OIL CONS. DIV DIST. 3

DEC 21 2015

District I
1625 N. French Dr., Hobbs, NM 88240
District II
811 S. First St., Artesia, NM 88210
District III
1000 Rio Brazos Road, Aztec, NM 87410
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico
Energy Minerals and Natural Resources

Oil Conservation Division
1220 South St. Francis Dr.
Santa Fe, NM 87505

Form C-141
Revised August 8, 2011

Submit 1 Copy to appropriate District Office in accordance with 19.15.29 NMAC.

Release Notification and Corrective Action

OPERATOR

☐ Initial Report ☒ Final Report

Name of Company: BP	Contact: Steve Moskal
Address: 200 Energy Court, Farmington, NM 87401	Telephone No.: 505-326-9497
Facility Name: Vandewart A 001A	Facility Type: Natural gas well

Surface Owner: Federal	Mineral Owner: Federal	API No. 3004522361

LOCATION OF RELEASE

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County: San Juan
P	11	29N	8W	800	South	800	East	

Latitude 36.73431 **Longitude** 107.63892

NATURE OF RELEASE

Type of Release: produced water/condensate	Volume of Release: unknown	Volume Recovered: N/A
Source of Release: below grade tank – 21 bbl	Date and Hour of Occurrence: unknown	Date and Hour of Discovery: March 9, 2010; 12:00 PM
Was Immediate Notice Given? ☐ Yes ☒ No ☐ Not Required	If YES, To Whom?	
By Whom?	Date and Hour	
Was a Watercourse Reached? ☐ Yes ☒ No	If YES, Volume Impacting the Watercourse.	

If a Watercourse was Impacted, Describe Fully.*

Describe Cause of Problem and Remedial Action Taken.* Sampling of the soil beneath the BGT was done during removal. Soil analysis resulted with chloride below standards. Laboratory results for TPH via method 418.1 were 4,030 and 3,330 via method 8015; benzene was 5.29 and total BTEX was 80.9 from the samples collected on March 9, 2010. On November 23, 2015, laboratory samples were collected from the former location of the BGT for site delineation. The results of the sampling are described below.

Describe Area Affected and Cleanup Action Taken.* Subsequent soil samples were collected on November 23, 2015. Samples were collected from a test hole (TH1) at the former location of the BGT at interval of 7.5', 10' and 13' below ground surface. The laboratory sample collected at 7.5'was below the spill and release closure standard and was likely located in the backfill material. The laboratory sample collected at 10' was above spill and release closure standard for TPH via 8015 with a combined concentration of 1,070 ppm. However, the laboratory sample collected a 13' was non-detect for TPH and BTEX with a chloride concentration of 37 ppm.

An additional test hole (TH2) was advanced near the former BGT location and immediately down of the suspected gradient. Two samples were collected for laboratory analysis at 9' and 13' below ground surface. The results for each hole were non-detect for TPH and BTEX and 51 ppm chloride at 13'; chloride was non-detect at 9'. The sample results indicate the TPH is defined. The TPH does not appear to have, or have the potential to, migrate and poses very little threat. BP requests closure of the site. A sampling location figure and laboratory results are attached.

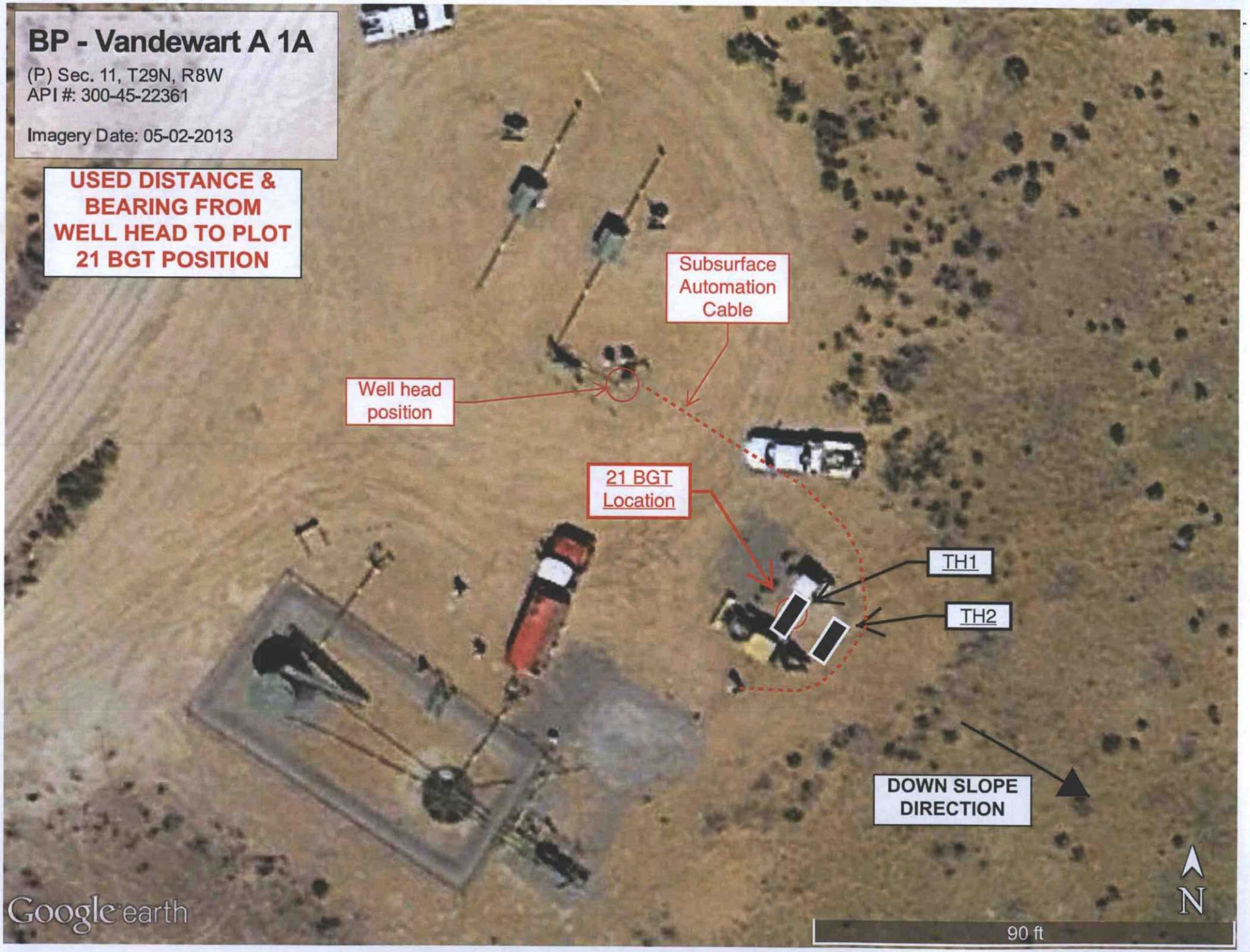
I hereby certify that the information given above is true and complete to the best of my knowledge and understand that pursuant to NMOCD rules and regulations all operators are required to report and/or file certain release notifications and perform corrective actions for releases which may endanger public health or the environment. The acceptance of a C-141 report by the NMOCD marked as "Final Report" does not relieve the operator of liability should their operations have failed to adequately investigate and remediate contamination that pose a threat to ground water, surface water, human health or the environment. In addition, NMOCD acceptance of a C-141 report does not relieve the operator of responsibility for compliance with any other federal, state, or local laws and/or regulations.

Signature:	OIL CONSERVATION DIVISION Approved by Environmental Specialist:	
Printed Name: Steve Moskal		
Title: Field Environmental Coordinator	Approval Date: 12/29/2015	Expiration Date:
E-mail Address: steven.moskal@bp.com	Conditions of Approval:	Attached ☐
Date: December 16, 2015 Phone: 505-326-9497		

* Attach Additional Sheets If Necessary

NCS1528833214

14


BP - Vandewart A 1A
(P) Sec. 11, T29N, R8W
API #: 300-45-22361
Imagery Date: 05-02-2013
USED DISTANCE & BEARING FROM WELL HEAD TO PLOT 21 BGT POSITION
Subsurface Automation Cable
Well head position
21 BGT Location
TH1
TH2
DOWN SLOPE DIRECTION
N
90 ft
Google earth

CLIENT: BP

BLAGG ENGINEERING, INC.
P.O. BOX 87, BLOOMFIELD, NM 87413
(505) 632-1199

API #: 3004522361
TANK ID (if applicble): 21 BGT

FIELD REPORT:

(circle one): BGT CONFIRMATION / RELEASE INVESTIGATION / OTHER:

PAGE #: 1 of 1

SITE INFORMATION:

SITE NAME: VANDEWART A # 1A

QUAD/UNIT: P SEC: 11 TWP: 29N RNG: 8W PM: NM CNTY: SJ ST: NM

1/4 -1/4/FOOTAGE: 800'S / 800'E SE/SE LEASE TYPE: FEDERAL / STATE / FEE / INDIAN

LEASE #: SF078502 PROD. FORMATION: MV CONTRACTOR: STRIKE MBF - S. GLYNN

DATE STARTED: 11/23/15

DATE FINISHED:

ENVIRONMENTAL SPECIALIST(S): NJV

REFERENCE POINT:

WELL HEAD (W.H.) GPS COORD.: 36.73446 X 107.63905 GL ELEV.: 6,396'

1) 21 BGT (SW/DB) GPS COORD.: 36.73431 X 107.63892 DISTANCE/BEARING FROM W.H.: 60', S35E

2) GPS COORD.: DISTANCE/BEARING FROM W.H.:

3) GPS COORD.: DISTANCE/BEARING FROM W.H.:

4) GPS COORD.: DISTANCE/BEARING FROM W.H.:

SAMPLING DATA:

CHAIN OF CUSTODY RECORD(S) # OR LAB USED: HALL

	SAMPLE ID:	SAMPLE DATE:	SAMPLE TIME:	LAB ANALYSIS:	OVM READING (ppm)
1)	TH1 @ 7.5' (21)	11/23/15	1015	8015B/8021B/300.0 (Cl)	0.0
2)	TH1 @ 10' (21)	11/23/15	1020	8015B/8021B/300.0 (Cl)	1,824
3)	TH1 @ 13' (21)	11/23/15	1030	8015B/8021B/300.0 (Cl)	3.2
4)	TH2 @ 9' (21)	11/23/15	1105	8015B/8021B/300.0 (Cl)	0.0
5)	TH2 @ 13' (21)	11/23/15	1115	8015B/8021B/300.0 (Cl)	0.0

SOIL DESCRIPTION:

SOIL TYPE: SAND / SILTY SAND / SILT / SILTY CLAY / CLAY / GRAVEL / OTHER

SOIL COLOR: DARK YELLOWISH ORANGE

COHESION (ALL OTHERS): NON COHESIVE / SLIGHTLY COHESIVE / COHESIVE / HIGHLY COHESIVE

CONSISTENCY (NON COHESIVE SOILS): LOOSE / FIRM / DENSE / VERY DENSE

MOISTURE: DRY / SLIGHTLY MOIST / MOIST / WET / SATURATED / SUPER SATURATED

SAMPLE TYPE: GRAB / COMPOSITE - # OF PTS. NA

DISCOLORATION/STAINING OBSERVED: YES / NO EXPLANATION -

PLASTICITY (CLAYS): NON PLASTIC / SLIGHTLY PLASTIC / COHESIVE / MEDIUM PLASTIC / HIGHLY PLASTIC

DENSITY (COHESIVE CLAYS & SILTS): SOFT / FIRM / STIFF / VERY STIFF / HARD

HC ODOR DETECTED: YES / NO EXPLANATION - AT APPROX. 8.5 - 9 FT. BELOW GRADE.

ANY AREAS DISPLAYING WETNESS: YES / NO EXPLANATION -

SITE OBSERVATIONS:

LOST INTEGRITY OF EQUIPMENT: YES / NO EXPLANATION - NA

APPARENT EVIDENCE OF A RELEASE OBSERVED AND/OR OCCURRED : YES / NO EXPLANATION: IDENTIFIED DURING BGT CONFIRMATION SAMPLING.

EQUIPMENT SET OVER RECLAIMED AREA: YES / NO EXPLANATION -

OTHER: TH2 APPROX. 9 - 10 FT. FROM TH1. IMPACTED SOILS APPEAR TO BE LIMITED BETWEEN APPROX. 8.5 - 12 FT. BELOW GRADE. RELEASE COULD BE CATEGORIZED AS NON REPORTABLE BASED ON ESTIMATED IMPACTED SOIL QUANTITY BEING < 10 CUBIC YARDS.

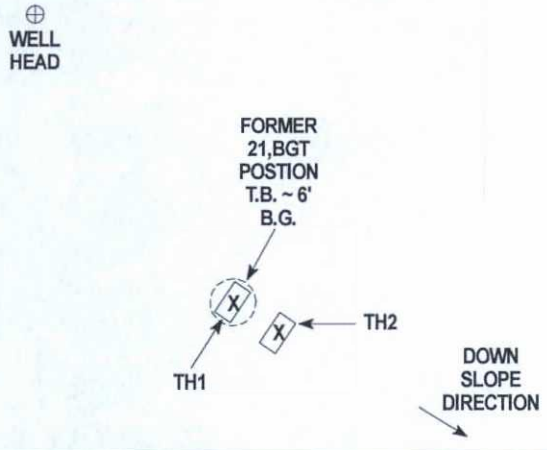
SOIL IMPACT DIMENSION ESTIMATION: 8 ft. X 8 ft. X 3.5 ft. IMPACTED SOIL ESTIMATION (Cubic Yards) : 5 - 10

DEPTH TO GROUNDWATER: >100' NEAREST WATER SOURCE: >1,000' NEAREST SURFACE WATER: <1,000' NMOCD TPH CLOSURE STD: 1,000 ppm

SITE SKETCH

BGT Located : off / on site

PLOT PLAN circle: attached



OVM CALIB. READ. = 103.1 ppm RF =0.52

OVM CALIB. GAS = 100 ppm

TIME: 10:45 am/pm DATE: 11/23/15

MISCELL. NOTES

WO:

REF. #: P - 278

VID: VHIXONEVRM

PJ #:

Permit date(s): 12/10/09

OCD Appr. date(s): 01/13/10

Tank ID	OVM = Organic Vapor Meter ppm = parts per million
21	BGT Sidewalls Visible: (Y) / N
	BGT Sidewalls Visible: Y / N
	BGT Sidewalls Visible: Y / N

Magnetic declination: 10° E

NOTES: BGT = BELOW-GRADE TANK; E.D. = EXCAVATION DEPRESSION; B.G. = BELOW GRADE; B = BELOW; T.H. = TEST HOLE; ~ = APPROX.; W.H. = WELL HEAD; T.B. = TANK BOTTOM; PBGTL = PREVIOUS BELOW-GRADE TANK LOCATION; SPD = SAMPLE POINT DESIGNATION; R.W. = RETAINING WALL; NA - NOT APPLICABLE OR NOT AVAILABLE; SW - SINGLE WALL; DW - DOUBLE WALL; SB - SINGLE BOTTOM; DB - DOUBLE BOTTOM.

NOTES: GOOGLE EARTH IMAGERY DATE: 05/02/2013. ONSITE: 11/23/15

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Blagg Engineering
Project: Vandewart A #1A
Lab ID: 1511A76-001 **Matrix:** SOIL

Client Sample ID: TH1 @ 7.5' (21)
Collection Date: 11/23/2015 10:15:00 AM
Received Date: 11/24/2015 8:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **LGT**	
Chloride	ND	30		mg/Kg	20	11/30/2015 7:32:35 PM	22556
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **TOM**	
Diesel Range Organics (DRO)	ND	9.6		mg/Kg	1	11/30/2015 3:15:53 PM	22517
Surr: DNOP	131	70-130	S	%REC	1	11/30/2015 3:15:53 PM	22517
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	5.0		mg/Kg	1	11/26/2015 2:24:34 AM	22514
Surr: BFB	86.8	66.2-112		%REC	1	11/26/2015 2:24:34 AM	22514
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.050		mg/Kg	1	11/26/2015 2:24:34 AM	22514
Toluene	ND	0.050		mg/Kg	1	11/26/2015 2:24:34 AM	22514
Ethylbenzene	ND	0.050		mg/Kg	1	11/26/2015 2:24:34 AM	22514
Xylenes, Total	ND	0.099		mg/Kg	1	11/26/2015 2:24:34 AM	22514
Surr: 4-Bromofluorobenzene	112	80-120		%REC	1	11/26/2015 2:24:34 AM	22514

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
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Blagg Engineering
Project: Vandewart A #1A
Lab ID: 1511A76-002 **Matrix:** SOIL

Client Sample ID: TH1 @ 10' (21)
Collection Date: 11/23/2015 10:20:00 AM
Received Date: 11/24/2015 8:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **LGT**	
Chloride	130	30		mg/Kg	20	11/30/2015 8:09:49 PM	22556
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **TOM**	
Diesel Range Organics (DRO)	820	97		mg/Kg	10	11/30/2015 3:42:56 PM	22517
Surr: DNOP	0	70-130	S	%REC	10	11/30/2015 3:42:56 PM	22517
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	290	48		mg/Kg	10	11/26/2015 3:38:11 AM	22514
Surr: BFB	280	66.2-112	S	%REC	10	11/26/2015 3:38:11 AM	22514
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.24		mg/Kg	10	11/26/2015 3:38:11 AM	22514
Toluene	1.4	0.48		mg/Kg	10	11/26/2015 3:38:11 AM	22514
Ethylbenzene	0.67	0.48		mg/Kg	10	11/26/2015 3:38:11 AM	22514
Xylenes, Total	20	0.96		mg/Kg	10	11/26/2015 3:38:11 AM	22514
Surr: 4-Bromofluorobenzene	142	80-120	S	%REC	10	11/26/2015 3:38:11 AM	22514

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
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Blagg Engineering
Project: Vandewart A #1A
Lab ID: 1511A76-003 **Matrix:** SOIL

Client Sample ID: TH1 @ 13' (21)
Collection Date: 11/23/2015 10:30:00 AM
Received Date: 11/24/2015 8:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **LGT**	
Chloride	37	30		mg/Kg	20	11/30/2015 8:47:03 PM	22556
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **TOM**	
Diesel Range Organics (DRO)	ND	9.7		mg/Kg	1	11/30/2015 4:10:17 PM	22517
Surr: DNOP	124	70-130		%REC	1	11/30/2015 4:10:17 PM	22517
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.8		mg/Kg	1	11/26/2015 4:51:55 AM	22514
Surr: BFB	94.1	66.2-112		%REC	1	11/26/2015 4:51:55 AM	22514
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.048		mg/Kg	1	11/26/2015 4:51:55 AM	22514
Toluene	ND	0.048		mg/Kg	1	11/26/2015 4:51:55 AM	22514
Ethylbenzene	ND	0.048		mg/Kg	1	11/26/2015 4:51:55 AM	22514
Xylenes, Total	ND	0.096		mg/Kg	1	11/26/2015 4:51:55 AM	22514
Surr: 4-Bromofluorobenzene	118	80-120		%REC	1	11/26/2015 4:51:55 AM	22514

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
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Blagg Engineering
Project: Vandewart A #1A
Lab ID: 1511A76-004 **Matrix:** SOIL

Client Sample ID: TH2 @ 9' (21)
Collection Date: 11/23/2015 11:05:00 AM
Received Date: 11/24/2015 8:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **LGT**	
Chloride	ND	30		mg/Kg	20	11/30/2015 8:59:27 PM	22556
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **TOM**	
Diesel Range Organics (DRO)	ND	10		mg/Kg	1	11/30/2015 4:37:35 PM	22517
Surr: DNOP	121	70-130		%REC	1	11/30/2015 4:37:35 PM	22517
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	5.0		mg/Kg	1	11/26/2015 6:29:58 AM	22514
Surr: BFB	86.7	66.2-112		%REC	1	11/26/2015 6:29:58 AM	22514
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.050		mg/Kg	1	11/26/2015 6:29:58 AM	22514
Toluene	ND	0.050		mg/Kg	1	11/26/2015 6:29:58 AM	22514
Ethylbenzene	ND	0.050		mg/Kg	1	11/26/2015 6:29:58 AM	22514
Xylenes, Total	ND	0.099		mg/Kg	1	11/26/2015 6:29:58 AM	22514
Surr: 4-Bromofluorobenzene	112	80-120		%REC	1	11/26/2015 6:29:58 AM	22514

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
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	% Recovery outside of range due to dilution or matrix		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Blagg Engineering
Project: Vandewart A #1A
Lab ID: 1511A76-005 **Matrix:** SOIL

Client Sample ID: TH2 @ 13' (21)
Collection Date: 11/23/2015 11:15:00 AM
Received Date: 11/24/2015 8:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **LGT**	
Chloride	55	30		mg/Kg	20	11/30/2015 9:11:52 PM	22556
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **TOM**	
Diesel Range Organics (DRO)	ND	9.9		mg/Kg	1	11/30/2015 5:04:34 PM	22517
Surr: DNOP	115	70-130		%REC	1	11/30/2015 5:04:34 PM	22517
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	4.9		mg/Kg	1	11/26/2015 6:54:30 AM	22514
Surr: BFB	82.0	66.2-112		%REC	1	11/26/2015 6:54:30 AM	22514
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.049		mg/Kg	1	11/26/2015 6:54:30 AM	22514
Toluene	ND	0.049		mg/Kg	1	11/26/2015 6:54:30 AM	22514
Ethylbenzene	ND	0.049		mg/Kg	1	11/26/2015 6:54:30 AM	22514
Xylenes, Total	ND	0.098		mg/Kg	1	11/26/2015 6:54:30 AM	22514
Surr: 4-Bromofluorobenzene	104	80-120		%REC	1	11/26/2015 6:54:30 AM	22514

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
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	% Recovery outside of range due to dilution or matrix		

Chain-of-Custody Record

Client: BLAGG ENGR. / BP AMERICA

Mailing Address: P.O. BOX 87
BLOOMFIELD, NM 87413

Phone #: (505) 632-1199

email or Fax#:

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

Accreditation:
☐ NELAP ☐ Other
☐ EDD (Type)

Turn-Around Time:
☑ Standard ☐ Rush

Project Name:
VANDEWART A # 1A

Project #:

Project Manager:
JEFF BLAGG

Sampler: NELSON VELEZ NV

On Ice: ☒ Yes ☐ No

Sample Temperature: 1.7

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 Request ID	Container Type and #	Preservative Type	HEAL No. 1511A716	BTEX + ~~MTBE + TMB's~~ (8021B)	BTEX + MTBE + TPH (Gas only)	TPH 8015B (GRO / DRO / ~~MRO~~) NV	TPH (Method 418.1)	EDB (Method 504.1)	PAH (8310 or 8270SIMS)	RCRA 8 Metals	Anions ($F, Cl, NO_3, NO_2, PO_4, SO_4$)	8081 Pesticides / 8082 PCB's	8260B (VOA)	8270 (Semi-VOA)	Chloride (soil - 300.0 / water - 300.1)		Grab sample	5 pt. composite sample	Air Bubbles (Y or N)
11/23/15	1015	SOIL	TH1 @ 7.5' (21)	4 oz. - 1	Cool	-001	✓		✓									✓		✓		
11/23/15	1020	SOIL	TH1 @ 10' (21)	4 oz. - 1	Cool	-002	✓		✓									✓		✓		
11/23/15	1030	SOIL	TH1 @ 13' (21)	4 oz. - 1	Cool	-003	✓		✓									✓		✓		
11/23/15	1105	SOIL	TH2 @ 9' (21)	4 oz. - 1	Cool	-004	✓		✓									✓		✓		
11/23/15	1115	SOIL	TH2 @ 13' (21)	4 oz. - 1	Cool	-005	✓		✓									✓		✓		

Date	Time	Relinquished by:	Received by:	Date	Time
11/23/15				11/23/15	1740
11/23/15	1829			11/24/15	0800

Remarks:

BILL DIRECTLY TO BP:
Jeff Peace, 200 Energy Court, Farmington, NM 87401

Reference #: P-278 Paykey: VHIXONEVRM

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1511A76**

02-Dec-15

Client: Blagg Engineering
Project: Vandewart A #1A

Sample ID	**MB-22556**	SampType:	**MBLK**		TestCode:	**EPA Method 300.0: Anions**				
Client ID:	**PBS**	Batch ID:	**22556**		RunNo:	**30531**				
Prep Date:	**11/30/2015**	Analysis Date:	**11/30/2015**		SeqNo:	**932129**	Units:	**mg/Kg**		
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Chloride	ND	1.5								

Sample ID	**LCS-22556**	SampType:	**LCS**		TestCode:	**EPA Method 300.0: Anions**				
Client ID:	**LCSS**	Batch ID:	**22556**		RunNo:	**30531**				
Prep Date:	**11/30/2015**	Analysis Date:	**11/30/2015**		SeqNo:	**932130**	Units:	**mg/Kg**		
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Chloride	14	1.5	15.00	0	93.7	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
- R RPD outside accepted recovery limits
- 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 Detection Limit

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1511A76**

02-Dec-15

Client: Blagg Engineering
Project: Vandewart A #1A

Sample ID **MB-22517**	SampType: **MBLK**	TestCode: **EPA Method 8015M/D: Diesel Range Organics**
Client ID: **PBS**	Batch ID: **22517**	RunNo: **30517**
Prep Date: **11/24/2015**	Analysis Date: **11/30/2015**	SeqNo: **931686** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	ND	10								
Surr: DNOP	9.9		10.00		99.0	70	130			

Sample ID **LCS-22517**	SampType: **LCS**	TestCode: **EPA Method 8015M/D: Diesel Range Organics**
Client ID: **LCSS**	Batch ID: **22517**	RunNo: **30517**
Prep Date: **11/24/2015**	Analysis Date: **11/30/2015**	SeqNo: **931687** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	53	10	50.00	0	106	57.4	139			
Surr: DNOP	5.7		5.000		114	70	130			

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
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	% Recovery outside of range due to dilution or matrix		

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1511A76**

02-Dec-15

Client: Blagg Engineering
Project: Vandewart A #1A

Sample ID **MB-22511**	SampType: **MBLK**	TestCode: **EPA Method 8015D: Gasoline Range**
Client ID: **PBS**	Batch ID: **22511**	RunNo: **30496**
Prep Date: **11/24/2015**	Analysis Date: **11/25/2015**	SeqNo: **930913** Units: **%REC**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Surr: BFB	820		1000		82.1	66.2	112			

Sample ID **LCS-22511**	SampType: **LCS**	TestCode: **EPA Method 8015D: Gasoline Range**
Client ID: **LCSS**	Batch ID: **22511**	RunNo: **30496**
Prep Date: **11/24/2015**	Analysis Date: **11/25/2015**	SeqNo: **930914** Units: **%REC**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Surr: BFB	1100		1000		110	66.2	112			

Sample ID **MB-22514**	SampType: **MBLK**	TestCode: **EPA Method 8015D: Gasoline Range**
Client ID: **PBS**	Batch ID: **22514**	RunNo: **30496**
Prep Date: **11/24/2015**	Analysis Date: **11/25/2015**	SeqNo: **930934** 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	820		1000		81.7	66.2	112			

Sample ID **LCS-22514**	SampType: **LCS**	TestCode: **EPA Method 8015D: Gasoline Range**
Client ID: **LCSS**	Batch ID: **22514**	RunNo: **30496**
Prep Date: **11/24/2015**	Analysis Date: **11/25/2015**	SeqNo: **930935** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	24	5.0	25.00	0	97.0	79.6	122			
Surr: BFB	1100		1000		105	66.2	112			

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
- R RPD outside accepted recovery limits
- 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 Detection Limit

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1511A76**

02-Dec-15

Client: Blagg Engineering
Project: Vandewart A #1A

Sample ID **MB-22511**	SampType: **MBLK**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **PBS**	Batch ID: **22511**	RunNo: **30496**
Prep Date: **11/24/2015**	Analysis Date: **11/25/2015**	SeqNo: **930957** Units: **%REC**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Surr: 4-Bromofluorobenzene	1.0		1.000		103	80	120			

Sample ID **LCS-22511**	SampType: **LCS**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **LCSS**	Batch ID: **22511**	RunNo: **30496**
Prep Date: **11/24/2015**	Analysis Date: **11/25/2015**	SeqNo: **930958** Units: **%REC**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Surr: 4-Bromofluorobenzene	1.2		1.000		125	80	120			S

Sample ID **MB-22514**	SampType: **MBLK**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **PBS**	Batch ID: **22514**	RunNo: **30496**
Prep Date: **11/24/2015**	Analysis Date: **11/25/2015**	SeqNo: **930970** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	ND	0.050								
Toluene	ND	0.050								
Ethylbenzene	ND	0.050								
Xylenes, Total	ND	0.10								
Surr: 4-Bromofluorobenzene	1.0		1.000		103	80	120			

Sample ID **LCS-22514**	SampType: **LCS**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **LCSS**	Batch ID: **22514**	RunNo: **30496**
Prep Date: **11/24/2015**	Analysis Date: **11/25/2015**	SeqNo: **930971** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	0.96	0.050	1.000	0	96.4	80	120			
Toluene	0.93	0.050	1.000	0	92.7	80	120			
Ethylbenzene	0.97	0.050	1.000	0	96.9	80	120			
Xylenes, Total	2.8	0.10	3.000	0	94.5	80	120			
Surr: 4-Bromofluorobenzene	1.3		1.000		128	80	120			S

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
- R RPD outside accepted recovery limits
- RL Reporting Detection Limit
- S % Recovery outside of range due to dilution or matrix

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: BLAGG | Work Order Number: 1511A76 | RcptNo: 1

Received by/date: JA 11/24/15

Logged By: Ashley Gallegos 11/24/2015 8:00:00 AM

Completed By: Ashley Gallegos 11/24/2015 11:18:53 AM

Reviewed By: CS 11/24/15

Chain of Custody

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

Log In

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

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

Adjusted? _____

Checked by: _____

Special Handling (if applicable)

16. 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: _____

17. Additional remarks:

18. Cooler Information

Cooler No	Temp °C	Condition	Seal Intact	Seal No	Seal Date	Signed By
1	1.1	Good	Not Present			