NM OIL CONSERVATION

ARTESIA DISTRICT

Form 3160 -3 (March 2012)

SEP 26 2017

FORM APPROVED OMB No. 1004-0137 Expires October 31, 2014

5. Lease Serial No.

SEC 29 / T18S / R29E / NMP

NMNM 56428

UNITED STATES DEPARTMENT OF THE INTERIOR BUREAU OF LAND MANAGEMEN RECEIVED

	APPLICATION FOR PERMIT TO	DRILL OR REENTER	6. If Indian, Allotee or Tribe Name
la.	Type of work: DRILL REENT	ER	7 If Unit or CA Agreement, Name and No.
lb.	Type of Well: Oil Well Gas Well Other	Single Zone Multiple Zone	8. Lease Name and Well No. PAVO FRIO 29/28 B2MP FED C 1H 3/9633
2.	Name of Operator MEWBOURNE OIL COMPANY	14744	9. API Well No. 30-015-44455
3a.	Address PO Box 5270 Hobbs NM 88240	3b. Phone No. (include area code) (575)393-5905	10. Field and Pool, or Exploratory PALMILLO EAST BONE SPRING OIL
4.	Location of Well (Report location clearly and in accordance with a	ny State requirements.*)	11. Sec., T. R. M. or Blk. and Survey or Area

4. Distance in miles and direction from nearest town or post office* 20 miles			12. County or Parish EDDY	13. Stat NM
15. Distance from proposed*	16. No. of acres in lease	17. Spacin	g Unit dedicated to this well	

- 440 320 property or lease line, ft.
 (Also to nearest drig. unit line, if any) 18. Distance from proposed location* to nearest well, drilling, completed, 330 feet applied for, on this lease, ft. 20. BLM/BIA Bond No. on file 19. Proposed Depth FED: NM1693 7837 feet / 17556 feet 21. Elevations (Show whether DF, KDB, RT, GL, etc.) 22. Approximate date work will start* 23. Estimated duration
- 3453 feet 08/16/2016 60 days 24. Attachments

The following, completed in accordance with the requirements of Onshore Oil and Gas Order No.1, must be attached to this form:

At surface SWSW / 600 FSL / 185 FWL / LAT 32.7128157 / LONG -104.1048942

At proposed prod. zone SESE / 330 FSL / 330 FEL / LAT 32.7121142 / LONG -104.0722497

- 1. Well plat certified by a registered surveyor.
- 2. A Drilling Plan.

25. Signature

- 3. A Surface Use Plan (if the location is on National Forest System Lands, the SUPO must be filed with the appropriate Forest Service Office).
- 4. Bond to cover the operations unless covered by an existing bond on file (see Item 20 above).
- 5. Operator certification
- Such other site specific information and/or plans as may be required by the

(Electronic Submission)	Bradley Bishop / Ph: (575)393-5905	11/03/2016
Title Title		
Regulatory		
Approved by (Signaure)	Name (Printed/Typed)	Date
(Electronic Submission)	Cody Layton / Ph: (575)234-5959	09/14/2017
Title	Office	
Supervisor Multiple Resources	CARLSBAD	

Name (Printed/Typed)

Application approval does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.

Conditions of approval, if any, are attached

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

(Continued on page 2)

*(Instructions on page 2)

Date



PECOS DISTRICT CONDITIONS OF APPROVAL

OPERATOR'S NAME: | Mewbourne Oil Company

LEASE NO.: NMNM-56428

WELL NAME & NO.: | Pavo Frio 29-28 Federal Com 1H

SURFACE HOLE FOOTAGE: | 0600' FSL & 0185' FWL

BOTTOM HOLE FOOTAGE | 0330' FSL & 0330' FEL Sec. 28, T. 18 S., R 29 E.

LOCATION: | Section 29, T. 18 S., R 29 E., NMPM

COUNTY: | County, New Mexico

DRILLING

In the interest of resource development, submission of additional well gas capture development plan information is deferred but may be required by the BLM Authorized Officer at a later date.

Communitization Agreement

- The operator will submit a Communitization Agreement to the Carlsbad Field Office, 620 E Greene St. Carlsbad, New Mexico 88220, at least 90 days before the anticipated date of first production from a well subject to a spacing order issued by the New Mexico Oil Conservation Division. The Communitization Agreement will include the signatures of all working interest owners in all Federal and Indian leases subject to the Communitization Agreement (i.e., operating rights owners and lessees of record), or certification that the operator has obtained the written signatures of all such owners and will make those signatures available to the BLM immediately upon request.
- If the operator does not comply with this condition of approval, the BLM may take enforcement actions that include, but are not limited to, those specified in 43 CFR 3163.1.
- In addition, the well sign shall include the surface and bottom hole lease numbers. When the Communitization Agreement number is known, it shall also be on the sign.

A. DRILLING OPERATIONS REQUIREMENTS

The BLM is to be notified in advance for a representative to witness:

- a. Spudding well (minimum of 24 hours)
- b. Setting and/or Cementing of all casing strings (minimum of 4 hours)
- c. BOPE tests (minimum of 4 hours)

□ Eddy County

Call the Carlsbad Field Office, 620 East Greene St., Carlsbad, NM 88220, (575) 361-2822

- 1. A Hydrogen Sulfide (H2S) Drilling Plan shall be activated 500 feet prior to drilling into the Grayburg formation. As a result, the Hydrogen Sulfide area must meet Onshore Order 6 requirements, which includes equipment and personnel/public protection items. If Hydrogen Sulfide is encountered, please provide measured values and formations to the BLM.
- 2. Unless the production casing has been run and cemented or the well has been properly plugged, the drilling rig shall not be removed from over the hole without prior approval. If the drilling rig is removed without approval an Incident of Non-Compliance will be written and will be a "Major" violation.
- 3. Floor controls are required for 3M or Greater systems. These controls will be on the rig floor, unobstructed, readily accessible to the driller and will be operational at all times during drilling and/or completion activities. Rig floor is defined as the area immediately around the rotary table; the area immediately above the substructure on which the draw works is located, this does not include the dog house or stairway area.
- 4. The record of the drilling rate along with the GR/N well log run from TD to surface (horizontal well vertical portion of hole) shall be submitted to the BLM office as well as all other logs run on the borehole 30 days from completion. If available, a digital copy of the logs is to be submitted in addition to the paper copies. The Rustler top and top and bottom of Salt are to be recorded on the Completion Report.

B. CASING

Changes to the approved APD casing program need prior approval if the items substituted are of lesser grade or different casing size or are Non-API. The Operator can exchange the components of the proposal with that of superior strength (i.e. changing from J-55 to N-80, or from 36# to 40#). Changes to the approved cement program need prior approval if the altered cement plan has less volume or strength or if the changes are substantial (i.e. Multistage tool, ECP, etc.). The initial wellhead installed on the well will remain on the well with spools used as needed.

Centralizers required on surface casing per Onshore Order 2.III.B.1.f.

Wait on cement (WOC) for Water Basin:

After cementing but before commencing any tests, the casing string shall stand cemented under pressure until both of the following conditions have been met: 1) cement reaches a minimum compressive strength of 500 psi at the shoe, 2) until cement has been in place at least 8 hours. WOC time will be recorded in the driller's log. See individual casing strings for details regarding lead cement slurry requirements.

Provide compressive strengths including hours to reach required 500 pounds compressive strength prior to cementing each casing string. Have well specific cement details onsite prior to pumping the cement for each casing string.

No pea gravel permitted for remedial or fall back remedial without prior authorization from the BLM engineer.

- 1. The 13-3/8 inch surface casing shall be set at approximately 300 feet (a minimum of 25 feet into the Rustler Anhydrite and above the salt) and cemented to the surface. If salt is encountered, set casing at least 25 feet above the salt.
 - a. If cement does not circulate to the surface, the appropriate BLM office shall be notified and a temperature survey utilizing an electronic type temperature survey with surface log readout will be used or a cement bond log shall be run to verify the top of the cement. Temperature survey will be run a minimum of six hours after pumping cement and ideally between 8-10 hours after completing the cement job.
 - b. Wait on cement (WOC) time for a primary cement job is to include the lead cement slurry.
 - c. Wait on cement (WOC) time for a remedial job will be a minimum of 4 hours after bringing cement to surface or 500 pounds compressive strength, whichever is greater.
 - d. If cement falls back, remedial cementing will be done prior to drilling out that string.

2.	. The minimum required	d fill of cement	behind the $9-5/8$	inch intermediate	casing is:

	Cement to surface. If cement does not circulate see B.1.a, c-d above. Excess calculates to 22% - Additional cement may be required.
Ce	ntralizers required through the curve and a minimum of one every other joint.
3.	The minimum required fill of cement behind the 7 inch production casing is:
	☐ Cement should tie-back at least 200 feet into previous casing string. Operator shall provide method of verification. Excess calculates to 24% - Additional cement may be required.
4.	The minimum required fill of cement behind the 4-1/2 inch production Liner is:
	Cement as proposed by operator. Operator shall provide method of verification.

5. If hardband drill pipe is rotated inside casing, returns will be monitored for metal. If metal is found in samples, drill pipe will be pulled and rubber protectors which have a larger diameter than the tool joints of the drill pipe will be installed prior to continuing drilling operations.

C. PRESSURE CONTROL

- 1. All blowout preventer (BOP) and related equipment (BOPE) shall comply with well control requirements as described in Onshore Oil and Gas Order No. 2 and API 53. .
- 2. Variance approved to use flex line from BOP to choke manifold. Check condition of flexible line from BOP to choke manifold, replace if exterior is damaged or if line fails test. Line to be as straight as possible with no hard bends and is to be anchored according to Manufacturer's requirements. The flexible hose can be exchanged with a hose of equal size and equal or greater pressure rating. Anchor requirements, specification sheet and hydrostatic pressure test certification matching the hose in service, to be onsite for review. These documents shall be posted in the company man's trailer and on the rig floor. If the BLM inspector questions the straightness of the hose, a BLM engineer will be contacted and will review in the field or via picture supplied by inspector to determine if changes are required (operator shall expect delays if this occurs).
- 3. Minimum working pressure of the blowout preventer (BOP) and related equipment (BOPE) required for drilling below the surface casing shoe shall be psi.

- a. **For surface casing only:** If the BOP/BOPE is to be tested against casing, the wait on cement (WOC) time for that casing is to be met (see WOC statement at start of casing section). Independent service company required.
- 4. The appropriate BLM office shall be notified a minimum of hours in advance for a representative to witness the tests.
 - a. In a water basin, for all casing strings utilizing slips, these are to be set as soon as the crew and rig are ready and any fallback cement remediation has been done. The casing cut-off and BOP installation can be initiated four hours after installing the slips, which will be approximately six hours after bumping the plug. For those casing strings not using slips, the minimum wait time before cut-off is eight hours after bumping the plug. BOP/BOPE testing can begin after cut-off or once cement reaches 500 psi compressive strength (including lead when specified), whichever is greater. However, if the float does not hold, cut-off cannot be initiated until cement reaches 500 psi compressive strength (including lead when specified).
 - a. The tests shall be done by an independent service company utilizing a test plug **not** a **cup** or **J-packer**. The operator also has the option of utilizing an independent tester to test without a plug (i.e. against the casing) pursuant to Onshore Order 2 with the pressure not to exceed 70% of the burst rating for the casing. Any test against the casing must meet the WOC time for water basin (8 hours) or potash (24 hours) or 500 pounds compressive strength, whichever is greater, prior to initiating the test (see casing segment as lead cement may be critical item).
 - b. The test shall be run on a 5000 psi chart for a 2-3M BOP/BOP, on a 10000 psi chart for a 5M BOP/BOPE and on a 15000 psi chart for a 10M BOP/BOPE. If a linear chart is used, it shall be a one hour chart. A circular chart shall have a maximum 2 hour clock. If a twelve hour or twenty-four hour chart is used, tester shall make a notation that it is run with a two hour clock.
 - c. The results of the test shall be reported to the appropriate BLM office.
 - d. All tests are required to be recorded on a calibrated test chart. A copy of the BOP/BOPE test chart and a copy of independent service company test will be submitted to the appropriate BLM office.
 - e. The BOP/BOPE test shall include a low pressure test from 250 to 300 psi. The test will be held for a minimum of 10 minutes if test is done with a test plug and 30 minutes without a test plug. This test shall be performed prior to the test at full stack pressure.

D. DRILL STEM TEST

If drill stem tests are performed, Onshore Order 2.III.D shall be followed.

E. WASTE MATERIAL AND FLUIDS

All waste (i.e. drilling fluids, trash, salts, chemicals, sewage, gray water, etc.) created as a result of drilling operations and completion operations shall be safely contained and disposed of properly at a waste disposal facility. No waste material or fluid shall be disposed of on the well location or surrounding area.

Porto-johns and trash containers will be on-location during fracturing operations or any other crew-intensive operations.

JAM 083017

PECOS DISTRICT SURFACE USE CONDITIONS OF APPROVAL

OPERATOR'S NAME: Mewbourne Oil Co
LEASE NO.: NM56428
WELL NAME & NO.: Pavo Frio 29 28 B2MP Fed Com - 1H
SURFACE HOLE FOOTAGE: 600'/S & 185'/W
BOTTOM HOLE FOOTAGE 330'/S & 330'/E
LOCATION: Section 29, T. 18 S., R. 29 E., NMPM
COUNTY: Eddy County, New Mexico

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Standard Conditions of Approval (COA) apply to this APD. If any deviations to these standards exist or special COAs are required, the section with the deviation or requirement will be checked below.

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☐ Construction
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Closed Loop System
Federal Mineral Material Pits
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Roads
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I. GENERAL PROVISIONS

The approval of the Application For Permit To Drill (APD) is in compliance with all applicable laws and regulations: 43 Code of Federal Regulations 3160, the lease terms, Onshore Oil and Gas Orders, Notices To Lessees, New Mexico Oil Conservation Division (NMOCD) Rules, National Historical Preservation Act As Amended, and instructions and orders of the Authorized Officer. Any request for a variance shall be submitted to the Authorized Officer on Form 3160-5, Sundry Notices and Report on Wells.

II. PERMIT EXPIRATION

If the permit terminates prior to drilling and drilling cannot be commenced within 60 days after expiration, an operator is required to submit Form 3160-5, Sundry Notices and Reports on Wells, requesting surface reclamation requirements for any surface disturbance. However, if the operator will be able to initiate drilling within 60 days after the expiration of the permit, the operator must have set the conductor pipe in order to allow for an extension of 60 days beyond the expiration date of the APD. (Filing of a Sundry Notice is required for this 60 day extension.)

III. ARCHAEOLOGICAL, PALEONTOLOGY & HISTORICAL SITES

Any cultural and/or paleontological resource discovered by the operator or by any person working on the operator's behalf shall immediately report such findings to the Authorized Officer. The operator is fully accountable for the actions of their contractors and subcontractors. The operator shall suspend all operations in the immediate area of such discovery until written authorization to proceed is issued by the Authorized Officer. An evaluation of the discovery shall be made by the Authorized Officer to determine the appropriate actions that shall be required to prevent the loss of significant cultural or scientific values of the discovery. The operator shall be held responsible for the cost of the proper mitigation measures that the Authorized Officer assesses after consultation with the operator on the evaluation and decisions of the discovery. Any unauthorized collection or disturbance of cultural or paleontological resources may result in a shutdown order by the Authorized Officer.

IV. NOXIOUS WEEDS

The operator shall be held responsible if noxious weeds become established within the areas of operations. Weed control shall be required on the disturbed land where noxious weeds exist, which includes the roads, pads, associated pipeline corridor, and adjacent land affected by the establishment of weeds due to this action. The operator shall consult with the Authorized Officer for acceptable weed control methods, which include following EPA and BLM requirements and policies.

V. SPECIAL REQUIREMENT(S)

VI. CONSTRUCTION

A. NOTIFICATION

The BLM shall administer compliance and monitor construction of the access road and well pad. Notify the Carlsbad Field Office at (575) 234-5909 at least 3 working days prior to commencing construction of the access road and/or well pad.

When construction operations are being conducted on this well, the operator shall have the approved APD and Conditions of Approval (COA) on the well site and they shall be made available upon request by the Authorized Officer.

B. TOPSOIL

The operator shall strip the top portion of the soil (root zone) from the entire well pad area and stockpile the topsoil along the edge of the well pad as depicted in the APD. The root zone is typically six (6) inches in depth. All the stockpiled topsoil will be redistributed over the interim reclamation areas. Topsoil shall not be used for berming the pad or facilities. For final reclamation, the topsoil shall be spread over the entire pad area for seeding preparation.

Other subsoil (below six inches) stockpiles must be completely segregated from the topsoil stockpile. Large rocks or subsoil clods (not evident in the surrounding terrain) must be buried within the approved area for interim and final reclamation.

C. CLOSED LOOP SYSTEM

Tanks are required for drilling operations: No Pits.

The operator shall properly dispose of drilling contents at an authorized disposal site.

D. FEDERAL MINERAL MATERIALS PIT

Payment shall be made to the BLM prior to removal of any federal mineral materials. Call the Carlsbad Field Office at (575) 234-5972.

E. WELL PAD SURFACING

Surfacing of the well pad is not required.

If the operator elects to surface the well pad, the surfacing material may be required to be removed at the time of reclamation. The well pad shall be constructed in a manner which creates the smallest possible surface disturbance, consistent with safety and operational needs.

F. EXCLOSURE FENCING (CELLARS & PITS)

Exclosure Fencing

The operator will install and maintain exclosure fencing for all open well cellars to prevent access to public, livestock, and large forms of wildlife before and after drilling operations until the pit is free of fluids and the operator initiates backfilling. (For examples of exclosure fencing design, refer to BLM's Oil and Gas Gold Book, Exclosure Fence Illustrations, Figure 1, Page 18.)

G. ON LEASE ACCESS ROADS

Road Width

The access road shall have a driving surface that creates the smallest possible surface disturbance and does not exceed fourteen (14) feet in width. The maximum width of surface disturbance, when constructing the access road, shall not exceed twenty-five (25) feet.

Surfacing

Surfacing material is not required on the new access road driving surface. If the operator elects to surface the new access road or pad, the surfacing material may be required to be removed at the time of reclamation.

Where possible, no improvements should be made on the unsurfaced access road other than to remove vegetation as necessary, road irregularities, safety issues, or to fill low areas that may sustain standing water.

The Authorized Officer reserves the right to require surfacing of any portion of the access road at any time deemed necessary. Surfacing may be required in the event the road deteriorates, erodes, road traffic increases, or it is determined to be beneficial for future field development. The surfacing depth and type of material will be determined at the time of notification.

Crowning

Crowning shall be done on the access road driving surface. The road crown shall have a grade of approximately 2% (i.e., a 1" crown on a 14' wide road). The road shall conform to Figure 1; cross section and plans for typical road construction.

Ditching

Ditching shall be required on both sides of the road.

Turnouts

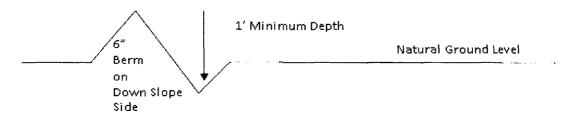
Vehicle turnouts shall be constructed on the road. Turnouts shall be intervisible with interval spacing distance less than 1000 feet. Turnouts shall conform to Figure 1; cross section and plans for typical road construction.

Drainage

Drainage control systems shall be constructed on the entire length of road (e.g. ditches, sidehill outsloping and insloping, lead-off ditches, culvert installation, and low water crossings).

A typical lead-off ditch has a minimum depth of 1 foot below and a berm of 6 inches above natural ground level. The berm shall be on the down-slope side of the lead-off ditch.

Cross Section of a Typical Lead-off Ditch



All lead-off ditches shall be graded to drain water with a 1 percent minimum to 3 percent maximum ditch slope. The spacing interval are variable for lead-off ditches and shall be determined according to the formula for spacing intervals of lead-off ditches, but may be amended depending upon existing soil types and centerline road slope (in %);

Formula for Spacing Interval of Lead-off Ditches

Example - On a 4% road slope that is 400 feet long, the water flow shall drain water into a lead-off ditch. Spacing interval shall be determined by the following formula:

400 foot road with 4% road slope:
$$\frac{400'}{4\%} + 100' = 200'$$
 lead-off ditch interval

Cattle guards

An appropriately sized cattle guard sufficient to carry out the project shall be installed and maintained at fence/road crossings. Any existing cattle guards on the access road route shall be repaired or replaced if they are damaged or have deteriorated beyond practical use. The operator shall be responsible for the condition of the existing cattle guards that are in place and are utilized during lease operations.

Fence Requirement

Where entry is granted across a fence line, the fence shall be braced and tied off on both sides of the passageway prior to cutting. The operator shall notify the private surface landowner or the grazing allotment holder prior to crossing any fences.

Public Access

Public access on this road shall not be restricted by the operator without specific written approval granted by the Authorized Officer.

Construction Steps

- 1. Salvage topsoil
- 3. Redistribute topsoil
- 2. Construct road
- 4. Revegetate slopes

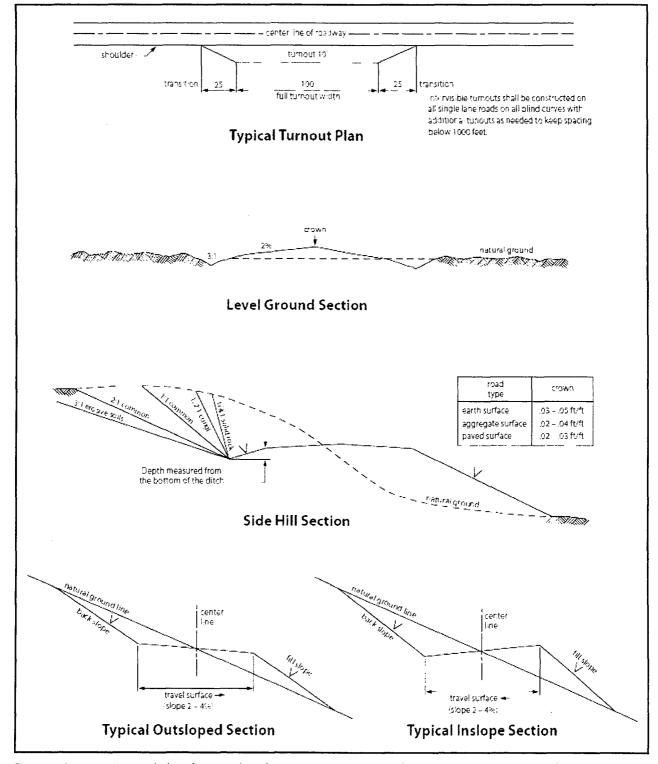


Figure 1. Cross-sections and plans for typical road sections representative of BLM resource or FS local and higher-class roads.

VII. PRODUCTION (POST DRILLING)

A. WELL STRUCTURES & FACILITIES

Placement of Production Facilities

Production facilities should be placed on the well pad to allow for maximum interim recontouring and revegetation of the well location.

Exclosure Netting (Open-top Tanks)

Immediately following active drilling or completion operations, the operator will take actions necessary to prevent wildlife and livestock access, including avian wildlife, to all open-topped tanks that contain or have the potential to contain salinity sufficient to cause harm to wildlife or livestock, hydrocarbons, or Resource Conservation and Recovery Act of 1976-exempt hazardous substances. At a minimum, the operator will net, screen, or cover open-topped tanks to exclude wildlife and livestock and prevent mortality. If the operator uses netting, the operator will cover and secure the open portion of the tank to prevent wildlife entry. The operator will net, screen, or cover the tanks until the operator removes the tanks from the location or the tanks no longer contain substances that could be harmful to wildlife or livestock. Use a maximum netting mesh size of 1 ½ inches. The netting must not be in contact with fluids and must not have holes or gaps.

Chemical and Fuel Secondary Containment and Exclosure Screening

The operator will prevent all hazardous, poisonous, flammable, and toxic substances from coming into contact with soil and water. At a minimum, the operator will install and maintain an impervious secondary containment system for any tank or barrel containing hazardous, poisonous, flammable, or toxic substances sufficient to contain the contents of the tank or barrel and any drips, leaks, and anticipated precipitation. The operator will dispose of fluids within the containment system that do not meet applicable state or U. S. Environmental Protection Agency livestock water standards in accordance with state law; the operator must not drain the fluids to the soil or ground. The operator will design, construct, and maintain all secondary containment systems to prevent wildlife and livestock exposure to harmful substances. At a minimum, the operator will install effective wildlife and livestock exclosure systems such as fencing, netting, expanded metal mesh, lids, and grate covers. Use a maximum netting mesh size of 1 ½ inches.

Open-Vent Exhaust Stack Exclosures

The operator will construct, modify, equip, and maintain all open-vent exhaust stacks on production equipment to prevent birds and bats from entering, and to discourage perching, roosting, and nesting. (*Recommended exclosure structures on open-vent exhaust stacks are in the shape of a cone.*) Production equipment includes, but may not be limited to, tanks, heater-treaters, separators, dehydrators, flare stacks, in-line units, and compressor mufflers.

Containment Structures

Proposed production facilities such as storage tanks and other vessels will have a secondary containment structure that is constructed to hold the capacity of 1.5 times the largest tank, plus freeboard to account for precipitation, unless more stringent protective requirements are deemed necessary.

Painting Requirement

All above-ground structures including meter housing that are not subject to safety requirements shall be painted a flat non-reflective paint color, **Shale Green** from the BLM Standard Environmental Color Chart (CC-001: June 2008).

VIII. INTERIM RECLAMATION

During the life of the development, all disturbed areas not needed for active support of production operations should undergo interim reclamation in order to minimize the environmental impacts of development on other resources and uses.

Within six (6) months of well completion, operators should work with BLM surface management specialists (Jim Amos: 575-234-5909) to devise the best strategies to reduce the size of the location. Interim reclamation should allow for remedial well operations, as well as safe and efficient removal of oil and gas.

During reclamation, the removal of caliche is important to increasing the success of revegetating the site. Removed caliche that is free of contaminants may be used for road repairs, fire walls or for building other roads and locations. In order to operate the well or complete workover operations, it may be necessary to drive, park and operate on restored interim vegetation within the previously disturbed area. Disturbing revegetated areas for production or workover operations will be allowed. If there is significant disturbance and loss of vegetation, the area will need to be revegetated. Communicate with the appropriate BLM office for any exceptions/exemptions if needed.

All disturbed areas after they have been satisfactorily prepared need to be reseeded with the seed mixture provided below.

Upon completion of interim reclamation, the operator shall submit a Sundry Notices and Reports on Wells, Subsequent Report of Reclamation (Form 3160-5).

IX. FINAL ABANDONMENT & RECLAMATION

At final abandonment, well locations, production facilities, and access roads must undergo "final" reclamation so that the character and productivity of the land are restored.

Earthwork for final reclamation must be completed within six (6) months of well plugging. All pads, pits, facility locations and roads must be reclaimed to a satisfactory revegetated, safe, and stable condition, unless an agreement is made with the landowner or BLM to keep the road and/or pad intact.

After all disturbed areas have been satisfactorily prepared, these areas need to be revegetated with the seed mixture provided below. Seeding should be accomplished by drilling on the contour whenever practical or by other approved methods. Seeding may need to be repeated until revegetation is successful, as determined by the BLM.

Operators shall contact a BLM surface protection specialist prior to surface abandonment operations for site specific objectives (Jim Amos: 575-234-5909).

Seed Mixture 2, for Sandy Sites

The holder shall seed all disturbed areas with the seed mixture listed below. The seed mixture shall be planted in the amounts specified in pounds of pure live seed (PLS)* per acre. There shall be <u>no</u> primary or secondary noxious weeds in the seed mixture. Seed will be tested and the viability testing of seed will be done in accordance with State law (s) and within nine (9) months prior to purchase. Commercial seed will be either certified or registered seed. The seed container will be tagged in accordance with State law(s) and available for inspection by the authorized officer.

Seed will be planted using a drill equipped with a depth regulator to ensure proper depth of planting where drilling is possible. The seed mixture will be evenly and uniformly planted over the disturbed area (smaller/heavier seeds have a tendency to drop the bottom of the drill and are planted first). The holder shall take appropriate measures to ensure this does not occur. Where drilling is not possible, seed will be broadcast and the area shall be raked or chained to cover the seed. When broadcasting the seed, the pounds per acre are to be doubled. The seeding will be repeated until a satisfactory stand is established as determined by the authorized officer. Evaluation of growth will not be made before completion of at least one full growing season after seeding.

Species to be planted in pounds of pure live seed* per acre:

Species	l <u>b/acre</u>
Sand dropseed (Sporobolus cryptandrus)	1.0
Sand love grass (Eragrostis trichodes)	1.0
Plains bristlegrass (Setaria macrostachya)	2.0

^{*}Pounds of pure live seed:

Pounds of seed x percent purity x percent germination = pounds pure live seed

FAFMSS

U.S. Department of the Interior BUREAU OF LAND MANAGEMENT



Operator Certification

I hereby certify that I, or someone under my direct supervision, have inspected the drill site and access route proposed herein; that I am familiar with the conditions which currently exist; that I have full knowledge of state and Federal laws applicable to this operation; that the statements made in this APD package are, to the best of my knowledge, true and correct; and that the work associated with the operations proposed herein will be performed in conformity with this APD package and the terms and conditions under which it is approved. I also certify that I, or the company I represent, am responsible for the operations conducted under this application. These statements are subject to the provisions of 18 U.S.C. 1001 for the filing of false statements.

NAME: Bradley Bishop Signed on: 11/03/2016

Title: Regulatory

Street Address: PO Box 5270

City: Hobbs State: NM Zip: 88240

Phone: (575)393-5905

Email address: bbishop@mewbourne.com

Field Representative

Representative Name:		
Street Address:		
City:	State:	Zip:
Phone:		
Email address:		

U.S. Department of the Interior BUREAU OF LAND MANAGEMENT



APD ID: 10400002822

Submission Date: 11/03/2016

Highlighted data

Operator Name: MEWBOURNE OIL COMPANY

reflects the most recent changes

Well Name: PAVO FRIO 29/28 B2MP FED COM

Well Number: 1H

Show Final Text

Well Type: OiL WELL

Well Work Type: Drill

Section 1 - General

APD ID:

10400002822

Tie to previous NOS?

Submission Date: 11/03/2016

BLM Office: CARLSBAD

User: Bradley Bishop

Title: Regulatory

Federal/Indian APD: FED

Is the first lease penetrated for production Federal or Indian? FED

Lease number: NMNM 56428

Lease Acres: 440

Surface access agreement in place?

Allotted?

Reservation:

Agreement in place? NO

Federal or Indian agreement:

Agreement number:

Agreement name:

Keep application confidential? YES

Permitting Agent? NO

APD Operator: MEWBOURNE OIL COMPANY

Operator letter of designation:

Pavo Frio 29_28 B2MP Federal Com 1H Operator letter of designation 10-18-2016.pdf

Operator Info

Operator Organization Name: MEWBOURNE OIL COMPANY

Operator Address: PO Box 5270

Zip: 88240

Operator PO Box:

Operator City: Hobbs

State: NM

Operator Phone: (575)393-5905

Operator Internet Address:

Section 2 - Well Information

Well in Master Development Plan? NO

Mater Development Plan name:

Well in Master SUPO? NO

Master SUPO name:

Well in Master Drilling Plan? NO

Master Drilling Plan name:

Well Name: PAVO FRIO 29/28 B2MP FED COM

Well Number: 1H

Well API Number:

Field/Pool or Exploratory? Field and Pool

BONE SPRING OIL

Field Name: PALMILLO EAST Pool Name:

Is the proposed well in an area containing other mineral resources? USEABLE WATER, NATURAL GAS, OIL

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H

Describe other minerals:

Is the proposed well in a Helium production area? N Use Existing Well Pad? NO New surface disturbance?

Type of Well Pad: SINGLE WELL Multiple Well Pad Name: Number:

Well Class: HORIZONTAL Number of Legs:

Well Work Type: Drill
Well Type: OIL WELL
Describe Well Type:

Well sub-Type: APPRAISAL

Describe sub-type:

Distance to town: 20 Miles Distance to nearest well: 330 FT Distance to lease line: 185 FT

Reservoir well spacing assigned acres Measurement: 320 Acres

Well plat: Pavo Frio 29_28 B2MP Federal Com 1H_well plat_11-15-2016.pdf

Section 3 - Well Location Table

Survey Type: RECTANGULAR

Describe Survey Type:

Datum: NAD83 Vertical Datum: NAVD88

Survey number:

	NS-Foot	NS Indicator	EW-Foot	EW Indicator	Twsp	Range	Section	Aliquot/Lot/Tract	Latitude	Longitude	County	State	Meridian	Lease Type	Lease Number	Elevation	MD	TVD
SHL Leg #1	600	FSL	185	FWL	18S	29E	29	Aliquot SWS W	32.71281 57	- 104.1048 942	EDD Y	1	NEW MEXI CO	F	NMNM 56428	345 3	0	0
KOP Leg #1	600	FSL	185	FWL	18\$	29E	29	Aliquot SWS W	32.71281 57	- 104.1048 942	EDD Y		NEW MEXI CO	F	NMNM 56428	- 378 6	723 9	723 9
PPP Leg #1	597	FSL	330	FWL	18\$	29E	29	Aliquot SESW	32.71268 92	- 104.1039 15	EDD Y		NEW MEXI CO	F	NMNM 56428	- 417 9	770 0	763 2

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H

EXIT	NS-Foot	NS Indicator	08 EW-Foot	표 EW Indicator	dsw1 188	Range	8 Section	Aliquot/Lot/Tract	Tatitude 32.71211	Longitude	County	State	Meridian	ਜ Lease Type	Z Lease Number	Elevation	요 175	Q/T 783
Leg #1		į						SESE	42	104.0722 497	Υ	MEXI CO	MEXI CO		34462	438 4	56	7
BHL Leg #1	330	FSL	330	FEL	18S	29E	28	Aliquot SESE	32.71211 42	- 104.0722 497	EDD Y	NEW MEXI CO	1.4	F	NMNM 34462	- 438 4	175 56	783 7

United States Department of the Interior Bureau of Land Management Roswell Field Office 2909 West Second Street Roswell, New Mexico 88201-1287

Statement Accepting Responsibility for Operations

Operator Name:

Mewbourne Oil Company

Street or Box:

P.O. Box 5270

City, State:

Hobbs, New Mexico

Zip Code:

88241

The undersigned accepts all applicable terms, conditions, stipulations, and restrictions concerning operations conducted of the leased land or portion thereof, as described below.

Lease Number:

NMNM 030752

NMNM 34462 NMNM 56428

Legal Description of Land:

Section 29, T-18S, R-29E Eddy County, New Mexico.

Location @ 600' FSL & 185' FWL.

Formation (if applicable):

Palmillo East Bone Spring Oil (49553)

Bond Coverage:

\$150,000

BLM Bond File:

NM1693 Nationwide, NMB 000919

Authorized Signature:

Name: Robin Terrell Title: District Manager

Date: 10-18-2016

∮AFMSS

U.S. Department of the Interior BUREAU OF LAND MANAGEMENT

Drilling Plan Data Report
09/15/2017

APD ID: 10400002822

Submission Date: 11/03/2016

Highlighted data reflects the most

recent changes

Well Name: PAVO FRIO 29/28 B2MP FED COM

Operator Name: MEWBOURNE OIL COMPANY

Well Number: 1H

Show Final Text

Well Type: OIL WELL

Well Work Type: Drill

Section 1 - Geologic Formations

Formation ID	Formation Name	Elevation	True Vertical Depth	Measured Depth	Lithologies	Mineral Resources	Producing Formation
17691	UNKNOWN	3453	27	27		NONE	No
17723	BOTTOM SALT	2618	835	835	SALT	NONE	No
17694	YATES	2468	985	985	SANDSTONE	NATURAL GAS,OIL	. No
15319	SEVEN RIVERS	2083	1370	1370	DOLOMITE	NATURAL GAS,OIL	. No
15318	QUEEN	1503	1950	1950	SANDSTONE,DOL OMITE	NATURAL GAS,OIL	. No
15314	SAN ANDRES	638	2815	2815	DOLOMITE	NATURAL GAS,OIL	. No
17721	BONE SPRING LIME	-127	3580	3580	LIMESTONE,SHAL E	NATURAL GAS,OIL	. No
15338	BONE SPRING 1ST	-3222	6675	6675	SANDSTONE	NATURAL GAS,OIL	No
17737	BONE SPRING 2ND	-4047	7500	7500	SANDSTONE	NATURAL GAS,OIL	Yes

Section 2 - Blowout Prevention

Pressure Rating (PSI): 3M

Rating Depth: 7983

Equipment: Annular, Pipe Ram, Blind Ram

Requesting Variance? YES

Variance request: A variance is requested for the use of a flexible choke line from the BOP to Choke Manifold.

Testing Procedure: Test Annular to 1500#. Test Rams to 3000#.

Choke Diagram Attachment:

Pavo Frio 29-28 B2MP Fed Com 1H_3M BOPE Choke Diagram_11-03-2016.pdf

BOP Diagram Attachment:

Pavo Frio 29-28 B2MP Fed Com 1H_3M BOPE Schematic 11-03-2016.pdf

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H

Pressure Rating (PSI): 3M

Rating Depth: 17560

Equipment: Annular, Pipe Ram, Blind Ram

Requesting Variance? YES

Variance request: A variance is requested for the use of a flexible choke line from the BOP to Choke Manifold.

Testing Procedure: Test Annular to 1500# Test Rams to 3000#

Choke Diagram Attachment:

Pavo Frio 29-28 B2MP Fed Com 1H_3M BOPE Choke Diagram_11-03-2016.pdf

BOP Diagram Attachment:

Pavo Frio 29-28 B2MP Fed Com 1H 3M BOPE Schematic 11-03-2016.pdf

Pressure Rating (PSI): 3M

Rating Depth: 1125

Equipment: Annular

Requesting Variance? YES

Variance request: A variance is requested for the use of a flexible choke line from the BOP to Choke Manifold. See attached

for specs and hydrostatic test chart. **Testing Procedure:** Test to 1500#

Choke Diagram Attachment:

Pavo Frio 29-28 B2MP Fed Com 1H 3M Surface BOPE Choke Diagram 11-03-2016.pdf

BOP Diagram Attachment:

Pavo Frio 29-28 B2MP Fed Com 1H_3M Surface BOPE Schematic_11-03-2016.pdf

Section 3 - Casing

Casing ID	String Type	Hole Size	Csg Size	Condition	Standard	Tapered String	Top Set MD	Bottom Set MD	Top Set TVD	Bottom Set TVD	Top Set MSL	Bottom Set MSL	Calculated casing length MD	Grade	Weight	Joint Type	Collapse SF	Burst SF	Joint SF Type	Joint SF	Body SF Type	Body SF
1	SURFACE	17.5	13,375	NEW	API	N	0	300	0	300	- 4179	-4479	300	H-40	48	STC	4.94	11.0 9	DRY	22.3 6	DRY	37.5 7
2		12.2 5	9.625	NEW	API	N	0	1325	0	1325	- 4179	-5504	1325	J-55	36	LTC	2.93	5.11	DRY	9.5	DRY	11.8 2
3	PRODUCTI ON	8.75	7.0	NEW	API	N	0	7983	0	7716	-4179	- 11895		P- 110	26	LTC	2.07	2.65	DRY	3.34	DRY	4
4	LINER	6.12 5	4.5	NEW	API	N	7239	17560	7239	7837	- 11418	- 12016	10321	P- 110	13.5	LTC	2.01	2.34	DRY	2.43	DRY	3.03

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H **Casing Attachments** Casing ID: 1 String Type: SURFACE **Inspection Document: Spec Document: Tapered String Spec:** Casing Design Assumptions and Worksheet(s): Pavo Frio 29-28 B2MP Fed Com 1H_Csg Assumptions_11-03-2016.pdf Casing ID: 2 String Type: INTERMEDIATE **Inspection Document: Spec Document: Tapered String Spec:** Casing Design Assumptions and Worksheet(s): Pavo Frio 29-28 B2MP Fed Com 1H_Csg Assumptions_11-03-2016.pdf Casing ID: 3 String Type: PRODUCTION **Inspection Document: Spec Document: Tapered String Spec:** Casing Design Assumptions and Worksheet(s): Pavo Frio 29-28 B2MP Fed Com 1H_Csg Assumptions_11-03-2016.pdf

Operator Name: MEWBOURNE OIL COMPANY

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H

Casing Attachments

Casing ID: 4

String Type:LINER

Inspection Document:

Spec Document:

Tapered String Spec:

Casing Design Assumptions and Worksheet(s):

Pavo Frio 29-28 B2MP Fed Com 1H_Csg Assumptions_11-03-2016.pdf

Section 4 - Cement

String Type	Lead/Tail	Stage Tool Depth	Top MD	Bottom MD	Quantity(sx)	Yield	Density	Cu Ft	Excess%	Cement type	Additives
SURFACE	Lead		0	111	75	2.12	12.5	159	100	Class C	Salt, Gel, Extender, LCM
SURFACE	Tail		111	300	200	1.34	14.8	268	100	Class C	Retarder
INTERMEDIATE	Lead		0	684	135	2.12	12.5	286	25	Class C	Salt, Gel, Extender, LCM
INTERMEDIATE	Tail		684	1125	200	1.34	14.8	268	25	Class C	Retarder
PRODUCTION	Lead		1125	5491	390	2.12	12.5	827	25	Class C	Gel, Retarder, Defoamer, Extender
PRODUCTION	Tail		5491	7983	400	1.18	15.6	472	25	Class H	Retarder, Fluid Loss, Defoamer
LINER	Lead		7239	1756 0	415	2.97	11.2	1232	25	Class C	Salt, Gel, Fluid Loss, Retarder, Dispersant, Defoamer, Anti-Settling Agent

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H

Section 5 - Circulating Medium

Mud System Type: Closed

Will an air or gas system be Used? NO

Description of the equipment for the circulating system in accordance with Onshore Order #2:

Diagram of the equipment for the circulating system in accordance with Onshore Order #2:

Describe what will be on location to control well or mitigate other conditions: Lost circulation material Sweeps Mud scavengers in surface hole

Describe the mud monitoring system utilized: Visual Monitoring

Circulating Medium Table

Top Depth	Bottom Depth	Mud Type	Min Weight (lbs/gal)	Max Weight (Ibs/gal)	Density (lbs/cu ft)	Gel Strength (lbs/100 sqft)	ЬН	Viscosity (CP)	Salinity (ppm)	Filtration (cc)	Additional Characteristics
0	300	SPUD MUD	8.6	8.8							
300	1325	SALT SATURATED	10	10							
1325	7239	WATER-BASED MUD	8.6	9.5							
7239	7837	WATER-BASED MUD	8.6	9.7					·		

Section 6 - Test, Logging, Coring

List of production tests including testing procedures, equipment and safety measures:

Will run GR/CNL from KOP (7239') to surface

List of open and cased hole logs run in the well:

CNL,DS,GR,MWD,MUDLOG

Coring operation description for the well:

None

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H

Section 7 - Pressure

Anticipated Bottom Hole Pressure: 4076

Anticipated Surface Pressure: 2351.85

Anticipated Bottom Hole Temperature(F): 140

Anticipated abnormal pressures, temperatures, or potential geologic hazards? NO

Describe:

Contingency Plans geoharzards description:

Contingency Plans geohazards attachment:

Hydrogen Sulfide drilling operations plan required? YES

Hydrogen sulfide drilling operations plan:

Pavo Frio 29-28 B2MP Fed Com 1H_H2S Plan_11-03-2016.pdf

Section 8 - Other Information

Proposed horizontal/directional/multi-lateral plan submission:

Pavo Frio 29-28 B2MP Fed Com 1H_Dir Plot_11-03-2016.pdf Pavo Frio 29-28 B2MP Fed Com 1H_Dir Plan 11-03-2016.pdf

Other proposed operations facets description:

Other proposed operations facets attachment:

Other Variance attachment:

Pavo Frio 29-28 B2MP Fed Com 1H_Flex Line Specs_11-03-2016.pdf

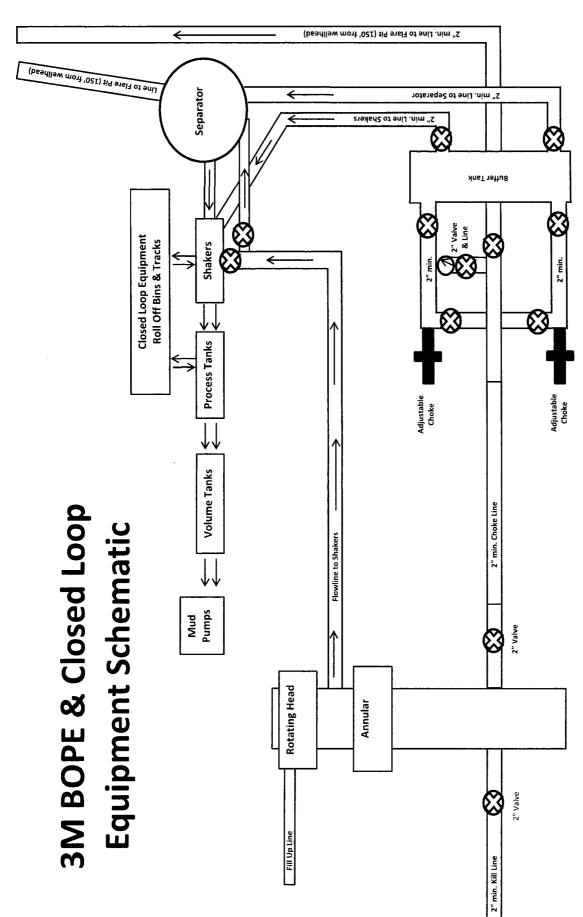
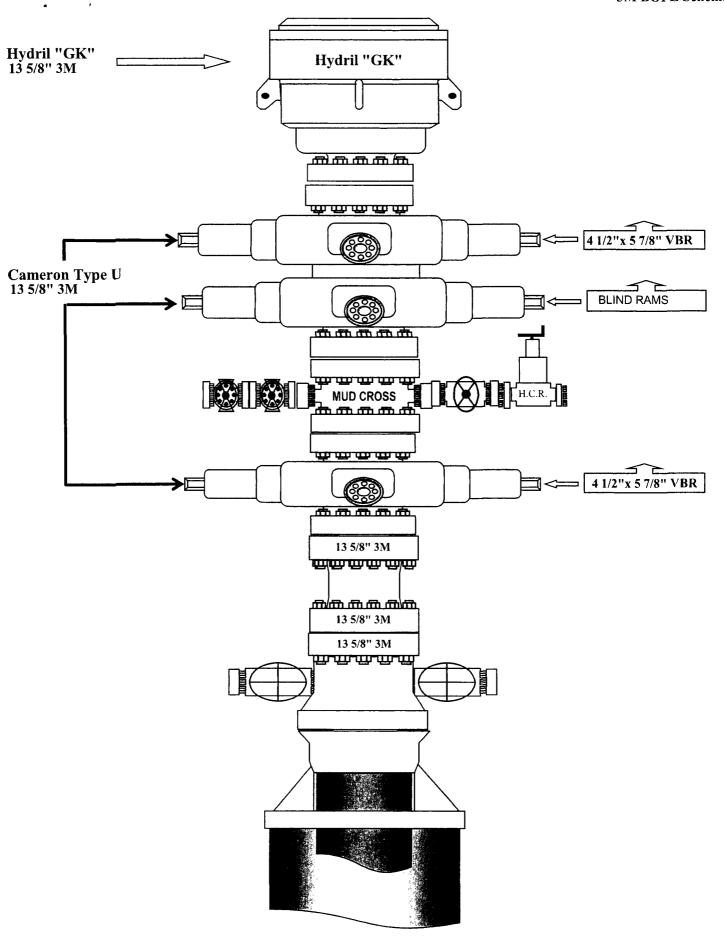


Exhibit "2"



Mewbourne Oil Company

BOP Schematic for

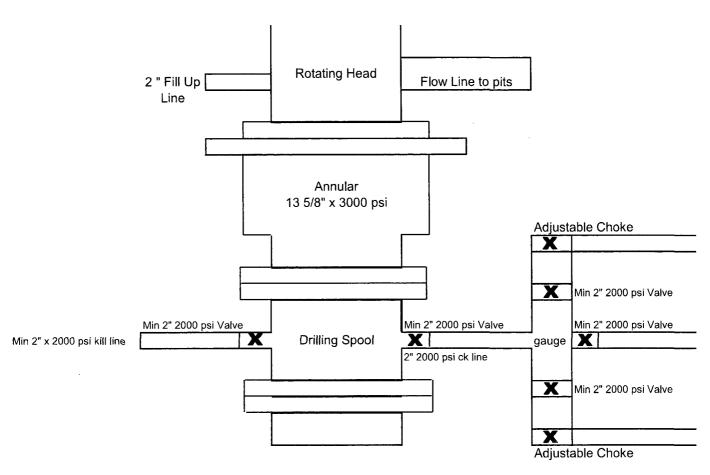


Exhibit #2

Mewbourne Oil Company, Pavo Frio 29/28 B2MP Fed Com #1H Sec 29, T18S, R29E

SL: 600' FSL & 185' FWL, Sec 29 BHL: 330' FSL & 330' FEL, Sec 28

Casing Program

Hole	Casing Interval		Csg.	Weight	Grade	Conn.	SF	SF	SF Jt	SF Body
Size	From	To	Size	(lbs)			Collapse	Burst	Tension	Tension
17.5"	0'	300'	13.375"	48	H40	STC	4.94	11.09	22.36	37.57
12.25"	0'	1325'	9.625"	36	J55	LTC	2.93	5.11	9.50	11.82
8.75"	0'	7983	7"	26	HCP110	LTC	2.07	2.65	3.34	4.00
6.125"	7239'	17560'	4.5"	13.5	P110	LTC	2.01	2.34	2.43	3.03
				BLM Minimum Safety			1.125	1	1.6 Dry	1.6 Dry
						Factor			1.8 Wet	1.8 Wet

All casing strings will be tested in accordance with Onshore Oil and Gas Order #2 III.B.1.h Must have table for contingency casing

	Y or N
Is casing new? If used, attach certification as required in Onshore Order #1	Y
Is casing API approved? If no, attach casing specification sheet.	Y
Is premium or uncommon casing planned? If yes attach casing specification sheet.	N
Does the above casing design meet or exceed BLM's minimum standards? If not provide justification (loading assumptions, casing design criteria).	Y
Will the pipe be kept at a minimum 1/3 fluid filled to avoid approaching the collapse pressure rating of the casing?	Y
Is well located within Capitan Reef?	N
If yes, does production casing cement tie back a minimum of 50' above the Reef?	
Is well within the designated 4 string boundary.	
Is well located in SOPA but not in R-111-P?	N
If yes, are the first 2 strings cemented to surface and 3 rd string cement tied back 500' into previous casing?	
Is well located in R-111-P and SOPA?	N
If yes, are the first three strings cemented to surface?	
Is 2 nd string set 100' to 600' below the base of salt?	
Is well located in high Cave/Karst?	N
If yes, are there two strings cemented to surface?	
(For 2 string wells) If yes, is there a contingency casing if lost circulation occurs?	
Is well located in critical Cave/Karst?	N
If yes, are there three strings cemented to surface?	

Hydrogen Sulfide Drilling Operations Plan Mewbourne Oil Company

1. General Requirements

Rule 118 does not apply to this well because MOC has researched this area and no high concentrations of H2S were found. MOC will have on location and working all H2S safety equipment before the Delaware formation for purposes of safety and insurance requirements.

2. Hydrogen Sulfide Training

All personnel, whether regularly assigned, contracted, or employed on an unscheduled basis, will have received training from a qualified instructor in the following areas prior to entering the drilling pad area of the well:

- 1. The hazards and characteristics of hydrogen sulfide gas.
- 2. The proper use of personal protective equipment and life support systems.
- 3. The proper use of hydrogen sulfide detectors, alarms, warning systems, briefing areas, evacuation procedures.
- 4. The proper techniques for first aid and rescue operations.

Additionally, supervisory personnel will be trained in the following areas:

- The effects of hydrogen sulfide on metal components. If high tensile tubular systems are utilized, supervisory personnel will be trained in their special maintenance requirements.
- 2 Corrective action and shut in procedures, blowout prevention, and well control procedures while drilling a well.
- The contents of the Hydrogen Sulfide Drilling Operations Plan.

There will be an initial training session prior to encountering a know hydrogen sulfide source. The initial training session shall include a review of the site specific Hydrogen Sulfide Drilling Operations Plan.

3. Hydrogen Sulfide Safety Equipment and Systems

All hydrogen sulfide safety equipment and systems will be installed, tested, and operational prior to drilling below the 9 5/8" intermediate casing.

1. Well Control Equipment

- A. Choke manifold with minimum of one adjustable choke/remote choke.
- B. Blowout preventers equipped with blind rams and pipe rams to accommodate all pipe sizes with properly sized closing unit
- C. Auxiliary equipment including annular type blowout preventer.
- 2. Protective Equipment for Essential Personnel

Thirty minute self contained work unit located in the dog house and at briefing areas.

Additionally: If H2S is encountered in concentrations less than 10 ppm, fans will be placed in work areas to prevent the accumulation of hazardous amounts of poisonous gas. If higher concentrations of H2S are detected the well will be shut in and a rotating head, mud/gas separator, remote choke and flare line with igniter will be installed.

3. <u>Hydrogen Sulfide Protection and Monitoring Equipment</u>

Two portable hydrogen sulfide monitors positioned on location for optimum coverage and detection. The units shall have audible sirens to notify personnel when hydrogen sulfide levels exceed 20 PPM.

4. <u>Visual Warning Systems</u>

- A. Wind direction indicators as indicated on the wellsite diagram.
- B. Caution signs shall be posted on roads providing access to location. Signs shall be painted a high visibility color with lettering of sufficient size to be readable at reasonable distances from potentially contaminated areas.

4. Mud Program

The mud program has been designed to minimize the amount of hydrogen sulfide entrained in the mud system. Proper mud weight, safe drilling practices, and the use of hydrogen sulfide scavengers will minimize hazards while drilling the well.

5. Metallurgy

All tubular systems, wellheads, blowout preventers, drilling spools, kill lines, choke manifolds, and valves shall be suitable for service in a hydrogen sulfide environment when chemically treated.

6. Communications

State & County Officials phone numbers are posted on rig floor and supervisors trailer. Communications in company vehicles and toolpushers are either two way radios or cellular phones.

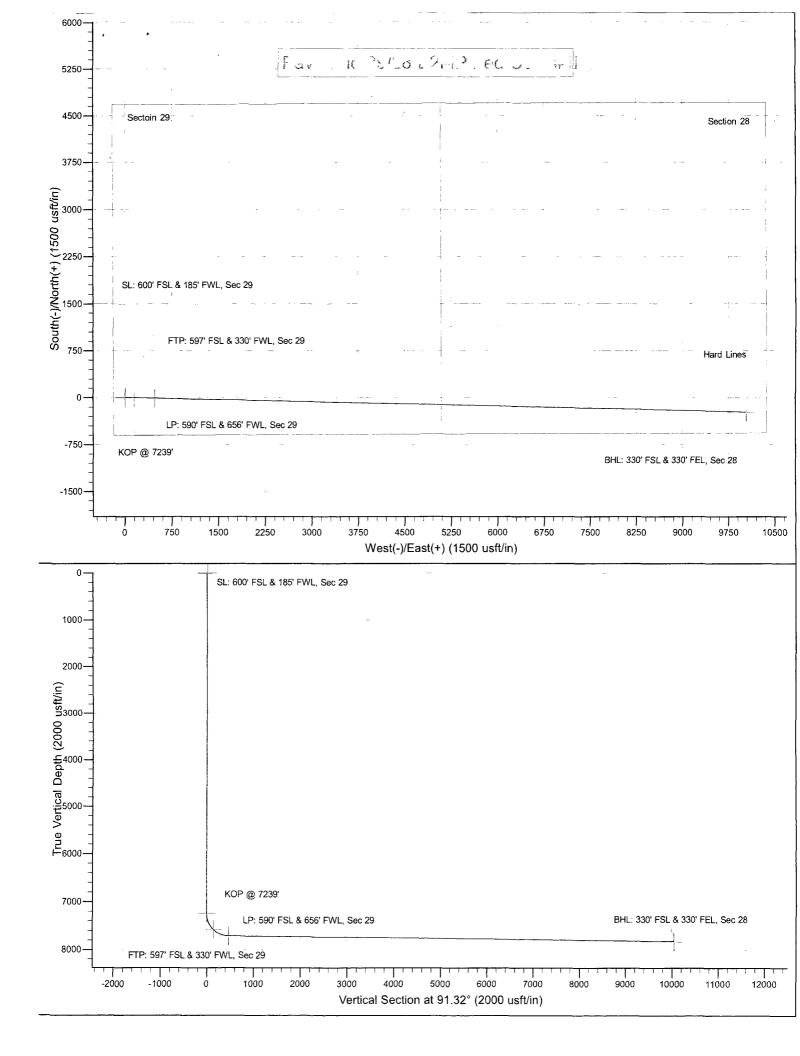
7. Well Testing

Drill stem testing is not an anticipated requirement for evaluation of this well. If a drill stem test is required, it will be conducted with a minimum number of personnel in the immediate vicinity. The test will be conducted during daylight hours only.

8. Emergency Phone Numbers

Eddy County Sheriff's Office	911 or 575-887-7551
Ambulance Service	911 or 575-885-2111
Carlsbad Fire Dept	911 or 575-885-2111
Loco Hills Volunteer Fire Dept.	911 or 575-677-3266
Closest Medical Facility - Columbia Medical Ce	enter of Carlsbad 575-492-5000

Mewbourne Oil Company	Hobbs District Office Fax	575-393-5905 575-397-6252
	2 nd Fax	575-393-7259
District Manager	Robin Terrell	575-390-4816
Drilling Superintendent	Frosty Lathan	575-390-4103
	Bradley Bishop	575-390-6838
Drilling Foreman	Wesley Noseff	575-441-0729



Mewbourne Oil Company

Eddy County, New Mexico Pavo Frio 29/28 B2MP Fed Com #1H Sec 29, T28S, R29E

SL: 600' FSL & 185' FWL, Sec 29 BHL: 330' FSL & 330' FEL, Sec 28

Plan: Design #1

Standard Planning Report

14 October, 2016

TVD Reference:

MD Reference:

North Reference:

Local Co-ordinate Reference:

Survey Calculation Method:

Database:

Hobbs

Company: Project:

Mewbourne Oil Company Eddy County, New Mexico

Site:

Pavo Frio 29/28 B2MP Fed Com #1H

Well:

Sec 29, T28S, R29E

Wellbore:

BHL: 330' FSL & 330' FEL, Sec 28

Design:

Design #1

Project

Eddy County, New Mexico

Map System: Geo Datum:

US State Plane 1927 (Exact solution) NAD 1927 (NADCON CONUS)

Map Zone:

New Mexico East 3001

System Datum:

Mean Sea Level

Grid

Minimum Curvature

Site Pavo Frio 29/28 B2MP Fed Com #1H

WELL @ 3480.0usft (Original Well Elev)

WELL @ 3480.0usft (Original Well Elev)

Site

From:

Pavo Frio 29/28 B2MP Fed Com #1H

Site Position:

Map

Northing: Easting:

623,067.00 usft 570,418.00 usft

Latitude:

Longitude:

32° 42' 45.717 N 104° 6' 15.791 W

Position Uncertainty:

0.0 usft Slot Radius: 13-3/16 "

Grid Convergence:

0.12°

Well

Sec 29, T28S, R29E

Well Position

+N/-S +E/-W 0.0 usft 0.0 usft

Northing: Easting:

623,067.00 usft 570,418.00 usft

Latitude: Longitude:

32° 42' 45.717 N 104° 6' 15.791 W

Position Uncertainty

0.0 usft Wellhead Elevation: 3,480.0 usft

Ground Level:

3,453.0 usft

Wellbore

BHL: 330' FSL & 330' FEL, Sec 28

Magnetics

Model Name

Sample Date

Declination (°)

Dip Angle

Field Strength

(nT)

IGRF200510

12/31/2009

8.03

60.60

49,027

Design

Design #1

Audit Notes:

Version:

Phase:

PROTOTYPE

Tie On Depth:

0.0

Vertical Section:

Depth From (TVD) (usft)

0.0

+N/-S (usft) 0.0

+E/-W (usft) 0.0

Direction (°) 91.32

Plan Sections

	Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	TFO (°)	Target
1	0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.00	0.00	
	7,238.5	0.00	0.00	7,238.5	0.0	0.0	0.00	0.00	0.00	0.00 KG	OP @ 7239'
	7,982.6	89.28	91,32	7,716.0	-10.9	471.3	12.00	12.00	0.00	91.32	
	17.555.5	89.28	91.32	7.837.0	-232.0	10.041.0	0.00	0.00	0.00	0.00 Bł	HL: 330' FSL & 330'

Database:

Hobbs

Company: Project:

Mewbourne Oil Company Eddy County, New Mexico

Site:

Pavo Frio 29/28 B2MP Fed Com #1H

Well:

Sec 29, T28S, R29E

Wellbore; Design:

BHL: 330' FSL & 330' FEL, Sec 28

Design #1

Local Co-ordinate Reference:

TVD Reference: MD Reference: North Reference:

Survey Calculation Method:

Site Pavo Frio 29/28 B2MP Fed Com #1H WELL @ 3480.0usft (Original Well Elev) WELL @ 3480.0usft (Original Well Elev)

Grid

Minimum Curvature

Planned Survey

Measured Depth	laalin-4!	A minor rate	Vertical Depth	+N/-S	+E/-W	Vertical Section	Dogleg Rate	Build Rate	Turn Rate
(usft)	Inclination (°)	Azimuth (°)	(usft)	+N/-S (usft)	(usft)	(usft)	(°/100usft)	(°/100usft)	(°/100usft)
0.0	0.00	0.00	0.0	0.0	0.0	0.0	0.00	0.00	0.00
SL: 600' FSI	L & 185' FWL, Se	c 29							
100.0	0.00	0.00	100.0	0.0	0.0	0.0	0.00	0.00	0.00
200.0	0.00	0.00	200.0	0.0	0.0	0.0	0.00	0.00	0.00
300.0	0.00	0.00	300.0	0.0	0.0	0.0	0.00	0.00	0.00
400.0	0.00	0.00	400.0	0.0	0.0	0.0	0.00	0.00	0.00
500.0	0.00	0.00	500.0	0.0	0.0	0.0	0.00	0.00	0.00
600.0	0.00	0.00	600.0	0.0	0.0	0.0	0.00	0.00	0.00
700.0	0.00	0.00	700.0	0.0	0.0	0.0	0.00	0.00	0.00
800.0	0.00	0.00	0.008	0.0	0.0	0.0	0.00	0.00	0.00
900.0	0.00	0.00	900.0	0.0	0.0	0.0	0.00	0.00	0.00
1,000.0	0.00	0.00	1,000.0	0.0	0.0	0.0	0.00	0.00	0.00
1,100.0	0.00	0.00	1,100.0	0.0	0.0	0.0	0.00	0.00	0.00
1,700.0	0.00	0.00	1,200.0	0.0	0.0	0.0	0.00	0.00	0.00
1,300.0	0.00	0.00	1,300.0	0.0	0.0	0.0	0.00	0.00	0.00
1,400.0	0.00	0.00	1,400.0	0.0	0.0	0.0	0.00	0.00	0.00
1,500.0	0.00	0.00	1,500.0	0.0	0.0	0.0	0.00	0.00	0.00
1,600.0	0.00	0.00	1,600.0	0.0	0.0	0.0	0.00	0.00	0.00
1,700.0	0.00	0.00	1,700.0	0.0	0.0	0.0	0.00	0.00	0.00
1,800.0	0.00	0.00	1,800.0	0.0	0.0	0.0	0.00	0.00	0.00
1,900.0	0.00	0.00	1,900.0	0.0	0.0	0.0	0.00	0.00	0.00
2,000.0	0.00	0.00	2,000.0	0.0	0.0	0.0	0.00	0.00	0.0
2,100.0	0.00	0.00	2,100.0	0.0	0.0	0.0	0.00	0.00	0.0
2,200.0	0.00	0.00	2,200.0	0.0	0.0	0.0	0.00	0.00	0.0
2,300.0	0.00	0.00	2,300.0	0.0	0.0	0.0	0.00	0.00	0.0
2,400.0	0.00	0.00	2,400.0	0.0	0.0	0.0	0.00	0.00	0.00
2,500.0	0.00	0.00	2,500.0	0.0	0.0	0.0	0.00	0.00	0.00
2,600.0	0.00	0.00	2,600.0	. 0.0	0.0	0.0	0.00	0.00	0.0
2,700.0	0.00	0.00	2,700.0	0.0	0.0	0.0	0.00	0,00	0.0
2,800.0	0.00	0.00	2,800.0	0.0	0.0	0.0	0.00	0.00	0.0
2,900.0	0.00	0.00	2,900.0	0.0	0.0	0.0	0.00	0.00	0.0
	0.00	0.00	2 000 0	0.0	0.0	0.0	0.00	0.00	0.0
3,000.0	0.00 0.00	0.00 0.00	3,000.0	0.0 0.0	0.0	0.0 0.0	0.00 0.00	0.00	0.0
3,100.0	0.00	0.00	3,100.0 3,200.0	0.0	0.0		0.00	0.00	0.0
3,200.0 3,300.0	0.00	0.00	3,300.0	0.0	0.0	0.0 0.0	0.00	0.00 0.00	0.0
3,400.0	0:00	0.00	3,400.0	0.0	0.0	0.0	0.00	0.00	0.0
3,500.0	0.00	0.00	3,500.0	0.0	0.0	0.0	0.00	0.00	0.0
3,600.0	0.00	0.00	3,600.0	0.0	0.0	0.0	0.00	0.00	0.0
3,700.0	0.00	0.00	3,700.0	0.0	0.0	0.0	0.00	0.00	0.0
3,800.0	0.00	0.00	3,800.0	0.0	0.0	0.0	0.00	0.00	0.0
3,900.0	0.00	0.00	3,900.0	0.0	0.0	0.0	0.00	0.00	0.0
4,000.0	0.00	0.00	4,000.0	0.0	0.0	0.0	0.00	0.00	0.0
4,100.0	0.00	0.00	4,100.0	0.0	0.0	0.0	0.00	0.00	0.0
4,200.0	0.00	0.00	4,200.0	0.0	0.0	0.0	0.00	0.00	0.0
4,300.0	0.00	0.00	4,300.0	0.0	0.0	0.0	0.00	0.00	0.0
4,400.0	0.00	0.00	4,400.0	0.0	0.0	0.0	0.00	0.00	0.0
4,500.0	0.00	0.00	4,500.0	0.0	0.0	0.0	0.00	0.00	0.0
4,500.0 4,600.0	0.00	0.00	4,600.0	0.0	0.0	0.0	0.00		0.0
4,600.0	0.00	0.00	4,600.0	0.0	0.0	0.0	0.00	0.00	
•								0.00	0.0
4,800.0	0.00	0.00	4,800.0	0.0	0.0	0.0	0.00	0.00	0.0
4,900.0	0.00	0.00	4,900.0	0.0	0.0	0.0	0.00	0.00	0.0
5,000.0	0.00	0.00	5,000.0	0.0	0.0	0.0	0.00	0.00	0.0
5,100.0	0.00	0.00	5,100.0	0.0	0.0	0.0	0.00	0.00	0.0
5,200.0	0.00	0.00	5,200.0	0.0	0.0	0.0	0.00	0.00	0.0

Database:

Hobbs

Company: Project:

Mewbourne Oil Company Eddy County, New Mexico

Site:

Pavo Frio 29/28 B2MP Fed Com #1H

Well:

Sec 29, T28S, R29E

Wellbore:

BHL: 330' FSL & 330' FEL, Sec 28

Design:

Design #1

Local Co-ordinate Reference:

TVD Reference: MD Reference:

North Reference: Survey Calculation Method:

Site Pavo Frio 29/28 B2MP Fed Com #1H WELL @ 3480.0usft (Original Well Elev) WELL @ 3480.0usft (Original Well Elev)

Grid

Minimum Curvature

Planned Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
5,300.0	0.00	0.00	5,300,0	0.0	0.0	0.0	0.00	0.00	0.00
5,400.0	0.00	0.00	5,400.0	0.0	0.0	0.0	0.00	0.00	0.00
5,500.0	0.00	0.00	5,500.0	0.0	0.0	0.0	0.00	0.00	0.00
5,600.0	0.00	0.00	5,600.0	0.0	0.0	0.0	0.00	0.00	0.00
5,700.0	0.00	0.00	5,700.0	0.0	0.0	0.0	0.00	0.00	0.00
5,800.0	0.00	0.00	5,800.0	0.0	0.0	0.0	0.00	0.00	0.00
5,900.0	0.00	0.00	5,900.0	0.0	0.0	0.0	0.00	0.00	0.00
6,000.0	0,00	0.00	6,000.0	0.0	0.0	0.0	0.00	0.00	0.00
6,100.0	0.00	0.00	6,100.0	0.0	0.0	0.0	0.00	0.00	0.00
6,200.0	0.00	0.00	6,200.0	0.0	0.0	0.0	0.00	0.00	0.00
6,300.0	0.00	0.00	6,300.0	0.0	0.0	0.0	0.00	0.00	0.00
6,400.0	0.00	0.00	6,400.0	0.0	0.0	0.0	0.00	0.00	0.00
6,500.0	0.00	0.00	6,500.0	0.0	0.0	0.0	0.00	0.00	0.00
6,600.0	0.00	0.00	6,600.0	0.0	0.0	0.0	0.00	0.00	0.00
6,700.0	0.00	0.00	6,700.0	0.0	0.0	0.0	0.00	0.00	0.00
6,800.0	0.00	0.00	6,800.0	0.0	0.0	0.0	0.00	0.00	0.00
6,900.0	0.00	0.00	6,900.0	0.0	0.0	0.0	0.00	0.00	0.00
7,000.0	0.00	0.00	7,000.0	0.0	0.0	0.0	0.00	0.00	0.00
7,100.0	0.00	0.00	7,100.0	0.0	0.0	0.0	0.00	0.00	0.00
7,200.0	0.00	0.00	7,200.0	0.0	0.0	0.0	0.00	0.00	0.00
7,238.5 KOP @ 7239	0.00	0.00	7,238.5	0.0	0.0	0.0	0.00	0.00	0.00
7,300.0	7.37	91.32	7,299.8	-0.1	3.9	3.9	12.00	12.00	0.00
7,400.0	19.37	91.32	7,396.9	-0.6	27.0	27.0	12.00	12.00	0.00
7,500.0	31.37	91.32	7,487.1	-1.6	69.8	69.8	12.00	12.00	0.00
7,600.0	43.37	91.32	7,566.5	-3.0	130.4	130.4	12.00	12.00	0.00
7,620.8	45.87	91.32	7,581.3	-3.3	145.0	145.0	12.00	12.00	0.00
	L & 330' FWL, S 55.37	Sec 29 91.32	7 621 5	4.0	206.4	206.2	12.00	12.00	0.00
7,700.0			7,631.5	-4.8	206.1	206.2			
7,800.0	67.37	91.32	7,679.3	-6.8	293.7	293.8	12.00	12.00	0.00
7,900.0	79.37	91.32	7,707.8	-9.0	389.3	389.4	12.00	12.00	0.00
7,982.5	89.27 . & 656' FWL, Se	91.32	7,716.0	-10.9	471.3	471.4	12.00	12.00	0.00
	89.28	91.32	7,716.2	11.2	400 0	400 0	0.03	0.03	0.00
8,000.0 8,100.0	89.28	91.32	7,710.2	-11.3 -13.6	488.8 588.7	488.9 588.9	0.00	0.00	0.00
8,200.0	89.28	91.32	7,718.7	-15.9	688.7	688.9	0.00	0.00	0.00
8,300.0	89.28	91.32	7,720.0	-18.2	788.7	788.9	0.00	0.00	0.00
8,400.0	89.28	91.32	7,721.3	-20.5	888.6	888.9	0.00	0.00	0.00
8,500.0	89.28	91.32	7,722.5	-22.8	988.6	988.9	0.00	0.00	0.00
8,600.0	89.28	91.32	7,723.8	-25.2	1,088.6	1,088.9	0.00	0.00	0.00
8,700.0	89.28	91.32	7,725.1	-27.5	1,188.5	1,188.8	0.00	0.00	0.00
8,800.0	89.28	91.32	7,726.3	-29.8	1,288.5	1,288.8	0.00	0.00	0.00
8,900.0	89.28	91.32	7,727.6	- 32.1	1,388.5	1,388.8	0.00	0.00	0.00
9,000.0	89.28	91.32	7,728.9	-34.4	1,488.4	1,488.8	0.00	0.00	0.00
9,100.0	89.28	91.32	7,730.1	-36.7	1,588.4	1,588.8	0.00	0.00	0.00
9,200.0	89.28	91.32	7,731.4	-39.0	1,688.4	1,688.8	0.00	0.00	0.00
9,300.0	89.28	91,32	7,732.7	-41.3	1,788.3	1,788.8	0.00	0.00	0.00
9,400.0	89.28	91.32	7,733.9	-43.6	1,888,3	1,888.8	0.00	0.00	0.00
9,500.0	89.28	91.32	7,735.2	-4 5.9	1,988.3	1,988.8	0.00	0.00	0.00
9,600.0	89.28	91.32	7,736.4	-48.2	2,088.2	2,088.8	0.00	0.00	0.00
9,700.0	89.28	91.32	7,737.7	-50.6	2,188.2	2,188.8	0.00	0.00	0.00
9,800.0	89.28	91.32	7,739.0	- 52.9	2,288.2	2,288.8	0.00	0.00	0.00
9,900.0	89.28	91.32	7,740.2	-55.2	2,388.1	2,388.8	0.00	0.00	0.00

Database:

Hobbs

Company: Project:

Mewbourne Oil Company Eddy County, New Mexico

Site: Well:

Wellbore:

BHL: 330' FSL & 330' FEL, Sec 28

Design: Design #1

Pavo Frio 29/28 B2MP Fed Com #1H Sec 29, T28S, R29E

Local Co-ordinate Reference:

TVD Reference: MD Reference: North Reference:

Survey Calculation Method:

Site Pavo Frio 29/28 B2MP Fed Com #1H WELL @ 3480.0usft (Original Well Elev) WELL @ 3480.0usft (Original Well Elev)

Grid

Minimum Curvature

Planned Survey

	Measured Depth (usft)	Inclination	Azimuth	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
		(°)	(°)			(usit)		(/ 1000311)	(/ loousit)	, ,
1	10,000.0	89.28	91.32	7,741.5	-57.5	2,488.1	2,488.7	0.00	0.00	0.00
i	10,100.0	89.28	91.32	7,742.8	-59.8	2,588.0	2,588.7	0.00	0.00	0.00
	10,200.0	89.28	91.32	7,744.0	-62.1	2,688.0	2,688.7	0.00	0.00	0.00
	10,300.0	89.28	91.32	7,745.3	-64.4	2,788.0	2,788.7	0.00	0.00	0.00
	10,400.0	89.28	91.32	7,746.6	-66.7	2,887.9	2,888.7	0.00	0.00	0.00
į	10,500.0	89.28	91.32	7,747.8	-69.0	2,987.9	2,988.7	0.00	0.00	0.00
	10,600.0	89.28	91.32	7,749.1	-71.3	3,087.9	3,088.7	0.00	0.00	0.00
	10,700.0	89.28	91.32	7,750.3	-73.7	3,187.8	3,188.7	0.00	0.00	0.00
i	10,800.0	89.28	91.32	7,751.6	-76. 0	3,287.8	3,288.7	0.00	0.00	0.00
	10,900.0	89.28	91.32	7,752.9	-78.3	3,387.8	3,388.7	0.00	0.00	0.00
1	11,000.0	89.28	91.32	7,754.1	-80.6	3,487.7	3,488.7	0.00	0.00	0.00
	11,100.0	89.28	91.32	7,755.4	-82.9	3,587.7	3,588.7	0.00	0.00	0.00
	11,200.0	89.28	91.32	7,756.7	-85.2	3,687.7	3,688.6	0.00	0.00	0.00
	11,300.0	89.28	91.32	7,750.7 7,757.9	-65.2 -87.5	3,787.6	3,788.6	0.00	0.00	0.00
i	11,400.0	89.28	91.32	7,759.2	-89.8	3,887.6	3,888.6	0.00	0.00	0.00
	11,500.0	89.28	91.32	7,760.5	-92.1	3,987.6	3,988.6	0.00	0.00	0.00
1	11,600.0	89.28	91.32	7,761.7	-94.4	4,087.5	4,088.6	0.00	0.00	0.00
	11,700 <i>.</i> 0 11,800.0	89.28 89.28	91.32 91.32	7,763.0	-96.8 -99.1	4,187.5	4,188.6	0.00	0.00	0.00 0.00
	11,900.0	89.28	91.32	7,764.3 7,765.5	-99.1 -101.4	4,287.5 4,387.4	4,288.6 4,388.6	0.00 0.00	0.00 0.00	0.00
:	12,000.0	89.28	91.32	7,765.5 7,766.8	-101.4	4,367.4 4,487.4	4,300.0 4,488.6	0.00	0.00	0.00
i	12,000.0	89.28	91.32	7,768.0	-105.7	4,467.4 4,587.4	4,466.6	0.00	0.00	0.00
i :						•	•			
:	12,200.0	89.28	91.32	7,769.3	-108.3	4,687.3	4,688.6	0.00	0.00	0.00
	12,300.0	89.28	91.32	7,770.6	-110.6	4,787.3	4,788.6	0.00	0.00	0.00
	12,400.0	89.28	91.32	7,771.8	-112.9	4,887.2	4,888.6	0.00	0.00	0.00
	12,500.0	89.28	91.32	7,773.1	-115.2	4,987.2	4,988.5	0.00	0.00	0.00
:	12,600.0	89.28	91.32	7,774.4	-117.5	5,087.2	5,088.5	0.00	0.00	0.00
	12,700.0	89,28	91.32	7,775.6	-119.9	5,187.1	5,188.5	0.00	0.00	0.00
	12,800.0	89.28	91.32	7,776.9	-122.2	5,287.1	5,288.5	0.00	0.00	0.00
	12,900.0	89.28	91.32	7,778.2	-124.5	5,387.1	5,388.5	0.00	0.00	0.00
	13,000.0	89.28	91.32	7,779.4	-126.8	5,487.0	5,488.5	0.00	0.00	0.00
	13,100.0	89.28	91.32	7,780.7	-129.1	5,587.0	5,588.5	0.00	0.00	0.00
	13,200.0	89.28	91.32	7,781.9	-131.4	5,687.0	5,688.5	0.00	0.00	0.00
	13,300.0	89.28	91.32	7,783.2	-133.7	5,786.9	5,788.5	0.00	0.00	0.00
	13,400.0	89.28	91.32	7,784.5	-136.0	5,886.9	5,888.5	0.00	0.00	0.00
	13,500.0	89.28	91.32	7,785.7	-138.3	5,986.9	5,988.5	0.00	0.00	0.00
	13,600.0	89.28	91.32	7,787.0	-140.6	6,086.8	6,088.5	0.00	0.00	0.00
	13,700.0	89.28	91.32	7,788.3	-142.9	6,186.8	6,188.4	0.00	0.00	0.00
	13,800.0	89.28	91.32	7,789.5	-145.3	6,286.8	6,288.4	0.00	0.00	0.00
	13,900.0	89.28	91.32	7,790.8	-147.6	6,386.7	6,388.4	0.00	0.00	0.00
	14,000.0	89.28	91.32	7,792.1	-149.9	6,486.7	6,488.4	0.00	0.00	0.00
	14,100.0	89.28	91.32	7,793.3	-152.2	6,586.7	6,588.4	0.00	0.00	0.00
	14,200.0	89.28	91.32	7,794.6	-154.5	6,686.6	6,688.4	0.00	0.00	0.00
	14,300.0	89.28	91.32	7,795.9	-156.8	6,786.6	6,788.4	0.00	0.00	0.00
	14,400.0	89.28	91.32	7,797.1	-159.1	6,886.6	6,888.4	0.00	0.00	0.00
	14,500.0	89.28	91.32	7,798.4	-161.4	6,986.5	6,988.4	0.00	0.00	0.00
	14,600.0	89.28	91.32	7,799.6	-163.7	7,086.5	7,088.4	0.00	0.00	0.00
	14,700.0	89,28	91.32	7,800.9	-166.0	7,186.5	7,188.4	0.00	0.00	0.00
	14,800.0	89.28	91.32	7,802.2	-168.4	7,286.4	7,288.4	0.00	0.00	0.00
	14,900.0	89.28	91.32	7,803.4	-170.7	7,386.4	7,388.4	0.00	0.00	0.00
	15,000.0	89.28	91.32	7,804.7	-173.0	7,486.3	7,488.3	0.00	0.00	0.00
	15,100.0	89.28	91.32	7,806.0	-175.3	7,586.3	7,588.3	0.00	0.00	0.00
	15,200.0	89.28	91.32	7,807.2	-177.6	7,686.3	7,688.3	0.00	0.00	0.00
	15,300.0	89.28	91.32	7,808.5	-177.8	7,786.2	7,788.3	0.00	0.00	0.00
	,555.5		31,02			. ,, 00,2	.,,,,,,,	0.00	0.00	0.00

Database:

Hobbs

Company: Project: Mewbourne Oil Company Eddy County, New Mexico

Site:

Pavo Frio 29/28 B2MP Fed Com #1H

Well:

Sec 29, T28S, R29E

Wellbore:

BHL: 330' FSL & 330' FEL, Sec 28

Design:

Design #1

Local Co-ordinate Reference:

TVD Reference:

MD Reference: North Reference:

Survey Calculation Method:

Site Pavo Frio 29/28 B2MP Fed Com #1H

WELL @ 3480.0usft (Original Well Elev) WELL @ 3480.0usft (Original Well Elev)

Grid

Minimum Curvature

Planned Survey

Measured			Vertical			Vertical	Dogleg	Build	Turn
Depth (usft)	Inclination (°)	Azimuth (°)	Depth (usft)	+N/-S (usft)	+E/-W (usft)	Section (usft)	Rate (°/100usft)	Rate (°/100usft)	Rate (°/100usft)
15,400,0	89.28	91.32	7,809.8	-182,2	7,886,2	7.888.3	0.00	0.00	0.00
15,500.0	89.28	91.32	7,811.0	-184.5	7,986.2	7,988,3	0.00	0.00	0.00
15,600.0	89.28	91.32	7,812.3	-186.8	8,086.1	8,088.3	0.00	0.00	0.00
15,700.0	89.28	91.32	7,813.5	-189.1	8,186.1	8,188.3	0.00	0.00	0.00
15,800.0	89.28	91.32	7,814.8	-191.5	8,286.1	8,288.3	0.00	0.00	0.00
15,900.0	89.28	91.32	7,816.1	-193.8	8,386.0	8,388.3	0.00	0.00	0.00
16,000.0	89.28	91.32	7,817.3	-196.1	8,486.0	8,488.3	0.00	0.00	0.00
16,100.0	89.28	91.32	7,818.6	-198.4	8,586.0	8,588.3	0.00	0.00	0.00
16,200.0	89.28	91.32	7,819.9	-200.7	8,685.9	8,688.2	0.00	0.00	0.00
16,300.0	89.28	91.32	7,821.1	-203.0	8,785.9	8,788.2	0.00	0.00	0.00
16,400.0	89.28	91.32	7,822.4	-205.3	8,885.9	8,888.2	0.00	0.00	0.00
16,500.0	89.28	91.32	7,823.7	-207.6	8,985.8	8,988.2	0.00	0.00	0.00
16,600.0	89.28	91.32	7,824.9	-209.9	9,085.8	9,088.2	0.00	0.00	0.00
16,700.0	89.28	91.32	7,826.2	-212.2	9,185.8	9,188.2	0.00	0.00	0.00
16,800.0	89.28	91.32	7,827.5	-214.5	9,285.7	9,288.2	0.00	0.00	0.00
16,900.0	89.28	91.32	7,828.7	-216.9	9,385.7	9,388.2	0.00	0.00	0.00
17,000.0	89.28	91,32	7,830.0	-219.2	9,485.7	9,488.2	0.00	0.00	0.00
17,100.0	89.28	91.32	7,831.2	-221.5	9,585.6	9,588.2	0.00	0.00	0.00
17,200.0	89.28	91.32	7,832.5	-223.8	9,685.6	9,688.2	0.00	0.00	0.00
17,300.0	89,28	91.32	7,833.8	-226.1	9,785.5	9,788.2	0.00	0.00	0.00
17,400.0	89.28	91.32	7,835.0	-228.4	9,885.5	9,888.2	0.00	0.00	0.00
17,500.0	89.28	91.32	7,836.3	-230.7	9,985.5	9,988.1	0.00	0.00	0.00
17,555.5	89.28	91.32	7,837.0	-232.0	10,041.0	10,043.7	0.00	0.00	0.00
BHL: 330' FS	SL & 330' FEL, S	ec 28							

Design Targets

Target Name - hit/miss target	Dip Angle	Dip Dir.	TVD	+N/-S	+E/-W	Northing	Easting		
- Shape	(°)	(°)	(usft)	(usft)	(usft)	(usft)	(usft)	Latitude	Longitude
SL: 600' FSL & 185' FWI - plan hits target cen - Point		0.00	0.0	0.0	0.0	623,067.00	570,418.00	32° 42′ 45.717 N	104° 6' 15.791 W
KOP @ 7239' - plan hits target cen - Point	0.00 iter	0.00	7,238.5	0.0	0.0	623,067.00	570,418.00	32° 42′ 45.717 N	104° 6' 15.791 W
FTP: 597' FSL & 330' FV - plan hits target cen - Point		0.00	7,581.3	-3.4	145.0	623,063.65	570,563.00	32° 42' 45.681 N	104° 6' 14.094 W
LP: 590' FSL & 656' FWI - plan hits target cen - Point		0.00	7,716.0	-10.9	471.3	623,056.10	570,889.30	32° 42′ 45.599 N	104° 6' 10.275 W
BHL: 330' FSL & 330' FE - plan hits target cen - Point	0.00 ter	0.00	7,837.0	-232.0	10,041.0	622,835.00	580,459.00	32° 42′ 43.192 N	104° 4' 18.273 W



GATES E & S NORTH AMERICA, INC. 134 44TH STREET CORPUS CHRISTI, TEXAS 78405 PHONE: 361-887-9807 FAX: 361-887-0812

EMAIL: Tim.Cantu@gates.com

WEB: www.gates.com

10K CEMENTING ASSEMBLY PRESSURE TEST CERTIFICATE

Customer Ref. :	AUSTIN DISTRIBUTING 4060578 500506	Test Date: Hose Serial No.: Created By:	4/30/2015 D-043015-7 JUSTIN CROPPER
Product Description:	· · · · · · · · · · · · · · · · · · ·	10K3.548.0CK4.1/1610KFLGE/E	LE
Product Description:	4 1/16 10K FLG	10K3.548.0CK4.1/1610KFLGE/E End Fitting 2 :	4 1/16 10K FLG
	4 1/16 10K FLG 4773-6290		

Gates E & S North America, Inc. certifies that the following hose assembly has been tested to the Gates Oilfield Roughneck Agreement/Specification requirements and passed the 15 minute hydrostatic test per API Spec 7K/Q1, Fifth Edition, June 2010, Test pressure 9.6.7 and per Table 9 to 15,000 psi in accordance with this product number. Hose burst pressure 9.6.7.2 exceeds the minimum of 2.5 times the working pressure per Table 9.

Quality Manager:

Date:

Signature:

QUALITY

4/30/2015

Produciton:

Date:

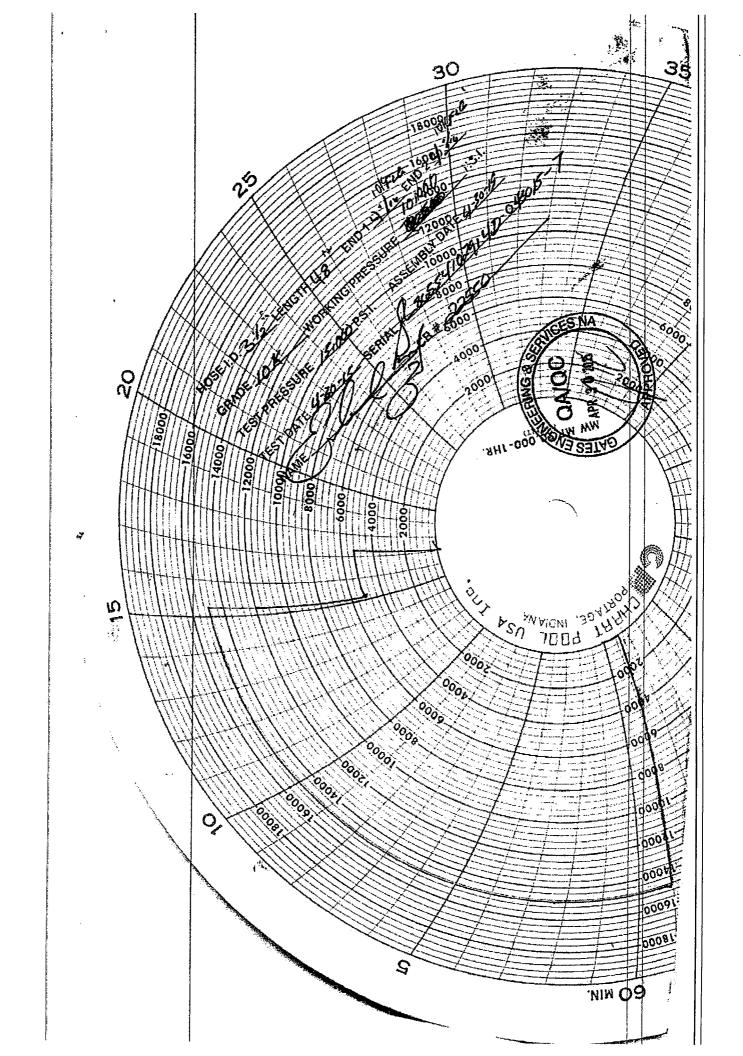
Signature :

PRODUCTION

4/30/2015

Forn PTC - 01 Rev.0 2





FAFMSS

U.S. Department of the Interior BUREAU OF LAND MANAGEMENT



APD ID: 10400002822

Operator Name: MEWBOURNE OIL COMPANY

Well Name: PAVO FRIO 29/28 B2MP FED COM

Well Type: OIL WELL

Submission Date: 11/03/2016

Well Number: 1H

Well Work Type: Drill

Highlighted data reflects the most

recent changes

Show Final Text

Section 1 - Existing Roads

Will existing roads be used? YES

Existing Road Map:

Pavo Frio 29 28 B2MP Federal Com 1H_exisitng road map 11-03-2016.pdf

Existing Road Purpose: ACCESS, FLUID TRANSPORT

Row(s) Exist? NO

ROW ID(s)

ID:

Do the existing roads need to be improved? NO

Existing Road Improvement Description:

Existing Road Improvement Attachment:

Section 2 - New or Reconstructed Access Roads

Will new roads be needed? YES

New Road Map:

Pavo Frio 29_28 B2MP Federal Com 1H_new road map_11-03-2016.pdf

New road type: LOCAL

Length: 2146.21

Feet

Width (ft.): 20

Max slope (%): 3

Max grade (%): 3

Army Corp of Engineers (ACOE) permit required? NO

ACOE Permit Number(s):

New road travel width: 14

New road access erosion control: None

New road access plan or profile prepared? NO

New road access plan attachment:

Access road engineering design? NO

Access road engineering design attachment:

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H

Access surfacing type: OTHER

Access topsoil source: OFFSITE

Access surfacing type description: Caliche

Access onsite topsoil source depth:

Offsite topsoil source description: None

Onsite topsoil removal process:

Access other construction information: None

Access miscellaneous information: None

Number of access turnouts: Access turnout map:

Drainage Control

New road drainage crossing: OTHER

Drainage Control comments: None

Road Drainage Control Structures (DCS) description: None

Road Drainage Control Structures (DCS) attachment:

Access Additional Attachments

Additional Attachment(s):

Section 3 - Location of Existing Wells

Existing Wells Map? YES

Attach Well map:

Pavo Frio 29_28 B2MP Federal Com 1H_exisitng well map_11-03-2016.pdf

Existing Wells description:

Section 4 - Location of Existing and/or Proposed Production Facilities

Submit or defer a Proposed Production Facilities plan? SUBMIT

Estimated Production Facilities description:

Production Facilities description: a. All permanent, lasting more than 6 months, above ground structures including but not limited to pumpjacks, storage tanks, pipeline risers, meter housing, etc. that are not subject to safety requirements will be painted a non-reflective paint color that blends in with the surrounding landscape. The paint color will be one of the colors from the BLM Standard Environmental Colors chart selected by the BLM authorized officer. b. All proposed production facilities that are located on the well pad will be strategically placed to allow for maximum interim reclamation, recontouring, and revegetation of the well location. c. Production from the proposed well will be located on the south edge of location. d. If any plans change regarding the production facility or other infrastructure (pipeline, electric line, etc.), we will submit a sundry notice or right of way (if applicable) prior to installation of construction. e. An electric line will be applied for through a sundry notice or BLM right of way at a later date.

Production Facilities map:

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H

Pavo Frio 29_28 B2MP Federal Com 1H_productionfacmap_12-27-2016.pdf

Section 5 - Location and Types of Water Supply

Water Source Table

Water source use type: DUST CONTROL,

Water source type: IRRIGATION

INTERMEDIATE/PRODUCTION CASING, STIMULATION, SURFACE

CASING

Describe type:

Source longitude: -104.12311

Water source type: IRRIGATION

Source longitude: -104.12276

Source latitude: 32.62002

Source datum: NAD83

Water source permit type: WATER WELL

Source land ownership: PRIVATE

Water source transport method: TRUCKING

Source transportation land ownership: FEDERAL

Water source volume (barrels): 2515 Source volume (acre-feet): 0.32416615

Source volume (gal): 105630

Water source use type: DUST CONTROL,

INTERMEDIATE/PRODUCTION CASING, SURFACE CASING

Describe type:

Source latitude: 32.618835

Source datum: NAD83

Water source permit type: WATER WELL

Source land ownership: FEDERAL

Water source transport method: TRUCKING

Source transportation land ownership: FEDERAL

Water source volume (barrels): 2515

Source volume (acre-feet): 0.32416615

Source volume (gal): 105630

Water source and transportation map:

Pavo Macho 29_28 B2MP Fed Com 1H_Water source and transportation map_11-03-2016.pdf Pavo Macho 29_28 B2MP Fed Com 1H_Water source and transportation map2_11-03-2016.pdf

Water source comments:

New water well? NO

New Water Well Info

Well latitude:

Well Longitude:

Well datum:

Well target aquifer:

Well Number: 1H Well Name: PAVO FRIO 29/28 B2MP FED COM

Est. depth to top of aquifer(ft):

Est thickness of aquifer:

Aquifer comments:

Aquifer documentation:

Well depth (ft):

Well casing type:

Well casing outside diameter (in.):

Well casing inside diameter (in.):

New water well casing?

Used casing source:

Drilling method:

Drill material:

Grout material:

Grout depth:

Casing length (ft.):

Casing top depth (ft.):

Well Production type:

Completion Method:

Water well additional information:

State appropriation permit:

Additional information attachment:

Section 6 - Construction Materials

Construction Materials description: Caliche

Construction Materials source location attachment:

Pavo Macho 29_28 B2MP Fed Com 1H_construction material source2_11-03-2016.pdf Pavo Macho 29_28 B2MP Fed Com 1H_construction material source_11-03-2016.pdf

Section 7 - Methods for Handling Waste

Waste type: DRILLING

Waste content description: Drill cuttings

Amount of waste: 1515

barrels

Waste disposal frequency: One Time Only

Safe containment description: Drill cuttings will be properly contained in steel tanks (20 yard roll off bins.)

Safe containment attachment:

Waste disposal type: HAUL TO COMMERCIAL

Disposal location ownership: PRIVATE

FACILITY

Disposal type description:

Disposal location description: NMOCD approved waste disposal locations are CRI or Lea Land, both facilities are located

on HWY 62/180, Sec. 27 T20S R32E.

Waste type: SEWAGE

Waste content description: Human waste & grey water

Amount of waste: 1500

gallons

Waste disposal frequency: Weekly

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H

Safe containment description: 2,000 gallon plastic container

Safe containment attachment:

Waste disposal type: HAUL TO COMMERCIAL Disposal location ownership: PRIVATE

FACILITY

Disposal type description:

Disposal location description: City of Carlsbad Water Treatment facility

Waste type: GARBAGE

Waste content description: Garbage & trash

Amount of waste: 1500

pounds

Waste disposal frequency: One Time Only

Safe containment description: Enclosed trash trailer

Safe containment attachment:

Waste disposal type: HAUL TO COMMERCIAL Disposal location ownership: PRIVATE

FACILITY

Disposal type description:

Disposal location description: Waste Management facility in Carlsbad.

Reserve Pit

Reserve Pit being used? NO

Temporary disposal of produced water into reserve pit?

Reserve pit length (ft.)

Reserve pit width (ft.)

Reserve pit depth (ft.)

Reserve pit volume (cu. yd.)

Is at least 50% of the reserve pit in cut?

Reserve pit liner

Reserve pit liner specifications and installation description

Cuttings Area

Cuttings Area being used? NO

Are you storing cuttings on location? NO

Description of cuttings location

Cuttings area length (ft.)

Cuttings area width (ft.)

Cuttings area depth (ft.)

Cuttings area volume (cu. yd.)

Is at least 50% of the cuttings area in cut?

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H

WCuttings area liner

Cuttings area liner specifications and installation description

Section 8 - Ancillary Facilities

Are you requesting any Ancillary Facilities?: NO

Ancillary Facilities attachment:

Comments:

Section 9 - Well Site Layout

Well Site Layout Diagram:

Pavo Frio 29_28 B2MP Federal Com 1H_well site layout_11-03-2016.pdf

Comments:

Section 10 - Plans for Surface Reclamation

Type of disturbance: NEW

Recontouring attachment:

Drainage/Erosion control construction: None

Drainage/Erosion control reclamation: None

Wellpad long term disturbance (acres): 1.478

Access road long term disturbance (acres): 1.48

Pipeline long term disturbance (acres): 0

Other long term disturbance (acres): 0

Total long term disturbance: 2.958

Wellpad short term disturbance (acres): 2.26

Access road short term disturbance (acres): 0

Pipeline short term disturbance (acres): 0

Other short term disturbance (acres): 0

Total short term disturbance: 2.26

Reconstruction method: The areas planned for interim reclamation will then be recontoured to the original contour if feasible, or if not feasible, to an interim contour that blends with the surrounding topography as much as possible. Where applicable, the fill material of the well pad will be backfilled into the cut to bring the area back to the original contour. The interim cut and fill slopes prior to re-seeding will not be steeper than a 3:1 ratio, unless the adjacent native topography is steeper. Note: Constructed slopes may be much steeper during drilling, but will be recontoured to the above ratios during interim reclamation.

Topsoil redistribution: Topsoil will be evenly respread and aggressively revegetated over the entire disturbed area not needed for all-weather operations including cuts & fills. To seed the area, the proper BLM seed mixture, free of noxious weeds, will be used.

Soil treatment: NA

Existing Vegetation at the well pad: Various brush & grasses

Existing Vegetation at the well pad attachment:

Existing Vegetation Community at the road: Various brush & grasses

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H

Existing Vegetation Community at the road attachment:

Existing Vegetation Community at the pipeline: NA

Existing Vegetation Community at the pipeline attachment:

Existing Vegetation Community at other disturbances: NA

Existing Vegetation Community at other disturbances attachment:

Non native seed used? NO

Non native seed description:

Seedling transplant description:

Will seedlings be transplanted for this project? NO

Seedling transplant description attachment:

Will seed be harvested for use in site reclamation? NO

Seed harvest description:

Seed harvest description attachment:

Seed Management

Seed Table

Seed source:

Seed type: Seed name:

Source name:

Source address:

Source phone:

Seed cultivar:

Seed use location:

PLS pounds per acre:

Proposed seeding season:

Seed Summary

Total pounds/Acre:

Seed Type

Pounds/Acre

Seed reclamation attachment:

Operator Contact/Responsible Official Contact Info

First Name: Bradley

Last Name: Bishop

Phone: (575)393-5905

Email: bbishop@mewbourne.com

Seedbed prep: Final seedbed preparation will consist of contour cultivating to a depth of 4 to 6 inches within 24 hours prior to seeding, dozer tracking, or other imprinting in order to break the soil crust and create seed germination micro-sites.

Seed BMP: To seed the area, the proper BLM seed mixture, free of noxious weeds, will be used.

Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H

Seed method: drilling or broadcasting seed over entire reclaimed area.

Existing invasive species? NO

Existing invasive species treatment description:

Existing invasive species treatment attachment:

Weed treatment plan description: NA

Weed treatment plan attachment:

Monitoring plan description: vii. All reclaimed areas will be monitored periodically to ensure that revegetation occurs, that the area is not redisturbed, and that erosion and invasive/noxious weeds are controlled.

Monitoring plan attachment:

Success standards: regrowth within 1 full growing season of reclamation.

Pit closure description: NA

Pit closure attachment:

Section 11 - Surface Ownership

Disturbance type: NEW ACCESS ROAD

Describe:

Surface Owner: BUREAU OF LAND MANAGEMENT, STATE GOVERNMENT

Other surface owner description:

BIA Local Office:

BOR Local Office:

COE Local Office:

DOD Local Office:

NPS Local Office:

State Local Office: NMSLO HOBBS, NM

Military Local Office:

USFWS Local Office:

Other Local Office:

USFS Region:

USFS Forest/Grassland:

USFS Ranger District:

Operator Name: MEWBOURNE OIL COMPANY Well Name: PAVO FRIO 29/28 B2MP FED COM Well Number: 1H Disturbance type: EXISTING ACCESS ROAD Describe: Surface Owner: BUREAU OF LAND MANAGEMENT, STATE GOVERNMENT Other surface owner description: **BIA Local Office: BOR Local Office: COE Local Office: DOD Local Office: NPS Local Office:** State Local Office: NMSLO HOBBS, NM Military Local Office: **USFWS Local Office:** Other Local Office: **USFS** Region: **USFS** Forest/Grassland: **USFS Ranger District:** Disturbance type: WELL PAD Describe: Surface Owner: PRIVATE OWNERSHIP Other surface owner description: **BIA Local Office: BOR Local Office: COE Local Office: DOD Local Office: NPS Local Office:** State Local Office: Military Local Office: **USFWS Local Office:** Other Local Office: **USFS** Region: **USFS** Forest/Grassland: **USFS** Ranger District:

Weil Name: PAVO FRIO 29/28 B2MP FED COM Weil Number: 1H

Fee Owner: COG Operating, LLC ETAL

Fee Owner Address: 1293 CR 305, Midland, TX 79701

Phone: (432)221-0500

Email:

Surface use plan certification: NO

Surface use plan certification document:

Surface access agreement or bond: Agreement

Surface Access Agreement Need description: SUA

Surface Access Bond BLM or Forest Service:

BLM Surface Access Bond number:

USFS Surface access bond number:

Section 12 - Other Information

Right of Way needed? NO

Use APD as ROW?

ROW Type(s):

ROW Applications

SUPO Additional Information: NONE

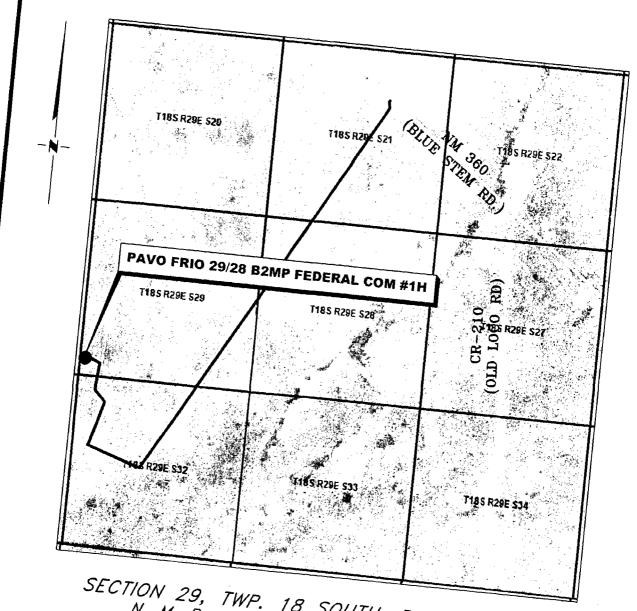
Use a previously conducted onsite? YES

Previous Onsite information: APR 11 2016 Met with Nick Franke (BLM) & RRC Surveying & staked location @ 450' FSL & 185' FWL, Sec 29, T18S, R29E, Eddy Co., NM. This location was unacceptable due to buried DCP pipeline to the S. Moved location to 600' FSL & 185' FWL (Elevation @ 3453'). This appears to be a drillable location with pit area to the W. Topsoil will be stockpiled 30' wide on N side. Reclaim 60' N & E. Battery will be on the S side. This will be a 290' x 340' pad. New road needed on the SE corner heading S. Electric 145' to W

Other SUPO Attachment

VICINITY MAP

NOT TO SCALE



SECTION 29, TWP. 18 SOUTH, RGE. 29 EAST, N. M. P. M., EDDY COUNTY, NEW MEXICO

OPERATOR: Mewbourne Oil Company

LEASE: Pavo Frio 29/28 B2MP Federal Com WELL NO .: 1H

LOCATION: 600' FSL & 185' FWL ELEVATION: 3453'

Firm	No.: TX 101	9.3838	
		JOSS N	N 4655451

	 	
-	-	
NO.		
	REVISION	DATE
JOB	NO.: LS1604	1170
DWG.	NO.: 16041	30VM

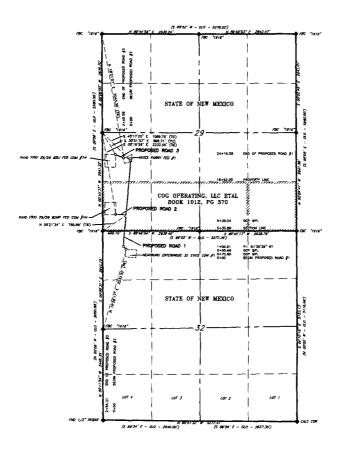
308 W. BROADWAY ST., HOBBS, NM 88240 (575) 964-8200 Copyright 2015 – All Rights Reserved SCALE: N. T. S.

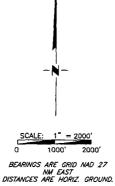
DATE: 4-08-2016

SURVEYED BY: BK/HD DRAWN BY: LPS

APPROVED BY: RMH SHEET : 1 OF 1

PROPOSED ROADS FOR THE PAVO FRIO 29/28 B2MP FED COM #1H & THE PAVO FRIO 29/28 B2LI FED COM #1H SECTIONS 29 & 32, T18S, R29E, N. M. P. M., EDDY CO., NEW MEXICO





LEGEND

RECORD DATA - GLO FOUND MONUMENT AS NOTED

PROPOSED ROAD

Firm No.. TX 10193838 NM 4655451

-					
L					
NO.	REVISION	DATE			
JOB NO.: LS1604129					
DWG	. NO.: 160412	29-1			

(575) 964-8200

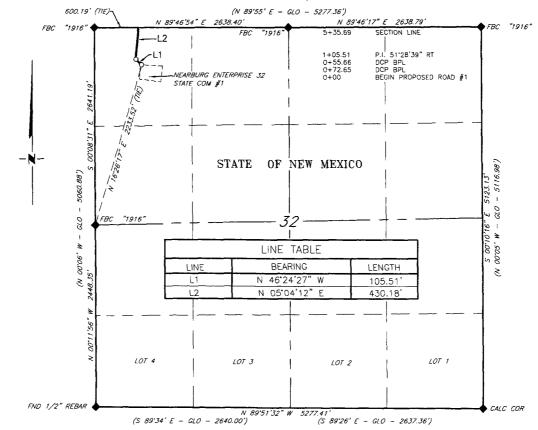
SCALE: 1" = 2000' DATE: 4-8-16 SURVEYED BY: BK/HD DRAWN BY: JR APPROVED BY: RMH SHEET: 1 OF 6

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308 W. BROADWAY ST., HOBBS, NM 88240

PROPOSED ROAD FOR THE PAVO FRIO 29/28 B2MP FED COM #1H & THE PAVO FRIO 29/28 B2LI FED COM #1H SECTION 32, T18S, R29E,

N. M. P. M., EDDY CO., NEW MEXICO



DESCRIPTION

A strip of land 20 feet wide, being 535.69 feet or 32.466 rods in length lying in Section 32, Township 18 South, Range 29 East, N. M. P. M., Eddy County, New Mexico, being 10 feet left and 10 feet right of the following described survey of a centerline across State of New Mexico land;

BEGINNING at Engr. Sta. 0+00, a point in the Northwest quarter of Section 32, which bears N 16°26'17" E, 2,233.52 feet, from a brass cap, stamped "1916", found for the West quarter corner of Section 32;

Thence N 46'24'27" W, 105.51 feet, to Engr. Sta. 1+05.51, a P. I. 51'28'39" right;

Thence N $05^{\circ}04^{\prime}12^{\prime\prime}$ E, 430.18 feet, to Engr. Sta. 5+35.69, a point on the North line of Section 32, which bears N 89°46′54" E 600.19 feet, from a brass cap, stamped "1916", found for the Northwest corner of Section 32.

Said strip of land contains 0.247 acres, more or less, and is allocated by forties as follows:

NW 1/4 NW 1/4 32.466 Rods 0.246 Acres = 1000 500 3/. 1000 BEARINGS ARE GRID NAD 27 NM EAST DISTANCES ARE HORIZ. GROUND. I, R. M. Howett, a N. M. Professional Surveyor, hereby certify that I prepared this plat from an actual survey made on the ground under my direct supervision, said survey and plat meet the Min. Stds. for Land Surveying in the State of N. M. and are true and correct to the best **LEGEND** SSIONAL SUP 19680 RECORD DATA - GLO FOUND MONUMENT of my knowledge and belief. AS NOTED About it mark PROPOSED ROAD Robert M. Howett NM PS 19680 Copyright 2014 - All Rights Reserve

TX 10193838 NM 4655457

SCALE: 1" = 1000 DATE: 4-8-2016 SURVEYED BY: BK/HD DRAWN BY: JR APPROVED BY: RMH

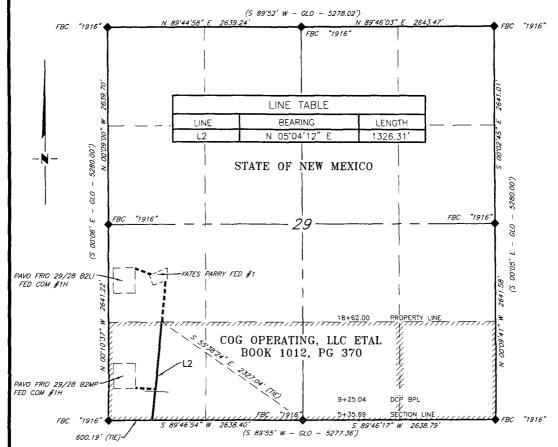
SHEET: 2 OF 6

REVISION JOB NO.: LS1604129 DWG. NO.: 1604129-2

308 W. BROADWAY ST., HOBBS, NM 88240 (575) 964-8200

PROPOSED ROAD FOR THE PAVO FRIO 29/28 B2MP FED COM #1H & THE PAVO FRIO 29/28 B2LI FED COM #1H SECTION 29, T18S, R29E,

N. M. P. M., EDDY CO., NEW MEXICO



DESCRIPTION

A strip of land 20 feet wide, being 1,326.31 feet or 80.382 rods in length lying in Section 29, Township 18 South, Range 29 East, N. M. P. M., Eddy County, New Mexico, being 10 feet left and 10 feet right of the following described survey of a centerline across the lands of COG Operating, LLC, ETAL, according to a deed filed for record in Book 1012, Page 370, of the Deed Records of Eddy County, New Mexico;

BEGINNING at Engr. Sta. 5+35.69, a point on the South line of Section 29, which bears N 89*46'54" E, 600.19 feet, from a brass cap, stamped "1916", found for the Southwest corner of Section 29;

Thence N 05°04'12" E, 1,326.31 feet, to Engr. Sta. 18+62.00, a point on the North line of the South half of the Southwest quarter of Section 29, which bears S 55'38'24" E 2,327.04 feet, from a brass cap, stamped "1916", found for the South quarter corner of Section 29.

Said strip of land contains 0.609 acres, more or less, and is allocated by forties as follows:

SW 1/4 SW 1/4

80.382 Rods

0.609 Acres

(575) 964-8200

SCALE: 1" = 1000'
0 500' 1000'

BEARINGS ARE GRID NAD 27
NM EAST

DISTANCES ARE HORIZ, GROUND.

LEGEND
() RECORD DATA - GLO

FOUND MONUMENT
AS NOTED

I, R. M. Howett, a N. M. Professional Surveyor, hereby certify that I prepared this plat from an actual survey made on the ground under my direct supervision, said survey and plat meet the Min. Stds. for Land Surveying in the State of N. M. and are true and correct to the best of my knowledge and belief.

19680 19680 19680 19680 19680 19680 19680

PROPOSED ROAD

Robert M. Howett N

308 W. BROADWAY ST., HOBBS, NM 88240

NM PS 19680

Firm No.. TX 10193838 NM 4655451

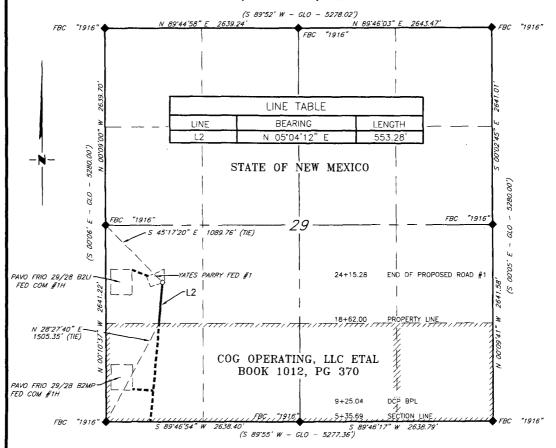
DWG. NO.: 1604129-3

NO. REVISION DATE
JOB NO.: LS1604129

SCALE: 1" = 1000'
DATE: 4-8-2016
SURVEYED BY: BK/HD
DRAWN BY: JR
APPROVED BY: RMH
SHEET: 3 OF 6

PROPOSED ROAD FOR THE PAVO FRIO 29/28 B2MP FED COM #1H & THE PAVO FRIO 29/28 B2LI FED COM #1H SECTION 29, T18S, R29E,

N. M. P. M., EDDY CO., NEW MEXICO



DESCRIPTION

A strip of land 20 feet wide, being 553.28 feet or 33.532 rods in length lying in Section 29, Township 18 South, Range 29 East, N. M. P. M., Eddy County, New Mexico, being 10 feet left and 10 feet right of the following described survey of a centerline across State of New Mexico land;

BEGINNING at Engr. Sta. 18+62.00, a point on the South line of the North half of the Southwest quarter of Section 29, which bears N 28'27'40" E, 1,505.35 feet, from a brass cap, stamped "1916", found for the Southwest corner of Section 29;

Thence N 05'04'12" E, 553.28 feet, to Engr. Sta. 24+15.28, the End of Survey, a point in the Southwest quarter of Section 29, which bears S 45'17'20" E 1,089.76 feet, from a brass cap, stamped "1916", found for the West quarter corner of Section 29.

Said strip of land contains 0.254 acres, more or less, and is allocated by forties as follows:

NW 1/4 SW 1/4

33.532 Rods

0.254 Acres



BEARINGS ARE GRID NAD 27 NM EAST DISTANCES ARE HORIZ. GROUND. LEGEND

RECORD DATA - GLO

FOUND MONUMENT

PROPOSED ROAD

I, R. M. Howett, a N. M. Professional Survey certify that I prepared this plat from an actual survey made on the ground under my direct supervision, said survey and plat meet the Min. Stds. for Land Surveying in the State of N. M. and are true and correct to the best of my knowledge and belief.

Firm No.. TX 10193838 NM 4655451

Robert M. Howett

NM PS 19680

Copyright 2014 - All Rights Reserve SCALE: 1" = 1000 DATE: 4-8-2016

SURVEYED BY: BK/HD

M. HO

DRAWN BY: JR

APPROVED BY: RMH SHEET: 4 OF 6

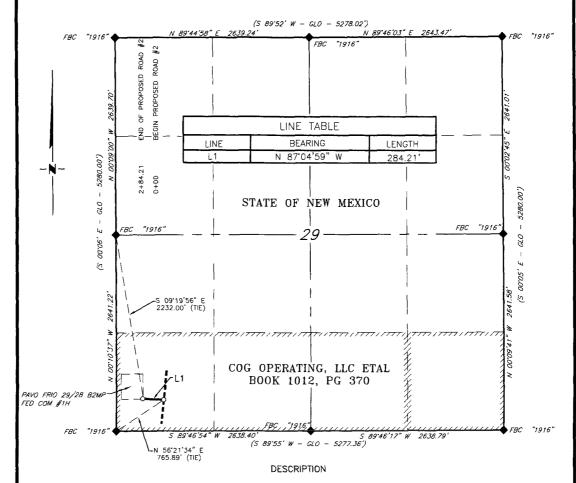
NO. REVISION DATE JOB NO.: LS1604129 DWG. NO.: 1604129-4



308 W. BROADWAY ST., HOBBS, NM 88240 (575) 964-8200

PROPOSED ROAD FOR THE PAVO FRIO 29/28 B2MP FED COM #1H SECTION 29, T18S, R29E,

N. M. P. M., EDDY CO., NEW MEXICO



A strip of land 20 feet wide, being 284.21 feet or 17.225 rods in length lying in Section 29, Township 18 South, Range 29 East, N. M. P. M., Eddy County, New Mexico, being 10 feet left and 10 feet right of the following described survey of a centerline across the lands of COG Operating, LLC, ETAL, according to a deed filed for record in Book 1012, Page 370, of the Deed Records of Eddy County, New Mexico;

BEGINNING at Engr. Sta. 0+00, a point in the Southwest quarter of Section 29, which bears N 56°21'34" E, 765.89 feet, from a brass cap, stamped "1916", found for the Southwest corner of Section 29;

Thence N 87'04'59" W, 284.21 feet, to Engr. Sta. 2+84.21, the End of Survey, a point in the Southwest quarter of Section 29, which bears S 09'19'56" E 2,232.00 feet, from a brass cap, stamped "1916", found for the West quarter corner of Section 29.

Said strip of land contains 0.131 acres, more or less, and is allocated by forties as follows:

SW 1/4 SW 1/4

17.225 Rods

0.131 Acres

1" = 1000 500'

BEARINGS ARE GRID NAD 27 NM EAST DISTANCES ARE HORIZ. GROUND.

RECORD DATA - GLO

FOUND MONUMENT AS NOTED

PROPOSED ROAD

I, R. M. Howett, a N. M. Professional Surveyor, hereby certify that I prepared this plat from an actual survey made on the ground under my direct supervision, said survey and plat meet the Min. Stds. for Land Surveying in the State of N. M. and are true and correct to the best of my knowledge and belief.

defail it sound Robert M. Howett NM PS 19680

TX 10193838 NM 4655451

SCALE: 1" = 1000 DATE: 4-8-2016 SURVEYED BY: BK/HD DRAWN_BY: JR APPROVED BY: RMH SHEET: 5 OF 6

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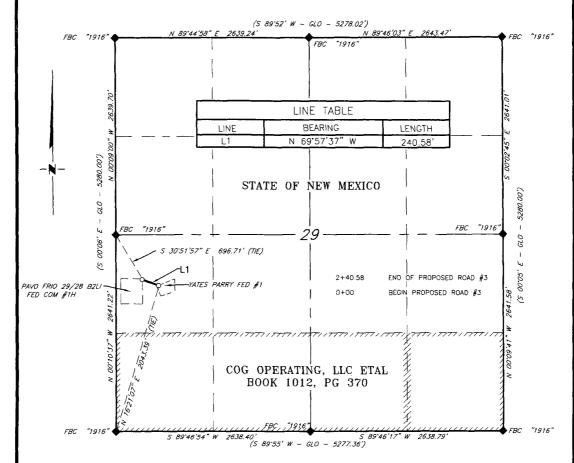
REVISION DATE JOB NO.: LS1604129 DWG. NO.: 1604129-5

308 W. BROADWAY ST., HOBBS, NM 88240

(575) 964-8200

PROPOSED ROAD FOR THE PAVO FRIO 29/28 B2LI FED COM #1H SECTION 29, T18S, R29E,

N. M. P. M., EDDY CO., NEW MEXICO



DESCRIPTION

A strip of land 20 feet wide, being 240.58 feet or 14.581 rods in length lying in Section 29, Township 18 South, Range 29 East, N. M. P. M., Eddy County, New Mexico, being 10 feet left and 10 feet right of the following described survey of a centerline across State of New Mexico land;

BEGINNING at Engr. Sta. 0+00, a point in the Southwest quarter of Section 29, which bears N 16'21'07" E, 2,043.39 feet, from a brass cap, stamped "1916", found for the Southwest corner of Section 29;

Thence N 69°57′37″ W, 240.58 feet, to Engr. Sta. 2+40.58, the End of Survey, a point in the Southwest quarter of Section 29, which bears S 30°51′37″ E 696.71 feet, from a brass cap, stamped "1916", found for the West quarter corner of Section 29.

Said strip of land contains 0.111 acres, more or less, and is allocated by forties as follows:

NW 1/4 SW 1/4

14.581 Rods

0.111 Acres

SCALE: 1" = 1000' 0 500' 1000'

BEARINGS ARE GRID NAD 27 NM EAST DISTANCES ARE HORIZ. GROUND. LEGEND

) RECORD DATA - GLO

FOUND MONUMENT AS NOTED

PROPOSED ROAD

I, R. M. Howett, a N. M. Professional Surveyor, hereby certify that I prepared this plat from an actual survey made on the ground under my direct supervision, said survey and plat meet the Min. Stds. for Land Surveying in the State of N. M. and are true and correct to the best of my knowledge and belief.

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Robert M. Howett

NM PS 19680

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n No.. TX 10193838 NM 4655451

NO.	REVISION	DATE			
JOB NO.: LS1604129					
DWG	. NO.: 16041	29-6			



SCALE: 1" = 1000'

DATE: 4-8-2016

SURVEYED BY: BK/HD

DRAWN BY: JR

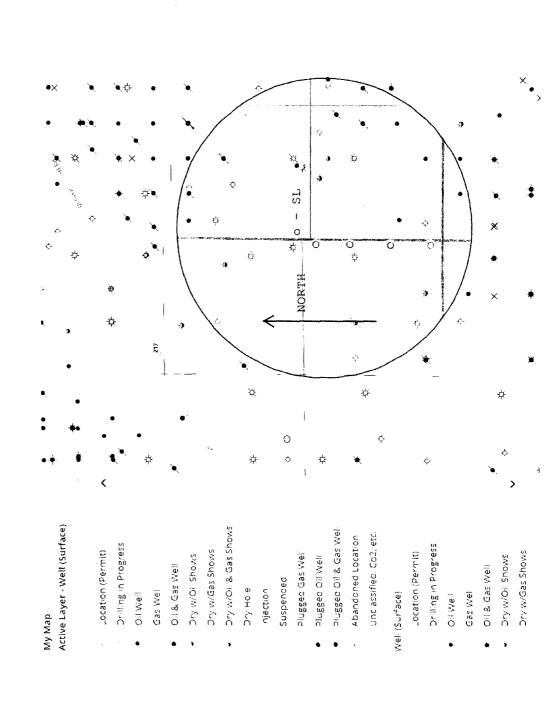
APPROVED BY: RMH

SHEET: 6 OF 6

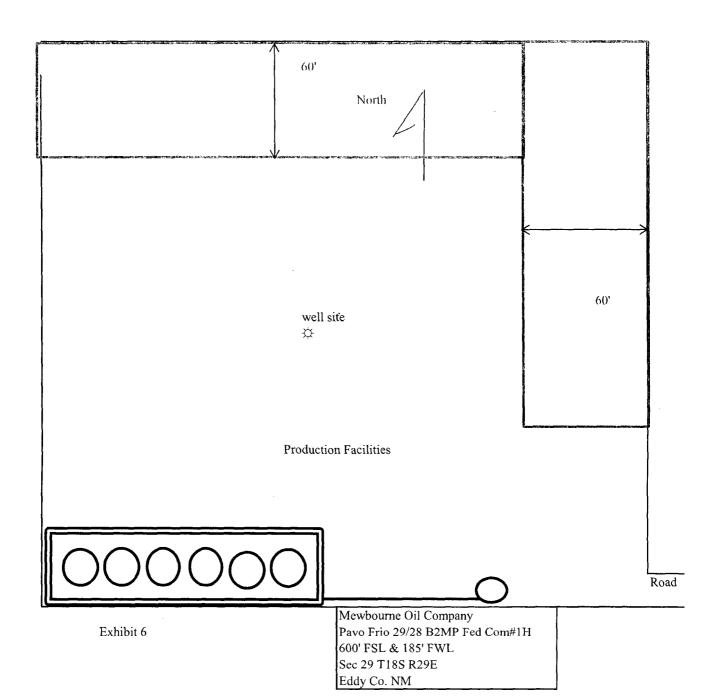
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308 W. BROADWAY ST., HOBBS, NM 88240 (575) 964-8200

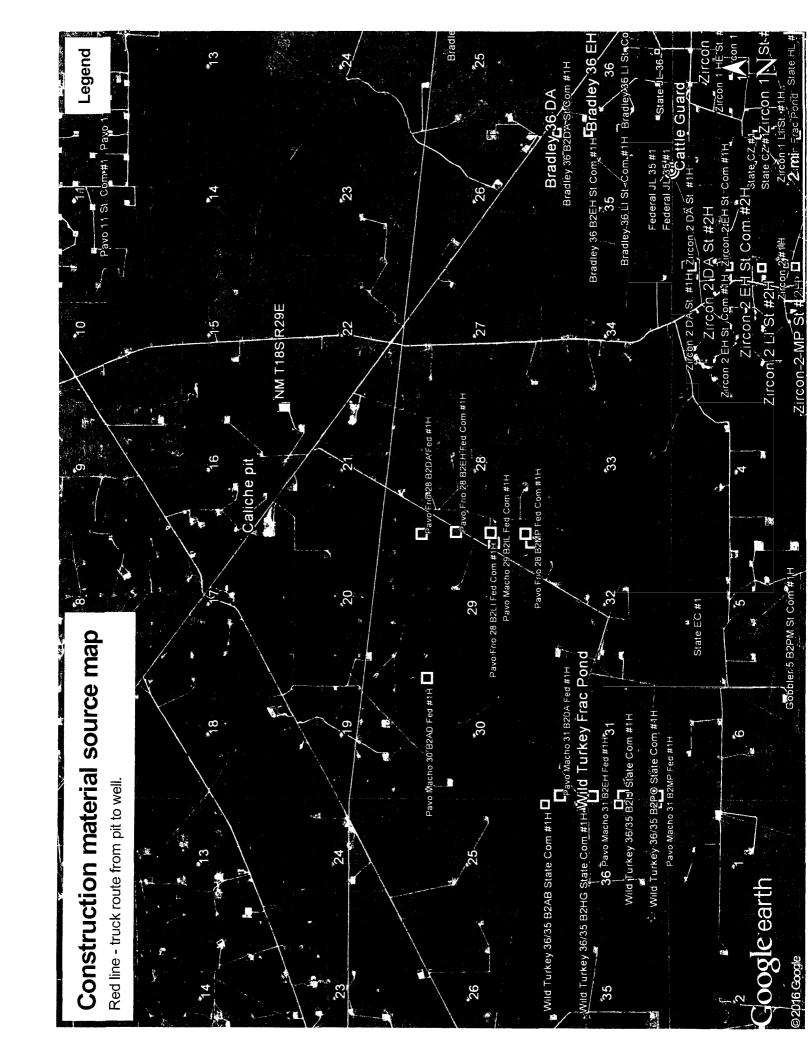
Exhibit "4" - SL - Pavo Macho 31 B2LI Fed #1H

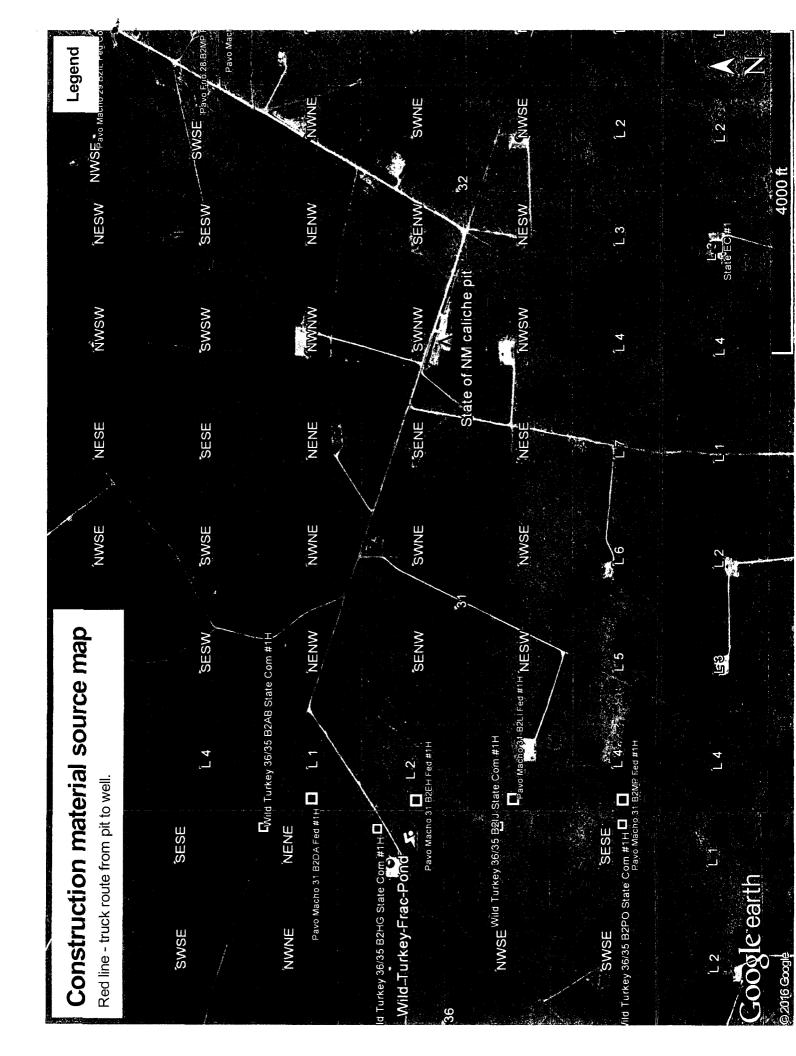


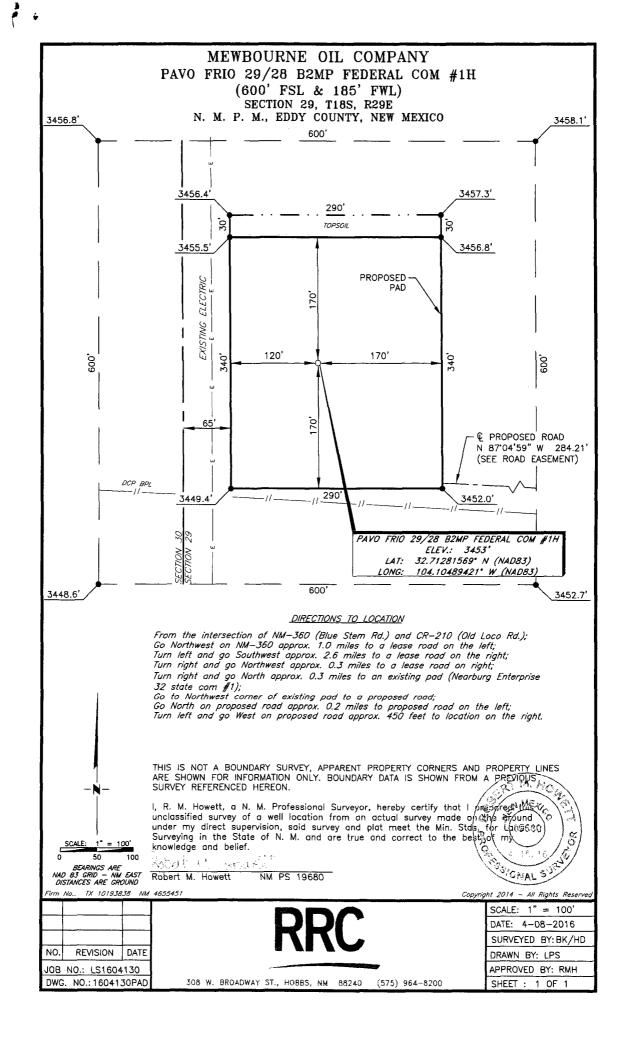
中 - BHL ťf `#; • 鉄 •,‡ Ġ 一 中 Exhibit "4A" - BHL - Pavo Macho 31 B2LI Fed #1H × NORTH ე # 芹 < Dry w/Oi' & Gas Shows Plugged Oil & Gas Wel Unc assified, Co2. etc. Abandoned Location Orilling in Progress Drilling in Progress Dry w/Gas Shows Location (Permit) Plugged Gas Well Location (Permit) Dry w/Gas Shows Dry W/Oi: Shows Plugged Oil Well Dry W/Oi' Shows Oll & Gas Well O'I & Gas Well Suspended Ory Hole njection Gas Wel Well (Surface) Gas Wel O.I.We.I O:| We.|















Section 1 - General

Would you like to address long-term produced water disposal? NO

Section 2 - Lined Pits Would you like to utilize Lined Pit PWD options? NO Produced Water Disposal (PWD) Location: PWD surface owner: PWD disturbance (acres): Lined pit PWD on or off channel: Lined pit PWD discharge volume (bbl/day): Lined pit specifications: Pit liner description: Pit liner manufacturers information: Precipitated solids disposal: Decribe precipitated solids disposal: Precipitated solids disposal permit: Lined pit precipitated solids disposal schedule: Lined pit precipitated solids disposal schedule attachment: Lined pit reclamation description:

Lined pit reclamation attachment:

Leak detection system description:

Leak detection system attachment:

Lined pit Monitor description:

Lined pit Monitor attachment:

Lined pit: do you have a reclamation bond for the pit?

Is the reclamation bond a rider under the BLM bond?

Lined pit bond number:

Lined pit bond amount:

Additional bond information attachment:

* **

Section 3 - Unlined Pits

Produced Water Disposal (PWD) Location:

Would you like to utilize Unlined Pit PWD options? NO

PWD surface owner:	PWD disturbance (acres):
Unlined pit PWD on or off channel:	
Unlined pit PWD discharge volume (bbl/day):	
Unlined pit specifications:	
Precipitated solids disposal:	
Decribe precipitated solids disposal:	
Precipitated solids disposal permit:	
Unlined pit precipitated solids disposal schedule:	
Unlined pit precipitated solids disposal schedule attachmer	nt:
Unlined pit reclamation description:	
Unlined pit reclamation attachment:	
Unlined pit Monitor description:	
Unlined pit Monitor attachment:	
Do you propose to put the produced water to beneficial use	?
Beneficial use user confirmation:	
Estimated depth of the shallowest aquifer (feet):	
Does the produced water have an annual average Total Dist that of the existing water to be protected?	solved Solids (TDS) concentration equal to or less than
TDS lab results:	
Geologic and hydrologic evidence:	
State authorization:	
Unlined Produced Water Pit Estimated percolation:	
Unlined pit: do you have a reclamation bond for the pit?	
Is the reclamation bond a rider under the BLM bond?	
Unlined pit bond number:	
Unlined pit bond amount:	
Additional bond information attachment:	
Section 4 - Injection	
Would you like to utilize Injection PWD options? NO	
Produced Water Disposal (PWD) Location:	
PWD surface owner:	PWD disturbance (acres):
Injection PWD discharge volume (bbl/day):	
Injection well mineral owner:	

₩	
Injection well type:	
Injection well number:	Injection well name:
Assigned injection well API number?	Injection well API number:
Injection well new surface disturbance (acres):	
Minerals protection information:	
Mineral protection attachment:	
Underground Injection Control (UIC) Permit?	
UIC Permit attachment:	
Section 5 - Surface Discharge	
Would you like to utilize Surface Discharge PWD options? NO	
Produced Water Disposal (PWD) Location:	
PWD surface owner:	PWD disturbance (acres):
Surface discharge PWD discharge volume (bbl/day):	
Surface Discharge NPDES Permit?	
Surface Discharge NPDES Permit attachment:	
Surface Discharge site facilities information:	
Surface discharge site facilities map:	
Section 6 - Other	
Would you like to utilize Other PWD options? NO	
Produced Water Disposal (PWD) Location:	
PWD surface owner:	PWD disturbance (acres):
Other PWD discharge volume (bbl/day):	
Other PWD type description:	
Other PWD type attachment:	
Have other regulatory requirements been met?	
Other regulatory requirements attachment:	





Bond Information

Federal/Indian APD: FED

BLM Bond number: NM1693

BIA Bond number:

Do you have a reclamation bond? NO

Is the reclamation bond a rider under the BLM bond?

Is the reclamation bond BLM or Forest Service?

BLM reclamation bond number:

Forest Service reclamation bond number:

Forest Service reclamation bond attachment:

Reclamation bond number:

Reclamation bond amount:

Reclamation bond rider amount:

Additional reclamation bond information attachment: