OIL CONS. DIV DIST. 3

AUG 17 2016

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 America Production Company	Contact: Steve Moskal
Address: 200 Energy Court, Farmington, NM 87401	Telephone No.: 505-326-9497
Facility Name: Gallegos Canyon Unit 211	Facility Type: Natural Gas Well

Surface Owner: Fee	Mineral Owner: Fee	API No. 30-045-11651

LOCATION OF RELEASE

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County
G	32	29N	12W	1,650	Notth	1,650	East	San Juan

Latitude: 36.6858 **Longitude:** -108.11917

NATURE OF RELEASE

Type of Release: Produced water	Volume of Release 6.38	Volume Recovered none
Source of Release: 2" poly pipeline	Date and Hour of Occurrence: August 2, 2016	Date and Hour of Discovery August 2, 2016 11:20 AM
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.* A field technician found a water stain on the active pipeline right of way. The water appeared to have moved from the source of the release, down the lease road. All fluid released remained to the area of current activities and disturbances. The pipeline was shut in and the area of impact was removed via vac-truck.

Describe Area Affected and Cleanup Action Taken* The produced water travelled approximately 186' to the north of the pipeline release point with an average width of 2-3'. The area of impact was remediated via excavation using a vac-truck. Soil samples collected at an average depth of 0.5-1.0' below the area of impact determined effective removal of contaminants. Laboratory analysis and site figure are included.

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.

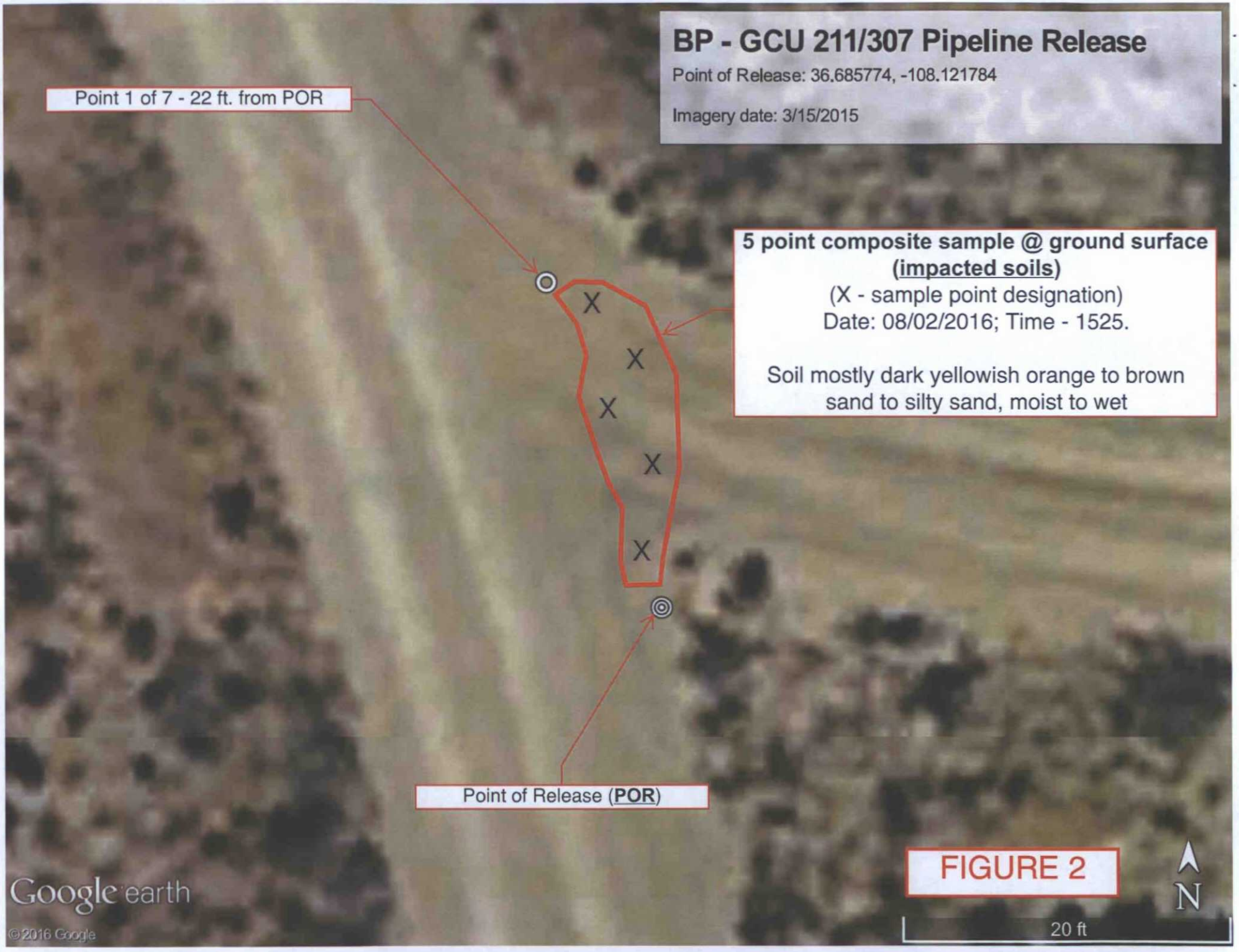
Signature:	OIL CONSERVATION DIVISION	
Printed Name: Steve Moskal	Approved by Environmental Specialist:	
Title: Field Environmental Coordinator	Approval Date: 8/22/16	Expiration Date:
E-mail Address: steven.moskal@bp.com	Conditions of Approval: —	Attached ☐
Date: August 15, 2016 Phone: (505) 326-9497		

* Attach Additional Sheets If Necessary

NCS 1623542776

21


BP - GCU 211/307 Pipeline Release
Point of Release: 36.685774, -108.121784
Imagery date: 3/15/2015
Point 7 of 7 - 186 ft. from POR
Point 6 of 7 - 156 ft. from POR
Point 5 of 7 - 134 ft. from POR
Point 4 of 7 - 106 ft. from POR
Point 3 of 7 - 77 ft. from POR
Point 2 of 7 - 48 ft. from POR
Point 1 of 7 - 22 ft. from POR
Point of Release (POR)
7 point composite sample @ 0.5 - 1.5 ft. below grade
(beneath impacted soils)
Date: 08/02/2016; Time - 1615
Soil mostly dark yellowish orange to brown
sand to silty sand, dry to slightly moist
FIGURE 1
N
100 ft
Google earth
© 2016 Google


BP - GCU 211/307 Pipeline Release
Point of Release: 36.685774, -108.121784
Imagery date: 3/15/2015
Point 1 of 7 - 22 ft. from POR
5 point composite sample @ ground surface (impacted soils)
(X - sample point designation)
Date: 08/02/2016; Time - 1525.
Soil mostly dark yellowish orange to brown sand to silty sand, moist to wet
X
X
X
X
X
Point of Release (POR)
FIGURE 2
N
20 ft
Google earth
© 2016 Google

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 48 HR.

Project Name:

Project #: GCU #211 / #307
PIPELINE RELEASE

Project Manager: NELSON VELEZ

Sampler: NELSON VELEZ

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

Date	Time	Matrix	Sample Request ID	Container Type and #	Preservative Type	HEAL No. 1608127	BTEX + ~~MTBE + TMB's~~ (8021B)	BTEX + MTBE + TPH (Gas only)	TPH 8015B (GRO / DRO / MRO)	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	# pt. composite sample	Air Bubbles (Y or N)
8/2/16	1525	SOIL	5PC @ GROUND SURFACE (IMPACTED)	4oz.-1	COOL	-001	✓		✓									✓			5	
8/2/16	1615	SOIL	7PC @ 0.5'-1.5' BELOW GRADE	4oz.-1	COOL	-002	✓		✓									✓			7	

Date	Time	Relinquished by:	Received by:	Date	Time
8/2/16	1652		Christine Walker	8/2/16	1652
8/2/16	1834	Christine Walker		08/03/16	0720

Remarks: BILL DIRECTLY TO BP USING THE CIRCLED CONTACT WITH CORRESPONDING VID & REFERENCE # WHEN APPLICABLE:

VID: Vance Hixon VHIXONEVB2 | Steve Moskal VMOS6HQFEC | John Ritchie VRITCJWFEC

~~Work Order~~ Reference # N15706743

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.

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

August 04, 2016

Nelson Velez
Blagg Engineering
P. O. Box 87
Bloomfield, NM 87413
TEL:
FAX

RE: GCU #211/#307 Pipeline Release OrderNo.: 1608127

Dear Nelson Velez:

Hall Environmental Analysis Laboratory received 2 sample(s) on 8/3/2016 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 qualifers 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 #NM0190

Sincerely,

Andy Freeman
Laboratory Manager
4901 Hawkins NE
Albuquerque, NM 87109

Analytical Report
Lab Order **1608127**
Date Reported: **8/4/2016**

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Blagg Engineering
Client Sample ID: 5PC@Ground Surface (Impacted
Project: GCU #211/#307 Pipeline Release
Collection Date: 8/2/2016 3:25:00 PM
Lab ID: 1608127-001 **Matrix:** MEOH (SOIL) **Received Date:** 8/3/2016 7:20:00 AM

Analyses	Result	PQL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **MRA**	
Chloride	9800	300		mg/Kg	200	8/3/2016 4:52:13 PM	26766
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **KJH**	
Diesel Range Organics (DRO)	ND	9.7		mg/Kg	1	8/3/2016 10:30:49 AM	26760
Motor Oil Range Organics (MRO)	ND	48		mg/Kg	1	8/3/2016 10:30:49 AM	26760
Surr: DNOP	99.1	70-130		%Rec	1	8/3/2016 10:30:49 AM	26760
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	12	3.3		mg/Kg	1	8/3/2016 10:42:55 AM	26741
Surr: BFB	119	49.4-163		%Rec	1	8/3/2016 10:42:55 AM	26741
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.016		mg/Kg	1	8/3/2016 10:42:55 AM	26741
Toluene	0.034	0.033		mg/Kg	1	8/3/2016 10:42:55 AM	26741
Ethylbenzene	ND	0.033		mg/Kg	1	8/3/2016 10:42:55 AM	26741
Xylenes, Total	0.087	0.066		mg/Kg	1	8/3/2016 10:42:55 AM	26741
Surr: 4-Bromofluorobenzene	98.2	80-120		%Rec	1	8/3/2016 10:42:55 AM	26741

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	W	Sample container temperature is out of limit as specified

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Blagg Engineering
Client Sample ID: 7PC@0.5'-1.5' Below Grade
Project: GCU #211/#307 Pipeline Release
Collection Date: 8/2/2016 4:15:00 PM
Lab ID: 1608127-002
Matrix: MEOH (SOIL)
Received Date: 8/3/2016 7:20:00 AM

Analyses	Result	PQL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **MRA**	
Chloride	250	30		mg/Kg	20	8/3/2016 11:29:34 AM	26766
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **KJH**	
Diesel Range Organics (DRO)	21	9.5		mg/Kg	1	8/3/2016 10:52:45 AM	26760
Motor Oil Range Organics (MRO)	ND	48		mg/Kg	1	8/3/2016 10:52:45 AM	26760
Surr: DNOP	90.2	70-130		%Rec	1	8/3/2016 10:52:45 AM	26760
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	3.5		mg/Kg	1	8/3/2016 11:06:28 AM	26741
Surr: BFB	97.5	49.4-163		%Rec	1	8/3/2016 11:06:28 AM	26741
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.017		mg/Kg	1	8/3/2016 11:06:28 AM	26741
Toluene	ND	0.035		mg/Kg	1	8/3/2016 11:06:28 AM	26741
Ethylbenzene	ND	0.035		mg/Kg	1	8/3/2016 11:06:28 AM	26741
Xylenes, Total	ND	0.070		mg/Kg	1	8/3/2016 11:06:28 AM	26741
Surr: 4-Bromofluorobenzene	92.3	80-120		%Rec	1	8/3/2016 11:06:28 AM	26741

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	W	Sample container temperature is out of limit as specified

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1608127**

04-Aug-16

Client: Blagg Engineering

Project: GCU #211/#307 Pipeline Release

Sample ID	**MB-26766**	SampType:	**mblk**	TestCode:	**EPA Method 300.0: Anions**					
Client ID:	**PBS**	Batch ID:	**26766**	RunNo:	**36217**					
Prep Date:	**8/3/2016**	Analysis Date:	**8/3/2016**	SeqNo:	**1121709**	Units:	**mg/Kg**			

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

Sample ID	**LCS-26766**	SampType:	**lcs**	TestCode:	**EPA Method 300.0: Anions**					
Client ID:	**LCSS**	Batch ID:	**26766**	RunNo:	**36217**					
Prep Date:	**8/3/2016**	Analysis Date:	**8/3/2016**	SeqNo:	**1121710**	Units:	**mg/Kg**			

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Chloride	14	1.5	15.00	0	93.5	90	110			

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	W	Sample container temperature is out of limit as specified

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1608127**

04-Aug-16

Client: Blagg Engineering

Project: GCU #211/#307 Pipeline Release

Sample ID **LCS-26760**	SampType: **LCS**	TestCode: **EPA Method 8015M/D: Diesel Range Organics**
Client ID: **LCSS**	Batch ID: **26760**	RunNo: **36186**
Prep Date: **8/3/2016**	Analysis Date: **8/3/2016**	SeqNo: **1120950** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	40	10	50.00	0	79.1	62.6	124			
Surr: DNOP	4.5		5.000		90.1	70	130			

Sample ID **MB-26760**	SampType: **MBLK**	TestCode: **EPA Method 8015M/D: Diesel Range Organics**
Client ID: **PBS**	Batch ID: **26760**	RunNo: **36186**
Prep Date: **8/3/2016**	Analysis Date: **8/3/2016**	SeqNo: **1120951** 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	8.5		10.00		85.0	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	W	Sample container temperature is out of limit as specified

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1608127**

04-Aug-16

Client: Blagg Engineering

Project: GCU #211/#307 Pipeline Release

Sample ID **MB-26741**	SampType: **MBLK**	TestCode: **EPA Method 8015D: Gasoline Range**
Client ID: **PBS**	Batch ID: **26741**	RunNo: **36191**
Prep Date: **8/2/2016**	Analysis Date: **8/3/2016**	SeqNo: **1121472** 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	960		1000		96.4	49.4	163			

Sample ID **LCS-26741**	SampType: **LCS**	TestCode: **EPA Method 8015D: Gasoline Range**
Client ID: **LCSS**	Batch ID: **26741**	RunNo: **36191**
Prep Date: **8/2/2016**	Analysis Date: **8/3/2016**	SeqNo: **1121473** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	26	5.0	25.00	0	102	80	120			
Surr: BFB	1100		1000		106	49.4	163			

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	W	Sample container temperature is out of limit as specified

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1608127**

04-Aug-16

Client: Blagg Engineering

Project: GCU #211/#307 Pipeline Release

Sample ID **MB-26741**	SampType: **MBLK**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **PBS**	Batch ID: **26741**	RunNo: **36191**
Prep Date: **8/2/2016**	Analysis Date: **8/3/2016**	SeqNo: **1121479** 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	0.91		1.000		91.5	80	120			

Sample ID **LCS-26741**	SampType: **LCS**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **LCSS**	Batch ID: **26741**	RunNo: **36191**
Prep Date: **8/2/2016**	Analysis Date: **8/3/2016**	SeqNo: **1121480** 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	101	75.3	123			
Toluene	0.98	0.050	1.000	0	97.6	80	124			
Ethylbenzene	1.0	0.050	1.000	0	101	82.8	121			
Xylenes, Total	3.0	0.10	3.000	0	100	83.9	122			
Surr: 4-Bromofluorobenzene	0.96		1.000		96.5	80	120			

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	W	Sample container temperature is out of limit as specified

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: 1608127 | RcptNo: 1

Received by/date: [signature] 08/03/16

Logged By: Lindsay Mangin 8/3/2016 7:20:00 AM [signature]

Completed By: Lindsay Mangin 8/3/2016 7:53:54 AM [signature]

Reviewed By: IO 08/03/16

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 ☐	# of preserved bottles checked for pH: (<2 or >12 unless noted)
13. Are matrices correctly identified on Chain of Custody?	Yes ☑	No ☐	Adjusted?
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 ☐	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	1.7	Good	Yes			

Chain-of-Custody Record

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

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 48 HR.
Project Name:
Project #: GCU #211 / #307 PIPELINE RELEASE
Project Manager: NELSON VELEZ
Sampler: NELSON VELEZ
On Ice: ☑ Yes ☐ No
Sample Temperature: 1.7

Date	Time	Matrix	Sample Request ID	Container Type and #	Preservative Type	HEAL No. 1608127	BTEX + ~~MTBE + TMB's~~ (8021B)	BTEX + MTBE + TPH (Gas only)	TPH 8015B (GRO / DRO / MRO)	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	# pt. composite sample	Air Bubbles (Y or N)
8/2/16	1525	SOIL	5PC @ GROUND SURFACE (IMPACTED)	4oz.-1	COOL	-001	✓		✓									✓			1	
8/2/16	1615	SOIL	7PC @ 0.5-1.5' BELOW GRADE	4oz.-1	COOL	-002	✓		✓									✓			1	

Date	Time	Relinquished by:	Received by:	Date	Time
8/2/16	1656		Christine Walker	8/2/16	1656
8/2/16	1834	Christine Walker		08/03/16	0720

Remarks: BILL DIRECTLY TO BP USING THE CIRCLED CONTACT WITH CORRESPONDING VID & REFERENCE # WHEN APPLICABLE:
VID: Vance Hixon VHIXONEVB2 | Steve Moskal VMOS6HQFEC | John Ritchie VRITCJWFEC
Lucho AOR Reference #: N15706743

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.

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

August 12, 2016

Nelson Velez

Blagg Engineering
P. O. Box 87
Bloomfield, NM 87413
TEL:
FAX

RE: GCU 211/307 Pipeline Release OrderNo.: 1608497

Dear Nelson Velez:

Hall Environmental Analysis Laboratory received 1 sample(s) on 8/9/2016 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 qualifers 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 #NM0190

Sincerely,

Andy Freeman
Laboratory Manager
4901 Hawkins NE
Albuquerque, NM 87109

Analytical Report
Lab Order **1608497**
Date Reported: **8/12/2016**

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Blagg Engineering
Project: GCU 211/307 Pipeline Release
Lab ID: 1608497-001 **Matrix:** MEOH (SOIL)

Client Sample ID: 3pc @ Source 6'-7' Below Grab
Collection Date: 8/8/2016 2:00:00 PM
Received Date: 8/9/2016 8:00:00 AM

Analyses	Result	PQL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst: **LGT**	
Chloride	770	30		mg/Kg	20	8/10/2016 3:48:03 AM	26873
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS						Analyst: **TOM**	
Diesel Range Organics (DRO)	ND	10		mg/Kg	1	8/10/2016 12:36:03 PM	26867
Motor Oil Range Organics (MRO)	ND	50		mg/Kg	1	8/10/2016 12:36:03 PM	26867
Surr: DNOP	86.1	70-130		%Rec	1	8/10/2016 12:36:03 PM	26867
EPA METHOD 8015D: GASOLINE RANGE						Analyst: **NSB**	
Gasoline Range Organics (GRO)	ND	3.3		mg/Kg	1	8/10/2016 1:01:24 PM	26858
Surr: BFB	109	68.3-144		%Rec	1	8/10/2016 1:01:24 PM	26858
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**	
Benzene	ND	0.017		mg/Kg	1	8/10/2016 1:01:24 PM	26858
Toluene	ND	0.033		mg/Kg	1	8/10/2016 1:01:24 PM	26858
Ethylbenzene	ND	0.033		mg/Kg	1	8/10/2016 1:01:24 PM	26858
Xylenes, Total	ND	0.066		mg/Kg	1	8/10/2016 1:01:24 PM	26858
Surr: 4-Bromofluorobenzene	104	80-120		%Rec	1	8/10/2016 1:01:24 PM	26858

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	W	Sample container temperature is out of limit as specified

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1608497**

12-Aug-16

Client: Blagg Engineering

Project: GCU 211/307 Pipeline Release

Sample ID	**MB-26873**	SampType:	**MBLK**			TestCode:	**EPA Method 300.0: Anions**				
Client ID:	**PBS**	Batch ID:	**26873**			RunNo:	**36358**				
Prep Date:	**8/9/2016**	Analysis Date:	**8/10/2016**			SeqNo:	**1126271**	Units:	**mg/Kg**		
Analyte		Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Chloride		ND	1.5								

Sample ID	**LCS-26873**	SampType:	**LCS**			TestCode:	**EPA Method 300.0: Anions**				
Client ID:	**LCSS**	Batch ID:	**26873**			RunNo:	**36358**				
Prep Date:	**8/9/2016**	Analysis Date:	**8/10/2016**			SeqNo:	**1126272**	Units:	**mg/Kg**		
Analyte		Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Chloride		14	1.5	15.00	0	93.2	90	110			

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
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QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1608497**

12-Aug-16

Client: Blagg Engineering

Project: GCU 211/307 Pipeline Release

Sample ID **LCS-26867**	SampType: **LCS**			TestCode: **EPA Method 8015M/D: Diesel Range Organics**					
Client ID: **LCSS**	Batch ID: **26867**			RunNo: **36347**					
Prep Date: **8/9/2016**	Analysis Date: **8/10/2016**			SeqNo: **1126001**		Units: **mg/Kg**			
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	43	10	50.00	0	86.2	62.6	124			
Surr: DNOP	4.7		5.000		93.9	70	130			

Sample ID **MB-26867**	SampType: **MBLK**			TestCode: **EPA Method 8015M/D: Diesel Range Organics**					
Client ID: **PBS**	Batch ID: **26867**			RunNo: **36347**					
Prep Date: **8/9/2016**	Analysis Date: **8/10/2016**			SeqNo: **1126002**		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	9.6		10.00		95.6	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	W	Sample container temperature is out of limit as specified

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1608497**

12-Aug-16

Client: Blagg Engineering
Project: GCU 211/307 Pipeline Release

Sample ID **MB-26858**	SampType: **MBLK**	TestCode: **EPA Method 8015D: Gasoline Range**
Client ID: **PBS**	Batch ID: **26858**	RunNo: **36367**
Prep Date: **8/9/2016**	Analysis Date: **8/10/2016**	SeqNo: **1126685** 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	1100		1000		110	68.3	144			

Sample ID **LCS-26858**	SampType: **LCS**	TestCode: **EPA Method 8015D: Gasoline Range**
Client ID: **LCSS**	Batch ID: **26858**	RunNo: **36367**
Prep Date: **8/9/2016**	Analysis Date: **8/10/2016**	SeqNo: **1126686** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	28	5.0	25.00	0	110	80	120			
Surr: BFB	1200		1000		122	68.3	144			

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	W	Sample container temperature is out of limit as specified

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1608497**

12-Aug-16

Client: Blagg Engineering

Project: GCU 211/307 Pipeline Release

Sample ID **MB-26858**	SampType: **MBLK**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **PBS**	Batch ID: **26858**	RunNo: **36367**
Prep Date: **8/9/2016**	Analysis Date: **8/10/2016**	SeqNo: **1126698** 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	1.1		1.000		106	80	120			

Sample ID **LCS-26858**	SampType: **LCS**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **LCSS**	Batch ID: **26858**	RunNo: **36367**
Prep Date: **8/9/2016**	Analysis Date: **8/10/2016**	SeqNo: **1126699** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	0.93	0.025	1.000	0	93.3	75.3	123			
Toluene	1.0	0.050	1.000	0	103	80	124			
Ethylbenzene	1.1	0.050	1.000	0	114	82.8	121			
Xylenes, Total	3.3	0.10	3.000	0	110	83.9	122			
Surr: 4-Bromofluorobenzene	1.1		1.000		108	80	120			

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	W	Sample container temperature is out of limit as specified

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: 1608497 | RcptNo: 1

Received by/date: AJ 08/09/16

Logged By: Ashley Gallegos 8/9/2016 8:00:00 AM

Completed By: Ashley Gallegos 8/9/2016 9:41:33 AM

Reviewed By: MJ 08/09/16

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 ☐	# of preserved bottles checked for pH: (<2 or >12 unless noted)
13. Are matrices correctly identified on Chain of Custody?	Yes ☑	No ☐	Adjusted?
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 ☐	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	1.8	Good	Yes			

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: 48 HR.
☐ Standard ☒ Rush

Project Name:

Project #: GCU #211 / #307
PIPELINE RELEASE

Project Manager: NELSON VELEZ

Sampler: NELSON VELEZ

On Ice: ☑ Yes ☐ No

Sample Temperature: 1.8°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 Request ID	Container Type and #	Preservative Type	HEAL No. 1608497	BTEX + MTBE + TMB's (8021B)	BTEX + MTBE + TPH (Gas only)	TPH 8015B (GRO / DRO / MRO)	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)
8/8/16	1400	SOIL	3FC @ SOURCE 5'-7' BELOW GRADE	4oz.-1	Cool	-001	✓		✓									✓			✓	

Date: 8/8/16 Time: 1550 Relinquished by: [signature] Received by: Christie Walters Date: 8/8/16 Time: 1550

Date: 8/8/16 Time: 1828 Relinquished by: Christie Walters Received by: [signature] Date: 08/09/16 Time: 0800

Remarks: BILL DIRECTLY TO BP USING THE CIRCLED CONTACT WITH CORRESPONDING VID & REFERENCE # WHEN APPLICABLE:

VID: Vance Hixon VHIXONEVB2 | Steve Moskal VMOS6HQFEC | John Ritchie VRITCJWFEC

WORK ORDER ~~Reference~~ # N5706743

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.