	75.0-125			5.74	20
Zinc	100	61.0	142	137	81.1	76.2	5	75.0-125			3.50	20

Method Blank (MB)

(MB) R3981745-1 10/03/23 20:59

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Arsenic	U		0.100	1.00
Barium	U		0.152	2.50
Cadmium	U		0.0855	1.00
Copper	U		0.133	5.00
Lead	U		0.0990	2.00
Nickel	1.18	U	0.197	2.50
Selenium	U		0.180	2.50
Silver	U		0.0865	0.500
Zinc	U		0.740	25.0

¹Cp

²Tc

³Ss

⁴Cn

⁵Sr

⁶Qc

Laboratory Control Sample (LCS)

(LCS) R3981745-2 10/03/23 21:03

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
Arsenic	100	108	108	80.0-120	
Barium	100	106	106	80.0-120	
Cadmium	100	113	113	80.0-120	
Copper	100	105	105	80.0-120	
Lead	100	99.1	99.1	80.0-120	
Nickel	100	117	117	80.0-120	
Selenium	100	108	108	80.0-120	
Silver	20.0	21.7	109	80.0-120	
Zinc	100	105	105	80.0-120	

⁷Gl

⁸Al

⁹Sc

L1659558-22 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1659558-22 10/03/23 21:06 • (MS) R3981745-5 10/03/23 21:16 • (MSD) R3981745-6 10/03/23 21:19

Analyte	Spike Amount mg/kg	Original Result mg/kg	MS Result mg/kg	MSD Result mg/kg	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	100	0.139	106	102	106	102	5	75.0-125			4.10	20
Barium	100	2.01	104	103	102	101	5	75.0-125			0.865	20
Cadmium	100	U	111	104	111	104	5	75.0-125			6.57	20
Copper	100	0.955	104	100	103	99.4	5	75.0-125			3.34	20
Lead	100	6.94	122	108	115	101	5	75.0-125			11.9	20
Nickel	100	0.978	110	103	109	102	5	75.0-125			6.11	20
Selenium	100	U	105	101	105	101	5	75.0-125			3.89	20
Silver	20.0	U	20.8	20.5	104	103	5	75.0-125			1.04	20
Zinc	100	1.53	103	101	101	99.0	5	75.0-125			2.18	20

Method Blank (MB)

(MB) R3981354-2 10/01/23 20:13

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
TPH (GC/FID) Low Fraction	U		0.0217	0.100
^(S) a,a,a-Trifluorotoluene(FID)	99.4			77.0-120

Laboratory Control Sample (LCS)

(LCS) R3981354-1 10/01/23 19:34

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
TPH (GC/FID) Low Fraction	5.50	5.78	105	72.0-127	
^(S) a,a,a-Trifluorotoluene(FID)			103	77.0-120	

¹ Cp

² Tc

³ Ss

⁴ Cn

⁵ Sr

⁶ Qc

⁷ Gl

⁸ Al

⁹ Sc

Method Blank (MB)

(MB) R3980983-2 10/01/23 23:42

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/kg		mg/kg	mg/kg
Benzene	U		0.000467	0.00100
Toluene	U		0.00130	0.00500
Ethylbenzene	U		0.000737	0.00250
Xylenes, Total	U		0.000880	0.00650
1,2,4-Trimethylbenzene	U		0.00158	0.00500
1,3,5-Trimethylbenzene	U		0.00200	0.00500
(S) Toluene-d8	107			75.0-131
(S) 4-Bromofluorobenzene	101			67.0-138
(S) 1,2-Dichloroethane-d4	87.6			70.0-130

Laboratory Control Sample (LCS)

(LCS) R3980983-1 10/01/23 22:28

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
	mg/kg	mg/kg	%	%	
Benzene	0.125	0.112	89.6	70.0-123	
Toluene	0.125	0.111	88.8	75.0-121	
Ethylbenzene	0.125	0.107	85.6	74.0-126	
Xylenes, Total	0.375	0.334	89.1	72.0-127	
1,2,4-Trimethylbenzene	0.125	0.101	80.8	70.0-126	
1,3,5-Trimethylbenzene	0.125	0.103	82.4	73.0-127	
(S) Toluene-d8			101	75.0-131	
(S) 4-Bromofluorobenzene			102	67.0-138	
(S) 1,2-Dichloroethane-d4			92.7	70.0-130	

L1659745-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1659745-02 10/02/23 02:16 • (MS) R3980983-3 10/02/23 07:53 • (MSD) R3980983-4 10/02/23 08:11

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/kg	mg/kg	mg/kg	mg/kg	%	%		%			%	%
Benzene	0.124	U	0.136	0.145	110	117	1	10.0-149			6.41	37
Toluene	0.124	U	0.140	0.145	113	117	1	10.0-156			3.51	38
Ethylbenzene	0.124	U	0.137	0.147	110	119	1	10.0-160			7.04	38
Xylenes, Total	0.372	U	0.403	0.430	108	116	1	10.0-160			6.48	38
1,2,4-Trimethylbenzene	0.124	U	0.123	0.132	99.2	106	1	10.0-160			7.06	36
1,3,5-Trimethylbenzene	0.124	U	0.134	0.136	108	110	1	10.0-160			1.48	38
(S) Toluene-d8					102	103		75.0-131				
(S) 4-Bromofluorobenzene					101	102		67.0-138				
(S) 1,2-Dichloroethane-d4					90.7	93.6		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) R3981475-1 10/03/23 23:40

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
C10-C28 Diesel Range	U		1.61	4.00
C28-C36 Motor Oil Range	U		0.274	4.00
<i>(S) o-Terphenyl</i>	69.4			18.0-148

Laboratory Control Sample (LCS)

(LCS) R3981475-2 10/03/23 23:54

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
C10-C28 Diesel Range	50.0	34.7	69.4	50.0-150	
<i>(S) o-Terphenyl</i>			80.9	18.0-148	

L1660097-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1660097-05 10/04/23 03:52 • (MS) R3981475-3 10/04/23 04:06 • (MSD) R3981475-4 10/04/23 04:20

Analyte	Spike Amount mg/kg	Original Result mg/kg	MS Result mg/kg	MSD Result mg/kg	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
C10-C28 Diesel Range	50.0	U	29.6	32.9	59.2	65.8	1	50.0-150			10.6	20
<i>(S) o-Terphenyl</i>					70.1	72.8		18.0-148				

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Method Blank (MB)

(MB) R3981743-2 10/04/23 02:13

Analyte	MB Result mg/kg	MB Qualifier	MB MDL mg/kg	MB RDL mg/kg
Acenaphthene	U		0.00209	0.00600
Anthracene	U		0.00230	0.00600
Benzo(a)anthracene	U		0.00173	0.00600
Benzo(b)fluoranthene	U		0.00153	0.00600
Benzo(k)fluoranthene	U		0.00215	0.00600
Benzo(a)pyrene	U		0.00179	0.00600
Chrysene	U		0.00232	0.00600
Dibenz(a,h)anthracene	U		0.00172	0.00600
Fluoranthene	U		0.00227	0.00600
Fluorene	U		0.00205	0.00600
Indeno(1,2,3-cd)pyrene	U		0.00181	0.00600
1-Methylnaphthalene	U		0.00449	0.0200
2-Methylnaphthalene	U		0.00427	0.0200
Naphthalene	U		0.00408	0.0200
Pyrene	U		0.00200	0.00600
(S) p-Terphenyl-d14	75.9			23.0-120
(S) Nitrobenzene-d5	67.3			14.0-149
(S) 2-Fluorobiphenyl	74.6			34.0-125

¹Cp

²Tc

³Ss

⁴Cn

⁵Sr

⁶Qc

⁷Gl

⁸Al

⁹Sc

Laboratory Control Sample (LCS)

(LCS) R3981743-1 10/04/23 01:56

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acenaphthene	0.0800	0.0525	65.6	50.0-120	
Anthracene	0.0800	0.0527	65.9	50.0-126	
Benzo(a)anthracene	0.0800	0.0564	70.5	45.0-120	
Benzo(b)fluoranthene	0.0800	0.0548	68.5	42.0-121	
Benzo(k)fluoranthene	0.0800	0.0504	63.0	49.0-125	
Benzo(a)pyrene	0.0800	0.0510	63.8	42.0-120	
Chrysene	0.0800	0.0561	70.1	49.0-122	
Dibenz(a,h)anthracene	0.0800	0.0540	67.5	47.0-125	
Fluoranthene	0.0800	0.0575	71.9	49.0-129	
Fluorene	0.0800	0.0591	73.9	49.0-120	
Indeno(1,2,3-cd)pyrene	0.0800	0.0585	73.1	46.0-125	
1-Methylnaphthalene	0.0800	0.0564	70.5	51.0-121	
2-Methylnaphthalene	0.0800	0.0572	71.5	50.0-120	
Naphthalene	0.0800	0.0543	67.9	50.0-120	
Pyrene	0.0800	0.0561	70.1	43.0-123	

Laboratory Control Sample (LCS)

(LCS) R3981743-1 10/04/23 01:56

Analyte	Spike Amount mg/kg	LCS Result mg/kg	LCS Rec. %	Rec. Limits %	LCS Qualifier
(S) p-Terphenyl-d14			72.8	23.0-120	
(S) Nitrobenzene-d5			71.5	14.0-149	
(S) 2-Fluorobiphenyl			74.8	34.0-125	

L1659497-51 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1659497-51 10/04/23 06:03 • (MS) R3981743-3 10/04/23 06:21 • (MSD) R3981743-4 10/04/23 06:39

Analyte	Spike Amount mg/kg	Original Result mg/kg	MS Result mg/kg	MSD Result mg/kg	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Acenaphthene	0.0788	U	0.0434	0.0458	55.1	57.8	1	14.0-127			5.38	27
Anthracene	0.0788	U	0.0431	0.0441	54.7	55.7	1	10.0-145			2.29	30
Benzo(a)anthracene	0.0788	0.00362	0.0445	0.0440	51.9	51.0	1	10.0-139			1.13	30
Benzo(b)fluoranthene	0.0788	0.00549	0.0447	0.0444	49.8	49.1	1	10.0-140			0.673	36
Benzo(k)fluoranthene	0.0788	0.00243	0.0415	0.0406	49.6	48.2	1	10.0-137			2.19	31
Benzo(a)pyrene	0.0788	0.00252	0.0453	0.0452	54.3	53.9	1	10.0-141			0.221	31
Chrysene	0.0788	0.00413	0.0464	0.0460	53.6	52.9	1	10.0-145			0.866	30
Dibenz(a,h)anthracene	0.0788	U	0.0434	0.0428	55.1	54.0	1	10.0-132			1.39	31
Fluoranthene	0.0788	U	0.0450	0.0447	57.1	56.4	1	10.0-153			0.669	33
Fluorene	0.0788	U	0.0472	0.0506	59.9	63.9	1	11.0-130			6.95	29
Indeno(1,2,3-cd)pyrene	0.0788	0.00270	0.0465	0.0461	55.6	54.8	1	10.0-137			0.864	32
1-Methylnaphthalene	0.0788	U	0.0490	0.0524	62.2	66.2	1	10.0-142			6.71	28
2-Methylnaphthalene	0.0788	U	0.0500	0.0551	63.5	69.6	1	10.0-137			9.71	28
Naphthalene	0.0788	U	0.0469	0.0529	59.5	66.8	1	10.0-135			12.0	27
Pyrene	0.0788	U	0.0461	0.0461	58.5	58.2	1	10.0-148			0.000	35
(S) p-Terphenyl-d14					63.5	63.3		23.0-120				
(S) Nitrobenzene-d5					59.7	63.7		14.0-149				
(S) 2-Fluorobiphenyl					65.7	68.3		34.0-125				

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

GLOSSARY OF TERMS

Guide to Reading and Understanding Your Laboratory Report

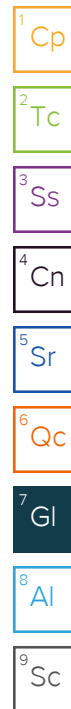
The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

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.
J2	Surrogate recovery limits have been exceeded; values are outside lower control limits.
J3	The associated batch QC was outside the established quality control range for precision.
J5	The sample matrix interfered with the ability to make any accurate determination; spike value is high.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
T8	Sample(s) received past/too close to holding time expiration.
V	The sample concentration is too high to evaluate accurate spike recoveries.



ACCREDITATIONS & LOCATIONS

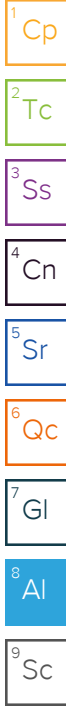
Pace Analytical National 12065 Lebanon Rd Mount Juliet, TN 37122

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN000032021-1
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico ¹	TN00003
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	LA000356
Kentucky ^{1,6}	KY90010	South Carolina	84004002
Kentucky ²	16	South Dakota	n/a
Louisiana	AI30792	Tennessee ^{1,4}	2006
Louisiana	LA018	Texas	T104704245-20-18
Maine	TN00003	Texas ⁵	LAB0152
Maryland	324	Utah	TN000032021-11
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	110033
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	998093910
Montana	CERT0086	Wyoming	A2LA
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

* 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 Analytical.



Caerus Oil and Gas
143 Diamond Avenue
Parachute, CO 81635

Billing Information:
SAME AS LEFT

Pres
Chk

Analysis / Container / Preservative

Chain of Custody Page ___ of ___



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



Report to:
Jake Janicek

Email To:
jjanicek@caerusoilandgas.com

Project Description:
A18 495 Background Sampling

City/State Collected: Piceance Crk, CO
Please Circle: PT MT CT ET

Phone: (970) 778-2314

Client Project #

Lab Project #

Collected by (print):
Tristan Schmalz

Site/Facility ID #
A18 495 Pad

P.O. #

Collected by (signature):
Tristan Schmalz

Rush? (Lab MUST Be Notified)

Quote #

___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Date Results Needed

Standard TAT

No. of Cntrs

Packed on Ice N ___ Y X

SDG # LL69927

Tab B124

Acctnum:

Template:

Prelogin:

PM:

PB:

Shipped Via:

Sample ID	Comp/Grab	Matrix*	Depth	Date	Time	No. of Cntrs	COGCC Table 915-1	EC, pH, SAR	Arsenic, Boron	COGCC Table 910-1	Remarks	Sample # (lab only)
0230926-NPRBG-(A18 495-5B01)@101	Grab	SS	101 ft	9/26/23	9:40	4	X					-01
0230926-NPRBG-(A18 495-5B02)@121	Grab		121 ft		10:16		X					-02
0230926-NPRBG-(A18 495-5B01)@134			134 ft		11:22		X					-03
0230926-NPRBG-(A18 495-5B03)@7			7 ft		11:56		X					-04
0230926-NPRBG-(A18 495-5B03)@15			15 ft		12:13		X					-05
0230926-NPRBG-(A18 495-5B03)@21			21 ft		12:31		X					-06
0230926-NPRBG-(A18 495-5B03)@43			43 ft		13:16		X					-07
0230926-NPRBG-(A18 495-5B03)@54			54 ft		13:32		X					-08
0230926-NPRBG-(A18 495-5B03)@65			65 ft		14:13		X					-09
0230926-NPRBG-(A18 495-5B03)@19					14:59		X					-10

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

Remarks:

Samples returned via:
___ UPS ___ FedEx ___ Courier

Tracking #

pH ___ Temp ___

Flow ___ Other ___

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)
Tristan Schmalz

Date: 9/26/23

Time: 16:45

Received by: (Signature)
[Signature]

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

Relinquished by: (Signature)
[Signature]

Date: 9/26/23

Time: 17:00

Received by: (Signature)
[Signature]

Temp: °C Bottles Received: 40

If preservation required by Login: Date/Time

Relinquished by: (Signature)
[Signature]

Date: 9-27-23

Time: 9:00

Received for lab by: (Signature)
[Signature]

Date: 9-27-23 Time: 9:00

Hold:

Condition: NCF / OK

