

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

Form C-144
Revised June 6, 2013

For temporary pits, below-grade tanks, and multi-well fluid management pits, submit to the appropriate NMOCD District Office.
For permanent pits submit to the Santa Fe Environmental Bureau office and provide a copy to the appropriate NMOCD District Office.

Pit, Below-Grade Tank, or

13972 Proposed Alternative Method Permit or Closure Plan Application

Type of action: Below grade tank registration
 Permit of a pit or proposed alternative method
 Closure of a pit, below-grade tank, or proposed alternative method
 Modification to an existing permit/or registration
 Closure plan only submitted for an existing permitted or non-permitted pit, below-grade tank, or proposed alternative method

OIL CONS. DIV DIST. 3

FEB 02 2016

Instructions: Please submit one application (Form C-144) per individual pit, 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.

1.
Operator: BP AMERICA PRODUCTION COMPANY OGRID #: 778
Address: 200 ENERGY COURT, FARMINGTON, NM 87401
Facility or well name: GALLEGOS CANYON UNIT 520
API Number: 3004528595 OCD Permit Number: _____
U/L or Qtr/Qtr J Section 22.0 Township 29.0N Range 12W County: San Juan
Center of Proposed Design: Latitude 36.709852 Longitude -108.082679 NAD: 1927 1983
Surface Owner: Federal State Private Tribal Trust or Indian Allotment

2.
 Pit: Subsection F, G or J of 19.15.17.11 NMAC
Temporary: Drilling Workover
 Permanent Emergency Cavitation P&A Multi-Well Fluid Management Low Chloride Drilling Fluid yes no
 Lined Unlined Liner type: Thickness _____ mil LLDPE HDPE PVC Other _____
 String-Reinforced
Liner Seams: Welded Factory Other _____ Volume: _____ bbl Dimensions: L _____ x W _____ x D _____

3.
 Below-grade tank: Subsection I of 19.15.17.11 NMAC TANK ID: B
Volume: 95 bbl Type of fluid: PRODUCED WATER
Tank Construction material: STEEL
 Secondary containment with leak detection Visible sidewalls, liner, 6-inch lift and automatic overflow shut-off
 Visible sidewalls and liner Visible sidewalls only Other _____
Liner type: Thickness _____ mil HDPE PVC Other Double walled/Double bottom, sidewalls not visible

4.
 Alternative Method:
Submittal of an exception request is required. Exceptions must be submitted to the Santa Fe Environmental Bureau office for consideration of approval.

5.
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 4' HOGWIRE WITH SINGLE BARBED WIRE

6.
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)

7.
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

8.
Variations 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:
 Variance(s): Requests must be submitted to the appropriate division district for consideration of approval.
 Exception(s): Requests must be submitted to the Santa Fe Environmental Bureau office for consideration of approval.

9.
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 acceptable source material are provided below. Siting criteria does not apply to drying pads or above-grade tanks.

General siting	
Ground water is less than 25 feet below the bottom of a low chloride temporary pit or below-grade tank. - <input checked="" type="checkbox"/> NM Office of the State Engineer - iWATERS database search; <input type="checkbox"/> USGS; <input type="checkbox"/> Data obtained from nearby wells	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> NA
Ground water is less than 50 feet below the bottom of a Temporary pit, permanent pit, or Multi-Well Fluid Management pit. NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> NA
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. (Does not apply to below grade tanks) - Written confirmation or verification from the municipality; Written approval obtained from the municipality	<input type="checkbox"/> Yes <input type="checkbox"/> No
Within the area overlying a subsurface mine. (Does not apply to below grade tanks) - Written confirmation or verification or map from the NM EMNRD-Mining and Mineral Division	<input type="checkbox"/> Yes <input type="checkbox"/> No
Within an unstable area. (Does not apply to below grade tanks) - Engineering measures incorporated into the design; NM Bureau of Geology & Mineral Resources; USGS; NM Geological Society; Topographic map	<input type="checkbox"/> Yes <input type="checkbox"/> No
Within a 100-year floodplain. (Does not apply to below grade tanks) - FEMA map	<input type="checkbox"/> Yes <input type="checkbox"/> No
Below Grade Tanks	
Within 100 feet of a continuously flowing watercourse, significant watercourse, lake bed, sinkhole, wetland or playa lake (measured from the ordinary high-water mark). - Topographic map; Visual inspection (certification) of the proposed site	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Within 200 horizontal feet of a spring or a fresh water well used for public or livestock consumption; - NM Office of the State Engineer - iWATERS database search; Visual inspection (certification) of the proposed site	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Temporary Pit using Low Chloride Drilling Fluid (maximum chloride content 15,000 mg/liter)	
Within 100 feet of a continuously flowing watercourse, or any other significant watercourse or within 200 feet of any lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark). (Applies to low chloride temporary pits.) - Topographic map; Visual inspection (certification) of the proposed site	<input type="checkbox"/> Yes <input type="checkbox"/> No
Within 300 feet from a occupied 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	<input type="checkbox"/> Yes <input type="checkbox"/> No
Within 200 horizontal feet of a spring or a private, domestic fresh water well used by less than five households for domestic or stock watering purposes, or 300feet of any other fresh water well or spring, in existence at the time of the initial application. NM Office of the State Engineer - iWATERS database search; Visual inspection (certification) of the proposed site	<input type="checkbox"/> Yes <input type="checkbox"/> No

<p>Within 100 feet of a wetland.</p> <ul style="list-style-type: none"> - US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site 	<input type="checkbox"/> Yes <input type="checkbox"/> No
<p><u>Temporary Pit Non-low chloride drilling fluid</u></p>	
<p>Within 300 feet of a continuously flowing watercourse, or any other significant watercourse, or within 200 feet of any lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark).</p> <ul style="list-style-type: none"> - Topographic map; Visual inspection (certification) of the proposed site 	<input type="checkbox"/> Yes <input type="checkbox"/> No
<p>Within 300 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application.</p> <ul style="list-style-type: none"> - Visual inspection (certification) of the proposed site; Aerial photo; Satellite image 	<input type="checkbox"/> Yes <input type="checkbox"/> No
<p>Within 500 horizontal feet of a spring or a private, domestic fresh water well used by less than five households for domestic or stock watering purposes, or 1000 feet of any other fresh water well or spring, in the existence at the time of the initial application;</p> <ul style="list-style-type: none"> - NM Office of the State Engineer - iWATERS database search; Visual inspection (certification) of the proposed site 	<input type="checkbox"/> Yes <input type="checkbox"/> No
<p>Within 300 feet of a wetland.</p> <ul style="list-style-type: none"> - US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site 	<input type="checkbox"/> Yes <input type="checkbox"/> No
<p><u>Permanent Pit or Multi-Well Fluid Management Pit</u></p>	
<p>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).</p> <ul style="list-style-type: none"> - Topographic map; Visual inspection (certification) of the proposed site 	<input type="checkbox"/> Yes <input type="checkbox"/> No
<p>Within 1000 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application.</p> <ul style="list-style-type: none"> - Visual inspection (certification) of the proposed site; Aerial photo; Satellite image 	<input type="checkbox"/> Yes <input type="checkbox"/> No
<p>Within 500 horizontal feet of a spring or a fresh water well used for domestic or stock watering purposes, in existence at the time of initial application.</p> <ul style="list-style-type: none"> - NM Office of the State Engineer - iWATERS database search; Visual inspection (certification) of the proposed site 	<input type="checkbox"/> Yes <input type="checkbox"/> No
<p>Within 500 feet of a wetland.</p> <ul style="list-style-type: none"> - US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site 	<input type="checkbox"/> Yes <input type="checkbox"/> No

10.

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 19.15.17.11 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: _____

11.

Multi-Well Fluid Management Pit 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.

- Design Plan - based upon the appropriate requirements of 19.15.17.11 NMAC
- Operating and Maintenance Plan - based upon the appropriate requirements of 19.15.17.12 NMAC
- A List of wells with approved application for permit to drill associated with the pit.
- 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
- Hydrogeologic Data - based upon the requirements of Paragraph (4) of Subsection B of 19.15.17.9 NMAC
- Siting Criteria Compliance Demonstrations - based upon the appropriate requirements of 19.15.17.10 NMAC

Previously Approved Design (attach copy of design) API Number: _____ or Permit Number: _____

12. **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
- Liner Specifications and Compatibility Assessment - 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 H₂S, 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

13. **Proposed Closure:** 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 Multi-well Fluid Management Pit
 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

14. **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 C 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 H of 19.15.17.13 NMAC
- Site Reclamation Plan - based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC

15. **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 require justifications and/or demonstrations of equivalency. Please refer to 19.15.17.10 NMAC for guidance.

Ground water is less than 25 feet below the bottom of the buried waste. - NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
Ground water is between 25-50 feet below the bottom of the buried waste - NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> 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	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
Within 100 feet of a continuously flowing watercourse, or 200 feet of any other significant watercourse, lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark). - Topographic map; Visual inspection (certification) of the proposed site	<input type="checkbox"/> Yes <input type="checkbox"/> No
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	<input type="checkbox"/> Yes <input type="checkbox"/> No
Within 300 horizontal feet of a private, domestic fresh water well or spring used for domestic or stock watering purposes, in existence at the time of initial application. - NM Office of the State Engineer - iWATERS database; Visual inspection (certification) of the proposed site	<input type="checkbox"/> Yes <input type="checkbox"/> No
Written confirmation or verification from the municipality; Written approval obtained from the municipality	<input type="checkbox"/> Yes <input type="checkbox"/> No
Within 300 feet of a wetland. US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site	<input type="checkbox"/> Yes <input type="checkbox"/> No
Within incorporated municipal boundaries or within a defined municipal fresh water well field covered under a municipal ordinance	<input type="checkbox"/> Yes <input type="checkbox"/> No

adopted pursuant to NMSA 1978, Section 3-27-3, as amended. - Written confirmation or verification from the municipality; Written approval obtained from the municipality	<input type="checkbox"/> Yes <input type="checkbox"/> No
Within the area overlying a subsurface mine. - Written confirmation or verification or map from the NM EMNRD-Mining and Mineral Division	<input type="checkbox"/> Yes <input type="checkbox"/> No
Within an unstable area. - Engineering measures incorporated into the design; NM Bureau of Geology & Mineral Resources; USGS; NM Geological Society; Topographic map	<input type="checkbox"/> Yes <input type="checkbox"/> No
Within a 100-year floodplain. - FEMA map	<input type="checkbox"/> Yes <input type="checkbox"/> No

16. **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 E of 19.15.17.13 NMAC
 Construction/Design Plan of Burial Trench (if applicable) based upon the appropriate requirements of Subsection K 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 19.15.17.11 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 19.15.17.13 NMAC
 Waste Material Sampling Plan - based upon the appropriate requirements 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 H of 19.15.17.13 NMAC
 Re-vegetation Plan - based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC
 Site Reclamation Plan - based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC

17. **Operator Application Certification:**

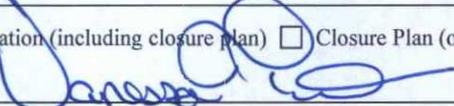
I hereby certify that the information submitted with this application is true, accurate and complete to the best of my knowledge and belief.

Name (Print): STEVEN MOSKAL Title: FIELD ENVIRONMENTAL ADVISOR

Signature:  Date: 2/1/2016

e-mail address: Steven.Moskal@bp.com Telephone: 505-326-9497

18. **OCD Approval:** Permit Application (including closure plan) Closure Plan (only) OCD Conditions (see attachment)

OCD Representative Signature:  Approval Date: 2/18/2016

Title: Environmental Specialist OCD Permit Number: _____

19. **Closure Report (required within 60 days of closure completion):** 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: _____

20. **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.

21. **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 for private land only)
 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 _____ Longitude _____ NAD: 1927 1983

22.

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): _____ Title: _____

Signature: _____ Date: _____

e-mail address: _____ Telephone: _____



BP America Production Company

200 Energy Court
Farmington, NM 87401
Phone: (505) 326-9200

February 1, 2016

Mr. Cory Smith
Environmental Specialist
New Mexico Oil Conservation Division
1000 Rio Brazos Road
Aztec, NM 87410

Re: Gallegos Canyon Unit 520; 95 bbl BGT, Tank B
API No. 3004528595; Unit letter J, Section 22, T29N, R12W

Dear Mr. Smith:

BP America respectfully requests a variance from the fencing requirement for below grade tanks specified in Subsection D of Rule 19.15.17.11 which states a four feet high fence of barbed wire, evenly spaced is required.

BP plans to install a four feet high fence consisting of hogwire, with a single strand of barbed wire place above the hogwire on top of the fence. This fence will be equal or more protective than the specified fence listed under the current rule. Details regarding the fencing plan are included in the attached closure plan.

If you have any questions or concerns, please contact me at (505) 326-9497 or at Steven.Moskal@bp.com.

Sincerely,

Steve Moskal
Field Environmental Coordinator

SITING AND HYDRO-GEOLOGICAL REPORT FOR GALLEGOS CANYON UNIT 520

SITING CRITERIA 19.15.17.10 NMAC

Depth to groundwater at the site is estimated to be above 100 feet. This estimation is based on data from Stone and others (1983), and depth to groundwater data obtained from water wells permitted by the New Mexico State Engineer's Office (attached). Local topography and proximity to adjacent water features are also considered. An aerial map provided as Figures 1, demonstrates, based on multiple database sources, that there are no freshwater wells or springs used for public or livestock consumption within 200 feet of the proposed below grade tank (BGT) position. A topographic map (Figure 2) demonstrates that the BGT is not within 100 feet of any continuously flowing watercourse, significant watercourse, lake bed, sinkhole, wetland or playa lake as measured from the ordinary high water mark.

LOCAL GEOLOGY AND HYDROLOGY

This particular site is located on Nacimiento Formation outcrops forming Crouch Mesa between the Animas and San Juan rivers. The site is located on a mesa top. The San Juan River is over a mile south of the site, and approximately 250 feet lower in elevation.

REGIONAL GEOLOGY AND HYDROLOGY

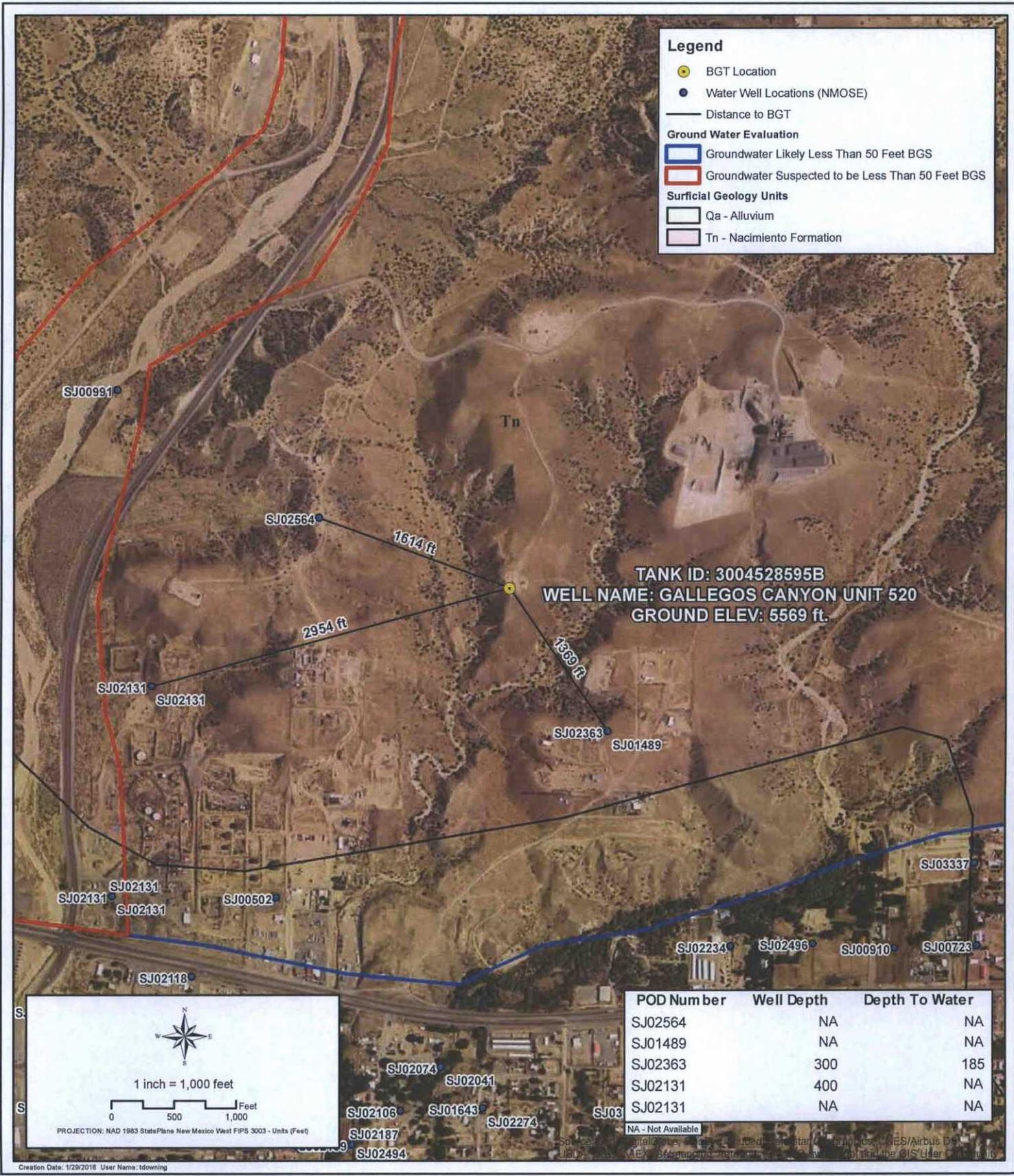
The San Juan Basin is situated in the Navajo section of the Colorado Plateau and is characterized by broad open valleys, mesas, buttes and hogbacks. Away from major valleys and canyons topographic relief is generally low. Native vegetation is sparse and shrubby. Drainage is mainly by the San Juan River, the only permanent stream in the Navajo Section of the Colorado Plateau. The San Juan River is a tributary of the Colorado River. Major tributaries include the Animas, Chaco and La Plata Rivers. Flow of the San Juan River across the basin is regulated by the Navajo Dam, located about 30 miles northeast of Farmington, New Mexico. The climate is arid to semiarid with an average annual precipitation of 8 to 10 inches. Soils within the basin consist of weathered parent rock derived from predominantly physical means mostly from eolian depositional system with fluvial having a lesser impact.

Cretaceous and Tertiary sandstones, as well as Quaternary Alluvial deposits, serve as the primary aquifers in the San Juan Basin (Stone et al., 1983). In most of the proposed area, the Nacimiento Formation lies at the surface and grades into the Animas Formation to the west. The lower part of the Nacimiento Formation is composed of interbedded black, carbonaceous mudstones and white coarse-grained sandstones. The upper part is comprised of mudstone and sandstone. It is generally slope-forming, even within the sandstone units. Thickness of the Nacimiento ranges from 418 to 2,232 feet (Stone et al., 1983). Aquifers within the coarser and continuous sandstone bodies of the Nacimiento Formation are between 0 and 1,000 feet deep in this section of the basin. Wells within these bodies flow from 16 to 100 gallons per minute (gpm), and transmissivities are expected to be 100 ft.²/d (Stone et al., 1983). Groundwater within these aquifers flows toward the San Juan River.

References

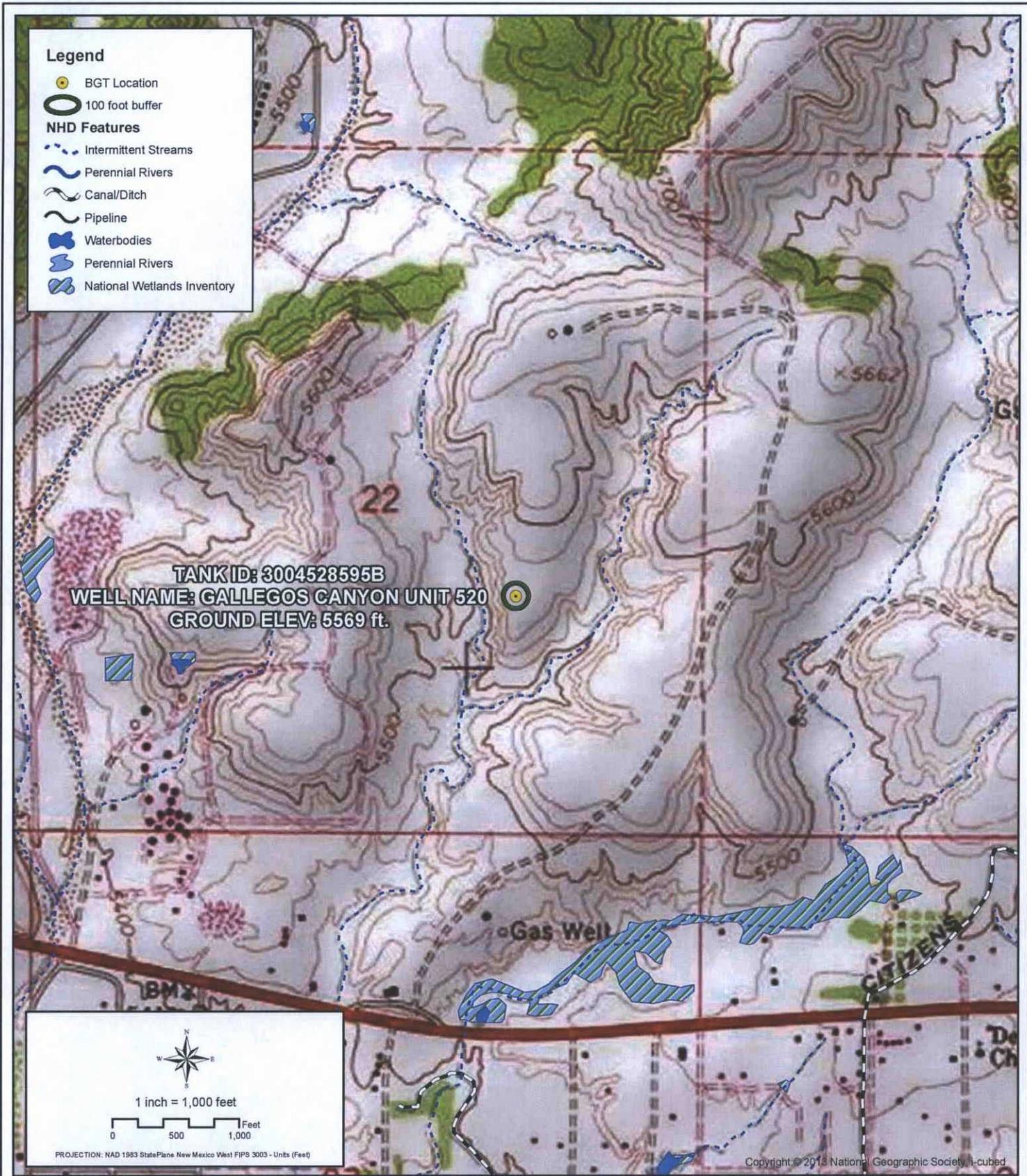
Circular 154—Guidebook to coal geology of northwest New Mexico by E. C. Beaumont, J. W. Shomaker, W. J. Stone, and others, 1976

Stone, et al., 1983, Hydrogeology and Water Resources of the San Juan Basin, New Mexico, Socorro, New Mexico Bureau of Mines and Mineral Resources Hydrologic Report 6, 70 p



 **GROUNDWATER AND WATER WELL PROXIMITY**
WELL NAME: GALLEGOS CANYON UNIT 520
API NUMBER: 3004528595 TANK ID: 3004528595B
SECTION 22, TOWNSHIP 29.0N, RANGE 12W, P.M. NM23

FIGURE 1



PROXIMITY TO WATERCOURSES AND WETLANDS

WELL NAME: GALLEGOS CANYON UNIT 520
 API NUMBER: 3004528595 TANK ID: 3004528595B
 SECTION 22, TOWNSHIP 29.0N, RANGE 12W, P.M. NM23

FIGURE
2



New Mexico Office of the State Engineer

Wells with Well Log Information

No wells found.

Basin/County Search:

Basin: San Juan

County: San Juan

UTMNAD83 Radius Search (in meters):

Easting (X): 224638.56

Northing (Y): 4067116.65

Radius: 60.96

The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, usability, or suitability for any particular purpose of the data.



New Mexico Office of the State Engineer
Wells Without Well Log Information

No wells found.

Basin/County Search:

Basin: San Juan

County: San Juan

UTMNAD83 Radius Search (in meters):

Easting (X): 224638.56

Northing (Y): 4067116.65

Radius: 60.96



New Mexico Office of the State Engineer

Point of Diversion with Meter Attached

No PODs found.

Basin/County Search:

Basin: San Juan

County: San Juan

UTMNAD83 Radius Search (in meters):

Easting (X): 224638.56

Northing (Y): 4067116.65

Radius: 60.96

The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, usability, or suitability for any particular purpose of the data.



New Mexico Office of the State Engineer

Wells with Well Log Information

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

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

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

(NAD83 UTM in meters)

(in feet)

POD Number	POD Sub-Code	basin	County	Source	q	q	q	Sec	Tws	Rng	X	Y	Distance	Start Date	Finish Date	Log File Date	Depth Well	Depth Water	Driller	License Number
SJ 02363			SJ	Shallow	4	4	22	29N	12W		224867	4066767*	417	01/14/1993	01/15/1993	01/25/1993	300	185	HOOD, TERRY	717
SJ 02496			SJ	Shallow	4	1	1	26	29N	12W	225351	4066241*	1128	08/16/1993	08/20/1993	09/09/1993	35	20	THOMPSON, LEON	527
SJ 02041			SJ	Shallow	3	2	27	29N	12W		224440	4065970*	1163	04/22/1986	04/25/1986	10/11/1988	37	8	CHIVERS,BRYCE	809
SJ 02074			SJ	Shallow	3	2	27	29N	12W		224440	4065970*	1163	08/01/1986	08/03/1986	10/11/1988	60	25	CHIVERS,BRYCE	809
SJ 02118			SJ	Shallow			1	27	29N	12W	223839	4066207*	1211	06/17/1987	06/18/1987	06/22/1987	29		6 CHIVERS DRILLING CO.	809
SJ 01643			SJ	Shallow	4	3	2	27	29N	12W	224539	4065869*	1251	05/03/1986	05/09/1986	05/15/1986	65	30	CHIVERS,BRYCE	809
SJ 02274			SJ	Shallow	4	3	2	27	29N	12W	224539	4065869*	1251	05/29/1990	05/29/1990	06/08/1990	47	22	CHIVERS DRILLING COMPANY	809
SJ 03394			SJ	Shallow	4	4	2	27	29N	12W	224938	4065851*	1300	07/07/2003	07/07/2003	07/11/2003	59	15	DEE GILES	1479
SJ 03422			SJ	Shallow	2	3	1	27	29N	12W	223737	4066105*	1355	02/08/2004	02/08/2004	02/13/2004	41	31	HOOD, TERRY	717
SJ 02058			SJ	Shallow				27	29N	12W	224218	4065793*	1388	06/19/1986	06/21/1986	06/26/1986	60	25	HOOD, TERRY	717
SJ 02169			SJ	Shallow				27	29N	12W	224218	4065793*	1388	04/08/1988	04/11/1988	04/27/1988	36	19	THOMPSON, LEON	527
SJ 04037 POD1			SJ	Shallow	1	2	4	27	29N	12W	224757	4065678	1442	03/18/2013	03/19/2013	04/01/2013	43	23	MARK BAILEY	1357
SJ 02506			SJ	Shallow	2	1	4	27	29N	12W	224526	4065662*	1458	09/21/1993	09/25/1993	08/19/1996	44	20	THOMPSON, LEON	527
SJ 01109			SJ	Shallow	1	1	2	26	29N	12W	225947	4066409*	1487	03/25/1980	04/01/1980	04/16/1980	100	70	THOMPSON, LEON	527
SJ 01590			SJ	Shallow	3	1	27	29N	12W		223638	4066006*	1494	06/20/1982	06/25/1982	07/13/1982	63	30	THOMPSON, LEON	527
SJ 00726			SJ	Shallow	1	3	1	27	29N	12W	223537	4066105*	1495	07/22/1978	07/24/1978	07/26/1978	50	30	JOHNNIE'S LUCKY "7" DRLG.	777

*UTM location was derived from PLSS - see Help

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

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

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

(NAD83 UTM in meters)

(in feet)

POD Number	POD Sub-Code	basin	County	Source	6416 4	q q q	Sec	Tws	Rng	X	Y	Distance	Start Date	Finish Date	Log File Date	Depth Well	Depth Water	Driller	License Number
SJ 02654			SJ	Shallow	1	3 1	27	29N	12W	223537	4066105*	1495	07/30/1995	08/12/1995	08/21/1996	62	32	DAVID L. MCDONALD	725
SJ 00666			SJ	Shallow	4	3 1	27	29N	12W	223737	4065905*	1510	06/03/1978	06/05/1978	06/15/1978	35	17	LEON THOMPSON	527
SJ 01828			SJ	Shallow	4	3 1	27	29N	12W	223737	4065905*	1510	05/03/1984	05/05/1984	05/11/1984	45	25	HOOD, TERRY	717
SJ 02870			SJ	Shallow	4	3 1	27	29N	12W	223737	4065905*	1510	11/07/1998	11/07/1998	11/12/1998	39	24	TERRY HOOD	717
SJ 03384			SJ	Shallow	4	3 1	27	29N	12W	223737	4065905*	1510	07/20/2003	07/21/2003	07/31/2003	41	30	TERRY HOOD	717
SJ 02183			SJ	Shallow	1	4	27	29N	12W	224427	4065563*	1567	05/05/1988	05/05/1988	05/11/1988	40	26	THOMPSON, LEON	527
SJ 01991			SJ	Shallow	2	4	27	29N	12W	224826	4065545*	1582	10/29/1985	10/31/1985	11/08/1985	50	13	CHIVERS,BRYCE	809

Record Count: 23

Basin/County Search:

Basin: San Juan

County: San Juan

UTMNAD83 Radius Search (in meters):

Easting (X): 224638.56

Northing (Y): 4067116.65

Radius: 1609.3

*UTM location was derived from PLSS - see Help

The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, usability, or suitability for any particular purpose of the data.



New Mexico Office of the State Engineer

Wells Without Well Log Information

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

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

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

(quarters are smallest to largest)

(NAD83 UTM in meters)

POD Number	POD		County	Source	q q q				Rng	X	Y	Distance	
	Code	Subbasin			64	16	4	Sec					Tws
<u>SJ 01489</u>			SJ		4	4	22	29N	12W	224867	4066767*	417	
<u>SJ 02564</u>			SJ		2	2	3	22	29N	12W	224181	4067298*	492
<u>SJ 02131 DCL</u>			SJ	Shallow	2	3	3	22	29N	12W	223762	4066908*	901
<u>SJ 02131 S</u>			SJ	Shallow	2	3	3	22	29N	12W	223762	4066908*	901
<u>SJ 00502</u>			SJ		2	1	27	29N	12W	224052	4066393*	931	
<u>SJ 02234</u>			SJ		3	1	1	26	29N	12W	225151	4066241*	1014
<u>SJ 00991</u>			SJ		3	1	22	29N	12W	223698	4067618*	1065	
<u>SJ 02557</u>			SJ		1	3	1	26	29N	12W	225138	4066034*	1192
<u>SJ 02131</u>			SJ	Shallow	1	1	27	29N	12W	223651	4066408*	1215	
<u>SJ 02131 EXPL 1</u>			SJ	Shallow	1	1	27	29N	12W	223651	4066408*	1215	
<u>SJ 02131 EXPL 2</u>			SJ	Shallow	1	1	27	29N	12W	223651	4066408*	1215	
<u>SJ 02131 S-2</u>			SJ	Shallow	1	1	27	29N	12W	223651	4066408*	1215	
<u>SJ 02131 S-3</u>			SJ	Shallow	1	1	27	29N	12W	223651	4066408*	1215	
<u>SJ 02131 S-4</u>			SJ	Shallow	1	1	27	29N	12W	223651	4066408*	1215	
<u>SJ 02131 S-5</u>			SJ	Shallow	1	1	27	29N	12W	223651	4066408*	1215	
<u>SJ 02131 S-6</u>			SJ	Shallow	1	1	27	29N	12W	223651	4066408*	1215	
<u>SJ 02131 S-7</u>			SJ	Shallow	1	1	27	29N	12W	223651	4066408*	1215	
<u>SJ 02131 S-8</u>			SJ	Shallow	1	1	27	29N	12W	223651	4066408*	1215	
<u>SJ 02131 S-9</u>			SJ	Shallow	1	1	27	29N	12W	223651	4066408*	1215	
<u>SJ 02131 T</u>			SJ		1	1	27	29N	12W	223651	4066408*	1215	
<u>SJ 00910</u>			SJ		3	2	1	26	29N	12W	225549	4066225*	1274
<u>SJ 02202</u>			SJ		4	1	27	29N	12W	224039	4065988*	1278	
<u>SJ 02106</u>			SJ		3	3	2	27	29N	12W	224339	4065869*	1283
<u>SJ 03337</u>			SJ		2	2	1	26	29N	12W	225749	4066425*	1308
<u>SJ 03338</u>			SJ		2	2	1	26	29N	12W	225749	4066425*	1308
<u>SJ 03339</u>			SJ		2	2	1	26	29N	12W	225749	4066425*	1308

*UTM location was derived from PLSS - see Help

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

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

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

(quarters are smallest to largest)

(NAD83 UTM in meters)

POD Number	POD		County	Source	q q q					X	Y	Distance	
	Code	Subbasin			64	16	4	Sec	Tws				Rng
<u>SJ 00354</u>			SJ		3	1	26	29N	12W	225239	4065935*	1325	
<u>SJ 01341</u>			SJ		3	1	26	29N	12W	225239	4065935*	1325	
<u>SJ 01748</u>			SJ		3	1	26	29N	12W	225239	4065935*	1325	
<u>SJ 02187</u>			SJ				27	29N	12W	224218	4065793*	1388	
<u>SJ 02327</u>			SJ				27	29N	12W	224218	4065793*	1388	
<u>SJ 02494</u>			SJ				27	29N	12W	224218	4065793*	1388	
<u>SJ 00723</u>			SJ		4	2	1	26	29N	12W	225749	4066225*	1424
<u>SJ 00647</u>			SJ		3	1	27	29N	12W	223638	4066006*	1494	
<u>SJ 02229</u>			SJ		3	1	27	29N	12W	223638	4066006*	1494	
<u>SJ 01622</u>			SJ		4	3	1	27	29N	12W	223737	4065905*	1510
<u>SJ 02125</u>			SJ		4	3	1	27	29N	12W	223737	4065905*	1510
<u>SJ 02183 X</u>			SJ		1	4	27	29N	12W	224427	4065563*	1567	
<u>SJ 02743</u>			SJ		1	4	27	29N	12W	224427	4065563*	1567	

Record Count: 39

Basin/County Search:

Basin: San Juan

County: San Juan

UTMNAD83 Radius Search (in meters):

Easting (X): 224638.56

Northing (Y): 4067116.65

Radius: 1609.3

*UTM location was derived from PLSS - see Help

The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, usability, or suitability for any particular purpose of the data.



New Mexico Office of the State Engineer
Point of Diversion with Meter Attached

No PODs found.

Basin/County Search:

Basin: San Juan

County: San Juan

UTMNAD83 Radius Search (in meters):

Easting (X): 224638.56

Northing (Y): 4067116.65

Radius: 1609.3

The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, usability, or suitability for any particular purpose of the data.

BP AMERICA PRODUCTION COMPANY
SAN JUAN BASIN, NORTHWEST NEW MEXICO
BELOW-GRADE TANK DESIGN AND CONSTRUCTION PLAN

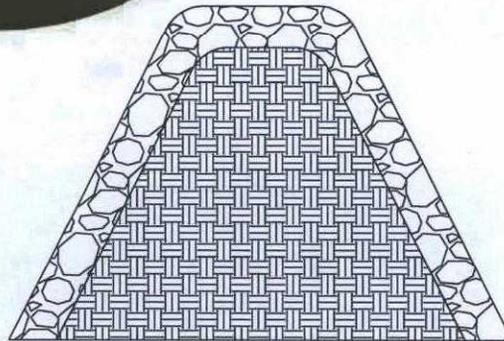
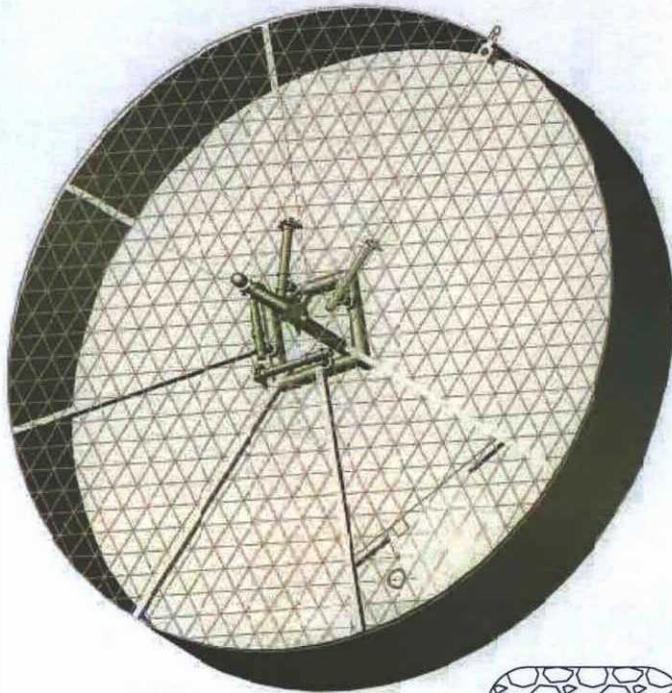
Pursuant to Rule 19.15.17.11 NMAC, BP America Production Company (BP) shall construct a below-grade tank (BGT) or modify an existing permitted BGT according to the following plan. Any deviations from this plan will be addressed on the New Mexico Oil Conservation Division's (NMOCD) form C-144 at the time of submittal.

Design and Construction Plan

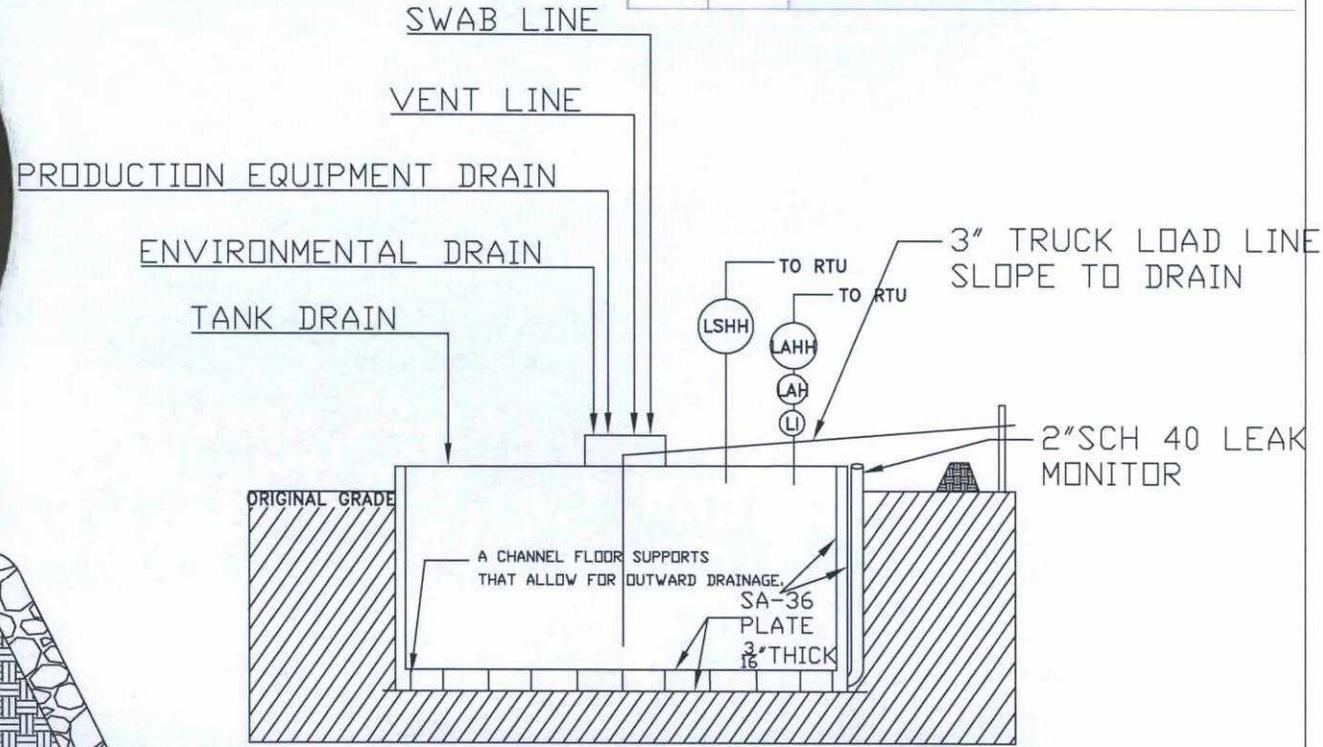
1. BP will design and construct a BGT which will be constructed to contain liquids and prevent contamination of fresh water and protect public health and the environment.
2. BP is the well operator and shall install and maintain a well sign that is in compliance with 19.15.16.8 NMAC. The sign will be posted at the well site to address, at a minimum;
 - a. Well Number
 - b. Property name
 - c. Operators name
 - d. Location by footage, quarter-quarter section, township and range (or unit letter)
 - e. API number
 - f. Emergency contact information
3. BP will fence or enclose its BGTs in a manner that prevents unauthorized access and shall maintain its fence in good repair.
4. BP will fence or enclose a BGT located within 1,000 feet of a permanent residence, school, hospital, institution or church with, at a minimum a chain link security fence at least six (6) feet in height with at least two (2) strands of barbed wire at the top. BP will ensure that all gates associated with the fence are closed and locked when responsible personnel are not on-site.
5. BP is requesting NMOCD's approval for an alternative fence design that provides, at a minimum, equivalent protection to the design specified in Paragraph 3 of Subsection D of 19.15.17.11 NMAC for BGTs beyond the stated distance in paragraph 4 of this document. BP's proposed design for its BGTs will utilize 48" steel mesh field-fence (hogwire) with a metal or steel top rail. Perimeter T-post will be installed roughly every 10 feet.
6. BP will construct an expanded metal covering that completely covers the top of the BGT. The covering will be constructed such that it will prevent hazardous conditions to wildlife, including migratory birds
7. BP shall construct the BGT of materials that are resistant to produced water, any contained liquids, and damage from sunlight. BP's BGTs will be constructed of carbon steel that meets the requirements of ASTM A36.
8. BP's BGTs shall have a properly constructed earthen foundation consisting of a level base free of rocks, debris, sharp edges, or irregularities as to prevent punctures, cracks or indentations to the tank bottom as demonstrated on the design drawing.
9. BP will construct and operate the BGT to prevent surface water run-on by using both earthen berms and leaving a portion of the BGT above the original grade as demonstrated on the design drawing.
10. BP will construct and operate the BGT to prevent overflow and overfilling of the BGT. Overflow will be prevented by use of an electronic high fluid level detector that will automatically engage an electronic shut-off valve when a 1 foot freeboard is reached. The Hi-level automatic alarm notifies well optimizers when liquid level has reached within a pre-set distance to the top of the BGT. The Hi Hi alarm will trigger the Hi-level automatic shutdown valve which will close in the well until the liquid level can be lowered.

11. BP will construct and install a double-walled tank design per Subparagraph (b) of Paragraph (4) of Subsection I of 19.15.17.11 NMAC with a two (2) inch diameter leak detection port. The floor supports located in the annular space of the tank bottom will be channeled to allow outward movement of liquid between the walls. Leak detection will be monitored per BP's Operating and Maintenance Plan. The walls of the BGT will be constructed of carbon steel that meets the ASTM A36 standard. BP's BGT design will insure containment of tank contents and protect underlying groundwater. The production equipment line drain is an automated drain that allows water level in production equipment (generally the separator) to be maintained within the equipment's operating parameters. The environmental drain is a manually operated drain that is used to drain liquids off of equipment. The tank drain is a manually operated drain, typically in the closed position that is used to rid the condensate tank of any water accumulation. The vent drain is a manually operated drain off the discharge of production equipment (usually the separator) and is used to blowdown the wellsite. The swab drain line is a manually operated drain originating between the wellhead and separator and is used during well workovers when large amounts of liquid are removed from the well and sent straight to the BGT.
12. BP owned and operated single walled BGTs constructed and installed prior to June 16, 2008 that has the side walls open for visual inspection and that does not meet all the requirements in Paragraphs (1) through (4) of Subsection I of 19.15.17.11 NMAC is not required to equip or retrofit the BGT to comply with Paragraphs (1) through (4) of Subsection I of 19.15.17.11 NMAC so long as it demonstrates integrity. If the existing BGT does not demonstrate integrity, the operator shall promptly drain the BGT and remove it from service and comply with the closure requirements of 19.15.17.13 NMAC.
13. BP owned and operated single walled BGTs constructed and installed prior to June 16, 2008 and where any portion of the tank sidewall is below the ground surface and not visible shall equip or retrofit the BGT to comply with Paragraphs (1) through (4) of Subsection I of 19.15.17.11 NMAC, or close it, by June 16, 2013. If the existing BGT does not demonstrate integrity, the operator shall promptly drain the BGT, remove it from service and comply with the closure requirements of 19.15.17.13 NMAC.
14. BP owned and operated double walled BGTs constructed and installed prior to June 16, 2008 and which does not meet all the requirements in Paragraphs (1) through (4) of Subsection I of 19.15.17.11 NMAC is not required to equip or retrofit the BGT to comply with Paragraphs (1) through (4) of Subsection I of 19.15.17.11 NMAC so long as it demonstrates integrity. If the existing BGT does not demonstrate integrity, the operator shall promptly drain the BGT, remove it from service and comply with the closure requirements of 19.15.17.13 NMAC.
15. The general specifications for the design and construction of the BGT have been provided in the attached BP design and construction schematic.

DOUBLE WALLED BGT



MANUAL OPERATION	
1.)	PRODUCTION TANK DRAIN LINE
2.)	SWAB LINE
3.)	ENVIRONMENTAL DRAIN
AUTOMATED OPERATION	
1.)	VENT LINE DRAIN LINE
2.)	SEPARATOR DRAIN LINE
3.)	AUTOMATIC SHUT OFF LSHH ACTIVATES AT 12" FROM TOP OF TANK.



PROPERLY CONSTRUCTED FOUNDATION CONSISTING OF A LEVEL BASE FREE OF ROCKS, DEBRIS, SHARP EDGES OR IRREGULARITIES TO PREVENT PUNCTURES CRACKS OR INDENTATIONS TO THE TANK BOTTOM.



1. 04.1 210					
Rev. No.	By	Date	Revised	SP-Process	SP-Approved

bp

This drawing is the property of and contains confidential information of BP America Production Company. This drawing and the information herein shall not be reproduced or disclosed in any other form or used for any purpose other than for the benefit of and as authorized by BP America Production Company.

SAN JUAN OPERATIONS CENTER FARMINGTON, NEW MEXICO BP AMERICA PRODUCTION COMPANY					
FACILITIES LAYOUT					
DOUBLE WALLED BELOW GRADE TANK					
Scale	Drawn By	Issue	Checked By	Rev. No.	Control Date
P:\Source: P11\02990_02\1411-1151.dwg					

BP AMERICA PRODUCTION COMPANY

SAN JUAN BASIN, NORTHWEST NEW MEXICO

BELOW-GRADE TANK OPERATING AND MAINTENANCE PLAN

Pursuant to Rule 19.15.17.12 NMAC, BP America Production Company (BP) shall maintain and operate a below-grade tank (BGT) by following the plan shown below. Deviations from this plan will be addressed with a submittal to the New Mexico Oil Conservation Division (NMOCD) using form C-144 at the time of the BGT registration or modification to an existing BGT registration.

Operating and Maintenance Plan

1. BP's BGTs will be operated to contain liquids and solids. BP will maintain the integrity of the BGT and secondary containment system as to prevent impacts to fresh water and to protect public health and the environment. BP will use automated high fluid level alarms and automated shut-off valves to insure that liquids are contained within the vessel and that the vessel does not overflow. These alarms and shut-off valves will be consistent with those demonstrated in the design plan.
2. BP will not knowingly discharge to or store any hazardous waste in a BGT.
3. If a BGT develops a leak below the liquid surface, BP shall remove all liquid above the damage or leak within 48 hours of discovery, notify the appropriate division office pursuant to 19.15.29 NMAC and repair the damage or replace the BGT as applicable.
4. BP will adhere to Subsection D of 19.15.17.12 NMAC. The requirements are as follows;
 - a. BP shall not allow a below-grade tank to overflow or allow surface water run-on to enter the BGT.
 - b. BP shall remove any measurable layer of oil from the fluid surface of a BGT.
 - c. BP shall inspect the BGT for leakage and damage at least monthly and will document the integrity of each tank at least annually and maintain a written record of the integrity for five years.
 - d. BP shall maintain adequate freeboard to prevent overtopping of the below-grade tank.
 - e. If BP discovers that the BGT tank does not demonstrate integrity or that the BGT develops any of the conditions identified in Paragraph (5) of Subsection A of 19.15.17.12 NMAC, BP shall repair the damage or close the existing BGT pursuant to the closure requirements of 19.15.17.13 NMAC.
 - f. If any of BP's BGTs are equipped or retrofitted to comply with Paragraphs (1) through (4) of Subsection I of 19.15.17.11 NMAC, then BP shall visually inspect the area beneath the BGT during the retrofit and document any areas that are wet, discolored or showing other evidence of a release on form C-141. BP will attempt to measure and report to the division the concentration of contaminants in the wet or discolored soil with respect to the standards set forth in Table I of 19.15.17.13 NMAC. If there is no wet or discolored soil or if the concentration of contaminants in the wet or discolored soil is less than the standard set forth in Table I of 19.15.17.13 NMAC, then BP shall proceed with the closure requirements of 19.15.17.13 NMAC prior to initiating the retrofit or replacement.

Managed Form NOP-5878 Revision 1

San Juan Lease Inspection

Custodian: Field Environmental Coordinator

Date: _____ Run: _____

Location: _____

Name of Inspector: _____

Yes _____ Action _____ N/A _____

Required Signs

- Does location have Well Sign and emergency phone number?
- Do compressor engines have Hearing Protection signs?
- Hydrogen Sulfide Signs (where applicable)
- Chemical containers and tanks have proper Hazcom label or BP Multi-Product Hazcom numbers?

Yes _____ Action _____ N/A _____

Location- General

- Housekeeping satisfactory?**
- Tripping or falling hazards are absent? **If NO, identify and report to FSC.**
- Rig anchors/Deadmen adequately marked and visible if they present a hazard to drivers?
- Driving hazards such as risers are marked or flagged?
- Painting meets safety standards?
- Cattleguards/gates properly maintained?
- Tarps in good repair?
- Seeps, drips, or leaks are absent?
- Is weed control adequate?
- Stains on ground are absent? **If NO, remediate immediately, identify and report to FEC.**

Yes _____ Action _____ N/A _____

Vessel/Tank

- Adequate fencing around below grade tank?
- Are the dike/berm walkover in place, used and stable?
- Are dikes/berms in good condition?
- Is there adequate and safe access to pit for gauging?
- Does the pit have a high level alarm?
- Are stairways and catwalks properly maintained and in good condition?
- Toprail, midrail and toeboard in place?
- Are thief hatches in good condition, seal properly, and in the closed position?
- Is tank vent line equipped with a PV valve? (Enardo)
- Does the tank have a high level alarm?
- Are open ended load lines and pipes capped?
- Is soil around load lines clean of oil stains?
- Is tank area free of any evidence of seeps or leaks (including manway cover)?
- Are there proper seals on sales and drain valves?
- Are all suspected dump lines well supported?
- Are above ground dump lines marked with t-posts and plastic covers?
- Have all fiberglass drip pits been removed?

Yes _____ Action _____ N/A _____

Treaters/Separators/Compressors/Pump Jacks

- If there is a block valve upstream of the relief valve, is the block valve secured in the open position?**
- Are relief valve discharge and blow downs piped to a safe area and secured against movement?
- Has flame arrestor been inspected within the last 5 years?
- Is flame port closed?
- Do all lines pass through a super muffler or swirl pot to the pit/tank? If not, are all lines secured?
- Is starting gas vented to a safe area, at least 10' vertically?
- No excessive vibration, knocking or unusual noises anywhere on unit or piping?
- Are site glasses in operating condition?
- Are environmental rails piped to a pit in a dedicated line?
- Do all blow downs, relief valve discharges, and risers have rain caps?
- Stuffing box leaks are absent?
- Are the weight guards and belt guard in place?
- Are skids in good condition?
- Are concrete bases / foundations in good condition?
- Are concrete bases free from erosion or settlement problems?
- Is secondary containment in place for day tanks?

Comments: _____

Signature of Inspector: _____

My signature assures that this location is SAFE, is in compliance with the LAW, and exhibits high standards of Pride, Ownership and Excellence.

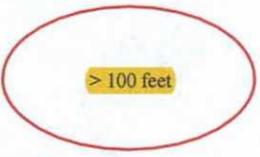
BP AMERICA PRODUCTION COMPANY
SAN JUAN BASIN, NORTHWEST NEW MEXICO

BELOW-GRADE TANK CLOSURE PLAN

This plan will address the method, procedures, and protocols for closure of below-grade tanks (BGTs) on BP America Production Company (BP) well sites pursuant to Subsection A of 19.15.17.13 NMAC. As stipulated in Paragraph (1) of Subsection C of 19.15.17.13 NMAC, BP will not commence closure without first obtaining approval of the closure plan submitted pursuant to Paragraph (3) of Subsection B of 19.15.17.9 NMAC. If deviations from this plan are necessary, BP will request preapproval from the Division District III office of any specific changes and will be included on form C-144. BP shall close its BGTs within 60 days of cessation of the operation as required by Paragraph (4) of Subsection G of 19.15.17.13 NMAC.

General Closure Plan

1. BP shall notify the surface owner by certified mail; return receipt requested that it plans to close a BGT. Notice given will be at least 72 hours in advanced, but not more than one week prior to any closure operation. The notice shall include the well name, API number, and legal description of the location. Evidence of mailing of the notice to the address of the surface owner shown in the county tax records demonstrates compliance with this requirement.
2. BP shall notify the Division District III office verbally and in writing at least 72 hours, but not more than one week, prior to any closure operation. The notice shall include the Operator's name, and the location of the BGT 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.
3. Within 60 days of cessation of operations, 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 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)
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 Division District III office approves. Documentation as to the final disposition of the removed BGT will be provided in the final closure report.
5. Within six months of cessation of operations, BP shall remove any on-site equipment associated with a BGT unless the equipment is required for some other purpose.
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 to include any obvious stained or wet soils, or other evidence of a release under the BGT. The composite sample shall be collected and analyzed as required for the constituents listed in Table I within Subparagraph (a) of Paragraph (3) of Subsection C of 19.15.17.13 NMAC (see Table 1 on following page).

Depth below bottom of pit to groundwater less than 10,000 mg/l TDS	Constituent	Method*	Limit**
≤50 feet	Chloride	EPA 300.0	600 mg/kg
	TPH	EPA SW-846 Method 418.1	100 mg/kg
	BTEX	EPA SW-846 Method 8021B or 8260B	50 mg/kg
	Benzene	EPA SW-846 Method 8021B or 8015M	10 mg/kg
51 feet-100 feet	Chloride	EPA 300.0	10,000 mg/kg
	TPH	EPA SW-846 Method 418.1	2,500 mg/kg
	GRO+DRO	EPA SW-846 Method 8015M	1,000 mg/kg
	BTEX	EPA SW-846 Method 8021B or 8260B	50 mg/kg
	Benzene	EPA SW-846 Method 8021B or 8015M	10 mg/kg
 > 100 feet	Chloride	EPA 300.0	20,000 mg/kg
	TPH	EPA SW-846 Method 418.1	2,500 mg/kg
	GRO+DRO	EPA SW-846 Method 8015M	1,000 mg/kg
	BTEX	EPA SW-846 Method 8021B or 8260B	50 mg/kg
	Benzene	EPA SW-846 Method 8021B or 8015M	10 mg/kg

Notes: mg/Kg = milligram per kilogram, BTEX = benzene, toluene, ethylbenzene, and total xylenes, TPH = total petroleum hydrocarbons, TDS = total dissolved solids.

* - Or other test methods approved by the division

** - Numerical limits or natural background level, whichever is greater

7. If any contaminant concentration exceeds those standards set in Table I, BP will acknowledge NMOCD's position to require additional delineation upon review of the results. BP will not proceed with any further closure activities until approval is first granted by NMOCD.
8. If the sampling demonstrates that all contaminant constituents do not exceed the concentrations specified in Table I, then BP shall backfill the excavation, with non-waste containing, uncontaminated, earthen material.
9. 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 Paragraph (2) of Subsection H of 19.15.17.13 NMAC, re-contour the BGT location and associated areas to a contour that approximates the original contour and blends with the surrounding topography and re-vegetate according to Paragraph (5) of Subsection H of 19.15.17.13 NMAC.
10. BP may propose an alternative to the re-vegetation or recontouring requirement if it can demonstrate to the NMOCD's District III office that the proposed alternative provides equal or greater prevention of erosion, and protection of fresh water, public health and the environment. BP will seek surface owner approval of the proposed alternative and provide written documentation of the surface owner's approval to NMOCD for its approval.
11. Areas reasonably needed for production operations or for subsequent drilling operations shall be compacted, covered, paved, or otherwise stabilized and maintained in such a way as to minimize dust and erosion to the extent practicable.
12. The soil cover for closures after site contouring, where the BGT has been removed and if necessary remediated beneath the BGT to chloride concentrations less than 600 mg/kg as analyzed by EPA Method 300.0, shall consist of the background thickness of topsoil or one foot or suitable material, whichever is greater.

13. 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.
14. All areas disturbed by the closure of the BGT, except areas reasonably needed for production operations or for subsequent drilling operations, shall be reclaimed as early and as nearly as practicable to their original condition or their final land use and shall be maintained to control dust and minimize erosion to the extent practicable.
15. Topsoils and subsoils shall be replaced to their original relative positions and contoured so as to achieve erosion control, long-term stability and preservation of surface water flow patterns. The disturbed area then shall be reseeded in the first favorable growing season following closure of the BGT.
16. Reclamation of all disturbed areas no longer in use shall be considered complete when all ground surface disturbing activities at the site have been completed, and a uniform vegetative cover has been established that reflects a life-form ratio of plus or minus fifty percent (50%) of pre-disturbance levels and a total percent plant cover of at least seventy percent (70%) of pre-disturbance levels, excluding noxious weeds.
17. The re-vegetation and reclamation obligations imposed by other applicable federal or tribal agencies on lands managed by those agencies shall supersede these provisions and govern the obligations of BP subject to those provisions, provided that the other requirements provide equal or better protection of fresh water, human health and the environment.
18. Pursuant to Subparagraph (e) of Paragraph (5) of Subsection H of 19.15.17.13 NMAC, BP shall notify the NMOCD when reclamation and re-vegetation has been successfully achieved.
19. Within 60 days of closure completion, BP shall submit a closure report on NMOCD's form C-144, and will include the following:
 - a. necessary attachments to document all closure activities
 - b. sampling results
 - c. information required by 19.15.17 NMAC
 - d. details on back-filling, capping and covering, where applicable.
20. 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.