District I
1625 N. French Dr., Hobbs, NM 88240
District II
1301 W. Grand Avenue, 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 Department Oil Conservation Division 1220 South St. Francis Dr. Santa Fe, NM 87505

For temporary pits, closed-loop systems, and below-grade tanks, submit to the appropriate NMOCD District Office.

For permanent pits and exceptions submit to the Santa Fe Environmental Bureau office and provide a copy to the appropriate NMOCD

District Office.

## Pit, Closed-Loop System, Below-Grade Tank, or Proposed Alternative Method Permit or Closure Plan Application

Froposed Alternative Method Ferrint of Closure Fran Application					
Type of action:  Permit of a pit, closed-loop system, below-grade tank, or proposed alternative method  Closure of a pit, closed-loop system, below-grade tank, or proposed alternative method  Modification to an existing permit  Closure plan only submitted for an existing permitted or non-permitted pit, closed-loop system,					
below-grade tank, or proposed alternative method					
Instructions: Please submit one application (Form C-144) per individual pit, closed-loop system, below-grade tank or alternative request  Please be advised that approval of this request does not relieve the operator of liability should operations result in pollution of surface water, ground water or the environment. Nor does approval relieve the operator of its responsibility to comply with any other applicable governmental authority's rules, regulations or ordinances.					
Operator: BP AMERICA PRODUCTION COMPANY OGRID #: 778					
Address: 200 Energy Court, Farmington, NM 87401					
Facility or well name: HEATH GAS COM N 001					
API Number: 3004521053 OCD Permit Number:					
U/L or Qtr/Qtr G Section 8.0 Township 29.0N Range 09W County: San Juan County					
Center of Proposed Design:         Latitude         36.74208         Longitude         -107.79919         NAD:         □1927 × 1983					
Surface Owner: ▼ Federal ☐ State ☐ Private ☐ Tribal Trust or Indian Allotment					
2.					
Pit: Subsection F or G of 19.15.17.11 NMAC					
Temporary: Drilling Workover					
☐ Permanent ☐ Emergency ☐ Cavitation ☐ P&A NOV 27 2018					
Lined Unlined Liner type: Thicknessmil LLDPE HDPE PVC Other					
□ String-Reinforced					
Liner Seams: Welded Factory Other Volume: bbl Dimensions: L x W x D					
Closed-loop System: Subsection H of 19.15.17.11 NMAC   Type of Operation: P&A Drilling a new well Workover or Drilling (Applies to activities which require prior approval of a permit or notice of intent)   Drying Pad Above Ground Steel Tanks Haul-off Bins Other Lined Unlined Liner type: Thickness mil LLDPE HDPE PVC Other Liner Seams: Welded Factory Other					
Selow-grade tank: Subsection I of 19.15.17.11 NMAC   Tank ID:   A					

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Alternative Method:

Submittal of an exception request is required. Exceptions must be submitted to the Santa Fe Environmental Bureau office for consideration of approval.

Fencing: Subsection D of 19.15.17.11 NMAC (Applies to permanent pits, temporary pits, and below-grade tanks)				
Chain link, six feet in height, two strands of barbed wire at top (Required if located within 1000 feet of a permanent residence, school, hospital, institution or church)				
Four foot height, four strands of barbed wire evenly spaced between one and four feet				
Alternate. Please specify				
7.				
Netting: Subsection E of 19.15.17.11 NMAC (Applies to permanent pits and permanent open top tanks)				
Screen Netting Other				
Monthly inspections (If netting or screening is not physically feasible)				
8. Signs: Subsection C of 19.15.17.11 NMAC				
☐ 12"x 24", 2" lettering, providing Operator's name, site location, and emergency telephone numbers				
Signed in compliance with 19.15.16.8 NMAC				
a signed in compilated with 15/15/16/6 (With Co				
9. Administrative Approvals and Exceptions: Justifications and/or demonstrations of equivalency are required. Please refer to 19.15.17 NMAC for guidance.  Please check a box if one or more of the following is requested, if not leave blank:  Administrative approval(s): Requests must be submitted to the appropriate division district or the Santa Fe Environmental Bureau of the sant	office for			
consideration of approval.  Exception(s): Requests must be submitted to the Santa Fe Environmental Bureau office for consideration of approval.				
Siting Criteria (regarding permitting): 19.15.17.10 NMAC Instructions: The applicant must demonstrate compliance for each siting criteria below in the application. Recommendations of accept material are provided below. Requests regarding changes to certain siting criteria may require administrative approval from the appropriate or may be considered an exception which must be submitted to the Santa Fe Environmental Bureau office for consideration of a Applicant must attach justification for request. Please refer to 19.15.17.10 NMAC for guidance. Siting criteria does not apply to drying above-grade tanks associated with a closed-loop system.	priate district pproval.			
Ground water is less than 50 feet below the bottom of the temporary pit, permanent pit, or below-grade tank.  - NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	☐ Yes ☐ No			
Within 300 feet of a continuously flowing watercourse, or 200 feet of any other significant watercourse or lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark).  - Topographic map; Visual inspection (certification) of the proposed site	Yes No			
Within 300 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application.  (Applies to temporary, emergency, or cavitation pits and below-grade tanks)  - Visual inspection (certification) of the proposed site; Aerial photo; Satellite image	☐ Yes ☐ No ☐ NA			
Within 1000 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application. (Applies to permanent pits)	☐ Yes ☐ No ☐ NA			
- Visual inspection (certification) of the proposed site; Aerial photo; Satellite image	☐ Yes ☐ No			
Within 500 horizontal feet of a private, domestic fresh water well or spring that less than five households use for domestic or stock watering purposes, or within 1000 horizontal feet of any other fresh water well or spring, in existence at the time of initial application.  - NM Office of the State Engineer - iWATERS database search; Visual inspection (certification) of the proposed site				
Within incorporated municipal boundaries or within a defined municipal fresh water well field covered under a municipal ordinance adopted pursuant to NMSA 1978, Section 3-27-3, as amended.  - Written confirmation or verification from the municipality; Written approval obtained from the municipality	Yes No			
Within 500 feet of a wetland.  - US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site	☐ Yes ☐ No			
Within the area overlying a subsurface mine Written confirmation or verification or map from the NM EMNRD-Mining and Mineral Division				
Within an unstable area.  - Engineering measures incorporated into the design; NM Bureau of Geology & Mineral Resources; USGS; NM Geological Society; Topographic map	☐ Yes ☐ No			
Within a 100-year floodplain FEMA map	☐ Yes ☐ No			

Temporary Pits, Emergency Pits, and Below-grade Tanks Permit Application Attachment Checklist: Subsection B of 19.15.17.9 NMAC  Instructions: Each of the following items must be attached to the application. Please indicate, by a check mark in the box, that the documents are attached.  Hydrogeologic Report (Below-grade Tanks) - based upon the requirements of Paragraph (4) of Subsection B of 19.15.17.9 NMAC  Hydrogeologic Data (Temporary and Emergency Pits) - based upon the requirements of Paragraph (2) of Subsection B of 19.15.17.9 NMAC  Siting Criteria Compliance Demonstrations - based upon the appropriate requirements of 19.15.17.10 NMAC  Design Plan - based upon the appropriate requirements of 19.15.17.12 NMAC  Operating and Maintenance Plan - based upon the appropriate requirements of 19.15.17.12 NMAC
Closure Plan (Please complete Boxes 14 through 18, if applicable) - based upon the appropriate requirements of Subsection C of 19.15.17.9 NMAC and 19.15.17.13 NMAC  Previously Approved Design (attach copy of design) API Number: or Permit Number:
ar removed being in (animal copy or accing in)
Closed-loop Systems Permit Application Attachment Checklist: Subsection B of 19.15.17.9 NMAC  Instructions: Each of the following items must be attached to the application. Please indicate, by a check mark in the box, that the documents are attached.  Geologic and Hydrogeologic Data (only for on-site closure) - based upon the requirements of Paragraph (3) of Subsection B of 19.15.17.9
<ul> <li>Siting Criteria Compliance Demonstrations (only for on-site closure) - based upon the appropriate requirements of 19.15.17.10 NMAC</li> <li>□ Design Plan - based upon the appropriate requirements of 19.15.17.11 NMAC</li> <li>□ Operating and Maintenance Plan - based upon the appropriate requirements of 19.15.17.12 NMAC</li> <li>□ Closure Plan (Please complete Boxes 14 through 18, if applicable) - based upon the appropriate requirements of Subsection C of 19.15.17.9 NMAC</li> <li>and 19.15.17.13 NMAC</li> </ul>
Previously Approved Design (attach copy of design) API Number:
☐ Previously Approved Operating and Maintenance Plan API Number: (Applies only to closed-loop system that use
above ground steel tanks or haul-off bins and propose to implement waste removal for closure)
Permanent Pits Permit Application Checklist: Subsection B of 19.15.17.9 NMAC Instructions: Each of the following items must be attached to the application. Please indicate, by a check mark in the box, that the documents are attached.    Hydrogeologic Report - based upon the requirements of Paragraph (1) of Subsection B of 19.15.17.9 NMAC   Siting Criteria Compliance Demonstrations - based upon the appropriate requirements of 19.15.17.10 NMAC   Climatological Factors Assessment   Certified Engineering Design Plans - based upon the appropriate requirements of 19.15.17.11 NMAC   Dike Protection and Structural Integrity Design - based upon the appropriate requirements of 19.15.17.11 NMAC   Leak Detection Design - based upon the appropriate requirements of 19.15.17.11 NMAC   Quality Control/Quality Assurance Construction and Installation Plan   Operating and Maintenance Plan - based upon the appropriate requirements of 19.15.17.12 NMAC   Freeboard and Overtopping Prevention Plan - based upon the appropriate requirements of 19.15.17.11 NMAC   Nuisance or Hazardous Odors, including H <sub>2</sub> S, Prevention Plan   Emergency Response Plan   Oil Field Waste Stream Characterization   Monitoring and Inspection Plan   Erosion Control Plan   Closure Plan - based upon the appropriate requirements of Subsection C of 19.15.17.9 NMAC and 19.15.17.13 NMAC
<u>Proposed Closure</u> : 19.15.17.13 NMAC Instructions: Please complete the applicable boxes, Boxes 14 through 18, in regards to the proposed closure plan.
Type: Drilling Workover Emergency Cavitation P&A Permanent Pit Below-grade Tank Closed-loop System Alternative Proposed Closure Method: Waste Excavation and Removal Waste Removal (Closed-loop systems only) On-site Closure Method (Only for temporary pits and closed-loop systems) In-place Burial On-site Trench Burial Alternative Closure Method (Exceptions must be submitted to the Santa Fe Environmental Bureau for consideration)
Waste Excavation and Removal Closure Plan Checklist: (19.15.17.13 NMAC) Instructions: Each of the following items must be attached to the closure plan. Please indicate, by a check mark in the box, that the documents are attached.  Protocols and Procedures - based upon the appropriate requirements of 19.15.17.13 NMAC  Confirmation Sampling Plan (if applicable) - based upon the appropriate requirements of Subsection F of 19.15.17.13 NMAC  Disposal Facility Name and Permit Number (for liquids, drilling fluids and drill cuttings)  Soil Backfill and Cover Design Specifications - based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC  Re-vegetation Plan - based upon the appropriate requirements of Subsection G of 19.15.17.13 NMAC

Waste Removal Closure For Closed-loop Systems That Utilize Above Ground Steel Tanks or Haul-off Bins Only: (19.15.17.13.D NMAC) Instructions: Please indentify the facility or facilities for the disposal of liquids, drilling fluids and drill cuttings. Use attachment if more than two facilities are required.						
Disposal Facility Name: Disposal Facility Permit Number:						
Disposal Facility Name: Disposal Facility Permit Number:						
Will any of the proposed closed-loop system operations and associated activities occur on or in areas that <i>will not</i> be used for future services of the proposed closed-loop system operations and associated activities occur on or in areas that <i>will not</i> be used for future services of the proposed closed-loop system operations and associated activities occur on or in areas that <i>will not</i> be used for future services of the proposed closed-loop system operations and associated activities occur on or in areas that <i>will not</i> be used for future services of the proposed closed-loop system operations and associated activities occur on or in areas that <i>will not</i> be used for future services of the proposed closed-loop system operations and associated activities occur on or in areas that <i>will not</i> be used for future services of the proposed closed-loop system operations and associated activities occur on or in areas that <i>will not</i> be used for future services of the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also obtained by the proposed closed-loop system operations are also	vice and operations?					
Required for impacted areas which will not be used for future service and operations:  Soil Backfill and Cover Design Specifications based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC  Re-vegetation Plan - based upon the appropriate requirements of Subsection I of 19.15.17.13 NMAC  Site Reclamation Plan - based upon the appropriate requirements of Subsection G of 19.15.17.13 NMAC						
Siting Criteria (regarding on-site closure methods only): 19.15.17.10 NMAC Instructions: Each siting criteria requires a demonstration of compliance in the closure plan. Recommendations of acceptable source material are provided below. Requests regarding changes to certain siting criteria may require administrative approval from the appropriate district office or may be considered an exception which must be submitted to the Santa Fe Environmental Bureau office for consideration of approval. Justifications and/or demonstrations of equivalency are required. Please refer to 19.15.17.10 NMAC for guidance.						
Ground water is less than 50 feet below the bottom of the buried waste.  - NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	☐ Yes ☐ No ☐ NA					
Ground water is between 50 and 100 feet below the bottom of the buried waste - NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	☐ Yes ☐ No ☐ NA					
Ground water is more than 100 feet below the bottom of the buried waste.  - NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	☐ Yes ☐ No ☐ NA					
Within 300 feet of a continuously flowing watercourse, or 200 feet of any other significant watercourse or lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark).  - Topographic map; Visual inspection (certification) of the proposed site						
Within 300 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application.  - Visual inspection (certification) of the proposed site; Aerial photo; Satellite image						
Within 500 horizontal feet of a private, domestic fresh water well or spring that less than five households use for domestic or stock watering purposes, or within 1000 horizontal feet of any other fresh water well or spring, in existence at the time of initial application.  - NM Office of the State Engineer - iWATERS database; Visual inspection (certification) of the proposed site						
Within incorporated municipal boundaries or within a defined municipal fresh water well field covered under a municipal ordinance adopted pursuant to NMSA 1978, Section 3-27-3, as amended.  - Written confirmation or verification from the municipality; Written approval obtained from the municipality						
Within 500 feet of a wetland US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site	☐ Yes ☐ No					
Within the area overlying a subsurface mine.  - Written confirmation or verification or map from the NM EMNRD-Mining and Mineral Division	☐ Yes ☐ No					
<ul> <li>Within an unstable area.</li> <li>Engineering measures incorporated into the design; NM Bureau of Geology &amp; Mineral Resources; USGS; NM Geological Society; Topographic map</li> </ul>	☐ Yes ☐ No					
Within a 100-year floodplain FEMA map	☐ Yes ☐ No					
On-Site Closure Plan Checklist: (19.15.17.13 NMAC) Instructions: Each of the following items must be attached to the closure plan. Please indicate, by a check mark in the box, that the documents are attached.  Siting Criteria Compliance Demonstrations - based upon the appropriate requirements of 19.15.17.10 NMAC  Proof of Surface Owner Notice - based upon the appropriate requirements of Subsection F of 19.15.17.13 NMAC  Construction/Design Plan of Burial Trench (if applicable) based upon the appropriate requirements of 19.15.17.11 NMAC  Construction/Design Plan of Temporary Pit (for in-place burial of a drying pad) - based upon the appropriate requirements of 19.15.17.13 NMAC  Protocols and Procedures - based upon the appropriate requirements of 19.15.17.13 NMAC  Confirmation Sampling Plan (if applicable) - based upon the appropriate requirements of Subsection F of 19.15.17.13 NMAC  Waste Material Sampling Plan - based upon the appropriate requirements of Subsection F of 19.15.17.13 NMAC  Disposal Facility Name and Permit Number (for liquids, drilling fluids and drill cuttings or in case on-site closure standards cannot be achieved)  Soil Cover Design - based upon the appropriate requirements of Subsection I of 19.15.17.13 NMAC  Re-vegetation Plan - based upon the appropriate requirements of Subsection I of 19.15.17.13 NMAC						

Operator Application Certification:  I hereby certify that the information submitted with this application is true, accurate and complete to the best of my knowledge and belief.
Name (Print): Title:
Signature: Date:
e-mail address: Telephone:
OCD Approval: Permit Application (including closure plan) Closure Plan (only) OCD Conditions (see attachment)  OCD Representative Signature: Approval Date: 12/10/2015  Title: CONTROLL Description (OCD Permit Number:
Closure Report (required within 60 days of closure completion): Subsection K of 19.15.17.13 NMAC  Instructions: Operators are required to obtain an approved closure plan prior to implementing any closure activities and submitting the closure report.  The closure report is required to be submitted to the division within 60 days of the completion of the closure activities. Please do not complete this section of the form until an approved closure plan has been obtained and the closure activities have been completed.  Closure Completion Date: 10\01\2018
22.  Closure Method:  Waste Excavation and Removal On-Site Closure Method Alternative Closure Method Waste Removal (Closed-loop systems only)  If different from approved plan, please explain.
Closure Report Regarding Waste Removal Closure For Closed-loop Systems That Utilize Above Ground Steel Tanks or Haul-off Bins Only:  Instructions: Please indentify the facility or facilities for where the liquids, drilling fluids and drill cuttings were disposed. Use attachment if more than two facilities were utilized.  Disposal Facility Name: Disposal Facility Permit Number:  Disposal Facility Name: Disposal Facility Permit Number:  Were the closed-loop system operations and associated activities performed on or in areas that will not be used for future service and operations?    Yes (If yes, please demonstrate compliance to the items below)   No  Required for impacted areas which will not be used for future service and operations:   Site Reclamation (Photo Documentation)   Soil Backfilling and Cover Installation   Re-vegetation Application Rates and Seeding Technique
Closure Report Attachment Checklist: Instructions: Each of the following items must be attached to the closure report. Please indicate, by a check mark in the box, that the documents are attached.  □ Proof of Closure Notice (surface owner and division) □ Proof of Deed Notice (required for on-site closure) □ Plot Plan (for on-site closures and temporary pits) □ Confirmation Sampling Analytical Results (if applicable) □ Waste Material Sampling Analytical Results (required for on-site closure) □ Disposal Facility Name and Permit Number □ Soil Backfilling and Cover Installation □ Re-vegetation Application Rates and Seeding Technique □ Site Reclamation (Photo Documentation) □ On-site Closure Location: Latitude 36.74208 Longitude -107.79919 NAD: □1927 ▼ 1983
25.  Operator Closure Certification:  I hereby certify that the information and attachments submitted with this closure report is true, accurate and complete to the best of my knowledge and
belief. I also certify that the closure complies with all applicable closure requirements and conditions specified in the approved closure plan.
Name (Print): Steve Moskal Title: Field Environmental Coordinator
Signature: Date: 11\26\2018
e-mail address. Steven.moskal@bpx.com Telephone 505-330-9179

22.						
Operator Closure Certification:						
I hereby certify that the information and attachments submitted with this closure repo	ort is true, accurate and complete to the best of my knowledge and					
belief. I also certify that the closure complies with all applicable closure requirement	belief. I also certify that the closure complies with all applicable closure requirements and conditions specified in the approved closure plan.					
Name (Print):	Title:					
Signature:	Date:					
e-mail address:	Telephone:					
C-man address.	receptione.					

District I
1625 N. French Dr., Hobbs, NM 88240
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District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico Energy Minerals and Natural Resources Department

Oil Conservation Division 1220 South St. Francis Dr. Santa Fe, NM 87505 Form C-141 Revised August 24, 2018 Submit to appropriate OCD District office

Incident ID	
District RP	
Facility ID	
Application ID	

## **Release Notification**

## **Responsible Party**

Responsible	Party BP A	America Produ	iction Compan	y OGRID 7	778		
Contact Name Steve Moskal Contact Telephone (505) 330-9179			Telephone (505) 330-9179				
Contact ema	Contact email Steven.Moskal@bpx.com Incident # (assigned by OCD)			# (assigned by OCD)			
Contact mailing address 380 North Airport Road, Durango, CO 81303			303				
Location of Release Source							
Latitude Longitude -107.79919  (NAD 83 in decimal degrees to 5 decimal places)							
Site Name H	EATH G	AS COM N 00	)1	Site Type	Natural Gas Well		
Date Release	Discovered			API# (if app	oplicable) 30-045-21053		
Unit Letter	Section	Township	Range	Cour	inty		
G	8	29N	09W	San J			
	Materia	l(s) Released (Select al		Volume of I	Release ic justification for the volumes provided below)		
Crude Oil		Volume Release		calculations or specific	Volume Recovered (bbls)		
Produced	Water	Volume Release	d (bbls)		Volume Recovered (bbls)		
Is the concentration of dissolved chloride produced water >10,000 mg/l?				loride in the	☐ Yes ☐ No		
Condensa	ite	Volume Release	d (bbls)		Volume Recovered (bbls)		
Natural Gas Volume Released (Mcf)			Volume Recovered (Mcf)				
Other (describe) Volume/Weight Released (provide units			Released (provide	units)	Volume/Weight Recovered (provide units)		
Cause of Release TPH, BTEX, & chloride all below below-grade tank (BGT) permit closure standards.							

Form C-141 Page 2

## State of New Mexico Oil Conservation Division

Incident ID	
District RP	
Facility ID	
Application ID	

Was this a major release as defined by	If YES, for what reason(s) does the respon	sible party consider this a major release?
19.15.29.7(A) NMAC?		
☐ Yes ⊠ No		
If YES, was immediate no	otice given to the OCD? By whom? To wh	om? When and by what means (phone, email, etc)?
	G,	(1)
Not required.		
	Initial Re	esponse
The responsible p	party must undertake the following actions immediately	unless they could create a safety hazard that would result in injury
☐ The source of the rele	ease has been stopped.	
☐ The impacted area has	s been secured to protect human health and	the environment.
Released materials ha	we been contained via the use of berms or d	ikes, absorbent pads, or other containment devices.
All free liquids and re	ecoverable materials have been removed and	managed appropriately.
If all the actions described	d above have <u>not</u> been undertaken, explain v	vhy:
has begun, please attach a	a narrative of actions to date. If remedial e	mediation immediately after discovery of a release. If remediation ifforts have been successfully completed or if the release occurred lease attach all information needed for closure evaluation.
regulations all operators are public health or the environn failed to adequately investiga	required to report and/or file certain release notified nent. The acceptance of a C-141 report by the O ate and remediate contamination that pose a threat	sest of my knowledge and understand that pursuant to OCD rules and ications and perform corrective actions for releases which may endanger CD does not relieve the operator of liability should their operations have at to groundwater, surface water, human health or the environment. In responsibility for compliance with any other federal, state, or local laws
Printed Name: Steve		Title: Environmental Coordinator
Signature:	Mry	Date:
email: Steven.Mosl	kal@bpx.com	Telephone: (505) 330-9179
OCD Only		
Received by:		Date:

#### BP AMERICA PRODUCTION COMPANY

SAN JUAN BASIN, NORTHWEST NEW MEXICO

#### BELOW-GRADE TANK CLOSURE PLAN

Heath Gas Com N # 1 - Tank ID: A

API #: 3004521053
Unit Letter G, Section 8, T29N, R09W

This plan will address the standard protocols and procedures for closure of below-grade tanks (BGTs) on BP America Production Company (BP) well sites. As stipulated in Paragraph A of 19.15.17.13 NMAC, BP shall close a BGT within the time periods provided in 19.15.17.13 NMAC, or by an earlier date that the New Mexico Oil Conservation Division (NMOCD) requires because of imminent danger to fresh water, public health, safety or the environment. If deviations from this plan are necessary, any specific changes will be included on form C-144 and approved by the NMOCD. BP shall close an existing BGT that does not meet the requirements of Paragraphs (1) through (4) of Subsection I of 19.15.17.11 NMAC or is not included in Paragraph (5) of Subsection I of 19.15.17.11 NMAC within five years after June 16, 2008, if not retrofit with a BGT that complies with the BP NMOCD approved BGT design attached to the BP Design and Construction Plan. BP shall close an existing BGT that does not meet the requirements of Paragraphs (1) through (4) of Subsection I of 19.15.17.11 NMAC, if not previously retrofitted to comply with the BP NMOCD approve BGT Design attached to the BP Design and Construction Plan, prior to any sale or change in operator pursuant to 19.15.9.9 NMAC. BP shall close the permitted BGT within 60 days of cessation of the BGTs operation or as required by the transitional provisions of Subsection B, D, or E of 19.15.17.17 NMAC.

#### **General Closure Plan**

1. BP shall notify the surface owner by certified mail that it plans to close a BGT. Evidence of mailing of the notice to the address of the surface owner shown in the county tax records demonstrates compliance with this requirement.

#### Notice is attached.

2. BP shall notify the division District III office verbally or by other means at least 72 hours, but not more than one (1) week, prior to any closure operation. The notice shall include the operator's name, and the location to be closed by unit letter, section, township and range. If the BGT closure is associated with a particular well, then the notice shall also include the well's name, number and API number.

#### Notice was provided and documented in the attached email.

- 3. BP shall remove liquids and sludge from the BGT prior to implementing a closure method and dispose of the liquids and sludge in a NMOCD's division-approved facility. The facilities to be used are:
  - a. BP Crouch Mesa Landfarm, Permit NM-02-003 (Solids)
  - b. JFJ Landfarm, Permit NM-01-010(B) (Solids and Sludge)
  - c. Basin Disposal, Permit NM-01-0005 (Liquids)
  - d. Envirotech Inc Soil Remediation Facility, Permit NM-01-0011 (Solids and Sludge)
  - e. BP Operated E.E. Elliott SWD #1, API 30-045-27799 (Liquids)
  - f. BP Operated 13 GCU SWD #1, API 30-045-28601 (Liquids)
  - g. BP Operated GCU 259 SWD, API 30-045-20006 (Liquids)
  - h. BP Operated GCU 306 SWD, API 30-045-24286 (Liquids)
  - i. BP Operated GCU 307 SWD, API 30-045-24248 (Liquids)
  - j. BP Operated GCU 328 SWD, API 30-045-24735 (Liquids)
  - k. BP Operated Pritchard SWD #1, API 30-045-28351 (Liquids)

All liquids and/or sludge within the BGT were removed and sent to one of the above NMOCD approved facilities for disposal.

4. BP shall remove the BGT and dispose of it in a NMOCD approved facility or recycle, reuse, or reclaim it in a manner that the NMOCD approves. If a liner is present and must be disposed of it will be cleaned by scraping any soils or other attached materials on the liner to a de minimus amount and disposed at a permitted solid waste facility, pursuant to Subparagraph (m) of Paragraph (1) of Subsection C of 19.15.35.8 NMAC. Documentation as to the final disposition of the removed BGT will be provided in the final closure report.

The BGT was transported for recycling.

5. BP shall remove any on-site equipment associated with a BGT unless the equipment is required for well production.

All equipment associated with the BGT has been removed.

6. BP shall test the soils beneath the BGT to determine whether a release has occurred. BP shall collect at a minimum: a five (5) point composite sample and individual grab samples from any area that is wet, discolored or showing other evidence of a release and analyze for BTEX, TPH and chlorides. The testing methods for those constituents are as follows;

Constituents	Testing Method	Release Verification	Sample
		(mg/Kg)	Results
Benzene	US EPA Method SW-846 8021B or 8260B	0.2	< 0.017
Total BTEX	US EPA Method SW-846 8021B or 8260B	50	< 0.069
TPH	US EPA Method SW-846 418.1	100	<49
Chlorides	US EPA Method 300.0 or 4500B	250 or background	<30

Notes:

mg/Kg = milligram per kilogram, BTEX = benzene, toluene, ethylbenzene, and total xylenes, TPH = total petroleum hydrocarbons. Other EPA methods that the division approves may be applied to all constituents listed. Chloride closure standards will be determined by which ever concentration level is greatest.

Soil beneath the BGT was sampled for TPH, BTEX, and chloride. All test parameters were below the stated limits. A field and laboratory reports are attached.

7. BP shall notify the division District III office of its results on form C-141. **C-141 is attached.** 

8. If it is determined that a release has occurred, then BP will comply with 19.15.30 NMAC and 19.15.29 NMAC, as appropriate.

Sampling results reveal no evidence of a release has occurred.

9. If the sampling demonstrates that a release has not occurred or that any release does not exceed the concentrations specified above, then BP shall backfill the excavation, with compacted, nonwaste containing, earthen material; construct a division-prescribed soil cover, re-contour and re-vegetate the location. The location will be reclaimed if it is not with in the active process area.

Sampling results reveal no evidence of a release has occurred. Area was backfilled with clean, earthen material and is within the active well pad.

10. BP shall reclaim the BGT location and all areas associated with the BGT including associated access roads to a safe and stable condition that blends with the surrounding undisturbed area. BP shall substantially restore the impacted surface area to the condition that existed prior to oil and gas operations by placement of the soil cover as provided in Subsection H of 19.15.17.13 NMAC, re-contour the location and associated areas to a contour that approximates the original contour and blends with the surrounding topography and re-vegetate according to Subsection I of 19.15.17.13 NMAC.

The BGT area has been backfilled and will be reclaimed once the well has been plugged & abandoned.

11. The soil cover for closures where the BGT has been removed or remediated to the NMOCD's satisfaction shall consist of the background thickness of topsoil or one foot of suitable material to establish vegetation at the site, whichever is greater. The soil cover will be constructed to the site's existing grade and all practicable efforts will be made to prevent ponding of water and erosion of the cover material.

# The BGT area has been backfilled and will be reclaimed once the well has been plugged & abandoned.

12. BP shall seed the disturbed area the first growing season after closure of the BGT. Seeding will be accomplished by drilling on the contour whenever practical or by other division-approved methods. Vegetative cover will be, at a minimum, 70% of the native perennial vegetative cover (un-impacted by overgrazing, fire or other intrusion damaging to native vegetation), consisting of at least three native plant species, including at least one grass, but not including noxious weeds, and maintenance of that cover through two successive growing seasons. During the two growing seasons that prove viability, there shall be no artificial irrigation of the vegetation.

The BGT area has been backfilled and will be reclaimed once the well has been plugged & abandoned.

13. BP shall seed, plant and re-seed pursuant to Paragraph (3) of Subsection I of 19.15.17.13 NMAC, until the location successfully achieves the required vegetative cover.

The BGT area has been backfilled and will be reclaimed once the well has been plugged & abandoned.

14. Pursuant to Paragraph (5) of Subsection I of 19.15.17.13 NMAC, BP shall notify the NMOCD when it has seeded or planted and when it successfully achieves re-vegetation.

BP will notify NMOCD when re-vegetation is successfully completed.

- 15. Within 60 days of closure completion, BP shall submit a closure report on NMOCD's form C-144, and will include the following;
  - a. proof of closure notification (surface owner and NMOCD)
  - b. sampling analytical reports; information required by 19.15.17 NMAC;
  - c. disposal facility name and permit number
  - d. details on back-filling, capping, covering, and where applicable re-vegetation application rates and seeding techniques and
  - e. site reclamation, photo documentation.

## <u>Closure report on C-144 form is included & contains a photo of the reclamation completion.</u>

16. BP shall certify that all information in the report and attachments is accurate, truthful, and compliant with all applicable closure requirements and conditions specified in the approved closure plan.

Certification section of C-144 has been completed.

#### RE: BP Pit Close Notification - HEATH GC N 001

Farrah Buckley <Farrah.Buckley@bpx.com>
 To:Smith, Cory, EMNRD,Fields, Vanessa, EMNRD (Vanessa.Fields@state.nm.us)
 Cc:jeffcblagg@aol.com,blagg\_njv@yahoo.com,Erin Dunman,Steven Moskal

September 28, 2018 12:14 PM

There is a typo in the original notice. I apologize. This is for the HEATH GAS COM N 001. I have fixed the note below. Thank you. Farrah

From: Farrah Buckley

Sent: Friday, September 28, 2018 10:01 AM

To: Smith, Cory, EMNRD; Fields, Vanessa, EMNRD (Vanessa.Fields@state.nm.us)

Cc: jeffcblagg@aol.com; blagg\_njv@yahoo.com; Erin Dunman; Steven.Moskal@BPX.COM

Subject: BP Pit Close Notification - HEATH GC N 001

September 28, 2018

BP America Production Company 380 Airport Rd Durango, CO 81303 Phone: (970) 247 6800

SENT VIA E-MAIL TO: CORY.SMITH@STATE.NM.US; VANESSA.FIELDS@STATE.NM.US

New Mexico Oil Conservation Division 1000 Rio Brazos Road Aztec, New Mexico 87410

RE: Notice of Proposed Below-Grade Tank (BGT) Closure

HEATH GAS COM N 001 API 30-045-21053 (G) Section 8 – T29N – R09W San Juan County, New Mexico

Dear Mr. Cory Smith and Mrs. Vanessa Fields,

In regards to the captioned subject and requirements of the NMOCD pit rule, this letter is notification that BP is planning to close a 21bbl BGT that will no longer be operational at this well site. We anticipate this work to start on or around October 1, 2018.

Should you have any questions, please feel free to contact BP.

Sincerely,

Steve Moskal BP Lower 48 – San Juan Field Environmental Coordinator Phone: (505) 330-9179

## Farrah Buckley

BGT Project Support 970-946-9199 -cell

This email and any attachments are intended only for the addressee(s) listed above and may contain confidential, proprietary, and/or privileged information. If you are not an intended recipient, please immediately advise the sender by return email, delete this email and any attachments, and destroy any copies of same. Any unauthorized review, use, copying disclosure or distribution of this email and any attachments is prohibited.



380 Airport Rd Durango, CO 81303 Phone: (970) 247 6800

September 28, 2018

Bureau of Land Management Whitney Thomas 6251 College Suite A Farmington, NM 87402

#### VIA EMAIL

Re: Notification of plans to close/remove a below grade tank Well Name: HEATH GAS COM N 001 API# - 3004521053

Dear Mrs. Thomas,

As part of the NM "Pit Rule": 19.15.17.13 Closure Requirements, Paragraph J. BP America Production Company (BP) is required to notify the surface owner of BP's plans to close/remove a below grade tank. BP wishes to inform you of our plans to close/remove the below grade tank on its well pad located on your surface. BP plans to commence this work on or about October 1, 2018. If there aren't any unforeseen problems, the work should be completed within 10 working days.

As a point of clarification, BP will be closing the below grade tank and either operating without one or replacing it with an above ground tank, the well site will continue to operate.

If witnessing of the tank removal is required please contact me for a specific time (505)-330-9179.

Sincerely,

Steve Moskal BP Lower 48 – San Juan Field Environmental Coordinator

CLIENT: BP	P.O. BOX 87, BLOOMFIELD, NM 87413			API #:	21053 A
FIELD REPORT:	(circle one): BGT CONFIRMATI			PAGE #: <b>1</b>	of <b>1</b>
SITE INFORMATIO	N: SITE NAME: <b>HEA</b>	TH GC N #1		DATE STARTED: 1	0/01/18
	2211	WW	SJ ST: NN		
1/4 -1/4/FOOTAGE: 1,710'N / 1					
LEASE #: <b>SF076337</b>		STF CONTRACTOR: BP	DIVE	LITTIN CONTINUENT IN CE	JCB
REFERENCE POIN		GPS COORD.: 3		202	E C27!
24 DCT (CM/DD)	GPS COORD.:	-		GL ELEV.: GL ELEV.:	
2)					
3)				CE/BEARING FROM W.H.:	
	GPS COORD.:		DISTANC	CE/BEARING FROM W.H.:	OVM
SAMPLING DATA:	CHAIN OF CUSTODY RECORD(	1		004 = D(0004 D(000 0 (0))	READING (ppm)
1) SAMPLE ID: 21 BG   5-p1	. @ 4' SAMPLE DATE:1	TOUR DESCRIPTION OF THE PARTY O	100/1002/00/00/00/00/00/00/00/00/00/00/00/00/	8015B/8021B/300.0 (CI)	0.0
SAMPLE ID:      SAMPLE ID:					
4) SAMPLE ID:					
5) SAMPLE ID:	SAMPLE DATE:	SAMPLE TIME:	LAB ANALYSIS:		
COHESION (ALL OTHERS): NON COHESIVE SLIGICONSISTENCY (NON COHESIVE SOILS): MOISTURE: DRY / SLIGHTLY MOIST MOIST SAMPLE TYPE: GRAB / COMPOSITE DISCOLORATION/STAINING OBSERVED: YES	LOOSE (FIRM) DENSE / VERY DEN WET / SATURATED / SUPER SATURAT H OF PTS5	HC ODOR DETECTED:	YES NO EXPLANATION -	IRM / STIFF / VERY STIFF / HARD	
SITE OBSERVATION APPARENT EVIDENCE OF A RELEASE OBSER EQUIPMENT SET OVER RECLAIMED AREA OTHER:	RVED AND/OR OCCURRED : YES NO				
EXCAVATION DIMENSION ESTIMATION	DN: NA ft. X N	A ft. X NA	ft. EXCAVATION	STIMATION (Cubic Yards) :	NA
DEPTH TO GROUNDWATER: 50' < x < 10	0' NEAREST WATER SOURCE: >	1,000' NEAREST SURFACE	WATER: < 300'	NMOCD TPH CLOSURE STD	. 100 ppm
SITE SKETCH	BGT Located: off on	site PLOT PLA	N circle: attached	OVM CALIB. READ. = 101	ppm   RF =1.00
			<b>A</b>	OVM CALIB. GAS = 100	ppm   KF = 1.00
×			N	TIME: 11:40 (am/pm DATE:	10/01/18
				MISCELL. N	OTES
	WOODEN R.W.			SIO #: 1900400054	
F	ENCE			REF #: P-1015	102
	PBG (x x x) T.B.			VID: VHIXONEV	11
ı	BERM B.C			PJ#:	
					5/14/10
			W.H.	OCD Appr. date(s): 02	2/09/17
			<b>⊕</b>	Tank OVM = Organic Vapo ID ppm = parts per milli	
				A BGT Sidewalls Visible:	
X - S.P.D.				BGT Sidewalls Visible: \	
	ATION DEPRESSION; B.G. = BELOW GRADE; BELOW-GRADE TANK LOCATION; SPD = SAN GLE WALL; DW - DOUBLE WALL; SB - SINGL	IPLE POINT DESIGNATION; R.W. =	RETAINING WALL; NA - NOT	BGT Sidewalls Visible: \( \) Magnetic declination:	-17 -7-0. 1-0.7
NOTES: GOOGLE EARTH IMA	The state of the s	ONSITE			

revised: 11/26/13 BEI1005E-6.SKF

#### **Analytical Report**

#### Lab Order 1810063

Date Reported: 10/3/2018

## Hall Environmental Analysis Laboratory, Inc.

**CLIENT:** Blagg Engineering

Client Sample ID: 21 BGT 5-pt @ 4'

Project: HE.

HEATH GAS COM N 001 Collection Date: 10/1/2018 12:05:00 PM

**Lab ID:** 1810063-001 **Matrix:** SOIL **Received Date:** 10/2/2018 8:00:00 AM

Analyses	Result	PQL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	MRA
Chloride	ND	30	mg/Kg	20	10/2/2018 11:30:59 AM	40726
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst	Irm
Diesel Range Organics (DRO)	ND	9.8	mg/Kg	1	10/2/2018 10:45:23 AM	40721
Motor Oil Range Organics (MRO)	ND	49	mg/Kg	1	10/2/2018 10:45:23 AM	40721
Surr: DNOP	113	50.6-138	%Rec	1	10/2/2018 10:45:23 AM	40721
EPA METHOD 8015D: GASOLINE RANGE					Analyst	NSB
Gasoline Range Organics (GRO)	ND	3.4	mg/Kg	1	10/2/2018 10:04:46 AM	40711
Surr: BFB	96.3	15-316	%Rec	1	10/2/2018 10:04:46 AM	40711
EPA METHOD 8021B: VOLATILES					Analyst	NSB
Benzene	ND	0.017	mg/Kg	1	10/2/2018 10:04:46 AM	40711
Toluene	ND	0.034	mg/Kg	1	10/2/2018 10:04:46 AM	40711
Ethylbenzene	ND	0.034	mg/Kg	1	10/2/2018 10:04:46 AM	40711
Xylenes, Total	ND	0.069	mg/Kg	1	10/2/2018 10:04:46 AM	40711
Surr: 4-Bromofluorobenzene	95.0	80-120	%Rec	1	10/2/2018 10:04:46 AM	40711

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

#### 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 Page 1 of 5
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Chain-of-Custody Record  Client: BP AMERICA			Turn-Around Time:									_		F 70° 80°							
Client:	BP A	MERICA	4	□ Standard	⋉Rush	SAME DAY		b												'AL	
			DEERING IN C.	Project Name	):																
Mailing	Address	:		HEATH GAS	5 COM N	201	www.hallenvironmental.com 4901 Hawkins NE - Albuquerque, NM 87109														
				Project #:						)5-34					505-						
Phone a	#: 500	<del>-</del> 320	-1193	1		97						*******	100000	10.4	Req						
email o		300		Project Manager:					0			-		Section 1				N. C.			
QA/QC F	Package: dard		☐ Level 4 (Full Validation)	STEVE MOSKAL					O / MRO)			SIMS)		PO <sub>4</sub> ,SO	PCB's						
Accredi	tation			Sampler: JEFF BLAKE					DRO			70 S		02,	082						
□ NEL	AP	☐ Othe	er	On Ice: X Yes □ No				+	30/	18.1	4.	8270		)3,N	8/8		(A				or N)
□ EDD (Type)								BE	(GF	pd 4	2 pc	0 0	stals	N,	ides	4	0				2
Date	Time	Matrix	Sample Request ID	Container Type and #  ModRet	Preservative Type	HEAL No. 18/00/3	BTEX +**	BTEX + MTBE + TPH (Gas only)	TPH 8015B (GRO	TPH (Method 418.1)	EDB (Method 504.1)	PAH's (8310	RCRA 8 Metals	Anions (F,CI,NO <sub>3</sub> ,NO <sub>2</sub> ,PO <sub>4</sub> ,SO <sub>4</sub> )	8081 Pesticides / 8082	8260B (VOA)	8270 (Semi-VOA)	CHORIDE			Air Bubbles (Y
0//2018	1205	SUIL	21 BGT 5-pt @ 4	40001	CEDL	701	X		X									X			
											$\neg$										1
											1										1
											-	-	-		-			$\vdash$	-	_	+
							-	-		-		$\dashv$				_			+	-	+
-							-				-	-	_					$\vdash$	+	+	-
							-											$\vdash$	$\dashv$	_	+
							-				_							$\vdash$			-
							_				_								_		
			2					_			_				-				$\perp$	_	
					,						- Se-										
Date: Time: Relinquished by:  Date: Time: Relinquished by:  Dill 1816 Mate Color				Received by:	uber	Date Time  16/1/8 16/0  Date Time  18/07/07/18  0800	Ren	nark	V	O E	et: Vi	4(XC	NE	EV1	1						

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, Inc.

WO#:

1810063

03-Oct-18

Client:

Blagg Engineering

Project:

HEATH GAS COM N 001

Sample ID MB-40726

SampType: mblk

TestCode: EPA Method 300.0: Anions

LowLimit

Client ID:

**PBS** 

Batch ID: 40726

RunNo: 54572

Prep Date: 10/2/2018 Analysis Date: 10/2/2018

SeqNo: 1810271

Units: mg/Kg

%RPD

%RPD

HighLimit

**RPDLimit** Qual

Analyte Chloride

**PQL** ND 1.5

Sample ID LCS-40726

10/2/2018

SampType: Ics

TestCode: EPA Method 300.0: Anions

Client ID: LCSS Batch ID: 40726

RunNo: 54572

SeqNo: 1810272

Units: mg/Kg

Prep Date: Analyte

Analysis Date: 10/2/2018

0

LowLimit

HighLimit

**RPDLimit** Qual

Chloride

1.5

15

SPK value SPK Ref Val 15.00

SPK value SPK Ref Val %REC

%REC 96.8

90

110

Qualifiers:

Value exceeds Maximum Contaminant Level.

D Sample Diluted Due to Matrix

Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

Practical Quanitative Limit

% Recovery outside of range due to dilution or matrix

Analyte detected in the associated Method Blank

E Value above quantitation range

Analyte detected below quantitation limits

Page 2 of 5

P Sample pH Not In Range

Reporting Detection Limit

Sample container temperature is out of limit as specified

## Hall Environmental Analysis Laboratory, Inc.

WO#:

1810063

03-Oct-18

Client:

Blagg Engineering

Project:

HEATH GAS COM N 001

Troject.	- GAS COM IN OUT										
Sample ID LCS-40721	SampType: LCS	TestCode: EPA Method 8015M/D: Diesel Range Organics									
Client ID: LCSS	Batch ID: 40721	RunNo: 54570									
Prep Date: 10/2/2018	Analysis Date: 10/2/2018	SeqNo: 1809314 Units: mg/Kg									
Analyte	Result PQL SPK valu	ue SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual									
Diesel Range Organics (DRO)	49 10 50.0	00 0 98.1 70 130									
Surr: DNOP	5.4 5.00	00 108 50.6 138									
Sample ID MB-40721	SampType: MBLK	TestCode: EPA Method 8015M/D: Diesel Range Organics									
Client ID: PBS	Batch ID: 40721	RunNo: <b>54570</b>									
Prep Date: 10/2/2018	Analysis Date: 10/2/2018	SeqNo: 1809315 Units: mg/Kg									
Analyte	Result PQL SPK valu	ue SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual									
Diesel Range Organics (DRO)	ND 10										
Motor Oil Range Organics (MRO)	ND 50										
Surr: DNOP	11 10.0	00 107 50.6 138									
Sample ID LCS-40665	SampType: LCS	TestCode: EPA Method 8015M/D: Diesel Range Organics									
Client ID: LCSS	Batch ID: 40665	RunNo: 54570									
Prep Date: 9/28/2018	Analysis Date: 10/2/2018	SeqNo: 1810169 Units: %Rec									
Analyte	Result PQL SPK valu	ie SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual									
Surr: DNOP	5.7 5.00	00 115 50.6 138									
Sample ID MB-40665	SampType: MBLK	TestCode: EPA Method 8015M/D: Diesel Range Organics									
Client ID: PBS	Batch ID: 40665	RunNo: <b>54570</b>									
Prep Date: 9/28/2018	Analysis Date: 10/2/2018	SeqNo: 1810170 Units: %Rec									
Analyte	Result PQL SPK valu	ue SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual									
Surr: DNOP	11 10.0	00 113 50.6 138									

#### 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

Page 3 of 5

P Sample pH Not In Range

RL Reporting Detection Limit

W Sample container temperature is out of limit as specified

#### Hall Environmental Analysis Laboratory, Inc.

WO#:

1810063

03-Oct-18

Client:

Blagg Engineering

Project:

HEATH GAS COM N 001

Sample ID MB-40711	SampT	ype: ME	BLK	TestCode: EPA Method 8015D: Gasoline Range							
Client ID: PBS	Batch	n ID: 40	711	RunNo: <b>54563</b>							
Prep Date: 10/1/2018	Analysis Date: 10/2/2018 SeqNo: 1809854 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	970		1000		97.5	15	316				

Sample ID LCS-40711	SampT	ype: <b>LC</b>	S	Tes	tCode: El	PA Method	8015D: Gaso	line Rang	е	
Client ID: LCSS	Batch	Batch ID: 40711 RunNo: 54563								
Prep Date: 10/1/2018	S	SeqNo: 1	809855	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	75.9	131			
Surr: BFB	1100		1000		110	15	316			

#### 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

Page 4 of 5

P Sample pH Not In Range

RL Reporting Detection Limit

W Sample container temperature is out of limit as specified

## Hall Environmental Analysis Laboratory, Inc.

WO#:

1810063

03-Oct-18

Client:

**Blagg Engineering** 

Project:

HEATH GAS COM N 001

Sample ID MB-40711	SampType: MBLK			Tes	tCode: El					
Client ID: PBS	Batch ID: 40711			F	RunNo: 5	4563				
Prep Date: 10/1/2018	Analysis D	0/2/2018	S	SeqNo: 1	809898	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	0.95		1.000		95.2	80	120			

Sample ID LCS-40711	SampT	ype: LC	S	TestCode: EPA Method 8021B: Volatiles									
Client ID: LCSS	Batch	ID: 40	711	RunNo: <b>54563</b>									
Prep Date: 10/1/2018	Analysis D	ate: 10	0/2/2018	S	SeqNo: 1	809899	Units: mg/K						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual			
Benzene	0.89	0.025	1.000	0	89.1	77.3	128						
Toluene	0.93	0.050	1.000	0	92.8	79.2	125						
Ethylbenzene	0.92	0.050	1.000	0	92.0	80.7	127						
Xylenes, Total	2.8	0.10	3.000	0	93.2	81.6	129						
Surr: 4-Bromofluorobenzene	0.93		1.000		92.6	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

etected below quantitation limits Page 5

P Sample pH Not In Range

RL Reporting Detection Limit

W Sample container temperature is out of limit as specified

Page 5 of 5



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

С	lient Name:	BLAGG		Work	Order Numb	er: 181	0063			RcptNo:	1
Re	eceived By:	Anne Tho	me	10/2/20	18 8:00:00 A	M		an	A	-	
Co	ompleted By:	Anne Tho	/	1 0/	18 8:08:51 A	M		an	1.		
/	eviewed By:	JAKS Ly:	10/02	2/18							
Ch	ain of Cus	tody									
1.	Is Chain of Co	ustody comp	lete?			Yes	<b>V</b>	No		Not Present	
2.	How was the	sample deliv	ered?			Cou	rier				
L	og In										
_	Was an atter	npt made to o	cool the samp	les?		Yes	$\checkmark$	No		NA 🗌	
4.	Were all samp	oles received	at a tempera	ture of >0° C t	to 6.0°C	Yes	<b>V</b>	No		NA 🗆	
5.	Sample(s) in p	proper conta	iner(s)?			Yes	<b>v</b>	No			
6.	Sufficient sam	ple volume f	or indicated to	est(s)?		Yes	<b>~</b>	No			
7.	Are samples (	except VOA	and ONG) pro	operly preserve	ed?	Yes	<b>~</b>	No			
8. 1	Vas preserva	tive added to	bottles?			Yes		No	<b>V</b>	NA 🗆	
9. \	VOA vials have	e zero heads	pace?			Yes		No		No VOA Vials	
10.	Were any san	nple containe	ers received b	roken?		Yes		No	<b>✓</b>	# of preserved	10/02/11
11.1	Does paperwo	ork match bot	tle labels?			Yes	~	No		bottles checked for pH:	1
	Note discrepa			)						(<2 or	(unless noted)
12.	Are matrices o	correctly iden	tified on Chai	n of Custody?		Yes	<b>V</b>	No		Adjusted?	
	s it clear what			?		Yes	<b>V</b>	No			
	Nere all holdir If no, notify cu					Yes	<b>V</b>	No		Checked by:	
Spe	cial Handli	ing (if app	licable)								
				with this order?		Yes		No		NA 🗹	
	Person	Notified:		tel 2 states int. Administrative variation of the construction of	Date	The second second			TO STATE WHITE		
	By Who	m:			Via:	eM	ail 🗌	Phone	Fax	In Person	
	Regardi	ng:		TO THE PERSON NAMED IN THE PERSON NAMED IN		AND SECURITION OF THE PARTY.	tacini lakkada pakoda	energy contractions, currently	ero adana		
	Client In	structions:		anne en		Anti-Anna an			MANAGE OF CONTRACT		
16.	Additional rer	marks:						70.00			
17.	Cooler Infon	mation									
	Cooler No		Condition	Seal Intact	Seal No	Seal D	ate	Signed	Ву		
	1	1.3	Good	Yes			_			1	



