Breitburn Operating LP
Jalmat 192
Work Plan

Section 11, Township 22S, Range 35E
Lea County, New Mexico

September 11, 2019

Prepared for:

Maverick Resources
P.O. BOX 678
Andrews, TX 79714

By:

Safety & Environmental Solutions, Inc.
703 East Clinton Street
Hobbs, New Mexico 88240
(575) 397-0510

TABLE OF CONTENTS

I. Company Contacts

Representative	Company	Telephone	E-mail
Thomas Haigood	Maverick Resources	(432) 523-1807	Thomas.haigood@mavresources.com
Bob Allen	SESI	(575) 397-0510	ballen@sesi-nm.com

II. Background

Safety and Environmental Solutions, Inc., hereinafter referred to as (SESI) was engaged by Maverick Resources to assess a spill on Jalmat Field Yates Sand Unit #192, concernin a 70 bbls spill of produced water. The spill area was mapped using a handheld Juno 3B. According to the mapped area the spill impacted approximately 1,232 square yards. This site is situated in Section 11, Township 22S, and Range 35E.

According to the C-141: A 2" casing riser at the wellhead developed a hole due to oberpressure in the tubing, causing fluid to escape. Most of the impact was contained on the pad area, while impacting approximately 352 sq. yards of pasture area.

III. Surface and Ground Water

There is no record of groundwater in the immediate vicinity of the site location. Further research of the New Mexico Office of the State Engineer records indicates the average depth to groundwater for the area to be 185' bgs., as documented for the depth to water in Section 14.

IV. Characterization

The target cleanup levels are determined using the NMAC 19.15.29 revisions dated July 24, 2018. The soil screening criteria presented below, and the applicable Recommended Remediation Action Levels (RRAL) for depths to groundwater >300' are 10 parts per million (ppm) Benzene, 50 ppm combined Benzene, Toluene, Ethyl Benzene, and Total Xylenes (BTEX), and 2,500 ppm Total Petroleum Hydrocarbons (TPH). Characterization of vertical extent of chloride concentration to a levels of 20,000 Mg/kg, furthermore 600 mg/kg (PPM) is also required for pasture impact.

Table 1 Closure Criteria for Soils Impacted by a Release			
Minimum depth below any point within the horizontal boundary of the release to ground water less than 10,000 mg/l TDS	Constituent	Method*	Limit**
<50 feet	Chloride***	EPA 300.0 or SM4500 Cl B	600 mg/kg
	TPH (GRO+DRO+MRO)	EPA SW-846 Method 8015B	100 mg/kg
	BTEX	EPA SW-846 Method 8021B or 8260B	50 mg/kg
	Benzene	EPA SW-846 Method 8021B or 8260B	10 mg/kg
51 feet-100 feet	Chloride***	EPA 300.0 or SM4500 Cl B	10,000 mg/kg
	TPH (GRO+DRO+MRO)	EPA SW-846 Method 8015B	2,500 mg/kg
	BTEX	EPA SW-846 Method 8021B or 8260B	50 mg/kg
	Benzene	EPA SW-846 Method 8021B or 8260B	10 mg/kg
>100 feet	Chloride***	EPA 300.0 or SM4500 Cl B	20,000 mg/kg
	TPH (GRO+DRO+MRO)	EPA SW-846 Method 8015B	2,500 mg/kg
	BTEX	EPA SW-846 Method 8021B or 8260B	50 mg/kg

V. Work Performed

On Auagust 27, 2019 SESI personnel, together with personnel and equipment from Custom Welding of Hobbs, NM were on site to advance soil testing trenches. Six test trenches locations were designated and flagged in order to delieate the spill area vertically, and horizontally. Soil samples were grabbed at surface and one foot incremnets and field tested for Total Petorleum Hydrocarbons and Chlorides. All soil samples were properly packaged, preserved and transported to Hall Environmental Analysis Laboratory of Albuquerque, NM via chain of custody, and analyzed for TPH(total petroleum hydrocarbons)(Method 8015M), BTEX, and Chlorides (Method SM4500Cl-B). The lab results are recapped in the following table:

Breitburn Operating LP Jalmat #192 Soil Sample Results: Cardinal Laboratories 9-06-2018									
SAMPLE ID	Benzene	Toluene	Ethyl-benzene	Total Xylenes	Total BTEX	Chlorides	TPH GRO	TPH DRO	EXT DRO
TT-1 @ 1ft	ND	ND	ND	ND	ND	3500	ND	ND	ND
TT-1 @ 2ft	ND	ND	ND	ND	ND	2000	ND	ND	ND
TT-1 @ 3ft	ND	ND	ND	ND	ND	250	ND	ND	ND
TT-2 @ Surface	ND	ND	ND	ND	ND	30000	ND	12	57
TT-2 @ 1ft	ND	ND	ND	ND	ND	4700	ND	ND	ND
TT-2 @ 2ft	ND	ND	ND	ND	ND	970	ND	ND	ND
TT-2 @ 3ft	ND	ND	ND	ND	ND	250	ND	ND	ND
TT-3 @ Surface	ND	ND	ND	ND	ND	16000	ND	ND	ND
TT-3 @ 1ft	ND	ND	ND	ND	ND	5800	ND	ND	ND
TT-3 @ 2ft	ND	ND	ND	ND	ND	1300	ND	ND	ND
TT-4 @ Surface	ND	ND	ND	ND	ND	12000	ND	500	400
TT-4 @ 1ft	ND	ND	ND	ND	ND	5500	ND	27	51
TT-4 @ 2ft	ND	ND	ND	ND	ND	1400	ND	ND	ND
TT-5 @ Surface	ND	ND	ND	ND	ND	46000	ND	1300	1900
TT-5 @ 1ft	ND	ND	ND	ND	ND	3200	ND	14	ND
TT-5 @ 2ft	ND	ND	ND	ND	ND	1300	ND	ND	ND
TT-6 @ Surface	ND	ND	ND	ND	ND	66000	ND	790	1400
TT-6 @ 1ft	ND	ND	ND	ND	ND	7600	ND	250	690
TT-6 @ 2ft	ND	ND	ND	ND	ND	1500	ND	ND	ND

VI. Action Plan

The results of the samples listed above indicate no BTEX present in any of the samples. SESI proposes to excavated the pad area, whereby the Recommende Remeidation Levels are < 20,000 ppm for the Chloride Constituency, and < 2,500 ppm for Total Petroleum Hydrocarbons. The pasture are is to be remediated to the extint that Chloride levels are below 600 ppm, or background, and TPH concentrations of less than 100 mg/kg.

The horizontal extent of contamination will be determined by side wall samples to be taken at the time of excavation. Vertical remediation will be documented with bottom soil grab sample laboratory confirmation of RL's. The excavated area in the pasture will be backfilled with uncontaminated soil, and reseeded. All contaminated soil will be transported to an NMOCD approved facility, and documented via disposal manifests. The pad area will be backfilled with like material and returned to grade. Upon completion of all approved remediation activity; all necessary closure documentation will be submitted to the appropriate regulatory agencies, and parties of concern.

VII. Figures & Appendices

Figure 1 - Site Map
Appendix A – C-141
Appendix B – Groundwater
Appendix C – Analytical Results
Appendix D – Photo Documentation

Figure 1
Site Map

Jalmat 192

Site Plan

Legend

- Initial Sample Points
- Oil or Gas Well
- TT=Test Trench
- Spill Area

SP5 @ 1'
TT 6
Oil or Gas Well Jalmat #192
Oil or Gas Well Jalmat #192
TT 5
TT 4
SP1 @ 1'
SP2 @ 1'
TT 3
Oil or Gas Well 75
SP3 @ 1'
SP6 @ 1'
TT 2
SP4 @1'
TT 1

Survey

Google Earth

N

90 ft

Appendix A
C-141

Appendix B
Groundwater

New Mexico Office of the State Engineer

Water Column/Average Depth to Water

(A CLW##### in the POD suffix indicates the POD has been replaced & no longer serves a water right file.)

(R=POD has been replaced, O=orphaned, C=the file is closed)

(quarters are 1=NW 2=NE 3=SW 4=SE)
(quarters are smallest to largest)

(NAD83 UTM in meters)

(In feet)

POD Number	Code	POD Sub-basin	County	Q 64	Q 16	Q 4	Sec	Tws	Rng	X	Y	Depth Well	Depth Water	Water Column
CP 00593 POD1		CP	LE	4	4	06	22S	35E	650422	3587591*		62		
CP 00594 POD1		CP	LE	2	1	34	22S	35E	654553	3580819*		98		
CP 00595 POD1		CP	LE	2	2	20	22S	35E	652089	3584000*		96		
CP 00753		CP	LE	2	2	14	22S	35E	656891	3585687*		215	185	30

Average Depth to Water: **185 feet**

Minimum Depth: **185 feet**

Maximum Depth: **185 feet**

Record Count: 4

PLSS Search:

Township: 22S **Range:** 35E

***UTM location was derived from PLSS - see Help**

Appendix C
Analytical Results

HALL ENVIRONMENTAL ANALYSIS LABORATORY

Hall Environmental Analysis Laboratory
4901 Hawkins NE
Albuquerque, NM 87109
TEL: 505-345-3975 FAX: 505-345-4107
Website: www.hallenvironmental.com

September 06, 2019

Bob Allen

Safety & Environmental Solutions
PO Box 1613
Hobbs, NM 88241
TEL: (575) 397-0510
FAX (575) 393-4388

RE: Maverick Jalmat 192 OrderNo.: 1908G52

Dear Bob Allen:

Hall Environmental Analysis Laboratory received 19 sample(s) on 8/28/2019 for the analyses presented in the following report.

These were analyzed according to EPA procedures or equivalent. To access our accredited tests please go to www.hallenvironmental.com or the state specific web sites. In order to properly interpret your results, it is imperative that you review this report in its entirety. See the sample checklist and/or the Chain of Custody for information regarding the sample receipt temperature and preservation. Data qualifiers or a narrative will be provided if the sample analysis or analytical quality control parameters require a flag. When necessary, data qualifiers are provided on both the sample analysis report and the QC summary report, both sections should be reviewed. All samples are reported, as received, unless otherwise indicated. Lab measurement of analytes considered field parameters that require analysis within 15 minutes of sampling such as pH and residual chlorine are qualified as being analyzed outside of the recommended holding time.

Please don't hesitate to contact HEAL for any additional information or clarifications.

ADHS Cert #AZ0682 -- NMED-DWB Cert #NM9425 -- NMED-Micro Cert #NM0901

Sincerely,

Andy Freeman
Laboratory Manager
4901 Hawkins NE
Albuquerque, NM 87109

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-1 1ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 8:30:00 AM
Lab ID: 1908G52-001 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	3500	150		mg/Kg	50	9/5/2019 2:52:26 AM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **JME**	
Diesel Range Organics (DRO)	ND	9.2		mg/Kg	1	8/30/2019 9:43:00 PM	47154
Motor Oil Range Organics (MRO)	ND	46		mg/Kg	1	8/30/2019 9:43:00 PM	47154
Surr: DNOP	94.0	70-130		%Rec	1	8/30/2019 9:43:00 PM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.9		mg/Kg	1	8/29/2019 7:01:25 PM	47144
Surr: BFB	98.0	77.4-118		%Rec	1	8/29/2019 7:01:25 PM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.025		mg/Kg	1	8/29/2019 7:01:25 PM	47144
Toluene	ND	0.049		mg/Kg	1	8/29/2019 7:01:25 PM	47144
Ethylbenzene	ND	0.049		mg/Kg	1	8/29/2019 7:01:25 PM	47144
Xylenes, Total	ND	0.098		mg/Kg	1	8/29/2019 7:01:25 PM	47144
Surr: 4-Bromofluorobenzene	99.7	80-120		%Rec	1	8/29/2019 7:01:25 PM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-1 2ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 8:45:00 AM
Lab ID: 1908G52-002 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	2000	60		mg/Kg	20	9/5/2019 3:29:28 AM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **JME**	
Diesel Range Organics (DRO)	ND	9.7		mg/Kg	1	8/30/2019 10:56:33 PM	47154
Motor Oil Range Organics (MRO)	ND	48		mg/Kg	1	8/30/2019 10:56:33 PM	47154
Surr: DNOP	84.9	70-130		%Rec	1	8/30/2019 10:56:33 PM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.9		mg/Kg	1	8/29/2019 8:11:41 PM	47144
Surr: BFB	90.2	77.4-118		%Rec	1	8/29/2019 8:11:41 PM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.024		mg/Kg	1	8/29/2019 8:11:41 PM	47144
Toluene	ND	0.049		mg/Kg	1	8/29/2019 8:11:41 PM	47144
Ethylbenzene	ND	0.049		mg/Kg	1	8/29/2019 8:11:41 PM	47144
Xylenes, Total	ND	0.098		mg/Kg	1	8/29/2019 8:11:41 PM	47144
Surr: 4-Bromofluorobenzene	91.0	80-120		%Rec	1	8/29/2019 8:11:41 PM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-1 3ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 9:00:00 AM
Lab ID: 1908G52-003 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	250	60		mg/Kg	20	9/5/2019 3:41:48 AM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **JME**	
Diesel Range Organics (DRO)	ND	9.3		mg/Kg	1	8/30/2019 11:21:08 PM	47154
Motor Oil Range Organics (MRO)	ND	47		mg/Kg	1	8/30/2019 11:21:08 PM	47154
Surr: DNOP	86.7	70-130		%Rec	1	8/30/2019 11:21:08 PM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.8		mg/Kg	1	8/29/2019 8:35:05 PM	47144
Surr: BFB	94.5	77.4-118		%Rec	1	8/29/2019 8:35:05 PM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.024		mg/Kg	1	8/29/2019 8:35:05 PM	47144
Toluene	ND	0.048		mg/Kg	1	8/29/2019 8:35:05 PM	47144
Ethylbenzene	ND	0.048		mg/Kg	1	8/29/2019 8:35:05 PM	47144
Xylenes, Total	ND	0.097		mg/Kg	1	8/29/2019 8:35:05 PM	47144
Surr: 4-Bromofluorobenzene	95.1	80-120		%Rec	1	8/29/2019 8:35:05 PM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-2 Surface
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 9:15:00 AM
Lab ID: 1908G52-004 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	30000	1500		mg/Kg	500	9/5/2019 1:40:16 PM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **BRM**	
Diesel Range Organics (DRO)	12	9.9		mg/Kg	1	8/30/2019 1:46:09 PM	47154
Motor Oil Range Organics (MRO)	57	49		mg/Kg	1	8/30/2019 1:46:09 PM	47154
Surr: DNOP	98.3	70-130		%Rec	1	8/30/2019 1:46:09 PM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	5.0		mg/Kg	1	8/29/2019 8:58:34 PM	47144
Surr: BFB	89.0	77.4-118		%Rec	1	8/29/2019 8:58:34 PM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.025		mg/Kg	1	8/29/2019 8:58:34 PM	47144
Toluene	ND	0.050		mg/Kg	1	8/29/2019 8:58:34 PM	47144
Ethylbenzene	ND	0.050		mg/Kg	1	8/29/2019 8:58:34 PM	47144
Xylenes, Total	ND	0.10		mg/Kg	1	8/29/2019 8:58:34 PM	47144
Surr: 4-Bromofluorobenzene	90.2	80-120		%Rec	1	8/29/2019 8:58:34 PM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-2 1ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 9:20:00 AM
Lab ID: 1908G52-005 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CJS**	
Chloride	4700	150		mg/Kg	50	9/5/2019 12:59:28 PM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **JME**	
Diesel Range Organics (DRO)	ND	9.9		mg/Kg	1	8/30/2019 11:45:34 PM	47154
Motor Oil Range Organics (MRO)	ND	49		mg/Kg	1	8/30/2019 11:45:34 PM	47154
Surr: DNOP	91.7	70-130		%Rec	1	8/30/2019 11:45:34 PM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	5.0		mg/Kg	1	8/29/2019 9:21:57 PM	47144
Surr: BFB	98.9	77.4-118		%Rec	1	8/29/2019 9:21:57 PM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.025		mg/Kg	1	8/29/2019 9:21:57 PM	47144
Toluene	ND	0.050		mg/Kg	1	8/29/2019 9:21:57 PM	47144
Ethylbenzene	ND	0.050		mg/Kg	1	8/29/2019 9:21:57 PM	47144
Xylenes, Total	ND	0.099		mg/Kg	1	8/29/2019 9:21:57 PM	47144
Surr: 4-Bromofluorobenzene	100	80-120		%Rec	1	8/29/2019 9:21:57 PM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-2 2ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 9:35:00 AM
Lab ID: 1908G52-006 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	970	60		mg/Kg	20	9/5/2019 4:43:30 AM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **JME**	
Diesel Range Organics (DRO)	ND	9.8		mg/Kg	1	8/31/2019 12:10:01 AM	47154
Motor Oil Range Organics (MRO)	ND	49		mg/Kg	1	8/31/2019 12:10:01 AM	47154
Surr: DNOP	86.6	70-130		%Rec	1	8/31/2019 12:10:01 AM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.9		mg/Kg	1	8/29/2019 9:45:22 PM	47144
Surr: BFB	90.4	77.4-118		%Rec	1	8/29/2019 9:45:22 PM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.025		mg/Kg	1	8/29/2019 9:45:22 PM	47144
Toluene	ND	0.049		mg/Kg	1	8/29/2019 9:45:22 PM	47144
Ethylbenzene	ND	0.049		mg/Kg	1	8/29/2019 9:45:22 PM	47144
Xylenes, Total	ND	0.098		mg/Kg	1	8/29/2019 9:45:22 PM	47144
Surr: 4-Bromofluorobenzene	92.0	80-120		%Rec	1	8/29/2019 9:45:22 PM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-2 3ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 9:45:00 AM
Lab ID: 1908G52-007 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	250	60		mg/Kg	20	9/5/2019 4:55:50 AM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **JME**	
Diesel Range Organics (DRO)	ND	9.5		mg/Kg	1	8/31/2019 12:34:31 AM	47154
Motor Oil Range Organics (MRO)	ND	47		mg/Kg	1	8/31/2019 12:34:31 AM	47154
Surr: DNOP	87.6	70-130		%Rec	1	8/31/2019 12:34:31 AM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.9		mg/Kg	1	8/29/2019 10:56:03 PM	47144
Surr: BFB	94.5	77.4-118		%Rec	1	8/29/2019 10:56:03 PM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.025		mg/Kg	1	8/29/2019 10:56:03 PM	47144
Toluene	ND	0.049		mg/Kg	1	8/29/2019 10:56:03 PM	47144
Ethylbenzene	ND	0.049		mg/Kg	1	8/29/2019 10:56:03 PM	47144
Xylenes, Total	ND	0.098		mg/Kg	1	8/29/2019 10:56:03 PM	47144
Surr: 4-Bromofluorobenzene	94.7	80-120		%Rec	1	8/29/2019 10:56:03 PM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-3 Surface
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 9:50:00 AM
Lab ID: 1908G52-008 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	16000	1500		mg/Kg	500	9/5/2019 1:52:41 PM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **JME**	
Diesel Range Organics (DRO)	ND	9.9		mg/Kg	1	8/31/2019 12:58:59 AM	47154
Motor Oil Range Organics (MRO)	ND	50		mg/Kg	1	8/31/2019 12:58:59 AM	47154
Surr: DNOP	90.2	70-130		%Rec	1	8/31/2019 12:58:59 AM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.8		mg/Kg	1	8/29/2019 11:19:50 PM	47144
Surr: BFB	90.9	77.4-118		%Rec	1	8/29/2019 11:19:50 PM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.024		mg/Kg	1	8/29/2019 11:19:50 PM	47144
Toluene	ND	0.048		mg/Kg	1	8/29/2019 11:19:50 PM	47144
Ethylbenzene	ND	0.048		mg/Kg	1	8/29/2019 11:19:50 PM	47144
Xylenes, Total	ND	0.097		mg/Kg	1	8/29/2019 11:19:50 PM	47144
Surr: 4-Bromofluorobenzene	92.4	80-120		%Rec	1	8/29/2019 11:19:50 PM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-3 1ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 9:55:00 AM
Lab ID: 1908G52-009 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	5800	300		mg/Kg	100	9/5/2019 1:15:28 PM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **JME**	
Diesel Range Organics (DRO)	ND	10		mg/Kg	1	8/31/2019 1:23:28 AM	47154
Motor Oil Range Organics (MRO)	ND	50		mg/Kg	1	8/31/2019 1:23:28 AM	47154
Surr: DNOP	94.0	70-130		%Rec	1	8/31/2019 1:23:28 AM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.8		mg/Kg	1	8/29/2019 11:43:32 PM	47144
Surr: BFB	92.6	77.4-118		%Rec	1	8/29/2019 11:43:32 PM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.024		mg/Kg	1	8/29/2019 11:43:32 PM	47144
Toluene	ND	0.048		mg/Kg	1	8/29/2019 11:43:32 PM	47144
Ethylbenzene	ND	0.048		mg/Kg	1	8/29/2019 11:43:32 PM	47144
Xylenes, Total	ND	0.096		mg/Kg	1	8/29/2019 11:43:32 PM	47144
Surr: 4-Bromofluorobenzene	94.1	80-120		%Rec	1	8/29/2019 11:43:32 PM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-3 2ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 10:05:00 AM
Lab ID: 1908G52-010 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	1300	60		mg/Kg	20	9/5/2019 5:32:52 AM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **JME**	
Diesel Range Organics (DRO)	ND	9.7		mg/Kg	1	8/31/2019 1:47:53 AM	47154
Motor Oil Range Organics (MRO)	ND	49		mg/Kg	1	8/31/2019 1:47:53 AM	47154
Surr: DNOP	91.4	70-130		%Rec	1	8/31/2019 1:47:53 AM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	5.0		mg/Kg	1	8/30/2019 12:07:11 AM	47144
Surr: BFB	93.6	77.4-118		%Rec	1	8/30/2019 12:07:11 AM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.025		mg/Kg	1	8/30/2019 12:07:11 AM	47144
Toluene	ND	0.050		mg/Kg	1	8/30/2019 12:07:11 AM	47144
Ethylbenzene	ND	0.050		mg/Kg	1	8/30/2019 12:07:11 AM	47144
Xylenes, Total	ND	0.099		mg/Kg	1	8/30/2019 12:07:11 AM	47144
Surr: 4-Bromofluorobenzene	94.6	80-120		%Rec	1	8/30/2019 12:07:11 AM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-4 Surface
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 10:15:00 AM
Lab ID: 1908G52-011 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	12000	600		mg/Kg	200	9/5/2019 2:17:29 PM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **BRM**	
Diesel Range Organics (DRO)	500	9.8		mg/Kg	1	8/30/2019 2:27:47 PM	47154
Motor Oil Range Organics (MRO)	400	49		mg/Kg	1	8/30/2019 2:27:47 PM	47154
Surr: DNOP	114	70-130		%Rec	1	8/30/2019 2:27:47 PM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.7		mg/Kg	1	8/30/2019 12:30:46 AM	47144
Surr: BFB	97.6	77.4-118		%Rec	1	8/30/2019 12:30:46 AM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.024		mg/Kg	1	8/30/2019 12:30:46 AM	47144
Toluene	ND	0.047		mg/Kg	1	8/30/2019 12:30:46 AM	47144
Ethylbenzene	ND	0.047		mg/Kg	1	8/30/2019 12:30:46 AM	47144
Xylenes, Total	ND	0.095		mg/Kg	1	8/30/2019 12:30:46 AM	47144
Surr: 4-Bromofluorobenzene	98.3	80-120		%Rec	1	8/30/2019 12:30:46 AM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-4 1ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 10:35:00 AM
Lab ID: 1908G52-012 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	5500	300		mg/Kg	100	9/5/2019 1:27:52 PM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **BRM**	
Diesel Range Organics (DRO)	27	9.8		mg/Kg	1	8/30/2019 2:03:17 PM	47154
Motor Oil Range Organics (MRO)	51	49		mg/Kg	1	8/30/2019 2:03:17 PM	47154
Surr: DNOP	113	70-130		%Rec	1	8/30/2019 2:03:17 PM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.8		mg/Kg	1	8/30/2019 12:54:24 AM	47144
Surr: BFB	91.9	77.4-118		%Rec	1	8/30/2019 12:54:24 AM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.024		mg/Kg	1	8/30/2019 12:54:24 AM	47144
Toluene	ND	0.048		mg/Kg	1	8/30/2019 12:54:24 AM	47144
Ethylbenzene	ND	0.048		mg/Kg	1	8/30/2019 12:54:24 AM	47144
Xylenes, Total	ND	0.097		mg/Kg	1	8/30/2019 12:54:24 AM	47144
Surr: 4-Bromofluorobenzene	91.7	80-120		%Rec	1	8/30/2019 12:54:24 AM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-4 2ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 10:45:00 AM
Lab ID: 1908G52-013 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	1400	60		mg/Kg	20	9/5/2019 6:09:54 AM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **JME**	
Diesel Range Organics (DRO)	ND	10		mg/Kg	1	8/31/2019 2:12:18 AM	47154
Motor Oil Range Organics (MRO)	ND	50		mg/Kg	1	8/31/2019 2:12:18 AM	47154
Surr: DNOP	99.2	70-130		%Rec	1	8/31/2019 2:12:18 AM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.8		mg/Kg	1	8/30/2019 1:18:03 AM	47144
Surr: BFB	91.3	77.4-118		%Rec	1	8/30/2019 1:18:03 AM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.024		mg/Kg	1	8/30/2019 1:18:03 AM	47144
Toluene	ND	0.048		mg/Kg	1	8/30/2019 1:18:03 AM	47144
Ethylbenzene	ND	0.048		mg/Kg	1	8/30/2019 1:18:03 AM	47144
Xylenes, Total	ND	0.096		mg/Kg	1	8/30/2019 1:18:03 AM	47144
Surr: 4-Bromofluorobenzene	91.5	80-120		%Rec	1	8/30/2019 1:18:03 AM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-5 Surface
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 10:55:00 AM
Lab ID: 1908G52-014 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	46000	1500		mg/Kg	500	9/5/2019 2:05:05 PM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **BRM**	
Diesel Range Organics (DRO)	1300	95		mg/Kg	10	8/30/2019 4:22:46 PM	47154
Motor Oil Range Organics (MRO)	1900	470		mg/Kg	10	8/30/2019 4:22:46 PM	47154
Surr: DNOP	0	70-130	S	%Rec	10	8/30/2019 4:22:46 PM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.9		mg/Kg	1	8/30/2019 1:41:46 AM	47144
Surr: BFB	90.8	77.4-118		%Rec	1	8/30/2019 1:41:46 AM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.024		mg/Kg	1	8/30/2019 1:41:46 AM	47144
Toluene	ND	0.049		mg/Kg	1	8/30/2019 1:41:46 AM	47144
Ethylbenzene	ND	0.049		mg/Kg	1	8/30/2019 1:41:46 AM	47144
Xylenes, Total	ND	0.098		mg/Kg	1	8/30/2019 1:41:46 AM	47144
Surr: 4-Bromofluorobenzene	91.4	80-120		%Rec	1	8/30/2019 1:41:46 AM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-5 1ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 11:10:00 AM
Lab ID: 1908G52-015 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	3200	150		mg/Kg	50	9/5/2019 1:03:03 PM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **JME**	
Diesel Range Organics (DRO)	14	9.1		mg/Kg	1	8/30/2019 10:40:39 AM	47154
Motor Oil Range Organics (MRO)	ND	46		mg/Kg	1	8/30/2019 10:40:39 AM	47154
Surr: DNOP	108	70-130		%Rec	1	8/30/2019 10:40:39 AM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.8		mg/Kg	1	8/30/2019 2:05:21 AM	47144
Surr: BFB	103	77.4-118		%Rec	1	8/30/2019 2:05:21 AM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.024		mg/Kg	1	8/30/2019 2:05:21 AM	47144
Toluene	ND	0.048		mg/Kg	1	8/30/2019 2:05:21 AM	47144
Ethylbenzene	ND	0.048		mg/Kg	1	8/30/2019 2:05:21 AM	47144
Xylenes, Total	ND	0.097		mg/Kg	1	8/30/2019 2:05:21 AM	47144
Surr: 4-Bromofluorobenzene	105	80-120		%Rec	1	8/30/2019 2:05:21 AM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-5 2ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 11:25:00 AM
Lab ID: 1908G52-016 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CAS**	
Chloride	1300	59		mg/Kg	20	9/5/2019 1:26:01 AM	47249
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **JME**	
Diesel Range Organics (DRO)	ND	9.0		mg/Kg	1	8/31/2019 2:36:45 AM	47154
Motor Oil Range Organics (MRO)	ND	45		mg/Kg	1	8/31/2019 2:36:45 AM	47154
Surr: DNOP	98.0	70-130		%Rec	1	8/31/2019 2:36:45 AM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.9		mg/Kg	1	8/30/2019 2:29:06 AM	47144
Surr: BFB	97.3	77.4-118		%Rec	1	8/30/2019 2:29:06 AM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.025		mg/Kg	1	8/30/2019 2:29:06 AM	47144
Toluene	ND	0.049		mg/Kg	1	8/30/2019 2:29:06 AM	47144
Ethylbenzene	ND	0.049		mg/Kg	1	8/30/2019 2:29:06 AM	47144
Xylenes, Total	ND	0.099		mg/Kg	1	8/30/2019 2:29:06 AM	47144
Surr: 4-Bromofluorobenzene	97.8	80-120		%Rec	1	8/30/2019 2:29:06 AM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-6 Surface
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 11:35:00 AM
Lab ID: 1908G52-017 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CJS**	
Chloride	66000	3000		mg/Kg	1E+	9/5/2019 12:47:03 PM	47268
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **BRM**	
Diesel Range Organics (DRO)	790	95		mg/Kg	10	8/30/2019 5:07:07 PM	47154
Motor Oil Range Organics (MRO)	1400	480		mg/Kg	10	8/30/2019 5:07:07 PM	47154
Surr: DNOP	0	70-130	S	%Rec	10	8/30/2019 5:07:07 PM	47154
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	5.0		mg/Kg	1	8/30/2019 3:16:47 AM	47144
Surr: BFB	90.3	77.4-118		%Rec	1	8/30/2019 3:16:47 AM	47144
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.025		mg/Kg	1	8/30/2019 3:16:47 AM	47144
Toluene	ND	0.050		mg/Kg	1	8/30/2019 3:16:47 AM	47144
Ethylbenzene	ND	0.050		mg/Kg	1	8/30/2019 3:16:47 AM	47144
Xylenes, Total	ND	0.099		mg/Kg	1	8/30/2019 3:16:47 AM	47144
Surr: 4-Bromofluorobenzene	89.3	80-120		%Rec	1	8/30/2019 3:16:47 AM	47144

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-6 1ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 11:50:00 AM
Lab ID: 1908G52-018 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CJS**	
Chloride	7600	300		mg/Kg	100	9/5/2019 12:09:49 PM	47268
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **BRM**	
Diesel Range Organics (DRO)	250	98		mg/Kg	10	9/5/2019 9:36:03 AM	47187
Motor Oil Range Organics (MRO)	690	490		mg/Kg	10	9/5/2019 9:36:03 AM	47187
Surr: DNOP	0	70-130	S	%Rec	10	9/5/2019 9:36:03 AM	47187
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.8		mg/Kg	1	8/30/2019 9:52:01 PM	47173
Surr: BFB	88.2	77.4-118		%Rec	1	8/30/2019 9:52:01 PM	47173
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.024		mg/Kg	1	8/30/2019 9:52:01 PM	47173
Toluene	ND	0.048		mg/Kg	1	8/30/2019 9:52:01 PM	47173
Ethylbenzene	ND	0.048		mg/Kg	1	8/30/2019 9:52:01 PM	47173
Xylenes, Total	ND	0.095		mg/Kg	1	8/30/2019 9:52:01 PM	47173
Surr: 4-Bromofluorobenzene	90.5	80-120		%Rec	1	8/30/2019 9:52:01 PM	47173

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Safety & Environmental Solutions
Client Sample ID: TT-6 2ft.
Project: Maverick Jalmat 192
Collection Date: 8/27/2019 12:10:00 PM
Lab ID: 1908G52-019 **Matrix:** SOIL
Received Date: 8/28/2019 8:45:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **CJS**	
Chloride	1500	60		mg/Kg	20	9/4/2019 7:22:13 PM	47268
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **BRM**	
Diesel Range Organics (DRO)	ND	9.6		mg/Kg	1	9/3/2019 10:14:30 AM	47187
Motor Oil Range Organics (MRO)	ND	48		mg/Kg	1	9/3/2019 10:14:30 AM	47187
Surr: DNOP	105	70-130		%Rec	1	9/3/2019 10:14:30 AM	47187
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.9		mg/Kg	1	8/30/2019 11:02:53 PM	47173
Surr: BFB	92.6	77.4-118		%Rec	1	8/30/2019 11:02:53 PM	47173
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.024		mg/Kg	1	8/30/2019 11:02:53 PM	47173
Toluene	ND	0.049		mg/Kg	1	8/30/2019 11:02:53 PM	47173
Ethylbenzene	ND	0.049		mg/Kg	1	8/30/2019 11:02:53 PM	47173
Xylenes, Total	ND	0.097		mg/Kg	1	8/30/2019 11:02:53 PM	47173
Surr: 4-Bromofluorobenzene	93.5	80-120		%Rec	1	8/30/2019 11:02:53 PM	47173

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
D	Sample Diluted Due to Matrix	E	Value above quantitation range
H	Holding times for preparation or analysis exceeded	J	Analyte detected below quantitation limits
ND	Not Detected at the Reporting Limit	P	Sample pH Not In Range
PQL	Practical Quanitative Limit	RL	Reporting Limit
S	% Recovery outside of range due to dilution or matrix		

QC SUMMARY REPORT
Hall Environmental Analysis Laboratory, Inc.

WO#: **1908G52**
06-Sep-19

Client: Safety & Environmental Solutions
Project: Maverick Jalmat 192

Sample ID: **MB-47268**	SampType: **mblk**	TestCode: **EPA Method 300.0: Anions**
Client ID: **PBS**	Batch ID: **47268**	RunNo: **62664**
Prep Date: **9/4/2019**	Analysis Date: **9/4/2019**	SeqNo: **2133793** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Chloride	ND	1.5								

Sample ID: **LCS-47268**	SampType: **lcs**	TestCode: **EPA Method 300.0: Anions**
Client ID: **LCSS**	Batch ID: **47268**	RunNo: **62664**
Prep Date: **9/4/2019**	Analysis Date: **9/4/2019**	SeqNo: **2133794** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Chloride	15	1.5	15.00	0	101	90	110			

Qualifiers:

*	Value exceeds Maximum Contaminant Level.
D	Sample Diluted Due to Matrix
H	Holding times for preparation or analysis exceeded
ND	Not Detected at the Reporting Limit
PQL	Practical Quanitative Limit
S	% Recovery outside of range due to dilution or matrix
B	Analyte detected in the associated Method Blank
E	Value above quantitation range
J	Analyte detected below quantitation limits
P	Sample pH Not In Range
RL	Reporting Limit

QC SUMMARY REPORT
Hall Environmental Analysis Laboratory, Inc.

WO#: **1908G52**
06-Sep-19

Client: Safety & Environmental Solutions
Project: Maverick Jalmat 192

Sample ID: **MB-47154** SampType: **MBLK** TestCode: **EPA Method 8015M/D: Diesel Range Organics**
Client ID: **PBS** Batch ID: **47154** RunNo: **62583**
Prep Date: **8/29/2019** Analysis Date: **8/30/2019** SeqNo: **2129832** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	ND	10								
Motor Oil Range Organics (MRO)	ND	50								
Surr: DNOP	9.4		10.00		93.6	70	130			

Sample ID: **LCS-47154** SampType: **LCS** TestCode: **EPA Method 8015M/D: Diesel Range Organics**
Client ID: **LCSS** Batch ID: **47154** RunNo: **62583**
Prep Date: **8/29/2019** Analysis Date: **8/30/2019** SeqNo: **2129834** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	45	10	50.00	0	90.8	63.9	124			
Surr: DNOP	4.5		5.000		89.3	70	130			

Sample ID: **1908G52-001AMS** SampType: **MS** TestCode: **EPA Method 8015M/D: Diesel Range Organics**
Client ID: **TT-1 1ft.** Batch ID: **47154** RunNo: **62583**
Prep Date: **8/29/2019** Analysis Date: **8/30/2019** SeqNo: **2129839** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	41	10	49.95	0	83.0	57	142			
Surr: DNOP	4.2		4.995		84.9	70	130			

Sample ID: **1908G52-001AMSD** SampType: **MSD** TestCode: **EPA Method 8015M/D: Diesel Range Organics**
Client ID: **TT-1 1ft.** Batch ID: **47154** RunNo: **62583**
Prep Date: **8/29/2019** Analysis Date: **8/30/2019** SeqNo: **2129841** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	40	9.4	46.95	0	84.2	57	142	4.69	20	
Surr: DNOP	4.2		4.695		88.7	70	130	0	0	

Sample ID: **LCS-47187** SampType: **LCS** TestCode: **EPA Method 8015M/D: Diesel Range Organics**
Client ID: **LCSS** Batch ID: **47187** RunNo: **62625**
Prep Date: **8/30/2019** Analysis Date: **9/3/2019** SeqNo: **2131974** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	52	10	50.00	0	104	63.9	124			
Surr: DNOP	4.8		5.000		95.3	70	130			

Qualifiers:

*	Value exceeds Maximum Contaminant Level.
D	Sample Diluted Due to Matrix
H	Holding times for preparation or analysis exceeded
ND	Not Detected at the Reporting Limit
PQL	Practical Quanitative Limit
S	% Recovery outside of range due to dilution or matrix
B	Analyte detected in the associated Method Blank
E	Value above quantitation range
J	Analyte detected below quantitation limits
P	Sample pH Not In Range
RL	Reporting Limit

QC SUMMARY REPORT
Hall Environmental Analysis Laboratory, Inc.

WO#: **1908G52**
06-Sep-19

Client: Safety & Environmental Solutions
Project: Maverick Jalmat 192

Sample ID: **MB-47187**	SampType: **MBLK**	TestCode: **EPA Method 8015M/D: Diesel Range Organics**
Client ID: **PBS**	Batch ID: **47187**	RunNo: **62625**
Prep Date: **8/30/2019**	Analysis Date: **9/3/2019**	SeqNo: **2131975** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	ND	10								
Motor Oil Range Organics (MRO)	ND	50								
Surr: DNOP	12		10.00		116	70	130			

Sample ID: **LCS-47254**	SampType: **LCS**	TestCode: **EPA Method 8015M/D: Diesel Range Organics**
Client ID: **LCSS**	Batch ID: **47254**	RunNo: **62660**
Prep Date: **9/4/2019**	Analysis Date: **9/5/2019**	SeqNo: **2133502** Units: **%Rec**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Surr: DNOP	4.3		5.000		86.6	70	130			

Sample ID: **MB-47254**	SampType: **MBLK**	TestCode: **EPA Method 8015M/D: Diesel Range Organics**
Client ID: **PBS**	Batch ID: **47254**	RunNo: **62660**
Prep Date: **9/4/2019**	Analysis Date: **9/5/2019**	SeqNo: **2133503** Units: **%Rec**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Surr: DNOP	10		10.00		101	70	130			

Qualifiers:

*	Value exceeds Maximum Contaminant Level.
D	Sample Diluted Due to Matrix
H	Holding times for preparation or analysis exceeded
ND	Not Detected at the Reporting Limit
PQL	Practical Quanitative Limit
S	% Recovery outside of range due to dilution or matrix
B	Analyte detected in the associated Method Blank
E	Value above quantitation range
J	Analyte detected below quantitation limits
P	Sample pH Not In Range
RL	Reporting Limit

QC SUMMARY REPORT
Hall Environmental Analysis Laboratory, Inc.

WO#: **1908G52**
06-Sep-19

Client: Safety & Environmental Solutions
Project: Maverick Jalmat 192

Sample ID: **MB-47144**	SampType: **MBLK**	TestCode: **EPA Method 8015D: Gasoline Range**							
Client ID: **PBS**	Batch ID: **47144**	RunNo: **62533**							
Prep Date: **8/28/2019**	Analysis Date: **8/29/2019**	SeqNo: **2127343**	Units: **mg/Kg**						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	ND	5.0								
Surr: BFB	980		1000		97.6	77.4	118			

Sample ID: **LCS-47144**	SampType: **LCS**	TestCode: **EPA Method 8015D: Gasoline Range**							
Client ID: **LCSS**	Batch ID: **47144**	RunNo: **62533**							
Prep Date: **8/28/2019**	Analysis Date: **8/29/2019**	SeqNo: **2127344**	Units: **mg/Kg**						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	21	5.0	25.00	0	85.0	80	120			
Surr: BFB	1000		1000		103	77.4	118			

Sample ID: **MB-47173**	SampType: **MBLK**	TestCode: **EPA Method 8015D: Gasoline Range**							
Client ID: **PBS**	Batch ID: **47173**	RunNo: **62566**							
Prep Date: **8/29/2019**	Analysis Date: **8/30/2019**	SeqNo: **2129020**	Units: **mg/Kg**						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	ND	5.0								
Surr: BFB	910		1000		90.9	77.4	118			

Sample ID: **LCS-47173**	SampType: **LCS**	TestCode: **EPA Method 8015D: Gasoline Range**							
Client ID: **LCSS**	Batch ID: **47173**	RunNo: **62566**							
Prep Date: **8/29/2019**	Analysis Date: **8/30/2019**	SeqNo: **2129021**	Units: **mg/Kg**						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	21	5.0	25.00	0	86.0	80	120			
Surr: BFB	1000		1000		100	77.4	118			

Sample ID: **1908G52-018AMS**	SampType: **MS**	TestCode: **EPA Method 8015D: Gasoline Range**							
Client ID: **TT-6 1ft.**	Batch ID: **47173**	RunNo: **62566**							
Prep Date: **8/29/2019**	Analysis Date: **8/30/2019**	SeqNo: **2129029**	Units: **mg/Kg**						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	23	4.9	24.53	0	93.3	69.1	142			
Surr: BFB	1000		981.4		102	77.4	118			

Sample ID: **1908G52-018AMSD**	SampType: **MSD**	TestCode: **EPA Method 8015D: Gasoline Range**							
Client ID: **TT-6 1ft.**	Batch ID: **47173**	RunNo: **62566**							
Prep Date: **8/29/2019**	Analysis Date: **8/30/2019**	SeqNo: **2129030**	Units: **mg/Kg**						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual

Qualifiers:

*	Value exceeds Maximum Contaminant Level.
D	Sample Diluted Due to Matrix
H	Holding times for preparation or analysis exceeded
ND	Not Detected at the Reporting Limit
PQL	Practical Quanitative Limit
S	% Recovery outside of range due to dilution or matrix
B	Analyte detected in the associated Method Blank
E	Value above quantitation range
J	Analyte detected below quantitation limits
P	Sample pH Not In Range
RL	Reporting Limit

QC SUMMARY REPORT
Hall Environmental Analysis Laboratory, Inc.

WO#: **1908G52**
06-Sep-19

Client: Safety & Environmental Solutions
Project: Maverick Jalmat 192

Sample ID: **1908G52-018AMSD** SampType: **MSD** TestCode: **EPA Method 8015D: Gasoline Range**
Client ID: **TT-6 1ft.** Batch ID: **47173** RunNo: **62566**
Prep Date: **8/29/2019** Analysis Date: **8/30/2019** SeqNo: **2129030** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	24	4.9	24.65	0	98.0	69.1	142	5.34	20	
Surr: BFB	1100		986.2		109	77.4	118	0	0	

Qualifiers:

*	Value exceeds Maximum Contaminant Level.
D	Sample Diluted Due to Matrix
H	Holding times for preparation or analysis exceeded
ND	Not Detected at the Reporting Limit
PQL	Practical Quanitative Limit
S	% Recovery outside of range due to dilution or matrix
B	Analyte detected in the associated Method Blank
E	Value above quantitation range
J	Analyte detected below quantitation limits
P	Sample pH Not In Range
RL	Reporting Limit

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1908G52**

06-Sep-19

Client: Safety & Environmental Solutions

Project: Maverick Jalmat 192

Sample ID: **MB-47144** SampType: **MBLK** TestCode: **EPA Method 8021B: Volatiles**

Client ID: **PBS** Batch ID: **47144** RunNo: **62533**

Prep Date: **8/28/2019** Analysis Date: **8/29/2019** SeqNo: **2127381** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	ND	0.025								
Toluene	ND	0.050								
Ethylbenzene	ND	0.050								
Xylenes, Total	ND	0.10								
Surr: 4-Bromofluorobenzene	0.99		1.000		98.9	80	120			

Sample ID: **LCS-47144** SampType: **LCS** TestCode: **EPA Method 8021B: Volatiles**

Client ID: **LCSS** Batch ID: **47144** RunNo: **62533**

Prep Date: **8/28/2019** Analysis Date: **8/29/2019** SeqNo: **2127382** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	0.95	0.025	1.000	0	95.0	80	120			
Toluene	1.0	0.050	1.000	0	100	80	120			
Ethylbenzene	1.0	0.050	1.000	0	100	80	120			
Xylenes, Total	3.1	0.10	3.000	0	102	80	120			
Surr: 4-Bromofluorobenzene	0.97		1.000		97.1	80	120			

Sample ID: **1908G52-001AMS** SampType: **MS** TestCode: **EPA Method 8021B: Volatiles**

Client ID: **TT-1 1ft.** Batch ID: **47144** RunNo: **62533**

Prep Date: **8/28/2019** Analysis Date: **8/29/2019** SeqNo: **2127384** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	1.0	0.025	0.9950	0	102	76	123			
Toluene	1.1	0.050	0.9950	0.009547	107	80.3	127			
Ethylbenzene	1.1	0.050	0.9950	0	111	80.2	131			
Xylenes, Total	3.3	0.10	2.985	0	111	78	133			
Surr: 4-Bromofluorobenzene	0.95		0.9950		95.1	80	120			

Sample ID: **1908G52-001AMSD** SampType: **MSD** TestCode: **EPA Method 8021B: Volatiles**

Client ID: **TT-1 1ft.** Batch ID: **47144** RunNo: **62533**

Prep Date: **8/28/2019** Analysis Date: **8/29/2019** SeqNo: **2127385** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	1.0	0.025	0.9833	0	103	76	123	0.666	20	
Toluene	1.1	0.049	0.9833	0.009547	111	80.3	127	2.13	20	
Ethylbenzene	1.1	0.049	0.9833	0	114	80.2	131	1.20	20	
Xylenes, Total	3.4	0.098	2.950	0	115	78	133	1.96	20	
Surr: 4-Bromofluorobenzene	0.96		0.9833		97.6	80	120	0	0	

Qualifiers:

*	Value exceeds Maximum Contaminant Level.
D	Sample Diluted Due to Matrix
H	Holding times for preparation or analysis exceeded
ND	Not Detected at the Reporting Limit
PQL	Practical Quanitative Limit
S	% Recovery outside of range due to dilution or matrix
B	Analyte detected in the associated Method Blank
E	Value above quantitation range
J	Analyte detected below quantitation limits
P	Sample pH Not In Range
RL	Reporting Limit

QC SUMMARY REPORT
Hall Environmental Analysis Laboratory, Inc.

WO#: **1908G52**
06-Sep-19

Client: Safety & Environmental Solutions
Project: Maverick Jalmat 192

Sample ID: **MB-47173** SampType: **MBLK** TestCode: **EPA Method 8021B: Volatiles**
Client ID: **PBS** Batch ID: **47173** RunNo: **62566**
Prep Date: **8/29/2019** Analysis Date: **8/30/2019** SeqNo: **2129059** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	ND	0.025								
Toluene	ND	0.050								
Ethylbenzene	ND	0.050								
Xylenes, Total	ND	0.10								
Surr: 4-Bromofluorobenzene	0.92		1.000		92.0	80	120			

Sample ID: **LCS-47173** SampType: **LCS** TestCode: **EPA Method 8021B: Volatiles**
Client ID: **LCSS** Batch ID: **47173** RunNo: **62566**
Prep Date: **8/29/2019** Analysis Date: **8/30/2019** SeqNo: **2129060** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	1.0	0.025	1.000	0	100	80	120			
Toluene	1.0	0.050	1.000	0	103	80	120			
Ethylbenzene	1.0	0.050	1.000	0	102	80	120			
Xylenes, Total	3.1	0.10	3.000	0	104	80	120			
Surr: 4-Bromofluorobenzene	0.95		1.000		95.3	80	120			

Qualifiers:

*	Value exceeds Maximum Contaminant Level.
D	Sample Diluted Due to Matrix
H	Holding times for preparation or analysis exceeded
ND	Not Detected at the Reporting Limit
PQL	Practical Quanitative Limit
S	% Recovery outside of range due to dilution or matrix
B	Analyte detected in the associated Method Blank
E	Value above quantitation range
J	Analyte detected below quantitation limits
P	Sample pH Not In Range
RL	Reporting Limit

HALL ENVIRONMENTAL ANALYSIS LABORATORY

Hall Environmental Analysis Laboratory
4901 Hawkins NE
Albuquerque, NM 87109
TEL: 505-345-3975 FAX: 505-345-4107
Website: www.hallenvironmental.com

Sample Log-In Check List

Client Name: Safety Env Solutions | Work Order Number: 1908G52 | RcptNo: 1

Received By: Daniel M. 8/28/2019 8:45:00 AM

Completed By: **Michelle Garcia** 8/28/2019 2:05:56 PM Michelle Garcia

Reviewed By: DAD 8/28/19

Chain of Custody

1. Is Chain of Custody complete?	Yes ☑	No ☐	Not Present ☐
2. How was the sample delivered?	Courier		

Log In

3. Was an attempt made to cool the samples?	Yes ☑	No ☐	NA ☐
4. Were all samples received at a temperature of >0° C to 6.0°C	Yes ☑	No ☐	NA ☐
5. Sample(s) in proper container(s)?	Yes ☑	No ☐	
6. Sufficient sample volume for indicated test(s)?	Yes ☑	No ☐	
7. Are samples (except VOA and ONG) properly preserved?	Yes ☑	No ☐	
8. Was preservative added to bottles?	Yes ☐	No ☑	NA ☐
9. VOA vials have zero headspace?	Yes ☐	No ☐	No VOA Vials ☑
10. Were any sample containers received broken?	Yes ☐	No ☑	
11. Does paperwork match bottle labels? (Note discrepancies on chain of custody)	Yes ☑	No ☐	
12. Are matrices correctly identified on Chain of Custody?	Yes ☑	No ☐	
13. Is it clear what analyses were requested?	Yes ☑	No ☐	
14. Were all holding times able to be met? (If no, notify customer for authorization.)	Yes ☑	No ☐	

TO 8/28/19

# of preserved bottles checked for pH: _____ (<2 or >12 unless noted)

Adjusted? _____

Checked by: _____

Special Handling (if applicable)

15. Was client notified of all discrepancies with this order? Yes ☐ No ☐ NA ☑

Person Notified: _____ Date: _____

By Whom: _____ Via: ☐ eMail ☐ Phone ☐ Fax ☐ In Person

Regarding: _____

Client Instructions: _____

16. Additional remarks:

17. **Cooler Information**

Cooler No	Temp °C	Condition	Seal Intact	Seal No	Seal Date	Signed By
1	3.7	Good	Yes			
2	4.0	Good	Yes			

Chain-of-Custody Record

Client: Stuntz & Bullhorn Solutions

Mailing Address: 703 E. Clinton Hobbs NM 88240

Phone #: 575-397-0510

email or Fax#:

QA/QC Package:
☑ Standard ☐ Level 4 (Full Validation)

Accreditation: ☐ Az Compliance
☐ NELAC ☐ Other

☐ EDD (Type)

Turn-Around Time:
5 Day Rush
☐ Standard ☐ Rush

Project Name: Maverick Hallmark 192

Project #: MAV-19-010

Project Manager: Allen, Bob

Sampler: Sean Jay

On Ice: ☑ Yes ☐ No

# of Coolers: 2

Cooler Temp (including CF): 4.1-0.4=3.7 | 4.0-0.4=4.0°C

HALL ENVIRONMENTAL ANALYSIS LABORATORY
www.hallenvironmental.com
4901 Hawkins NE - Albuquerque, NM 87109
Tel. 505-345-3975 Fax 505-345-4107

Analysis Request

Date	Time	Matrix	Sample Name	Container Type and #	Preservative Type	HEAL No. 1908G52	BTEX / MTBE / TMB's (8021)	TPH:8015D(GRO / DRO / MRO)	8081 Pesticides/8082 PCB's	EDB (Method 504.1)	PAHs by 8310 or 8270SIMS	RCRA 8 Metals	Cl, F, Br, NO_3, NO_2, PO_4, SO_4	8260 (VOA)	8270 (Semi-VOA)	Total Coliform (Present/Absent)	Chloride
08/27	0830	S	TT-1 1Ft	1	Ice	-001	X	X									X
	0845		TT-1 2Ft	1	Ice	-002											
	0900		TT-1 3Ft	1		-003											
	0915		TT-2 Surface	1		-004											
	0920		TT-2 1Ft	1		-005											
	0935		TT-2 2Ft	1		-006											
	0945		TT-2 3Ft	1		-007											
	0950		TT-3 Surface	1		-008											
	0955		TT-3 1Ft	1		-009											
	1005		TT-3 2Ft	1		-010											
	1015		TT-4 Surface	1		-011											
	1035	S	TT-4 1Ft	1		-012	X	X									X

Date	Time	Relinquished by:	Received by:	Via:	Date	Time
08/27	1500	Sean Jay			8/27/19	1400
8/27/19	1900			Courier	8/28/19	8:45

Remarks:

If necessary, samples submitted to Hall Environmental may be subcontracted to other accredited laboratories. This serves as notice of this possibility. Any sub-contracted data will be clearly notated on the analytical report.

Chain-of-Custody Record

Client: Safety & Environmental Solutions

Mailing Address: 703 E. Clinton Hobbs NM 88240

Phone #: 575-397-0510

email or Fax#:

QA/QC Package:
☑ Standard ☐ Level 4 (Full Validation)

Accreditation: ☐ Az Compliance
☐ NELAC ☐ Other

☐ EDD (Type)

Turn-Around Time:
5 Day Rush
☐ Standard ☐ Rush

Project Name: Maverick Gallup 192

Project #: MAV-19-010

Project Manager: Allen, Bob

Sampler: Son Jung

On Ice: ☑ Yes ☐ No

# of Coolers: 2

Cooler Temp(including CF): 4.0+0.3=4.4°C

HEAL No. 1908G52

Date	Time	Matrix	Sample Name	Container Type and #	Preservative Type	HEAL No.	BTEX / MTBE / TMB's (8021)	TPH:8015D(GRO / DRO / MRO)	8081 Pesticides/8082 PCB's	EDB (Method 504.1)	PAHs by 8310 or 8270SIMS	RCRA 8 Metals	Cl, F, Br, NO_3, NO_2, PO_4, SO_4	8260 (VOA)	8270 (Semi-VOA)	Total Coliform (Present/Absent)
8/27	1045	S	TT-4 2Ft	1	Ice	-013	X	X								X Chlorinated
	1055		TT-5 Surface	1	None	-014										
	1110		TT-5 1Ft	1		-015										
	1125		TT-5 2Ft	1		-016										
	1135		TT-6 Surface	1		-017										
	1150		TT-6 1Ft	1		-018										
	1210		TT-6 2Ft	1		-019	X	X								X

Date:	Time:	Relinquished by:	Received by:	Via:	Date	Time
8/27	1500	Son Jung			8/27/19	1600
8/27/19	1948			Courier	8/28/19	8:45

Remarks:

HALL ENVIRONMENTAL ANALYSIS LABORATORY
www.hallenvironmental.com
4901 Hawkins NE - Albuquerque, NM 87109
Tel. 505-345-3975 Fax 505-345-4107

Analysis Request

Appendix D
Site Photos

Maverick Resources
Jalmat 192