

# Application for Permit to Drill

# U.S. Department of the Interior Bureau of Land Management

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## **APD Package Report**

APD ID: 10400100973 Well Status: AAPD

APD Received Date: 09/23/2024 02:51 PM Well Name: POKER LAKE UNIT 20-8 BD

Operator: XTO PERMIAN OPERATING LLC Well Number: 207H

## **APD Package Report Contents**

- Form 3160-3
- Operator Certification Report
- Application Report
- Application Attachments
  - -- Well Plat: 1 file(s)
- Drilling Plan Report
- Drilling Plan Attachments
  - -- Blowout Prevention Choke Diagram Attachment: 1 file(s)
  - -- Blowout Prevention BOP Diagram Attachment: 1 file(s)
  - -- Casing Spec Documents: 2 file(s)
  - -- Casing Taperd String Specs: 1 file(s)
  - -- Casing Design Assumptions and Worksheet(s): 1 file(s)
  - -- Hydrogen sulfide drilling operations plan: 1 file(s)
  - -- Proposed horizontal/directional/multi-lateral plan submission: 1 file(s)
  - -- Other Facets: 4 file(s)
  - -- Other Variances: 4 file(s)
- SUPO Report
- SUPO Attachments
  - -- Existing Road Map: 1 file(s)
  - -- Attach Well map: 1 file(s)
  - -- Production Facilities map: 1 file(s)
  - -- Water source and transportation map: 1 file(s)
  - -- Well Site Layout Diagram: 2 file(s)
  - -- Recontouring attachment: 2 file(s)
  - -- Other SUPO Attachment: 1 file(s)
- PWD Report
- PWD Attachments
  - -- None

- Bond ReportBond Attachments
  - -- None

Form 3160-3 FORM APPROVED OMB No. 1004-0137 (June 2015) Expires: January 31, 2018 **UNITED STATES** DEPARTMENT OF THE INTERIOR 5. Lease Serial No. NMLC064894A BUREAU OF LAND MANAGEMENT APPLICATION FOR PERMIT TO DRILL OR REENTER 6. If Indian, Allotee or Tribe Name 7. If Unit or CA Agreement, Name and No. **✓** DRILL 1a. Type of work: REENTER NMNM071016X/POKER LAKE UNIT 1b. Type of Well: Oil Well Gas Well Other 8. Lease Name and Well No. 1c. Type of Completion: Hydraulic Fracturing Single Zone ✓ Multiple Zone POKER LAKE UNIT 20-8 BD 207H 2. Name of Operator 9. API Well No. XTO PERMIAN OPERATING LLC 30-**015-5**6758 3a. Address 3b. Phone No. (include area code) 10. Field and Pool, or Exploratory CORRAL CANYON/BONE SPRING 6401 HOLIDAY HILL ROAD BLDG 5, MIDLAND, TX 7970 (432) 683-2277 4. Location of Well (Report location clearly and in accordance with any State requirements: \*) 11. Sec., T. R. M. or Blk. and Survey or Area SEC 20/T25S/R30E/NMP At surface NWSE / 1813 FSL / 1574 FEL / LAT 32.113302 / LONG -103.899883 At proposed prod. zone NWSE / 2652 FSL / 1348 FEL / LAT 32.144862 / LONG -103.899173 12. County or Parish 13. State 14. Distance in miles and direction from nearest town or post office\* **EDDY** NM 15. Distance from proposed\* 16. No of acres in lease 17. Spacing Unit dedicated to this well 1574 feet location to neares 400.0 property or lease line, ft. (Also to nearest drig. unit line, if any) 18. Distance from proposed location\* 19. Proposed Depth 20. BLM/BIA Bond No. in file to nearest well, drilling, completed, 30 feet 10159 feet / 24380 feet FED: COB000050 applied for, on this lease, ft. 21. Elevations (Show whether DF, KDB, RT, GL, etc.) 22. Approximate date work will start\* 23. Estimated duration 3198 feet 10/24/2025 45 days 24. Attachments The following, completed in accordance with the requirements of Onshore Oil and Gas Order No. 1, and the Hydraulic Fracturing rule per 43 CFR 3162.3-3 (as applicable) 1. Well plat certified by a registered surveyor. 4. Bond to cover the operations unless covered by an existing bond on file (see 2. A Drilling Plan. Item 20 above). 3. A Surface Use Plan (if the location is on National Forest System Lands, the 5. Operator certification. 6. Such other site specific information and/or plans as may be requested by the SUPO must be filed with the appropriate Forest Service Office). 25. Signature Name (Printed/Typed) Date (Electronic Submission) SAMANTHA WEIS / Ph: (432) 682-8873 09/23/2024 Permitting Advisor Approved by (Signature) Date Name (Printed/Typed) (Electronic Submission) CODY LAYTON / Ph: (575) 234-5959 05/12/2025 Title Office Assistant Field Manager Lands & Minerals Carlsbad Field Office 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.

APPROVED WITH CONDITIONS Released to Imaging: 6/13/2025 10:38:32 AM Approval Date: 05/12/2025

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)

#### INSTRUCTIONS

GENERAL: This form is designed for submitting proposals to perform certain well operations, as indicated on Federal and Indian lands and leases for action by appropriate Federal agencies, pursuant to applicable Federal laws and regulations. Any necessary special instructions concerning the use of this form and the number of copies to be submitted, particularly with regard to local, area, or regional procedures and practices, either are shown below or will be issued by, or may be obtained from local Federal offices.

ITEM I: If the proposal is to redrill to the same reservoir at a different subsurface location or to a new reservoir, use this form with appropriate notations. Consult applicable Federal regulations concerning subsequent work proposals or reports on the well.

ITEM 4: Locations on Federal or Indian land should be described in accordance with Federal requirements. Consult local Federal offices for specific instructions.

ITEM 14: Needed only when location of well cannot readily be found by road from the land or lease description. A plat, or plats, separate or on the reverse side, showing the roads to, and the surveyed location of, the wen, and any other required information, should be furnished when required by Federal agency offices.

ITEMS 15 AND 18: If well is to be, or has been directionany drilled, give distances for subsurface location of hole in any present or objective productive zone.

ITEM 22: Consult applicable Federal regulations, or appropriate officials, concerning approval of the proposal before operations are started.

ITEM 24: If the proposal will involve hydraulic fracturing operations, you must comply with 43 CFR 3162.3-3, including providing information about the protection of usable water. Operators should provide the best available information about all formations containing water and their depths. This information could include data and interpretation of resistivity logs run on nearby wells. Information may also be obtained from state or tribal regulatory agencies and from local BLM offices.

## NOTICES

The Privacy Act of 1974 and regulation in 43 CFR 2.48(d) provide that you be furnished the following information in connection with information required by this application.

AUTHORITY: 30 U.S.C. 181 et seq., 25 U.S.C. 396; 43 CFR 3160

PRINCIPAL PURPOSES: The information will be used to: (1) process and evaluate your application for a permit to drill a new oil, gas, or service wen or to reenter a plugged and abandoned well; and (2) document, for administrative use, information for the management, disposal and use of National Resource Lands and resources including (a) analyzing your proposal to discover and extract the Federal or Indian resources encountered; (b) reviewing procedures and equipment and the projected impact on the land involved; and (c) evaluating the effects of the proposed operation on the surface and subsurface water and other environmental impacts.

ROUTINE USE: Information from the record and/or the record win be transferred to appropriate Federal, State, and local or foreign agencies, when relevant to civil, criminal or regulatory investigations or prosecution, in connection with congressional inquiries and for regulatory responsibilities.

EFFECT OF NOT PROVIDING INFORMATION: Filing of this application and disclosure of the information is mandatory only if you elect to initiate a drilling or reentry operation on an oil and gas lease.

The Paperwork Reduction Act of 1995 requires us to inform you that:

The BLM conects this information to anow evaluation of the technical, safety, and environmental factors involved with drilling for oil and/or gas on Federal and Indian oil and gas leases. This information will be used to analyze and approve applications. Response to this request is mandatory only if the operator elects to initiate drilling or reentry operations on an oil and gas lease. The BLM would like you to know that you do not have to respond to this or any other Federal agency-sponsored information collection unless it displays a currently valid OMB control number.

**BURDEN HOURS STATEMENT:** Public reporting burden for this form is estimated to average 8 hours per response, including the time for reviewing instructions, gathering and maintaining data, and completing and reviewing the form. Direct comments regarding the burden estimate or any other aspect of this form to U.S. Department of the Interior, Bureau of Land Management (1004-0137), Bureau Information Conection Clearance Officer (WO-630), 1849 C Street, N.W., Mail Stop 401 LS, Washington, D.C. 20240.

## **Additional Operator Remarks**

## **Location of Well**

0. SHL: NWSE / 1813 FSL / 1574 FEL / TWSP: 25S / RANGE: 30E / SECTION: 20 / LAT: 32.113302 / LONG: -103.899883 ( TVD: 0 feet, MD: 0 feet )

PPP: SWSE / 100 FSL / 1344 FEL / TWSP: 25S / RANGE: 30E / SECTION: 20 / LAT: 32.108597 / LONG: -103.899149 ( TVD: 10159 feet, MD: 11200 feet )

BHL: NWSE / 2652 FSL / 1348 FEL / TWSP: 25S / RANGE: 30E / SECTION: 8 / LAT: 32.144862 / LONG: -103.899173 ( TVD: 10159 feet, MD: 24380 feet )

## **BLM Point of Contact**

Name: MARIAH HUGHES Title: Land Law Examiner Phone: (575) 234-5972 Email: mhughes@blm.gov

## **Review and Appeal Rights**

A person contesting a decision shall request a State Director review. This request must be filed within 20 working days of receipt of the Notice with the appropriate State Director (see 43 CFR 3165.3). The State Director review decision may be appealed to the Interior Board of Land Appeals, 801 North Quincy Street, Suite 300, Arlington, VA 22203 (see 43 CFR 3165.4). Contact the above listed Bureau of Land Management office for further information.

#### PECOS DISTRICT

#### **SURFACE USE**

#### CONDITIONS OF APPROVAL

OPERATOR'S NAME: | XTO PERMIA

XTO PERMIAN OPERATING LLC

LEASE NO.:

NMLC064894

COUNTY:

Eddy County, New Mexico

Wells:

#### **POKER LAKE UNIT 20-17 BD #201H**: PAD B - E1

Surface Hole Location: 1,904' FWL & 1,434' FSL, SECTION 20, T. 25 S. R. 30 E. Bottom Hole Location: 330' FWL & 10' FNL, SECTION 17, T. 25 S. R. 30 E.

#### **POKER LAKE UNIT 20-17 BD #202H**: PAD B – E2

Surface Hole Location: 1,934' FWL & 1,433' FSL, SECTION 20, T. 25 S. R. 30 E. Bottom Hole Location: 800' FWL & 10' FNL, SECTION 17, T. 25 S. R. 30 E.

## **POKER LAKE UNIT 20-17 BD #203H**: PAD B - E3

Surface Hole Location: 1,964' FWL & 1,432' FSL, SECTION 20, T. 25 S. R. 30 E. Bottom Hole Location: 1,570' FWL & 10' FNL, SECTION 17, T. 25 S. R. 30 E.

## POKER LAKE UNIT 20-8 BD #204H: PAD B - E4

Surface Hole Location: 1,994' FWL & 1,431' FSL, SECTION 20, T. 25 S. R. 30 E. Bottom Hole Location: 1,895' FWL & 2,649' FSL, SECTION 8, T. 25 S. R. 30 E.

#### **POKER LAKE UNIT 20-8 BD #205H: PAD B - E5**

Surface Hole Location: 2,024' FWL & 1,431' FSL, SECTION 20, T. 25 S. R. 30 E. Bottom Hole Location: 2,544' FEL & 2,650' FSL, SECTION 8, T. 25 S. R. 30 E.

## **POKER LAKE UNIT 20-8 BD #206H: PAD D - B5**

Surface Hole Location: 1,604' FEL & 1,813' FSL, SECTION 20, T. 25 S. R. 30 E. Bottom Hole Location: 2,358' FEL & 2,650' FSL, SECTION 8, T. 25 S. R. 30 E.

## **POKER LAKE UNIT 20-8 BD #207H:** PAD D – B6

Surface Hole Location: 1,574' FEL & 1,813' FSL, SECTION 20, T. 25 S. R. 30 E. Bottom Hole Location: 1,348' FEL & 2,652' FSL, SECTION 8, T. 25 S. R. 30 E.

## **POKER LAKE UNIT 20-8 BD #208H**: PAD D – B7

Surface Hole Location: 1,544' FEL & 1,813' FSL, SECTION 20, T. 25 S. R. 30 E. Bottom Hole Location: 1,248' FEL & 2,652' FSL, SECTION 8, T. 25 S. R. 30 E.

## **POKER LAKE UNIT 20-8 BD #209H:** PAD D – B8

Surface Hole Location: 1,514' FEL & 1,813' FSL, SECTION 20, T. 25 S. R. 30 E. Bottom Hole Location: 177' FEL & 10' FNL, SECTION 8, T. 25 S. R. 30 E.

## POKER LAKE UNIT 20-8 BD #210H: PAD D - B9

Surface Hole Location: 1,484' FEL & 1,813' FSL, SECTION 20, T. 25 S. R. 30 E. Bottom Hole Location: 717' FEL & 10' FNL, SECTION 8, T. 25 S. R. 30 E.

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## 1. GENERAL PROVISIONS

The failure of the operator to comply with these requirements may result in the assessment of liquidated damages or penalties pursuant to 43 CFR 3163.1 or 3163.2. A copy of these conditions of approval shall be present on the location during construction, drilling and reclamation activity. Any request for a variance shall be submitted to the Authorized Officer on Form 3160-5, Sundry Notices and Report on Wells.

## 1.1. ARCHAEOLOGICAL, PALEONTOLOGY & HISTORICAL SITES

Any cultural resource (historic or prehistoric site or object) discovered by the operator, or any person working on the operator's behalf, on the public or federal land shall be immediately reported to the Authorized Officer. The operator shall suspend all operations in the immediate area (within 100ft) of such discovery until written authorization to proceed is issued by the Authorized Officer. An evaluation of the discovery will be made by the Authorized Officer, in conjunction with a BLM Cultural Resource Specialist, to determine appropriate actions to prevent the loss of significant scientific values. The operator shall be responsible for the cost of evaluation and any decision as to the proper mitigation measures will be made by the Authorized Officer after consulting with the operator.

Traditional Cultural Properties (TCPs) are protected by NHPA as codified in 36 CFR 800 for possessing traditional, religious, and cultural significance tied to a certain group of individuals. Though there are currently no designated TCPs within the project area or within a mile of the project area, but it is possible for a TCP to be designated after the approval of this project. If a TCP is designated in the project area after the project's approval, the BLM Authorized Officer will notify the operator of the following conditions and the duration for which these conditions are required.

- 1. Temporary halting of all construction, drilling, and production activities to lower noise.
- 2. Temporary shut-off of all artificial lights at night.

The operator is hereby obligated to comply with procedures established in the Native American Graves Protection and Repatriation Act (NAGPRA), specifically NAGPRA Subpart B regarding discoveries, to protect human remains, associated funerary objects, sacred objects, and objects of cultural patrimony discovered during project work. If any human skeletal remains, funerary objects, sacred objects, or objects of cultural patrimony are discovered at any time during construction, all construction activities shall halt and a BLM-CFO Authorized Officer will be notified immediately. The BLM will then be required to be notified, in writing, within 24 hours of the discovery. The written notification should include the geographic location by county and state, the contents of the discovery, and the steps taken to protect said discovery. You must also include any potential threats to the discovery and a conformation that all activity within 100ft of the discovery has ceased and work will not resume until written certification is issued. All work on the entire project must halt for a minimum of 3 days and work cannot resume until an Authorized Officer grants permission to do so.

Any paleontological resource discovered by the operator, or any person working on the operator's behalf, on public or Federal land shall be immediately reported to the Authorized Officer. The operator shall suspend all operations in the immediate area of such discovery until written authorization to proceed is issued by the Authorized Officer. The operator will be responsible for the cost of evaluation and any decision as to the proper mitigation measures will be made by the Authorized Officer after consulting with the operator.

## 1.2. RANGELAND RESOURCES

## 1.2.1. Cattleguards

Where a permanent cattleguard is approved, an appropriately sized cattleguard(s) sufficient to carry out the project shall be installed and maintained at fence crossing(s). Any existing cattleguard(s) on the access road 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 cattleguard(s) that are in place and are utilized during

lease operations. A gate shall be constructed on one side of the cattleguard and fastened securely to H-braces.

#### 1.2.2. Fence Requirement

Where entry granted across a fence line, the fence must be braced and tied off on both sides of the passageway prior to cutting. Once the work is completed, the fence will be restored to its prior condition, or better. The operator shall notify the private surface landowner or the grazing allotment holder prior to crossing any fence(s).

## 1.2.3. Livestock Watering Requirement

Any damage to structures that provide water to livestock throughout the life of the well, caused by operations from the well site, must be immediately corrected by the operator. The operator must notify the BLM office (575-234-5972) and the private surface landowner or the grazing allotment holder if any damage occurs to structures that provide water to livestock.

## 1.3. 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, New Mexico Department of Agriculture, and BLM requirements and policies.

#### 1.3.1 African Rue (Peganum harmala)

Spraying: The spraying of African Rue must be completed by a licensed or certified applicator. In order to attempt to kill or remove African Rue the proper mix of chemical is needed. The mix consists of 2% Arsenal (Imazapyr) and 2% Roundup (Glyphosate) along with a nonionic surfactant. Any other chemicals or combinations shall be approved by the BLM Noxious Weeds Coordinator prior to treatment. African Rue shall be sprayed in connection to any dirt working activities or disturbances to the site being sprayed. Spraying of African Rue shall be done on immature plants at initial growth through flowering and mature plants between budding and flowering stages. Spraying shall not be conducted after flowering when plant is fruiting. This will ensure optimal intake of chemical and decrease chances of developing herbicide resistance. After spraying, the operator or necessary parties must contact the Carlsbad Field Office to inspect the effectiveness of the application treatment to the plant species. No ground disturbing activities can take place until the inspection by the authorized officer is complete. The operator may contact the Environmental Protection Department or the BLM Noxious Weed Coordinator at (575) 234-5972 or BLM NM CFO NoxiousWeeds@blm.gov.

Management Practices: In addition to spraying for African Rue, good management practices should be followed. All equipment should be washed off using a power washer in a designated containment area. The containment area shall be bermed to allow for containment of the seed to prevent it from entering any open areas of the nearby landscape. The containment area shall be excavated near or adjacent to the well pad at a depth of three feet and just large enough to get equipment inside it to be washed off. This will allow all seeds to be in a centrally located area that can be treated at a later date if the need arises.

## 1.4. LIGHT POLLUTION

#### 1.4.1. **Downfacing**

All permanent lighting will be pointed straight down at the ground in order to prevent light spill beyond the edge of approved surface disturbance.

## 1.4.2. Shielding

All permanent lighting will use full cutoff luminaires, which are fully shielded (i.e., not emitting direct or indirect light above an imaginary horizontal plane passing through the lowest part of the light source).

## 1.4.3. Lighting Color

Lighting shall be 3,500 Kelvin or less (Warm White) except during drilling, completion, and workover operations. No bluish-white lighting shall be used in permanent outdoor lighting.

## 2. SPECIAL REQUIREMENTS

#### WATERSHED 2.1.

The entire well pad(s) will be bermed to prevent oil, salt, and other chemical contaminants from leaving the well pad. The compacted berm shall be constructed at a minimum of 12 inches with impermeable mineral material (e.g. caliche). Topsoil shall not be used to construct the berm. No water flow from the uphill side(s) of the pad shall be allowed to enter the well pad. The integrity of the berm shall be maintained around the surfaced pad throughout the life of the well and around the downsized pad after interim reclamation has been completed. Any water erosion that may occur due to the construction of the well pad during the life of the well will be quickly corrected and proper measures will be taken to prevent future erosion. Stockpiling of topsoil is required. The topsoil shall be stockpiled in an appropriate location to prevent loss of soil due to water or wind erosion and not used for berming or erosion control. If fluid collects within the bermed area, the fluid must be vacuumed into a safe container and disposed of properly at a state approved facility.

## 2.1.1. Tank Battery

Tank battery locations will be lined and bermed. A 20-mil permanent liner will be installed with a 4 oz. felt backing to prevent tears or punctures. Secondary containment holding capacity must be large enough to contain 1 ½ times the content of the largest tank or 24-hourproduction, whichever is greater (displaced volume from all tanks within the berms MUST be subtracted from total volume of containment in calculating holding capacity). Automatic shut off, check valves, or similar systems will be installed for tanks to minimize the effects of catastrophic line failures used in production or drilling.

## 2.1.2. Buried/Surface Line(s)

When crossing ephemeral drainages, the pipeline(s) will be buried to a minimum depth of 48 inches from the top of pipe to ground level. Erosion control methods such as gabions and/or rock aprons must be placed on both up and downstream sides of the pipeline crossing. In addition, curled (weed free) wood/straw fiber wattles/logs and/or silt fences must be placed on the downstream side for sediment control during construction and maintained until soils and vegetation have stabilized. Water bars must be placed within the corridor to divert and dissipate surface runoff. A pipeline access road is not permitted to cross ephemeral drainages. Traffic must be diverted to a preexisting route. Additional seeding may be required in floodplains and drainages to restore energy dissipating vegetation.

Prior to pipeline installation/construction a leak detection plan will be developed. The method(s) could incorporate gauges to detect pressure drops, situating valves and lines so they can be visually inspected periodically or installing electronic sensors to alarm when a leak is present. The leak detection plan will incorporate an automatic shut off system that will be installed for proposed pipelines to minimize the effects of an undesirable event.

## 2.1.3. Electric Line(s)

Any water erosion that may occur due to the construction of overhead electric line and during the life of the power line will be quickly corrected and proper measures will be taken to prevent future erosion. A power pole must not be placed in drainages, playas, wetlands, riparian areas, or floodplains and must span across the features at a distance away that does not promote further erosion.

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## 2.1.4. Temporary Use Fresh Water Frac Line(s)

Once the temporary use exceeds the timeline of 180 days and/or with a 90 day extension status; further analysis will be required if the applicant pursues to turn the temporary pipeline into a permanent pipeline.

## 2.3 VISUAL RESOURCE MANAGEMENT

#### 2.5.1 VRM IV

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

## 3. CONSTRUCTION REQUIRENMENTS

## 3.1 CONSTRCUTION NOTIFICATION

The BLM shall administer compliance and monitor construction of the access road and well pad. Notify the Carlsbad Field Office at BLM\_NM\_CFO\_Construction\_Reclamation@blm.gov 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 COAs on the well site and they shall be made available upon request by the Authorized Officer.

## 3.2 TOPSOIL

The operator shall strip the topsoil (the A horizon) from the entire well pad area and stockpile the topsoil along the edge of the well pad as depicted in the APD. No more than the top 6 inches of topsoil shall be removed. 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 (the B horizon and below) 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.

## 3.3 CLOSED LOOP SYSTEM

Tanks are required for drilling operations: No reserve pits will be used for drill cuttings. The operator shall properly dispose of drilling contents at an authorized disposal site.

## 3.4 FEDERAL MINERAL 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.

## 3.5 WELL PAD & SURFACING

Any surfacing material used to surface the well pad will be removed at the time of interim and final reclamation.

## 3.6 EXCLOSURE FENCING (CELLARS & PITS)

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 well cellar 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.)

The operator will also install and maintain mesh netting for all open well cellars to prevent access to smaller wildlife before and after drilling operations until the well cellar is free of fluids and the operator. Use a maximum netting mesh size of 1 ½ inches. The netting must not have holes or gaps.

## 4.1 BURIED PIPELINES

A copy of the application (APD, or Sundry Notice) and attachments, including conditions of approval, survey plat and/or map, will be on location during construction. BLM personnel may request a copy of your permit during construction to ensure compliance with all stipulations.

Operator agrees to comply with the following stipulations to the satisfaction of the Authorized Officer:

- 1. The Operator shall indemnify the United States against any liability for damage to life or property arising from the occupancy or use of public lands under this APD.
- 2. The Operator shall comply with all applicable Federal laws and regulations existing or hereafter enacted or promulgated. In any event, the operator shall comply with the Toxic Substances Control Act of 1976 as amended, 15 USC 2601 et seq. (1982) with regards to any toxic substances that are used, generated by or stored on the pipeline corridor or on facilities authorized under this APD. (See 40 CFR Part 702-799 and especially, provisions on polychlorinated biphenyls, 40 CFR 761.1-761.193.) Additionally, any release of toxic substances (leaks, spills, etc.) in excess of the reportable quantity established by 40 CFR Part 117 shall be reported as required by the Comprehensive Environmental Response, Compensation, and Liability Act, section 102b. A copy of any report required or requested by any Federal agency or State government as a result of a reportable release or spill of any toxic substances shall be furnished to the authorized officer concurrent with the filing of the reports to the involved Federal agency or State government.
- 3. The operator agrees to indemnify the United States against any liability arising from the release of any hazardous substance or hazardous waste (as these terms are defined in the Comprehensive Environmental Response, Compensation and Liability Act of 1980, 42 U.S.C. 9601, et seq. or the Resource Conservation and Recovery Act, 42 U.S.C.6901, et seq.) on the Pipeline corridor (unless the release or threatened release is wholly unrelated to the operator's activity on the pipeline corridor), or resulting from the activity of the Operator on the pipeline corridor. This agreement applies without regard to whether a release is caused by the operator, its agent, or unrelated third parties.
- 4. If, during any phase of the construction, operation, maintenance, or termination of the pipeline, any oil or other pollutant is discharged from the pipeline system, impacting Federal lands, the control and total removal, disposal, and cleaning up of such oil or other pollutant, wherever found, shall be the responsibility of operator, regardless of fault. Upon failure of operator to control, dispose of, or clean up such discharge on or affecting Federal lands, or to repair all damages resulting therefrom, on the Federal lands, the Authorized Officer may take such measures as he deems necessary to control and clean up the discharge and restore the area, including where appropriate, the aquatic environment and fish and wildlife habitats, at the full expense of the operator. Such action by the Authorized Officer shall not relieve operator of any responsibility as provided herein.
- 5. All construction and maintenance activity will be confined to the authorized pipeline corridor.
- 6. The pipeline will be buried with a minimum cover of 36 inches between the top of the pipe and ground level.
- 7. The maximum allowable disturbance for construction in this pipeline corridor will be 30 feet:
  - Blading of vegetation within the pipeline corridor will be allowed: maximum width of blading operations will not exceed <u>20</u> feet. The trench is included in this area. (*Blading is defined as the complete removal of brush and ground vegetation*.)

- Clearing of brush species within the pipeline corridor will be allowed: maximum width of clearing operations will not exceed 30 feet. The trench and bladed area are included in this area. (Clearing is defined as the removal of brush while leaving ground vegetation (grasses, weeds, etc.) intact. Clearing is best accomplished by holding the blade 4 to 6 inches above the ground surface.)
- The remaining area of the pipeline corridor (if any) shall only be disturbed by compressing the vegetation. (Compressing can be caused by vehicle tires, placement of equipment, etc.)
- 8. The operator shall stockpile an adequate amount of topsoil where blading is allowed. The topsoil to be stripped is approximately \_\_\_6\_\_ inches in depth. The topsoil will be segregated from other spoil piles from trench construction. The topsoil will be evenly distributed over the bladed area for the preparation of seeding.
- 9. Vegetation, soil, and rocks left as a result of construction or maintenance activity will be randomly scattered on this pipeline corridor and will not be left in rows, piles, or berms, unless otherwise approved by the Authorized Officer. The entire pipeline corridor shall be recontoured to match the surrounding landscape. The backfilled soil shall be compacted, and a 6-inch berm will be left over the ditch line to allow for settling back to grade.
- 10. The pipeline will be identified by signs at the point of origin and completion of the pipeline corridor and at all road crossings. At a minimum, signs will state the operator's name, BLM serial number, and the product being transported. All signs and information thereon will be posted in a permanent, conspicuous manner, and will be maintained in a legible condition for the life of the pipeline.
- 11. The operator shall not use the pipeline route as a road for purposes other than routine maintenance as determined necessary by the Authorized Officer in consultation with the operator before maintenance begins. The operator will take whatever steps are necessary to ensure that the pipeline route is not used as a roadway. As determined necessary during the life of the pipeline, the Authorized Officer may ask the operator to construct temporary deterrence structures.
- 12. 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 associated roads, 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.
- 13. <u>Escape Ramps</u> The operator will construct and maintain pipeline/utility trenches [that are not otherwise fenced, screened, or netted] to prevent livestock, wildlife, and humans from becoming entrapped. At a minimum, the operator will construct and maintain escape ramps, ladders, or other methods of avian and terrestrial wildlife escape in the trenches according to the following criteria:
  - a. Any trench left open for eight (8) hours or less is not required to have escape ramps; however, before the trench is backfilled, the contractor/operator shall inspect the trench for wildlife, remove all trapped wildlife, and release them alive at least 100 yards from the trench.
  - b. For trenches left open for eight (8) hours or more, earthen escape ramps (built at no more than a 30-degree slope and spaced no more than 500 feet apart) shall be placed in the trench. Before the trench is backfilled, the contractor/operator shall inspect the trench for wildlife, remove all trapped wildlife, and release them alive at least 100 yards from the trench.

## 4.2 SURFACE PIPELINES

A copy of the APD and attachments, including stipulations, survey plat(s) and/or map(s), shall be on location during construction. BLM personnel may request to review a copy of your permit during construction to ensure compliance with all stipulations.

Operator agrees to comply with the following stipulations to the satisfaction of the Authorized Officer:

- 1. Operator shall indemnify the United States against any liability for damage to life or property arising from the occupancy or use of public lands under this APD.
- 2. Operator shall comply with all applicable Federal laws and regulations existing or hereafter enacted or promulgated. In any event, Operator shall comply with the Toxic Substances Control Act of 1976 as amended, 15 USC § 2601 et seq. (1982) with regard to any toxic substances that are used, generated by or stored on the pipeline corridoror on facilities authorized under this APD (see 40 CFR, Part 702-799 and in particular, provisions on polychlorinated biphenyls, 40 CFR 761.1-761.193). Additionally, any release of toxic substances (leaks, spills, etc.) in excess of the reportable quantity established by 40 CFR, Part 117 shall be reported as required by the Comprehensive Environmental Response, Compensation, and Liability Act, section 102b. A copy of any report required or requested by any Federal agency or State government as a result of a reportable release or spill of any toxic substances shall be furnished to the Authorized Officer concurrent with the filing of the reports to the involved Federal agency or State government.
- 3. Operator agrees to indemnify the United States against any liability arising from the release of any hazardous substance or hazardous waste (as these terms are defined in the Comprehensive Environmental Response, Compensation and Liability Act of 1980, 42 U.S.C. § 9601, et seq. or the Resource Conservation and Recovery Act, 42 U.S.C. 6901, et seq.) on the Pipeline corridor (unless the release or threatened release is wholly unrelated to activity of the Operator's activity on the Pipeline corridor), or resulting from the activity of the Operator on the pipeline corridor. This provision applies without regard to whether a release is caused by Operator, its agent, or unrelated third parties.
- 4. Operator shall be liable for damage or injury to the United States to the extent provided by 43 CFR Sec. 2883.1-4. Operator shall be held to a standard of strict liability for damage or injury to the United States resulting from pipe rupture, fire, or spills caused or substantially aggravated by any of the following within the pipeline corridor or permit area:
  - a. Activities of Operator including, but not limited to: construction, operation, maintenance, and termination of the facility;
  - b. Activities of other parties including, but not limited to:
    - (1) Land clearing
    - (2) Earth-disturbing and earth-moving work
    - (3) Blasting
    - (4) Vandalism and sabotage
  - c. Acts of God.

The maximum limitation for such strict liability damages shall not exceed one million dollars (\$1,000,000) for any one event, and any liability in excess of such amount shall be determined by the ordinary rules of negligence of the jurisdiction in which the damage or injury occurred.

This section shall not impose strict liability for damage or injury resulting primarily from an act of war or from the negligent acts or omissions of the United States.

5. If, during any phase of the construction, operation, maintenance, or termination of the pipeline, any oil, salt water, or other pollutant is discharged from the pipeline system, impacting Federal lands, the control and total removal, disposal, and cleaning up of such oil, salt water, or other pollutant, wherever found, shall be the responsibility of Operator, regardless of fault. Upon failure of Operator to control, dispose of, or clean up such discharge on or affecting Federal lands, or to repair all damages resulting therefrom, on the Federal lands, the Authorized Officer may take such measures as they deem necessary to control and clean up the discharge and restore the area, including, where appropriate, the aquatic environment and fish and wildlife habitats, at the full expense of Operator. Such action by the Authorized Officer shall not relieve Operator of any responsibility as provided herein.

- 6. All construction and maintenance activity shall be confined to the authorized pipeline corridor width of 30-feet. If the pipeline route follows an existing road or buried pipeline corridor, the surface pipeline shall be installed no farther than 10 feet from the edge of the road or buried pipeline corridor. If existing surface pipelines prevent this distance, the proposed surface pipeline shall be installed immediately adjacent to the outer surface pipeline. All construction and maintenance activity shall be confined to existing roads or pipeline corridors.
- 7. No blading or clearing of any vegetation shall be allowed unless approved in writing by the Authorized Officer.
- 8. Operator shall install the pipeline on the surface in such a manner that will minimize suspension of the pipeline across low areas in the terrain. In hummocky of duney areas, the pipeline shall be "snaked" around hummocks and dunes rather than suspended across these features.
- 9. The pipeline shall be buried with a minimum of 6 inches under all roads, "two-tracks," and trails. Burial of the pipe will continue for 20 feet on each side of each crossing. The condition of the road, upon completion of construction, shall be returned to at least its former state with no bumps or dips remaining in the road surface.
- 10. The operator shall minimize disturbance to existing fences and other improvements on public lands. The operator is required to promptly repair improvements to at least their former state. Functional use of these improvements will be maintained at all times. The operator will contact the owner of any improvements prior to disturbing them. When necessary to pass through a fence line, the fence shall be braced on both sides of the passageway prior to cutting of the fence. No permanent gates will be allowed unless approved by the Authorized Officer.
- 11. In those areas where erosion control structures are required to stabilize soil conditions, the operator will install such structures as are suitable for the specific soil conditions being encountered and which are in accordance with sound resource management practices.
- 12. Excluding the pipe, all above-ground structures not subject to safety requirement shall be painted by the operator to blend with the natural color of the landscape. The paint used shall be a color which simulates "Standard Environmental Colors" Shale Green, Munsell Soil Color No. 5Y 4/2; designated by the Rocky Mountain Five State Interagency Committee.
- 13. The pipeline will be identified by signs at the point of origin and completion of the pipeline corridor and at all road crossings. At a minimum, signs will state the operator's name, BLM serial number, and the product being transported. Signs will be maintained in a legible condition for the life of the pipeline.
- 14. The operator shall not use the pipeline route as a road for purposes other than routine maintenance as determined necessary by the Authorized Officer in consultation with the operator. The operator will take whatever steps are necessary to ensure that the pipeline route is not used as a roadway.
- 15. 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, powerline 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.
- 16. Surface pipelines shall be less than or equal to 4 inches and a working pressure below 125 psi.

## 4.3 RANGELAND MITIGATION FOR PIPELINES

## 4.5.1 Fence Requirement

Where entry is granted across a fence line, the fence must be braced and tied off on both sides of the passageway with H-braces prior to cutting. Once the work is completed, the fence will be restored to its prior condition, or better. The operator shall notify the private surface landowner or the grazing allotment operator prior to crossing any fence(s).

#### 4.5.2 Cattleguards

An appropriately sized cattleguard(s) sufficient to carry out the project shall be installed and maintained at road-fence crossing(s). Any existing cattleguard(s) on the access road 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 cattleguard(s) that are in place and are utilized during lease operations. A gate shall be constructed on one side of the cattleguard and fastened securely to H-braces.

#### 4.5.3 Livestock Watering Requirement

Structures that provide water to livestock, such as windmills, pipelines, drinking troughs, and earthen reservoirs, will be avoided by moving the proposed action.

Any damage to structures that provide water to livestock throughout the life of the well, caused by operations from the well site, must be immediately corrected by the operator. The operator must notify the BLM office (575-234-5972) and the private surface landowner or the grazing allotment operator if any damage occurs to structures that provide water to livestock.

- Livestock operators will be contacted, and adequate crossing facilities will be provided as needed to ensure livestock are not prevented from reaching water sources because of the open trench.
- Wildlife and livestock trails will remain open and passable by adding soft plugs (areas where the
  trench is excavated and replaced with minimal compaction) during the construction phase. Soft
  plugs with ramps on either side will be left at all well-defined livestock and wildlife trails along
  the open trench to allow passage across the trench and provide a means of escape for livestock and
  wildlife that may enter the trench.
- Trenches will be backfilled as soon as feasible to minimize the amount of open trench. The Operator will avoid leaving trenches open overnight to the extent possible and open trenches that cannot be backfilled immediately will have escape ramps (wooden) placed at no more than 2,500 feet intervals and sloped no more than 45 degrees.

## 4. OVERHEAD ELECTRIC LINES

A copy of the APD and attachments, including stipulations, survey plat and/or map, will be on location during construction. BLM personnel may request to you a copy of your permit during construction to ensure compliance with all stipulations.

Operator agrees to comply with the following stipulations to the satisfaction of the Authorized Officer:

- 1. The operator shall indemnify the United States against any liability for damage to life or property arising from the occupancy or use of public lands under this APD.
- 2. The operator shall comply with all applicable Federal laws and regulations existing or hereafter enacted or promulgated. In any event, the operator shall comply with the Toxic Substances Control Act of 1976 as amended, 15 USC 2601 et seq. (1982) with regards to any toxic substances that are used, generated by or stored on the powerline corridor or on facilities authorized under this powerline corridor. (See 40 CFR, Part 702-799 and especially, provisions on polychlorinated biphenyls, 40 CFR 761.1-761.193.) Additionally, any release of toxic substances (leaks, spills, etc.) in excess of the reportable quantity established by 40 CFR, Part 117 shall be reported as required by the

- Comprehensive Environmental Response, Compensation, and Liability Act, section 102b. A copy of any report required or requested by any Federal agency or State government as a result of a reportable release or spill of any toxic substances shall be furnished to the authorized officer concurrent with the filing of the reports to the involved Federal agency or State government.
- 3. The operator agrees to indemnify the United States against any liability arising from the release of any hazardous substance or hazardous waste (as these terms are defined in the Comprehensive Environmental Response, Compensation and Liability Act of 1980, 42 U.S.C. 9601, et seq. or the Resource Conservation and Recovery Act, 42 U.S.C. 6901, et seq.) on the Powerline corridor(unless the release or threatened release is wholly unrelated to the operator's activity on the powerline corridor), or resulting from the activity of the Operator on the powerline corridor. This agreement applies without regard to whether a release is caused by the operator, its agent, or unrelated third parties.
- 4. There will be no clearing or blading of the powerline corridor unless otherwise agreed to in writing by the Authorized Officer.
- 5. Power lines shall be constructed and designed in accordance to standards outlined in "Suggested Practices for Avian Protection on Power lines: The State of the Art in 2006" Edison Electric Institute, APLIC, and the California Energy Commission 2006. The operator shall assume the burden and expense of proving that pole designs not shown in the above publication deter raptor perching, roosting, and nesting. Such proof shall be provided by a raptor expert approved by the Authorized Officer. The BLM reserves the right to require modification or additions to all powerline structures placed on this powerline corridor, should they be necessary to ensure the safety of large perching birds. Such modifications and/or additions shall be made by the operator without liability or expense to the United States.
- 6. Raptor deterrence will consist of but not limited to the following: triangle perch discouragers shall be placed on each side of the cross arms and a nonconductive perching deterrence shall be placed on all vertical poles that extend past the cross arms.
- 7. The operator shall minimize disturbance to existing fences and other improvements on public lands. The operator is required to promptly repair improvements to at least their former state. Functional use of these improvements will be maintained at all times. The operator will contact the owner of any improvements prior to disturbing them. When necessary to pass through a fence line, the fence shall be braced on both sides of the passageway prior to cutting the fence. No permanent gates will be allowed unless approved by the Authorized Officer.
- 8. The BLM serial number assigned to this authorization shall be posted in a permanent, conspicuous manner where the power line crosses roads and at all serviced facilities. Numbers will be at least two inches high and will be affixed to the pole nearest the road crossing and at the facilities served.
- 9. Upon cancellation, relinquishment, or expiration of this APD, the operator shall comply with those abandonment procedures as prescribed by the Authorized Officer.
- 10. All surface structures (poles, lines, transformers, etc.) shall be removed within 180 days of abandonment, relinquishment, or termination of use of the serviced facility or facilities or within 180 days of abandonment, relinquishment, cancellation, or expiration of this APD, whichever comes first. This will not apply where the power line extends service to an active, adjoining facility or facilities.
- 11. Special Stipulations:
  - For reclamation remove poles, lines, transformer, etc. and dispose of properly. Fill in any holes from the poles removed.

## 5. PRODUCTION (POST DRILLING)

## 5.1 WELL STRUCTURES & FACILITIES

## 5.1.1 Placement of Production Facilities

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

#### 5.1.2 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.

## 5.1.3. 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.

## 5.1.4. 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.

#### 5.1.5. 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.

## 6. RECLAMATION

Stipulations required by the Authorized Officer on specific actions may differ from the following general guidelines

## 6.1 ROAD AND SITE RECLAMATION

Any roads constructed during the life of the well will have the caliche removed or linear burial. If contaminants are indicated then testing will be required for chlorides and applicable contaminate anomalies for final disposal determination (disposed of in a manner approved by the Authorized Officer within Federal, State and Local statutes, regulations, and ordinances) and seeded to the specifications in sections 6.5 and 6.6.

## **6.2 EROSION CONTROL**

Install erosion control berms, windrows, and hummocks. Windrows must be level and constructed perpendicular to down-slope drainage; steeper slopes will require greater windrow density. Topsoil between windrows must be ripped to a depth of at least 12", unless bedrock is encountered. Any large boulders pulled up during ripping must be deep-buried on location. Ripping must be perpendicular to down-slope. The surface must be left rough in order to catch and contain rainfall on-site. Any trenches resulting from erosion cause by run-off shall be addressed immediately.

## **6.3 INTERIM RECLAMATION**

During the life of the development, all disturbed areas not needed for active support of production operations must 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 must work with BLM surface protection specialists (BLM\_NM\_CFO\_Construction\_Reclamation@blm.gov) to devise the best strategies to reduce the size of the location. Interim reclamation must allow for remedial well operations, as well as safe and efficient removal of oil and gas.

During reclamation, the removal of caliche and any other surface material is required. 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 in section 6.6.

Upon completion of interim reclamation, the operator shall submit a Sundry Notice, Subsequent Report of Reclamation (Form 3160-5).

## 6.4 FINAL ABANDONMENT & RECLAMATION

Prior to surface abandonment, the operator shall submit a Notice of Intent Sundry Notice and reclamation plan.

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 will 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. After earthwork and seeding is completed, the operator is required to submit a Sundry Notice, Subsequent Report of Reclamation.

Operators shall contact a BLM surface protection specialist prior to surface abandonment operations for site specific objectives (BLM NM CFO Construction Reclamation@blm.gov).

## 6.5 SEEDING TECHNIQUES

Seeds shall be hydro-seeded, mechanically drilled, or broadcast, with the broadcast-seeded area raked, ripped or dragged to aid in covering the seed. The seed mixture shall be evenly and uniformly planted over the disturbed area.

## 6.6 SOIL SPECIFIC SEED MIXTURE

The lessee/permitee 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 no 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 land application will be accomplished by mechanical planting 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 tend to drop the bottom of the drill and are planted first; the operator 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 BLM or Soil Conservation

District 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 or until several months of precipitation

## **Seed Mixture 2, for Sandy Site**

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             |

<sup>\*</sup>Pounds of pure live seed:

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

# DRILLING PLAN: BLM COMPLIANCE (Supplement to BLM 3160-3)

XTO Energy Inc.
POKER LAKE UNIT 20-8 BD 207H
Projected TD: 24380.33' MD / 10159' TVD
SHL: 1813' FSL & 1574' FEL , Section 20, T25S, R30E
BHL: 2652' FSL & 1348' FEL , Section 8, T25S, R30E
EDDY County, NM

## 1. Geologic Name of Surface Formation

A. Quaternary

## 2. Estimated Tops of Geological Markers & Depths of Anticipated Fresh Water, Oil or Gas

| Formation         | Well Depth (TVD) | Water/Oil/Gas |
|-------------------|------------------|---------------|
| Rustler           | 876'             | Water         |
| Top of Salt       | 1017'            | Water         |
| Base of Salt      | 3482'            | Water         |
| Delaware          | 3679'            | Water         |
| Brushy Canyon     | 6196'            | Water/Oil/Gas |
| Bone Spring       | 7505'            | Water         |
| Avalon            | 7630'            | Water/Oil/Gas |
| 1st Bone Spring   | 8238'            | Water/Oil/Gas |
| 2nd Bone Spring   | 8717'            | Water/Oil/Gas |
| 3rd Bone Spring   | 9589'            | Water/Oil/Gas |
| Target/Land Curve | 10159'           | Water/Oil/Gas |
|                   |                  |               |

<sup>\*\*\*</sup> Hydrocarbons @ Brushy Canyon

No other formations are expected to yield oil, gas or fresh water in measurable volumes. The surface fresh water sands will be protected by setting 9.625 inch casing @ 976' (41' above the salt) and circulating cement back to surface. The intermediate will isolate from the top of salt down to the next casing seat by setting 7.625 inch casing at 9863.09' and cemented to surface. A 6.75 inch curve and 6.75 inch lateral hole will be drilled to 24380.33 MD/TD and 5.5 inch production casing will be set at TD and cemented back up in the intermediate shoe (estimated TOC 9563.09 feet).

## 3. Casing Design

| Hole Size | Depth                   | OD Csg | Weight | Grade    | Collar      | New/Used | SF<br>Burst | SF<br>Collapse | SF<br>Tension |
|-----------|-------------------------|--------|--------|----------|-------------|----------|-------------|----------------|---------------|
| 12.25     | 0' – 976'               | 9.625  | 40     | J-55     | втс         | New      | 1.33        | 6.45           | 16.14         |
| 8.75      | 0' – 4000'              | 7.625  | 29.7   | RY P-110 | Flush Joint | New      | 3.00        | 2.57           | 1.90          |
| 8.75      | 4000' –<br>9863.09'     | 7.625  | 29.7   | HC L-80  | Flush Joint | New      | 2.18        | 1.93           | 2.33          |
| 6.75      | 0' - 9763.09'           | 5.5    | 20     | RY P-110 |             | New      | 1.05        | 2.14           | 2.03          |
| 6.75      | 9763.09' -<br>24380.33' | 5.5    | 20     | RY P-110 |             | New      | 1.05        | 2.06           | 2.03          |

 $<sup>\</sup>cdot$  XTO requests the option to utilize a spudder rig (Atlas Copco RD20 or Equivalent) to set and cement surface casing

<sup>\*\*\*</sup> Groundwater depth 40' (per NM State Engineers Office).

#### Wellhead:

#### 4. Cement Program

XTO requests the option to offline cement and remediate (if needed) surface and intermediate casing strings where batch drilling is approved and if unplanned remediation is needed. XTO will ensure well is static with no pressure on the csg annulus, as with all other casing strings where batch drilling operations occur before moving off the rig. The TA cap will also be installed when applicable per Cactus procedure and pressure inside the casing will be monitored via the valve on the TA cap as per standard batch drilling ops. Offline cement operations will then be conducted after the rig is moved off the current well to the next well in the batch sequence.

#### Surface Casing: 9.625, 40 New BTC, J-55 casing to be set at +/- 976'

Lead: 220 sxs EconoCem-HLTRRC (mixed at 10.5 ppg, 1.87 ft3/sx, 10.13 gal/sx water)

Tail: 130 sxs Class C + 2% CaCl (mixed at 14.8 ppg, 1.35 ft3/sx, 6.39 gal/sx water)

Top of Cement: Surface

Compressives: 12-hr = 900 psi 24 hr = 1500 psi

## 2nd Intermediate Casing: 7.625, 29.7 New casing to be set at +/- 9863.09

<u>1st Stage</u>

Optional Lead: 330 sxs Class C (mixed at 10.5 ppg, 2.77 ft3/sx, 15.59 gal/sx water)

TOC: Surface

Tail: 340 sxs Class C (mixed at 14.8 ppg, 1.35 ft3/sx, 6.39 gal/sx water)

TOC: Brushy Canyon @ 6196

Compressives: 12-hr = 900 psi 24 hr = 1150 psi

2nd Stage

Lead: 0 sxs Class C (mixed at 12.9 ppg, 2.16 ft3/sx, 9.61 gal/sx water)
Tail: 700 sxs Class C (mixed at 14.8 ppg, 1.33 ft3/sx, 6.39 gal/sx water)

Top of Cement: 0

Compressives: 12-hr = 900 psi 24 hr = 1150 psi

XTO requests to pump a two stage cement job on the 7-5/8" intermediate casing string with the first stage being pumped conventionally with the calculated top of cement at the Brush Canyon (6196') and the second stage performed as a bradenhead squeeze with planned cement from the Brushy Canyon to surface. If cement is not visually confirmed to circulate to surface, the final cement top after the second stage job will be verified by Echo-meter. If necessary, a top out consisting of 1,500 sack of Class C cement + 3% Salt + 1% PreMag-M + 6% Bentonite Gel (2.30 yld, 12.91 ppg) will be executed as a contingency. If cement is still unable to circulate to surface, another Echo-meter run will be performed for cement top verification.

XTO will report to the BLM the volume of fluid (limited to 5 bbls) used to flush intermediate casing valves following backside cementing procedures.

XTO requests to pump an Optional Lead if well conditions dictate in an attempt to bring cement inside the first intermediate casing. If cement reaches the desired height, the BLM will be notified and the second stage bradenhead squeeze and subsequent TOC verification will be negated.

XTO requests the option to conduct the bradenhead squeeze and TOC verification offline as per standard approval from BLM when unplanned remediation is needed and batch drilling is approved. In the event the bradenhead is conducted, we will ensure the first stage cement job is cemented properly and the well is static with floats holding and no pressure on the csg annulus as with all other casing strings where batch drilling operations occur before moving off the rig. The TA cap will also be installed per Cactus procedure and pressure inside the casing will be monitored via the valve on the TA cap as per standard batch drilling ops.

#### Production Casing: 5.5, 20 New Semi-Flush, RY P-110 casing to be set at +/- 24380.33'

Lead: 20 sxs NeoCem (mixed at 11.5 ppg, 2.69 ft3/sx, 15.00 gal/sx water) Top of Cement: 9563.09 feet
Tail: 1020 sxs VersaCem (mixed at 13.2 ppg, 1.51 ft3/sx, 8.38 gal/sx water) Top of Cement: 10063.09 feet
Compressives: 12-hr = 800 psi 24 hr = 1500 psi

## 5. Pressure Control Equipment

| Once the permanent WH is installed on the casing, the blow out preventer equipment (BOP) will consist of a Hydril Annular and a 10M Triple Ram BOP. | 5M |
|---|----|
| All BOP testing will be done by an independent service company. Operator will test as per 43 CFR3172  |    |

A variance is requested to allow use of a flex hose as the choke line from the BOP to the Choke Manifold.

XTO requests a variance to be able to batch drill this well if necessary. In doing so, XTO will set casing and ensure that the well is cemented properly (unless approval is given for offline cementing) and the well is static. With floats holding, no pressure on the csg annulus, and the installation of a 10K TA cap as per Cactus recommendations, XTO will contact the BLM to skid the rig to drill the remaining wells on the pad. Once surface and both intermediate strings are all completed, XTO will begin drilling the production hole on each of the wells.

A break testing variance is requested to ONLY test broken pressure seals on the BOP equipment when moving from wellhead to wellhead which is in compliance with API Standard 53.

XTO requests a variance to utilize a spudder rig.

#### 6. Proposed Mud Circulation System

| INTERVAL                | Hole Size | Mud Type  | MW        | Viscosity | Fluid Loss | Additional                                   |  |
|-------------------------|-----------|---|-----------|-----------|------------|--|--|
|                         |           |   | (ppg)     | (sec/qt)  | (cc)       | Comments                                     |  |
| 0' - 976'               | 12.25     | FW/Native   | 8.4-8.9   | 35-40     | NC         | Fresh water or<br>native water               |  |
| 976' - 9863.09'         | 8.75      | Saturated<br>brine for<br>salt interval<br>/ Direct<br>Emulsion | 10-10.5   | 30-32     | NC         | Fully saturated salt<br>across salado / salt |  |
| 9863.09' -<br>24380.33' | 6.75      | ОВМ   | 10.2-10.7 | 50-60     | NC - 20    | N/A  |  |

The necessary mud products for weight addition and fluid loss control will be on location at all times.

Spud with fresh water/native mud. Drill out from under surface casing with Saturated Salt. A saturated salt brine mud will be used while drilling through the salt formation. Use fibrous materials as needed to control seepage and lost circulation. Pump viscous sweeps as needed for hole cleaning. Pump speed will be recorded on a daily drilling report after mudding up. A Pason or Totco will be used to detect changes in loss or gain of mud volume. A mud test will be performed every 24 hours to determine: density, viscosity, strength, filtration and pH as necessary. Use available solids controls equipment to help keep mud weight down after mud up. Rig up solids control equipment to operate as a closed loop system.

## 7. Auxiliary Well Control and Monitoring Equipment

- A. A Kelly cock will be in the drill string at all times.
- B. A full opening drill pipe stabbing valve having appropriate connections will be on the rig floor at all times.
- C. H2S monitors will be on location when drilling below the 9.625 casing.

#### 8. Logging, Coring and Testing Program

Open hole logging will not be done on this well.

#### 9. Abnormal Pressures and Temperatures / Potential Hazards

None Anticipated. BHT of 165 to 185 F is anticipated. No H2S is expected but monitors will be in place to detect any H2S occurrences. Should these circumstances be encountered the operator and drilling contractor are prepared to take all necessary steps to ensure safety of all personnel and environment. Lost circulation could occur but is not expected to be a serious problem in this area and hole seepage will be compensated for by additions of small amounts of LCM in the drilling fluid.

#### 10. Anticipated Starting Date and Duration of Operations

Anticipated spud date will be after BLM approval. Move in operations and drilling is expected to take 40 days.

# PECOS DISTRICT DRILLING CONDITIONS OF APPROVAL

OPERATOR'S NAME: XTO Permian Operating LLC
WELL NAME & NO.: Poker Lake Unit 20-8 BD 207H
LOCATION: Section 20, T.25S., R.30E.

**COUNTY:** Eddy County

COA

| H2S                  | • Yes          | ○ No                |                |
|----------------------|----------------|---------------------|----------------|
| Potash               | None           | © Secretary         | ○ R-111-P      |
| Cave/Karst Potential | • Low          | ○ Medium            | ○ High         |
| Cave/Karst Potential | Critical       |                     |                |
| Variance             | © None         | Flex Hose           | Other          |
| Wellhead             | © Conventional | • Multibowl         | O Both         |
| Wellhead Variance    | © Diverter     |                     |                |
| Other                | 4 String       | Capitan Reef        | □ WIPP         |
| Other                | Fluid Filled   | Pilot Hole          | Open Annulus   |
| Cementing            |                | EchoMeter EchoMeter | Primary Cement |
|                      | Cement Squeeze |                     | Squeeze        |
| Special Requirements | Water Disposal | □ COM               | ✓ Unit         |
| Special Requirements | Batch Sundry   |                     |                |
| Special Requirements | Break Testing  | ✓ Offline           | Casing         |
| Variance             |                | Cementing           | Clearance      |

Possibility of water flows in the Rustler Possibility of lost circulation in the Salado, Castile, and Delaware Abnormal pressures may be encountered upon penetrating the 3rd Bone Spring Sandstone and all subsequent formations.

## A. HYDROGEN SULFIDE

A Hydrogen Sulfide (H2S) Drilling Plan shall be activated AT SPUD. As a result, the Hydrogen Sulfide area must meet 43 CFR part 3170 requirements, which includes equipment and personnel/public protection items. If Hydrogen Sulfide is encountered, please provide measured values and formations to the BLM.

## **B. CASING**

- 1. The **9-5/8** inch surface casing shall be set at approximately **1150** feet (a minimum of 70 feet (Eddy County) into the Rustler Anhydrite, above the salt, and below usable fresh water) and cemented to the surface. The surface hole shall be **12-1/4** inch in diameter.
  - 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 will be a minimum of **8** hours or 500 pounds compressive strength, whichever is greater. (This is to include the lead cement)
  - 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 fill of cement behind the 7-5/8 inch intermediate casing is:
  - Cement to surface. If cement does not circulate see B.1.a, c-d above.

Operator has proposed to pump down 9-5/8" X 7-5/8" annulus after primary cementing stage. Operator must run Echo-meter to verify Cement Slurry/Fluid top in the annulus Or operator shall run a CBL from TD of the 7-5/8" casing to surface after the second stage BH to verify TOC.

Submit results to the BLM. No displacement fluid/wash out shall be utilized at the top of the cement slurry between second stage BH and top out. Operator must run one CBL per Well Pad.

If cement does not reach surface, the next casing string must come to surface.

Operator must use a limited flush fluid volume of 1 bbl following backside cementing procedures.

- 3. The minimum required fill of cement behind the 5-1/2 inch production casing is:
  - Cement should tie-back at least **200 feet** into previous casing string. Operator shall provide method of verification.

## C. PRESSURE CONTROL

- 1. Variance approved to use flex line from BOP to choke manifold. Manufacturer's specification to be readily available. No external damage to flex line. Flex line to be installed as straight as possible (no hard bends).'
- 2. Operator has proposed a multi-bowl wellhead assembly. This assembly will only be tested when installed on the **9-5/8** inch surface casing. Minimum working pressure of the blowout preventer (BOP) and related equipment (BOPE) required for drilling below the surface casing shoe shall be **5000 (5M)** psi.
  - a. Wellhead shall be installed by manufacturer's representatives, submit documentation with subsequent sundry.
  - b. If the welding is performed by a third party, the manufacturer's representative shall monitor the temperature to verify that it does not exceed the maximum temperature of the seal.
  - c. Manufacturer representative shall install the test plug for the initial BOP test.
  - d. If the cement does not circulate and one inch operations would have been possible with a standard wellhead, the well head shall be cut off, cementing operations performed and another wellhead installed.
  - e. Whenever any seal subject to test pressure is broken, all the tests in 43 CFR 3172 i must be followed.

## D. SPECIAL REQUIREMENT (S)

## **Unit Wells**

The well sign for a unit well shall include the unit number in addition to the surface and bottom hole lease numbers. This also applies to participating area numbers. If a participating area has not been established, the operator can use the general unit designation, but will replace the unit number with the participating area number when the sign is replaced.

## **Commercial Well Determination**

A commercial well determination shall be submitted after production has been established for at least six months.

## E. SPECIAL REQUIREMENT (S)

## **BOPE Break Testing Variance**

- BOPE Break Testing is ONLY permitted for 5M BOPE or less. (Annular preventer must be tested to a minimum of 70% of BOPE working pressure and shall be higher than the MASP)
- BOPE Break Testing is NOT permitted to drilling the production hole section.
- Variance only pertains to the intermediate hole-sections and no deeper than the Bone Springs formation.
- While in transfer between wells, the BOPE shall be secured by the hydraulic carrier or cradle.
- Any well control event while drilling require notification to the BLM Petroleum Engineer (575-706-2779) prior to the commencement of any BOPE Break Testing operations.
- A full BOPE test is required prior to drilling the first deep intermediate hole section. If any subsequent hole interval is deeper than the first, a full BOPE test will be required. (200' TVD tolerance between intermediate shoes is allowable).
- The BLM is to be contacted (575-361-2822 Eddy County) 4 hours prior to BOPE tests.
- As a minimum, a full BOPE test shall be performed at 21-day intervals.
- In the event any repairs or replacement of the BOPE is required, the BOPE shall test as per 43 CFR 3172.
- If in the event break testing is not utilized, then a full BOPE test would be conducted.

## **Offline Cementing**

Contact the BLM prior to the commencement of any offline cementing procedure.

## **GENERAL 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

**EMAIL** or call the Carlsbad Field Office, 620 East Greene St., Carlsbad, NM 88220.

**BLM\_NM\_CFO\_DrillingNotifications@BLM.GOV** (575) 361-2822

Lea County

Call the Hobbs Field Station, 414 West Taylor, Hobbs NM 88240, (575) 689-5981

- 1. 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.
  - a. In the event the operator has proposed to drill multiple wells utilizing a skid/walking rig. Operator shall secure the wellbore on the current well, after installing and testing the wellhead, by installing a blind flange of like pressure rating to the wellhead and a pressure gauge that can be monitored while drilling is performed on the other well(s).
  - b. When the operator proposes to set surface casing with Spudder Rig
    - i. Notify the BLM when moving in and removing the Spudder Rig.
    - ii. Notify the BLM when moving in the 2<sup>nd</sup> Rig. Rig to be moved in within 90 days of notification that Spudder Rig has left the location.
    - iii. BOP/BOPE test to be conducted per **43 CFR 3172** as soon as 2<sup>nd</sup> Rig is rigged up on well.
- 2. 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 are located, this does not include the dog house or stairway area.
- 3. For intervals in which cement to surface is required, cement to surface should be verified with a visual check and density or pH check to differentiate cement from spacer and drilling mud. The results should be documented in the driller's log and daily reports.

## A. CASING

1. 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.

- 2. Wait on cement (WOC) for Potash Areas: 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 for all cement blends of both lead and tail cement, 2) until cement has been in place at least 8 hours. WOC time will be recorded in the driller's log. The casing integrity test can be done (prior to the cement setting up) immediately after bumping the plug.
- 3. 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. The casing integrity test can be done (prior to the cement setting up) immediately after bumping the plug.
- 4. 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.
- 5. No pea gravel permitted for remedial or fall back remedial without prior authorization from the BLM engineer.
- 6. On that portion of any well approved for a 5M BOPE system or greater, a pressure integrity test of each casing shoe shall be performed. Formation at the shoe shall be tested to a minimum of the mud weight equivalent anticipated to control the formation pressure to the next casing depth or at total depth of the well. This test shall be performed before drilling more than 20 feet of new hole.
- 7. 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.
- 8. Whenever a casing string is cemented in the R-111-Q potash area, the NMOCD requirements shall be followed.

## **B. PRESSURE CONTROL**

1. All blowout preventer (BOP) and related equipment (BOPE) shall comply with well control requirements as described in 43 CFR 3172.

- 2. If a variance is approved for a flexible hose to be installed from the BOP to the choke manifold, the following requirements apply: The flex line must meet the requirements of API 16C. 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.
- 3. 5M or higher system requires an HCR valve, remote kill line and annular to match. The remote kill line is to be installed prior to testing the system and tested to stack pressure.
- 4. If the operator has proposed a multi-bowl wellhead assembly in the APD. The following requirements must be met:
  - i. Wellhead shall be installed by manufacturer's representatives, submit documentation with subsequent sundry.
  - ii. If the welding is performed by a third party, the manufacturer's representative shall monitor the temperature to verify that it does not exceed the maximum temperature of the seal.
  - iii. Manufacturer representative shall install the test plug for the initial BOP test.
  - iv. Whenever any seal subject to test pressure is broken, all the tests in 43 CFR 3172.6(b)(9) must be followed.
  - v. If the cement does not circulate and one inch operations would have been possible with a standard wellhead, the well head shall be cut off, cementing operations performed and another wellhead installed.
- 5. The appropriate BLM office shall be notified a minimum of 4 hours in advance for a representative to witness the tests.
  - i. 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 cement), 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).
- ii. In potash areas, 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. For all casing strings, casing cut-off and BOP installation can be initiated at twelve hours after bumping the cement plug. The BOPE test can be initiated after bumping the cement plug with the casing valve open. (only applies to single stage cement jobs, prior to the cement setting up.)
- iii. The tests shall be done by an independent service company utilizing a test plug not a cup or J-packer and can be initiated immediately with the casing valve open. The operator also has the option of utilizing an independent tester to test without a plug (i.e. against the casing) pursuant to **43 CFR 3172** 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 8 hours or 500 pounds compressive strength, whichever is greater, prior to initiating the test (see casing segment as lead cement may be critical item).
- iv. 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.
- v. The results of the test shall be reported to the appropriate BLM office.
- vi. 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.
- vii. 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.
- viii. BOP/BOPE must be tested by an independent service company within 500 feet of the top of the Wolfcamp formation if the time between the setting of the intermediate casing and reaching this depth exceeds 20 days. This test does not exclude the test prior to drilling out the casing shoe as per **43 CFR 3172**.

## C. DRILLING MUD

Mud system monitoring equipment, with derrick floor indicators and visual and audio alarms, shall be operating before drilling into the Wolfcamp formation, and shall be used until production casing is run and cemented.

## D. 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.

JS 4/30/2025

BUREAU OF LAND MANAGEMENT

**NAME: SIVAPRAKASH SELVAM** 

**Email address:** 

Signed on: 09/23/2024

05/14/2025

#### **Operator**

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.

| Title: Regulatory Clerk        |                      |                   |
|--------------------------------|----------------------|-------------------|
| Street Address: 22777 SPRINGWO | OODS VILLAGE PARKWAY |                   |
| City: SPRING                   | State: TX            | <b>Zip:</b> 77389 |
| <b>Phone:</b> (720)539-1673    |                      |                   |
| Email address: SIVAPRAKASH.SE  | LVAM1@EXXONMOBIL.COM |                   |
|                                |                      |                   |
| Field                          |                      |                   |
| Representative Name:           |                      |                   |
| Street Address:                |                      |                   |
| City: St                       | ate:                 | Zip:              |
| Phone:                         |                      |                   |



BUREAU OF LAND MANAGEMENT

Application Data

05/14/2025

**APD ID:** 10400100973

Submission Date: 09/23/2024

**Operator Name:** XTO PERMIAN OPERATING LLC

Well Name: POKER LAKE UNIT 20-8 BD

Well Number: 207H

Well Type: OIL WELL

recent changes **Show Final Text** 

Highlighted data reflects the most

Well Work Type: Drill

#### **Section 1 - General**

APD ID: 10400100973 Tie to previous NOS? N Submission Date: 09/23/2024

**BLM Office:** Carlsbad

**User:** SIVAPRAKASH SELVAM

Title: Regulatory Clerk

Federal/Indian APD: FED

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

Lease number: NMLC064894A

Surface access agreement in place?

Lease Acres: Allotted?

Reservation:

Agreement in place? YES

Federal or Indian agreement: FEDERAL

Agreement number: NMNM71016X

Agreement name: POKER LAKE UNIT

Keep application confidential? Y

Permitting Agent? NO **APD Operator:** XTO PERMIAN OPERATING LLC

Operator letter of

# Operator Info

Operator Organization Name: XTO PERMIAN OPERATING LLC

Operator Address: 6401 HOLIDAY HILL ROAD BLDG 5

**Zip:** 79707

**Operator PO Box:** 

**Operator City: MIDLAND** 

State: TX

**Operator Phone:** (432)683-2277

**Operator Internet Address:** 

#### **Section 2 - Well Information**

Well in Master Development Plan? NO

**Master Development Plan name:** 

Well in Master SUPO? NO

Master SUPO name:

Well in Master Drilling Plan? NO

Master Drilling Plan name:

Well Name: POKER LAKE UNIT 20-8 BD

Field/Pool or Exploratory? Field and Pool

Well Number: 207H Well API Number:

Page 1 of 3

Field Name: CORRAL CANYON Pool Name: BONE SPRING

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

Is the proposed well in a Helium production area? N Use Existing Well Pad? N New surface disturbance?

Type of Well Pad: MULTIPLE WELL

Multiple Well Pad Name: Number: D
POKER LAKE UNIT 20-8 BD

Well Class: HORIZONTAL Number of Legs: 1

Well Work Type: Drill
Well Type: OIL WELL
Describe Well Type:
Well sub-Type: INFILL

Describe sub-type:

Distance to town: Distance to nearest well: 30 FT Distance to lease line: 1574 FT

Reservoir well spacing assigned acres Measurement: 400 Acres

Well plat: 2024060279\_XTO\_POKER\_LAKE\_UNIT\_20\_8\_BD\_207H\_C\_102\_FINAL\_7\_12\_2024\_\_\_UPDATED\_FOR

M\_9\_12\_2024\_15\_09\_2024\_\_14\_50\_20240923144952.pdf

Well work start Date: 10/24/2025 Duration: 45 DAYS

#### **Section 3 - Well Location Table**

Survey Type: RECTANGULAR

**Describe Survey Type:** 

Datum: NAD83 Vertical Datum: NAVD88

Survey number: Reference Datum: GROUND LEVEL

| Wellbore           | 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       | Will this well produce from this |
|--------------------|----------|--------------|----------|--------------|------|-------|---------|-------------------|---------------|---------------------|----------|-------------------|----------|------------|-----------------|---------------|-----------|-----------|----------------------------------|
| SHL<br>Leg<br>#1   | 181<br>3 | FSL          | 157<br>4 | FEL          | 25S  | 30E   | 20      | Aliquot<br>NWSE   | 32.11330<br>2 | -<br>103.8998<br>83 | EDD<br>Y | NEW<br>MEXI<br>CO | —        |            | NMLC0<br>64894A |               |           |           | Y                                |
| KOP<br>Leg<br>#1   | 181<br>3 | FSL          | 157<br>4 | FEL          | 25S  | 30E   | 20      | Aliquot<br>NWSE   | 32.11330<br>2 | -<br>103.8998<br>83 | EDD<br>Y | MEXI              |          |            | NMLC0<br>64894A | -<br>624<br>5 | 100<br>63 | 944<br>3  | Υ                                |
| PPP<br>Leg<br>#1-1 | 100      | FSL          | 134<br>4 | FEL          | 25S  | 30E   | 20      | Aliquot<br>SWSE   | 32.10859<br>7 | -<br>103.8991<br>49 | EDD<br>Y | NEW<br>MEXI<br>CO |          |            | NMLC0<br>64894A | -<br>696<br>1 | 112<br>00 | 101<br>59 | Y                                |

Released to Imaging: 6/13/2025 10:38:32 AM

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Well Name: POKER LAKE UNIT 20-8 BD Well Number: 207H

| Wellbore          | 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       | Will this well produce<br>from this |
|-------------------|----------|--------------|----------|--------------|------|-------|---------|-------------------|---------------|---------------------|--------|-------------------|-------------------|------------|--------------|---------------|-----------|-----------|-------------------------------------|
| EXIT<br>Leg<br>#1 | 256<br>2 | FSL          | 134<br>8 | FEL          | 25S  | 30E   |         | Aliquot<br>NWSE   | 32.14461<br>5 | -<br>103.8991<br>73 |        | NEW<br>MEXI<br>CO | NEW<br>MEXI<br>CO | S          | STATE        | -<br>696<br>1 | 242<br>90 | 101<br>59 | Υ                                   |
| BHL<br>Leg<br>#1  | 265<br>2 | FSL          | 134<br>8 | FEL          | 25S  | 30E   |         | Aliquot<br>NWSE   | 32.14486<br>2 | -<br>103.8991<br>73 |        | NEW<br>MEXI<br>CO | NEW<br>MEXI<br>CO | S          | STATE        | -<br>696<br>1 | 243<br>80 | 101<br>59 | Υ                                   |

Note: No allowable will be assigned to this completion until all interests have been consolidated or a non-standard unit has been approved by the division.

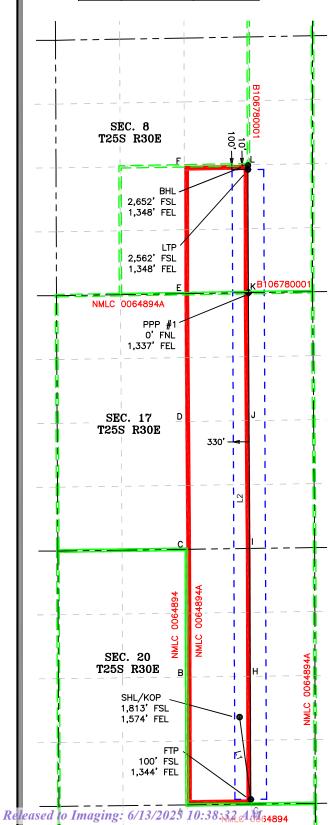
TIM C. PAPPAS 21209

7/12/2024

Email Address



|      | LINE TABL   | E          |
|------|-------------|------------|
| LINE | AZIMUTH     | LENGTH     |
| L1   | 172 12'28"  | 1,726.63'  |
| L2   | 359° 44'12" | 13,192.64' |



|         | COORDINATE TABLE SHL/KOP (NAD 83 NME) FTP (NAD 83 NME) |      |         |                 |     |  |  |  |  |  |  |  |
|---------|--|------|---------|-----------------|-----|--|--|--|--|--|--|--|
| SHL/I   | KOP (NAD 83  | NME) | F       | TP (NAD 83 NM   | E)  |  |  |  |  |  |  |  |
| Y =     | 405,225.4  | N    | Y =     | 403,514.7       | N   |  |  |  |  |  |  |  |
| X =     | 675,537.0  | Е    | X =     | 675,771.1       | Е   |  |  |  |  |  |  |  |
| LAT. =  | 32.113302  | °N   | LAT. =  | 32.108597       | °N  |  |  |  |  |  |  |  |
| LONG. = | 103.899883   | °W   | LONG. = | 103.899149      | °W  |  |  |  |  |  |  |  |
| LT      | P (NAD 83 NN   | 1E)  | ВІ      | HL (NAD 83 NM   | E)  |  |  |  |  |  |  |  |
| Y =     | 416,617.2  | N    | Y =     | 416,707.2       | N   |  |  |  |  |  |  |  |
| X =     | 675,710.8  | Е    | X =     | 675,710.5       | Е   |  |  |  |  |  |  |  |
| LAT. =  | 32.144615  | °N   | LAT. =  | 32.144862       | °N  |  |  |  |  |  |  |  |
| LONG. = | 103.899173   | °W   | LONG. = | 103.899173      | °W  |  |  |  |  |  |  |  |
| SHL/I   | KOP (NAD 27  | NME) |         | ΓP (NAD 27 NM   | E)  |  |  |  |  |  |  |  |
| Y =     | 405,167.0  | Z    | Y =     | 403,456.4       | Z   |  |  |  |  |  |  |  |
| X =     | 634,352.1  | Е    | X =     | 634,586.2       | Е   |  |  |  |  |  |  |  |
| LAT. =  | 32.113177  | °N   | LAT. =  | 32.108472       | °N  |  |  |  |  |  |  |  |
| LONG. = | 103.899400   | °W   | LONG. = | 103.898666      | °W  |  |  |  |  |  |  |  |
| LT      | P (NAD 27 NM   | 1E)  | ВІ      | HL (NAD 27 NM   | E)  |  |  |  |  |  |  |  |
| Y =     | 416,558.5  | Ν    | Y =     | 416,648.5       | Ν   |  |  |  |  |  |  |  |
| X =     | 634,526.3  | Ш    | X =     | 634,526.0       | Ш   |  |  |  |  |  |  |  |
| LAT. =  | 32.144490  | °N   | LAT. =  | 32.144737       | °N  |  |  |  |  |  |  |  |
| LONG. = | 103.898689   | °W   | LONG. = | 103.898689      | °W  |  |  |  |  |  |  |  |
| PPP     | #1 (NAD 83 N   | ME)  | PPI     | P #1 (NAD 27 NI | ME) |  |  |  |  |  |  |  |
| Y =     | 414,055.5  | Ν    | Y =     | 413,996.9       | Ν   |  |  |  |  |  |  |  |
| X =     | 675,722.6  | Е    | X =     | 634,538.0       | Е   |  |  |  |  |  |  |  |
| LAT. =  | 32.137573  | °N   | LAT. =  | 32.137448       | °N  |  |  |  |  |  |  |  |
| LONG. = | 103.899169   | °W   | LONG. = | 103.898684      | °W  |  |  |  |  |  |  |  |

| <u>C</u> ( | ORNER COO | RDII | NATES (N | NAD83 NME) |   |
|------------|-----------|------|----------|------------|---|
| A - Y =    | 403,398.9 | Ζ    | A - X =  | 674,444.4  | Е |
| B - Y =    | 406,057.8 | Ν    | B - X =  | 674,435.7  | Е |
| C - Y =    | 408,716.9 | N    | C - X =  | 674,426.9  | Е |
| D - Y =    | 411,375.4 | N    | D - X =  | 674,407.3  | Е |
| E - Y =    | 414,034.7 | Ν    | E - X =  | 674,387.7  | Е |
| F-Y=       | 416,694.9 | Ζ    | F - X =  | 674,383.2  | Е |
| G - Y =    | 403,414.8 | N    | G - X =  | 675,779.8  | Е |
| H - Y =    | 406,074.3 | Ν    | H - X =  | 675,772.5  | Е |
| I-Y=       | 408,734.6 | N    | I - X =  | 675,765.0  | Е |
| J - Y =    | 411,394.4 | Ν    | J - X =  | 675,744.5  | Е |
| K - Y =    | 414,055.5 | Z    | K - X =  | 675,723.4  | Е |
| L - Y =    | 416,717.4 | Ν    | L - X =  | 675,720.8  | Е |
| <u>C</u> ( | ORNER COO | RDI  | NATES (N | NAD27 NME) |   |
| A - Y =    | 403,340.6 | N    | A - X =  | 633,259.5  | Е |
| B - Y =    | 405,999.4 | Ν    | B - X =  | 633,250.9  | Е |
| C - Y =    | 408,658.4 | Ν    | C - X =  | 633,242.2  | Е |
| D - Y =    | 411,316.9 | N    | D - X =  | 633,222.7  | Е |
| E-Y=       | 413,976.1 | Ν    | E - X =  | 633,203.2  | Е |
| F - Y =    | 416,636.2 | N    | F - X =  | 633,188.7  | Е |
| G - Y =    | 403,356.5 | N    | G - X =  | 634,594.9  | Е |
| H - Y =    | 406,015.9 | Ν    | H - X =  | 634,587.6  | Е |
| I-Y=       | 408,676.1 | N    | I - X =  | 634,580.2  | Е |
| J - Y =    | 411,335.9 | Ν    | J - X =  | 634,559.9  | Е |
| K - Y =    | 413,996.9 | N    | K - X =  | 634,538.8  | Е |
| L - Y =    | 416,658.7 | N    | L - X =  | 634,536.3  | Е |

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

APD ID: 10400100973

Submission Date: 09/23/2024

Highlighted data reflects the most

recent changes

Operator Name: XTO PERMIAN OPERATING LLC

Well Name: POKER LAKE UNIT 20-8 BD Well Number: 207H

**Show Final Text** Well Type: OIL WELL Well Work Type: Drill

# **Section 1 - Geologic Formations**

| Formation ID | Formation Name  | Elevation | True Vertical | Measured<br>Depth | Lithologies             | Mineral Resources                              | Producing<br>Formatio |
|--------------|-----------------|-----------|---------------|-------------------|-------------------------|--|-----------------------|
| 15611107     | QUATERNARY      | 3198      | 0             | 0                 | ALLUVIUM                | USEABLE WATER                                  | N                     |
| 15611108     | RUSTLER         | 2322      | 876           | 876               | ANHYDRITE,<br>SANDSTONE | USEABLE WATER                                  | N                     |
| 15611109     | SALADO          | 2181      | 1017          | 1017              | SALT                    | NONE   | N                     |
| 15611110     | BASE OF SALT    | -284      | 3482          | 3482              | SALT                    | NONE   | N                     |
| 15611111     | DELAWARE        | -481      | 3679          | 3679              | LIMESTONE,<br>SANDSTONE | NATURAL GAS, OIL,<br>OTHER: Produced<br>Water  | N                     |
| 15611112     | BRUSHY CANYON   | -2998     | 6196          | 6196              | SANDSTONE               | NATURAL GAS, OIL,<br>OTHER: Produced<br>Water  | N                     |
| 15611113     | BONE SPRING     | -4307     | 7505          | 7505              | LIMESTONE,<br>SANDSTONE | NATURAL GAS, OIL,<br>OTHER: Produced<br>Water  | Y                     |
| 15611118     | BONE SPRING 1ST | -5040     | 8238          | 8238              | LIMESTONE,<br>SANDSTONE | NATURAL GAS, OIL,<br>OTHER: Produced<br>Water  | Y                     |
| 15611114     | BONE SPRING 2ND | -5519     | 8717          | 8717              | LIMESTONE,<br>SANDSTONE | NATURAL GAS, OIL,<br>OTHER: Produced<br>Water  | Y                     |
| 15611117     | BONE SPRING 3RD | -6391     | 9589          | 9589              | LIMESTONE,<br>SANDSTONE | NATURAL GAS, OIL,<br>OTHER: Produced<br>Water  | Y                     |
| 15611119     | BONE SPRING 3RD | -6761     | 9959          | 9959              | LIMESTONE,<br>SANDSTONE | NATURAL GAS, OIL,<br>OTHER : Produced<br>Water | Y                     |

#### **Section 2 - Blowout Prevention**

Pressure Rating (PSI): 5M Rating Depth: 10159

Equipment: Once the permanent WH is installed on the surface casing, the BOP equipment will have a 5M Hydril Annular & a 10M Triple Ram BOP. XTO will use a Multi-Bowl System which is attached

Requesting Variance? YES

Variance request: XTO requests a variance to allow the use of a flex hose. See attached. XTO requests a variance to be able to batch drill this well if necessary. XTO requests a variance to utilize a spudder rig. See attached. XTO requests a break test variance. See attached.

Testing Procedure: All BOP testing will be done by an independent service company. Operator will test as per 43 CFR 3172.

#### **Choke Diagram Attachment:**

Poker\_Lake\_Unit\_20\_17\_\_\_20\_8\_BD\_\_10MCM\_20250319081608.pdf

#### **BOP Diagram Attachment:**

Poker\_Lake\_Unit\_20\_17\_\_\_20\_8\_BD\_\_5M10M\_BOP\_20250319081645.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<br>length MD | Grade     | Weight | Joint Type                  | Collapse SF | Burst SF | Joint SF Type | Joint SF  | Body SF Type | Body SF   |
|-----------|------------------|-----------|----------|-----------|------------|----------------|------------|---------------|-------------|----------------|-------------|----------------|--------------------------------|-----------|--------|-----------------------------|-------------|----------|---------------|-----------|--------------|-----------|
| 1         | SURFACE          | 12.2<br>5 | 9.625    | NEW       | API        | N              | 0          | 976           | 0           | 976            | 3198        | 2222           | 976                            | J-55      | 40     | BUTT                        | 6.45        | 1.33     | DRY           | 16.1<br>4 | DRY          | 16.1<br>4 |
| 2         | INTERMED<br>IATE | 8.75      | 7.625    | NEW       | API        | Υ              | 0          | 9863          | 0           | 9245           | 3198        | -6047          | 9863                           | L-80      | 29.7   | FJ                          | 1.93        | 2.18     | DRY           | 2.33      | DRY          | 2.33      |
| 3         | PRODUCTI<br>ON   | 6.75      | 5.5      | NEW       | NON<br>API | Υ              | 0          | 24380         | 0           | 10159          | 3198        | -6961          | 24380                          | P-<br>110 |        | OTHER -<br>TPN/Wedge<br>441 | 2.06        | 1.05     | DRY           | 2.03      | DRY          | 2.03      |

#### **Casing Attachments**

Casing ID: 1 String SURFACE

**Inspection Document:** 

**Spec Document:** 

**Tapered String Spec:** 

**Casing Design Assumptions and Worksheet(s):** 

#### **Casing Attachments**

Casing ID: 2

String

**INTERMEDIATE** 

**Inspection Document:** 

**Spec Document:** 

**Tapered String Spec:** 

**Casing Design Assumptions and Worksheet(s):** 

Casing ID: 3

String

**PRODUCTION** 

**Inspection Document:** 

#### **Spec Document:**

TPN\_\_5.500\_20.00\_0.361\_P110\_ICY\_20250319081916.pdf
Wedge\_441\_\_5.500\_\_20.00\_0.361\_P110\_ICY\_20250319081915.pdf

#### **Tapered String Spec:**

Poker\_Lake\_Unit\_20\_8\_BD\_207H\_Csg\_20250319081954.pdf

#### Casing Design Assumptions and Worksheet(s):

Poker\_Lake\_Unit\_20\_8\_BD\_207H\_Csg\_20250319082019.pdf

### **Section 4 - Cement**

| String Type  | Lead/Tail | Stage Tool<br>Depth | Тор МD | Bottom MD | Quantity(sx) | Yield | Density | Cu Ft | Excess% | Cement type         | Additives |
|--------------|-----------|---------------------|--------|-----------|--------------|-------|---------|-------|---------|---------------------|-----------|
| SURFACE      | Lead      |                     | 0      | 976       | 220          | 1.87  | 10.5    | 411.4 | 100     | EconoCem-<br>HLTRRC | NA        |
| SURFACE      | Tail      |                     | 0      | 976       | 130          | 1.35  | 14.8    | 175.5 | 100     | Class C             | 2%cacl    |
| INTERMEDIATE | Lead      |                     | 0      | 6196      | 340          | 1.35  | 14.8    | 459   | 100     | Class C             | NA        |
| INTERMEDIATE | Tail      |                     | 6196   | 9863      | 700          | 1.33  | 14.8    | 931   | 100     | Class C             | NA        |

| String Type | Lead/Tail | Stage Tool<br>Depth | Top MD    | Bottom MD | Quantity(sx) | Yield | Density | Cu Ft      | Excess% | Cement type | Additives |
|-------------|-----------|---------------------|-----------|-----------|--------------|-------|---------|------------|---------|-------------|-----------|
| PRODUCTION  | Lead      |                     | 9563      | 1006<br>3 | 20           | 2.69  | 11.5    | 53.8       | 30      | NeoCem      | NA        |
| PRODUCTION  | Tail      |                     | 1006<br>3 | 2438<br>0 | 1020         | 1.51  | 13.2    | 1540.<br>2 | 30      | VersaCem    | NA        |

# **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 43 CFR 3172:

Diagram of the equipment for the circulating system in accordance with 43 CFR 3172:

**Describe what will be on location to control well or mitigate other conditions:** The necessary mud products for weight addition and fluid loss control will be on location at all times.

Describe the mud monitoring system utilized: Spud with fresh water/native mud. Drill out from under surface casing with Saturated Salt solution. Saturated Salt mud will be used while drilling through the salt formation. Use fibrous materials as needed to control seepage and lost circulation. Pump viscous sweeps as needed for hole cleaning. Pump speed will be recorded on a daily drilling report after mudding up. A Pason or Totco will be used to detect changes in loss or gain of mud volume. A mud test will be performed every 24 hours to determine: density, viscosity, strength, filtration and pH as necessary. Use available solids controls equipment to help keep mud weight down after mud up. Rig up solids control equipment to operate as a closed loop system.

## **Circulating Medium Table**

| Top Depth | Bottom Depth | Mud Type           | Min Weight (lbs/gal) | Max Weight (lbs/gal) | Density (lbs/cu ft) | Gel Strength (lbs/100 sqft) | НА | Viscosity (CP) | Salinity (ppm) | Filtration (cc) | Additional Characterístics |
|-----------|--------------|--------------------|----------------------|----------------------|---------------------|-----------------------------|----|----------------|----------------|-----------------|----------------------------|
| 0         | 976          | WATER-BASED<br>MUD | 8.4                  | 8.9                  |                     |                             |    |                |                |                 |                            |
| 976       | 3679         | SALT<br>SATURATED  | 10.5                 | 11                   |                     |                             |    |                |                |                 |                            |
| 3679      | 9863         | OTHER :<br>BDE/OBM | 9                    | 9.5                  |                     |                             |    |                |                |                 |                            |
| 9863      | 2438<br>0    | OIL-BASED<br>MUD   | 10.2                 | 10.7                 |                     |                             |    |                |                |                 |                            |

#### Section 6 - Test, Logging, Coring

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

Open hole logging will not be done on this well.

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

CEMENT BOND LOG,GAMMA RAY LOG,DIRECTIONAL SURVEY,MEASUREMENT WHILE DRILLING,MUD LOG/GEOLOGICAL LITHOLOGY LOG,

Coring operation description for the well:

No coring is planned for the well.

#### **Section 7 - Pressure**

Anticipated Bottom Hole Pressure: 5652 Anticipated Surface Pressure: 3417

**Anticipated Bottom Hole Temperature(F):** 185

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

Describe:

**Contingency Plans geoharzards description:** 

Contingency Plans geohazards

Hydrogen Sulfide drilling operations plan required? YES

Hydrogen sulfide drilling operations

XTO\_Energy\_H2S\_Plan\_Updated\_20240827123524.pdf

#### Section 8 - Other Information

Proposed horizontal/directional/multi-lateral plan submission:

Poker Lake Unit 20 8 BD 207H DD 20240912030840.pdf

Other proposed operations facets description:

Other proposed operations facets attachment:

Poker\_Lake\_Unit\_20\_8\_BD\_207H\_Cmt\_20240912030944.pdf

Poker\_Lake\_Unit\_20\_17\_\_\_20\_8\_BD\_MBS\_9.625\_x\_7.625\_3String\_20240827131502.pdf

NGMPForm\_PLU\_20\_17\_20\_8\_BD\_\_\_18\_19\_\_\_18\_30\_20240911063348.pdf

POKER\_LAKE\_UNIT\_20\_17\_\_\_20\_8\_BD\_H2S\_DIA\_PAD\_B\_\_\_PAD\_D\_Combined\_20250319082303.pdf

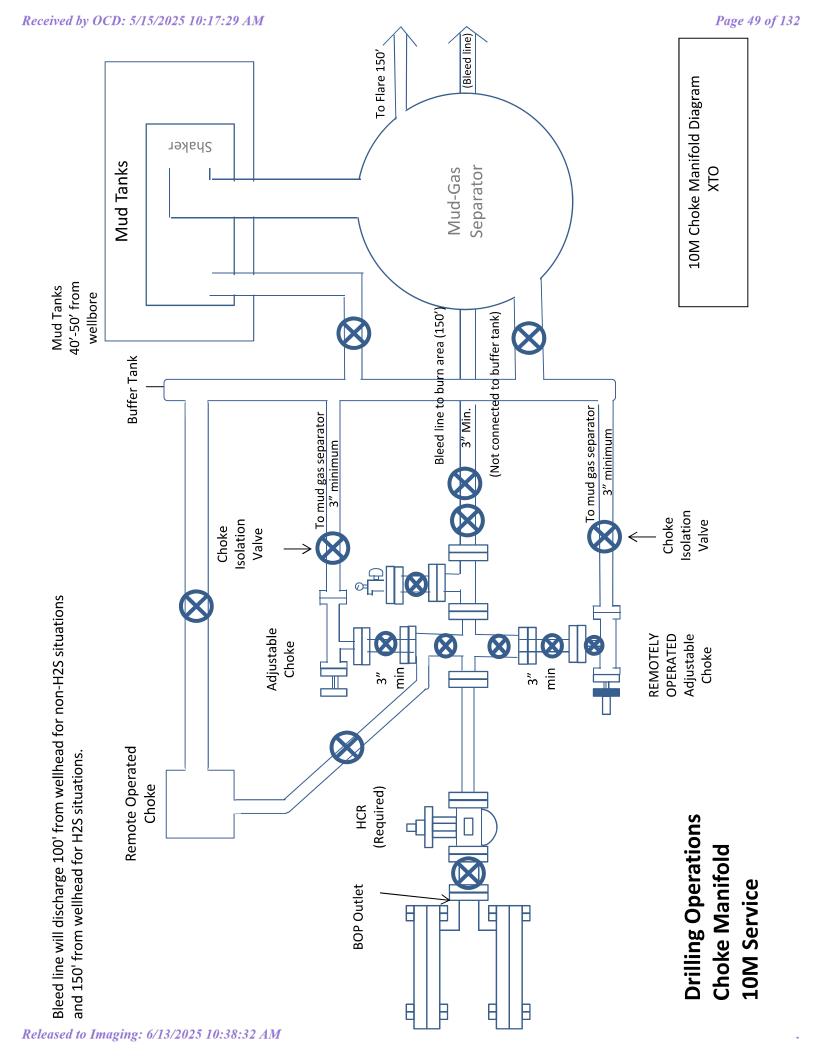
Other Variance request(s)?:

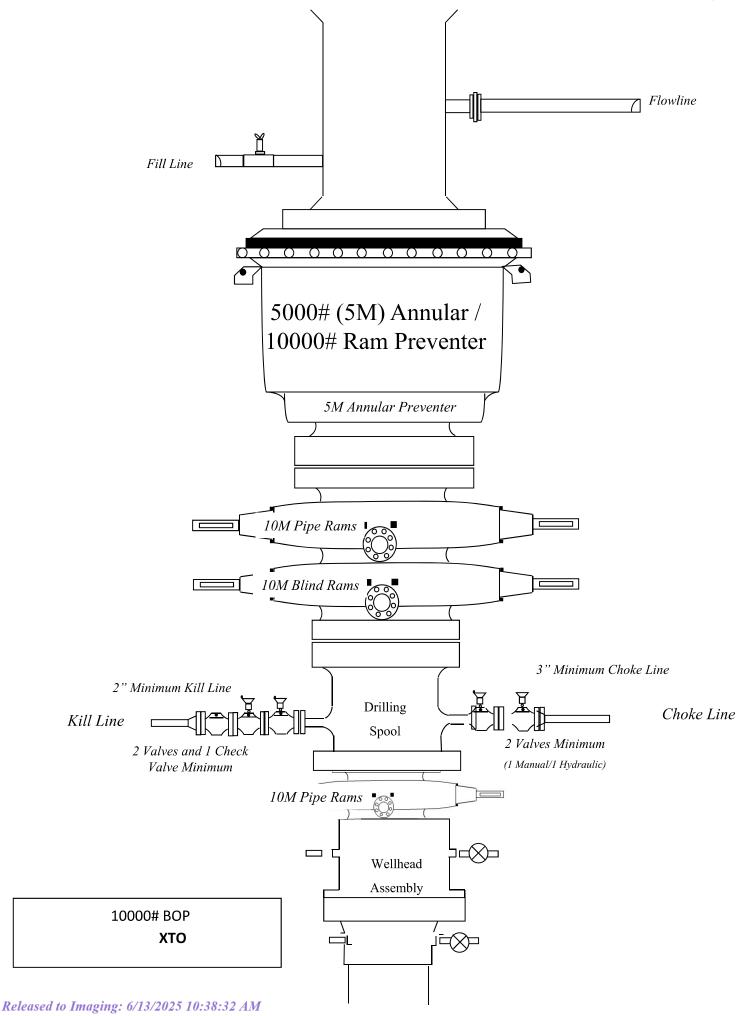
Other Variance attachment:

BOP\_Break\_Test\_Variance\_20240827131930.pdf

Flex\_Hose\_Updated\_20240827131622.pdf

Poker\_Lake\_Unit\_20\_17\_\_\_20\_8\_BD\_\_OLCV\_20240827131923.pdf Spudder\_Rig\_Request\_20240827131622.pdf





# TenarisHydril Wedge



Coupling

Pipe Body

Page 51 of 132

Grade: P110-ICY Body: White 1st Band: Pale Green 2nd Band: -

3rd Band: -

Grade: P110-ICY 1st Band: White 2nd Band: Pale Green 3rd Band: Pale Green

4th Band: -

5th Band: -6th Band: -

| Outside Diameter     | 5.500 in. | Wall Thickness  | 0.361 in.    | Grade | P110-ICY |
|----------------------|-----------|-----------------|--------------|-------|----------|
| Min. Wall Thickness  | 87.50 %   | Pipe Body Drift | API Standard | Туре  | Casing   |
| Connection OD Option | REGULAR   |                 |              |       |          |

#### Pipe Body Data

| Geometry       |             |                  |             |
|----------------|-------------|------------------|-------------|
| Nominal OD     | 5.500 in.   | Wall Thickness   | 0.361 in.   |
| Nominal Weight | 20.00 lb/ft | Plain End Weight | 19.83 lb/ft |
| Drift          | 4.653 in.   | OD Tolerance     | API         |
| Nominal ID     | 4.778 in.   |                  |             |

| Performance                  |              |
|------------------------------|--------------|
| Body Yield Strength          | 729 x1000 lb |
| Min. Internal Yield Pressure | 14,360 psi   |
| SMYS                         | 125,000 psi  |
| Collapse Pressure            | 12,300 psi   |

#### **Connection Data**

| 5.852 in. |
|-----------|
| 8.714 in. |
| 4.778 in. |
| 3.780 in. |
| 3.40      |
| Regular   |
|           |

| Performance                |                |
|----------------------------|----------------|
| Tension Efficiency         | 81.50 %        |
| Joint Yield Strength       | 594 x1000 lb   |
| Internal Pressure Capacity | 14,360 psi     |
| Compression Efficiency     | 81.50 %        |
| Compression Strength       | 594 x1000 lb   |
| Max. Allowable Bending     | 84.76 °/100 ft |
| External Pressure Capacity | 12,300 psi     |

| Make-Up Torques         |              |
|-------------------------|--------------|
| Minimum                 | 15,000 ft-lb |
| Optimum                 | 16,000 ft-lb |
| Maximum                 | 19,200 ft-lb |
| Operation Limit Torques |              |
| Operating Torque        | 36,000 ft-1b |
| Yield Torque            | 42,000 ft-lb |
| Buck-On                 |              |
| Minimum                 | 19,200 ft-lb |
| Maximum                 | 20,700 ft-1b |
|                         |              |

#### Notes

This connection is fully interchangeable with: Wedge 441 $\oplus$  -5.5 in. - 0.304 (17.00) in. (lb/ft) Wedge 461 $\oplus$  -5.5 in. - 0.304 (17.00) / 0.361 (20.00) / 0.415 (23.00) in. (lb/ft) Connections with Dopeless  $\oplus$  Technology are fully compatible with the same connection in its doped version

For the lastest performance data, always visit our website: www.tenaris.com
For further information on concepts indicated in this datasheet, download the Datasheet Manual from www.tenaris.com

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Coupling

Pipe Body

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Grade: P110-ICY Body: White 1st Band: Pale Green 2nd Band: -3rd Band: -

Grade: P110-ICY 1st Band: White 2nd Band: Pale Green 3rd Band: Pale Green

4th Band: -

| 5th | Band: | - |
|-----|-------|---|
| 6th | Band: | _ |

| Customer             | XTO ENERGY INC. | Wall Thickness  | 0.361 in.    | Grade | P110-JCY |
|----------------------|-----------------|-----------------|--------------|-------|----------|
| Outside Diameter     | 5.500 in.       | Pipe Body Drift | API Standard | Туре  | Casing   |
| Min. Wall Thickness  | 87.50 %         |                 |              |       |          |
| Connection OD Option | REGULAR         |                 |              |       |          |

#### Pipe Body Data

| Geometry       |             |                  |             |
|----------------|-------------|------------------|-------------|
| Nominal OD     | 5.500 in.   | Wall Thickness   | 0.361 in.   |
| Nominal Weight | 20.00 lb/ft | Plain End Weight | 19.83 lb/ft |
| Drift          | 4.653 in.   | OD Tolerance     | API         |
| Nominal ID     | 4.778 in.   |                  |             |

| Performance                  |              |
|------------------------------|--------------|
| Body Yield Strength          | 729 x1000 lb |
| Min. Internal Yield Pressure | 14,360 psi   |
| SMYS                         | 125,000 psi  |
| Collapse Pressure            | 12,300 psi   |

#### **Connection Data**

| Geometry             |           |
|----------------------|-----------|
| Connection OD        | 6.300 in. |
| Coupling Length      | 8.408 in. |
| Connection ID        | 4.778 in. |
| Make-up Loss         | 4.204 in. |
| Threads per inch     | 5         |
| Connection OD Option | Regular   |
|                      |           |

| 100 %        |
|--------------|
| 729 x1000 lb |
| 14,360 psi   |
| 100 %        |
| 729 x1000 lb |
| 104 °/100 ft |
| 12,300 psi   |
|              |

| Make-Up Torques         |              |
|-------------------------|--------------|
| Minimum                 | 21,100 ft-lb |
| Optimum                 | 22,600 ft-lb |
| Maximum                 | 24,100 ft-lb |
| Operation Limit Torques |              |
| Operating Torque        | 29,300 ft-1b |
| Yield Torque            | 32,500 ft-lb |
|                         |              |

#### Notes

For the lastest performance data, always visit our website: www.tenaris.com
For further information on concepts indicated in this datasheet, download the Datasheet Manual from www.tenaris.com

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PI-0/CII-3

# **Casing Assumptions**

#### Casing Design

| Hole Size | Depth                   | OD Csg | Weight | Grade    | Collar      | New/Used | SF<br>Burst | SF<br>Collapse | SF<br>Tension |
|-----------|-------------------------|--------|--------|----------|-------------|----------|-------------|----------------|---------------|
| 12.25     | 0' – 976'               | 9.625  | 40     | J-55     | втс         | New      | 1.33        | 6.45           | 16.14         |
| 8.75      | 0' - 4000'              | 7.625  | 29.7   | RY P-110 | Flush Joint | New      | 3.00        | 2.57           | 1.90          |
| 8.75      | 4000' –<br>9863.09'     | 7.625  | 29.7   | HC L-80  | Flush Joint | New      | 2.18        | 1.93           | 2.33          |
| 6.75      | 0' - 9763.09'           | 5.5    | 20     |          |             | New      | 1.05        | 2.14           | 2.03          |
| 6.75      | 9763.09' -<br>24380.33' | 5.5    | 20     | П        |             | New      | 1.05        | 2.06           | 2.03          |

# **Casing Assumptions**

#### Casing Design

| Hole Size | Depth                   | OD Csg | Weight | Grade    | Collar      | New/Used | SF<br>Burst | SF<br>Collapse | SF<br>Tension |
|-----------|-------------------------|--------|--------|----------|-------------|----------|-------------|----------------|---------------|
| 12.25     | 0' – 976'               | 9.625  | 40     | J-55     | втс         | New      | 1.33        | 6.45           | 16.14         |
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| 6.75      | 0' - 9763.09'           | 5.5    | 20     |          |             | New      | 1.05        | 2.14           | 2.03          |
| 6.75      | 9763.09' -<br>24380.33' | 5.5    | 20     | п        |             | New      | 1.05        | 2.06           | 2.03          |



# **HYDROGEN SULFIDE (H2S) CONTINGENCY PLAN**

# **Assumed 100 ppm ROE = 3000'**

100 ppm H2S concentration shall trigger activation of this plan.

#### **Emergency Procedures**

In the event of a release of gas containing H<sub>2</sub>S, the first responder(s) must

- Isolate the area and prevent entry by other persons into the 100 ppm ROE.
- Evacuate any public places encompassed by the 100 ppm ROE.
- Be equipped with H<sub>2</sub>S monitors and air packs in order to control the release.
- Use the "buddy system" to ensure no injuries occur during the response
- Take precautions to avoid personal injury during this operation.
- Contact operator and/or local officials to aid in operation. See list of phone numbers attached.
- Have received training in the
  - o Detection of H<sub>2</sub>S, and
  - o Measures for protection against the gas,
  - o Equipment used for protection and emergency response.

#### Ignition of Gas source

Should control of the well be considered lost and ignition considered, take care to protect against exposure to Sulfur Dioxide (SO<sub>2</sub>). Intentional ignition must be coordinated with the NMOCD and local officials. Additionally, the NM State Police may become involved. NM State Police shall be the Incident Command on scene of any major release. Take care to protect downwind whenever this is an ignition of the gas.

Characteristics of H<sub>2</sub>S and SO<sub>2</sub>

| o i i ai ao coi i o ci c | 00 01 1120 an       | u 002            |                 |                 |                      |
|--------------------------|---------------------|------------------|-----------------|-----------------|----------------------|
| Common Name              | Chemical<br>Formula | Specific Gravity | Threshold Limit | Hazardous Limit | Lethal Concentration |
| Hydrogen Sulfide         | H <sub>2</sub> S    | 1.189 Air = I    | 10 ppm          | 100 ppm/hr      | 600 ppm              |
| Sulfur Dioxide           | SO <sub>2</sub>     | 2.21 Air = I     | 2 ppm           | N/A             | 1000 ppm             |

#### **Contacting Authorities**

All XTO location personnel must liaison with local and state agencies to ensure a proper response to a major release. Additionally, the OCD must be notified of the release as soon as possible but no later than 4 hours. Agencies will ask for information such as type and volume of release, wind direction, location of release, etc. Be prepared with all information available including directions to site. The following call list of essential and potential responders has been prepared for use during a release. (Operator Name)'s response must be in coordination with the State of New Mexico's "Hazardous Materials Emergency Response Plan" (HMER).

# **CARLSBAD OFFICE – EDDY & LEA COUNTIES**

| 3104 E. Greene St., Carlsbad, NM 88220<br>Carlsbad, NM  | 575-887-7329  |
|---|---|
| XTO PERSONNEL: Will Dacus, Drilling Manager Brian Dunn, Drilling Supervisor Robert Bartels, Construction Execution Planner Andy Owens, EH & S Manager Frank Fuentes, Production Foreman | 832-948-5021<br>832-653-0490<br>406-478-3617<br>903-245-2602<br>575-689-3363        |
| SHERIFF DEPARTMENTS:  |   |
| Eddy County<br>Lea County   | 575-887-7551<br>575-396-3611  |
| NEW MEXICO STATE POLICE:  | 575-392-5588  |
| FIRE DEPARTMENTS: Carlsbad Eunice Hobbs Jal Lovington   | 911<br>575-885-2111<br>575-394-2111<br>575-397-9308<br>575-395-2221<br>575-396-2359 |
| HOSPITALS: Carlsbad Medical Emergency Eunice Medical Emergency Hobbs Medical Emergency Jal Medical Emergency Lovington Medical Emergency  | 911<br>575-885-2111<br>575-394-2112<br>575-397-9308<br>575-395-2221<br>575-396-2359 |
| AGENT NOTIFICATIONS: For Lea County: Bureau of Land Management – Hobbs New Mexico Oil Conservation Division – Hobbs   | 575-393-3612<br>575-393-6161  |
| For Eddy County: Bureau of Land Management - Carlsbad New Mexico Oil Conservation Division - Artesia  | 575-234-5972<br>575-748-1283  |

Semi-minor

Semi-minor

Semi-major

Magnitude

Vertical

Lateral

TVD Highside

Poker Lake Unit 20-8 BD 207H

Position Uncertainty

Measured

# Well Plan Report - Poker Lake Unit 20-8 BD 207H

Well Plan Report

| <sup>9/24</sup> , 3:35 PM<br>Well Plan Report - Poker Lake Unit 2 | 24380.33 ft     | 10159.00 ft |          | New Mexico East -<br>NAD 27    | 405167.00 ft | 634352.10 ft | 3230.00 ft | 3198.00 ft    | Grid             | 0.23 Deg           |
|---|-----------------|-------------|----------|--------------------------------|--------------|--------------|------------|---------------|------------------|--------------------|
| 7/29/24, 3:35 PM Well Plan Report                                 | Measured Depth: | TVD RKB:    | Location | Cartographic Reference System: | Northing:    | Easting:     | RKB:       | Ground Level: | North Reference: | Convergence Angle: |

| Plan Sections | Pol         | Poker Lake Unit 20-8 BD | 8 BD 207H |          |            |             |             |                    |       |
|---------------|-------------|-------------------------|-----------|----------|------------|-------------|-------------|--------------------|-------|
| Measured      |             |                         | DVT       |          |            | Build       | Turn        | Dogleg             |       |
| Depth         | Inclination | Azimuth                 | RKB       | Y Offset | X Offset   | Rate        | Rate        | Rate               |       |
| (ft)          | (Deg)       | (Deg)                   | (#)       | (ff)     | ( <b>t</b> | (Deg/100ft) | (Deg/100ft) | (Deg/100ft) Target | rget  |
| 00:00         | 00.00       | 00.00                   | 0.00      | 00.00    | 00.00      | 0.00        | 0.00        | 0.00               |       |
| 1100.00       | 00.00       | 00.00                   | 1100.00   | 00.00    | 00.00      | 0.00        | 0.00        | 00.00              |       |
| 2723.66       | 32.47       | 174.41                  | 2638.12   | -445.80  | 43.61      | 2.00        | 0.00        | 2.00               |       |
| 5596.63       | 32.47       | 174.41                  | 5061.88   | -1980.99 | 193.77     | 00.00       | 0.00        | 00'0               |       |
| 7220.29       | 00.00       | 00.00                   | 00'0099   | -2426 79 | 237.37     | -2.00       | 0.00        | 2.00               |       |
| 10063.09      | 00.00       | 00.00                   | 9442.80   | -2426.79 | 237.37     | 00.00       | 0.00        | 0.00               |       |
| 11188.09      | 00.06       | 359.74                  | 10159.00  | -1710.60 | 234.10     | 8.00        | 0.00        | 8.00 FTF           | FTP 7 |
| 24290.33      | 00'06       | 359.74                  | 10159.00  | 11391.50 | 174.20     | 00.00       | 0.00        | 0.00 LTP 7         | Ь 7   |
| 24380.33      | 90.00       | 359.74                  | 10159.00  | 11481.50 | 173.79     | 0.00        | 0.00        | 0.00 BHI           | BHL 7 |
|               |             |                         |           |          |            |             |             |                    |       |

|                  | Azimuth Used              | (,)       | 0.000 XOMR2_OWSG<br>MWD+IFR1+MS | 90.000 XOMR2_OWSG<br>MWD+IFR1+MS | 89.995 XOMR2_OWSG<br>MWD+IFR1+MS | 89.962 XOMR2_OWSG<br>MWD+IFR1+MS | 89.940 XOMR2_OWSG<br>MWD+IFR1+MS | 89.961 XOMR2_OWSG<br>MWD+IFR1+MS | 90.050 XOMR2_OWSG<br>MWD+IFR1+MS | 90.241 XOMR2_OWSG<br>MWD+IFR1+MS | 90.580 XOMR2_OWSG<br>MWD+IFR1+MS |
|------------------|---------------------------|-----------|---------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|
|                  | Error                     | (#J)      | 0.000                           | 0.179                            | 0.538                            | 0.896                            | 1.255                            | 1.613                            | 1.972                            | 2.330                            | 2.689                            | 3.047                            | 3.405                            | 3.764                            | 4.104                            | 4.429                            | 4.759                            | 5.093                            | 5.433                            | 5.780                            | 6.133                            |
|                  | Error                     | (ft)      | 0.000                           | 0.358                            | 0.717                            | 1.075                            | 1.434                            | 1.792                            | 2.151                            | 2.509                            | 2.868                            | 3.226                            | 3.585                            | 3.943                            | 4.284                            | 4.612                            | 4.945                            | 5.282                            | 5.622                            | 5.965                            | 6.310                            |
| n Report         | of Bias                   | (ft)      | 00000                           | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0000                             | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            |
| Well Plan Report | Error Bias                | (ft) (ft) | 0.000 0.000                     | 2.300 0.000                      | 2.309 0.000                      | 2.325 0.000                      | 2.346 0.000                      | 2.373 0.000                      | 2.405 0.000                      | 2.442 0.000                      | 2.483 0.000                      | 2.528 0.000                      | 2.578 0.000                      | 2.631 0.000                      | 2.686 0.000                      | 2.743 0.000                      | 2.801 0.000                      | 2.860 0.000                      | 2.920 0.000                      | 2.983 0.000                      | 3.049 0.000                      |
|                  | Error Bias                | (ft) (ft) | 0.000 0.000                     | 0.179 0.000                      | 0.538 0.000                      | 0.896 0.000                      | 1.255 0.000                      | 1.613 0.000                      | 1.972 0.000                      | 2.330 0.000                      | 2.689 0.000                      | 3.047 0.000                      | 3.405 0.000                      | 3.764 0.000                      | 4.106 -0.000                     | 4.431 -0.000                     | 4.761 -0.000                     | 5.095 -0.000                     | 5.435 -0.000                     | 5.782 -0.000                     | 6.135 -0.000                     |
|                  | Error Bias                | (ft) (ft) | 0.000 0.000                     | 0.358 0.000                      | 0.717 0.000                      | 1.075 0.000                      | 1.434 0.000                      | 1.792 0.000                      | 2.151 0.000                      | 2.509 0.000                      | 2.868 0.000                      | 3.226 0.000                      | 3.585 0.000                      | 3.943 0.000                      | 4.280 0.000                      | 4.601 0.000                      | 4.920 0.000                      | 5.239 0.000                      | 5.556 0.000                      | 5.871 0.000                      | 6.185 0.000                      |
|                  | RKB                       | (ft)      | 0.000                           | 100.000                          | 200.000                          | 300.000                          | 400.000                          | 200.000                          | 000.009                          | 700.000                          | 800.000                          | 900.006                          | 1000.000                         | 1100.000                         | 1199.980                         | 1299.838                         | 1399.452                         | 1498.702                         | 1597.465                         | 1695.623                         | 1793.055                         |
|                  | Azimuth                   | (0)       | 0.000                           | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 174.413                          | 174.413                          | 174.413                          | 174.413                          | 174.413                          | 174.413                          | 174.413                          |
|                  | Depth Inclination Azimuth | (0)       | 0000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 2.000                            | 4.000                            | 9.000                            | 8.000                            | 10.000                           | 12.000                           | 14.000                           |
| 7/29/24, 3:35 PM |                           | (ft)      | 0000                            | 100.000                          | 200.000                          | 300.000                          | 400.000                          | 500.000                          | 000.009                          | 700.000                          | 800.000                          | 900.006                          | 1000.000                         | 1100.000                         | 1200.000                         | 1300.000                         | 1400.000                         | 1500.000                         | 1600.000                         | 1700.000                         | 1800.000                         |
|                  | eleas                     | ed to     | Imag                            | ging: 6                          | /13/20                           | <i>25 10:</i> .                  | 38:32                            | 4M                               |                                  |                                  |                                  |                                  |                                  |                                  |                                  |                                  |                                  |                                  |                                  |                                  |                                  |

|                  | 6.494 91.152 XOMR2_OWSG<br>MWD+IFR1+MS | 6.864 92.129 XOMR2_OWSG<br>MWD+IFR1+MS | 7.244 93.930 XOMR2_OWSG<br>MWD+IFR1+MS | 7.634 97.855 XOMR2_OWSG<br>MWD+IFR1+MS | 8.033 109.903 XOMR2_OWSG<br>MWD+IFR1+MS | 8.424 -34.527 XOMR2_OWSG<br>MWD+IFR1+MS | 8.793 -16.941 XOMR2_OWSG<br>MWD+IFR1+MS | 9.159 -11.807 XOMR2_OWSG<br>MWD+IFR1+MS | 9.526 -9.581 XOMR2_OWSG<br>MWD+IFR1+MS | 9.616 -9.292 XOMR2_OWSG<br>MWD+IFR1+MS | 9.893 -8.400 XOMR2_OWSG<br>MWD+IFR1+MS | 10.259 -7.674 XOMR2_OWSG | 10.632 -7.217 XOMR2_OWSG | 11.009 -6.903 XOMR2_OWSG MWD+IFR1+MS | 11.392 -6.673 XOMR2_OWSG<br>MWD+IFR1+MS | 11.779 -6.498 XOMR2_OWSG MWD+IFR1+MS | 12.170 -6.361 XOMR2_OWSG<br>MWD+IFR1+MS | 12.565 -6.249 XOMR2_OWSG MWD+IFR1+MS | 12.963 -6.158 XOMR2_OWSG<br>MWD+IFR1+MS | 13.364 -6.081 XOMR2_OWSG |
|------------------|--|--|--|--|---|---|---|---|--|--|--|--------------------------|--------------------------|--------------------------------------|---|--------------------------------------|---|--------------------------------------|---|--------------------------|
|                  |  |  |  |  |   |   |   |   |  |  |  |                          |                          |                                      |   |                                      |   |                                      |   |                          |
|                  | 6.658                                  | 7.009                                  | 7.363                                  | 7.720                                  | 8.083                                   | 8.469                                   | 8.892                                   | 9.334                                   | 9.792                                  | 9.902                                  | 10.262                                 | 10.745                   | 11.235                   | 11.733                               | 12.237                                  | 12.747                               | 13.261                                  | 13.781                               | 14.304                                  | 14.830                   |
| Well Plan Report | 0.000                                  | 0.000                                  | 0.000                                  | 0.000                                  | 0.000                                   | 0.000                                   | 0.000                                   | 0.000                                   | 0.000                                  | 0.000                                  | 0.000                                  | 0.000                    | 0.000                    | 0.000                                | 0.000                                   | 0.000                                | 0.000                                   | 0.000                                | 0.000                                   | 0.000                    |
| Well Pla         | 3.119 0.000                            | 3.195 0.000                            | 3.277 0.000                            | 3.368 0.000                            | 3.469 0.000                             | 3.583 0.000                             | 3.712 0.000                             | 3.857 0.000                             | 4.022 0.000                            | 4.056 0.000                            | 4.209 0.000                            | 4.423 0.000              | 4.645 0.000              | 4.875 0.000                          | 5.112 0.000                             | 5.355 0.000                          | 5.604 0.000                             | 5.857 0.000                          | 6.114 0.000                             | 6.374 0.000              |
|                  | 6.496 -0.000                           | 0.000- 2.000                           | 7.247 -0.000                           | 7.639 -0.000                           | 8.042 -0.000                            | 8.458 -0.000                            | 8.888 -0.000                            | 9.332 -0.000                            | 9.791 -0.000                           | 9.901 -0.000                           | 10.261 -0.000                          | 10.744 -0.000            | 11.235 -0.000            | 11.733 -0.000                        | 12.237 -0.000                           | 12.747 -0.000                        | 13.261 -0.000                           | 13.780 -0.000                        | 14.303 -0.000                           | 14.830 -0.000            |
|                  | 6.498 0.000                            | 6.810 0.000                            | 7.121 0.000                            | 7.434 0.000                            | 7.747 0.000                             | 8.061 0.000                             | 8.377 0.000                             | 8.696 0.000                             | 9.017 0.000                            | 9.094 0.000                            | 9.427 0.000                            | 9.872 0.000              | 10.324 0.000             | 10.782 0.000                         | 11.246 0.000                            | 11.715 0.000                         | 12.188 0.000                            | 12.665 0.000                         | 13.145 0.000                            | 13.628 0.000             |
|                  | 1889.643                               | 1985.268                               | 2079.816                               | 2173.169                               | 2265.215                                | 2355.841                                | 2444.937                                | 2532.394                                | 2618.107                               | 2638.118                               | 2702.523                               | 2786.888                 | 2871.252                 | 2955.616                             | 3039.981                                | 3124.345                             | 3208.709                                | 3293.074                             | 3377.438                                | 3461.802                 |
|                  | 16.000 174.413                         | 174.413                                | 174.413                                | 174.413                                | 174.413                                 | 26.000 174.413                          | 174.413                                 | 174.413                                 | 174.413                                | 174.413                                | 174.413                                | 174.413                  | 174.413                  | 174.413                              | 174.413                                 | 174.413                              | 174.413                                 | 174.413                              | 174.413                                 | 174.413                  |
|                  | 16.000                                 | 18.000                                 | 20.000                                 | 22.000                                 | 24.000                                  | 26.000                                  | 28.000                                  | 30.000                                  | 32.000                                 | 32.473                                 | 32.473                                 | 32.473                   | 32.473                   | 32.473                               | 32.473                                  | 32.473                               | 32.473                                  | 32.473                               | 32.473                                  | 32.473                   |
| 7/29/24, 3:35 PM | 1900.000                               | 2000.000                               | 2100.000                               | 2200.000                               | 2300.000                                | 2400.000                                | 2500.000                                | 2600.000                                | 2700.000                               | 2723.658                               | 2800.000                               | 2900.000                 | 3000.000                 | 3100.000                             | 3200.000                                | 3300.000                             | 3400.000                                | 3500.000                             | 3600.000                                | 3700.000                 |

|                           | 32.473 174.413 3546.166 14.114<br>32.473 174.413 3630.531 14.603 | 0.000   | 15.359 -0.000 | Well Plan Report 6.638 0.000 0.0 | Report<br>0.000<br>0.000 | 15.360 | 13.767           | -6.015 XOMR2_OWSG<br>-6.015 MWD+IFR1+MS<br>-5.959 XOMR2_OWSG |
|---------------------------|--|---------|---------------|----------------------------------|--------------------------|--------|------------------|--|
|                           | <u> </u>   |         |               |                                  | 0.000                    | 15.892 | 14.1/3<br>14.582 | MWD+IF<br>XOMR2<br>MWD+IF                                    |
| 174.413 3799.259 15.587   | 99   | 0000 2  | 16.964 -0.000 | 7.447 0.000                      | 0000                     | 16.964 | 14.993           | -5.867 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 3883.624 16.082   | 80   | 2 0.000 | 17.503 -0.000 | 7.721 0.000                      | 0.000                    | 17.504 | 15.405           | -5.829 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 3967.988 16.578   | 2,5  | 3 0.000 | 18.045 -0.000 | 7.997 0.000                      | 0.000                    | 18.045 | 15.820           | -5.795 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 4052.352 17.076   | <u>&gt;</u>  | 9 0.000 | 18.588 -0.000 | 8.274 0.000                      | 0000                     | 18.588 | 16.236           | -5.764 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 4136.717 17.575   | 7.   | 0.000   | 19.132 -0.000 | 8.554 0.000                      | 0000                     | 19.132 | 16.654           | -5.737 XOMR2 OWSG<br>MWD+IFR1+MS                             |
| 174.413 4221.081 18.076   | )/(  | 000'0   | 19.678 -0.000 | 8.835 0.000                      | 00000                    | 19.678 | 17.073           | -5.712 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 4305.445 18.578   | 929  | 0.000   | 20.226 -0.000 | 9.118 0.000                      | 0000                     | 20.226 | 17.494           | -5.689 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 4389.810 19.081   | 91   | 0.000   | 20.774 -0.000 | 9.402 0.000                      | 00000                    | 20.774 | 17.916           | -5.668 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 4474.174 19.585   | 385  | 0.000   | 21.324 -0.000 | 000.0 789.6                      | 0.000                    | 21.324 | 18.339           | -5.649 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 4558.538 20.090   | 060  | 0.000   | 21.875 -0.000 | 9.974 0.000                      | 0.000                    | 21.875 | 18.763           | -5.631 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 4642.902 20.595   |  | 0.000   | 22.427 -0.000 | 10.262 0.000                     | 00000                    | 22.427 | 19.189           | -5.615 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 4727.267 21.102   |  | 0.000   | 22.979 -0.000 | 10.551 0.000                     | 00000                    | 22.979 | 19.615           | -5.600 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 4811.631 21.609 ( |  | 0.000   | 23.533 -0.000 | 10.841 0.000                     | 0.000                    | 23.533 | 20.042           | -5.586 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 4895.995 22.117 ( |  | 0.000   | 24.087 -0.000 | 11.132 0.000                     | 00000                    | 24.087 | 20.471           | -5.573 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 4980.360 22.626   |  | 0.000   | 24.642 -0.000 | 11.424 0.000                     | 0.000                    | 24.642 | 20.900           | -5.560 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 5061.882 23.118   | 18   | 0.000   | 25.179 -0.000 | 11.707 0.000                     | 0.000                    | 25.179 | 21.315           | -5.549 XOMR2_OWSG<br>MWD+IFR1+MS                             |
| 174.413 5064.725 23.138   | 38   | 0.000   | 25.198 -0.000 | 11.717 0.000                     | 0.000                    | 25.198 | 21.330           | -5.549 XOMR2_OWSG<br>MWD+IFR1+MS                             |

| 7/29/24, 3:35 PM |        |                |          |              |               | Well Plan Report | Report |        |        |        |                           |
|------------------|--------|----------------|----------|--------------|---------------|------------------|--------|--------|--------|--------|---------------------------|
| 5700.000         | 30.406 | 30.406 174.413 | 5150.071 | 23.724 0.000 | 25.746 -0.000 | 12.005 0.000     | 0.000  | 25.746 | 21.759 | -5.538 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 5800.000         | 28.406 | 174.413        | 5237.183 | 24.271 0.000 | 26.281 -0.000 | 12.278 0.000     | 0.000  | 26.281 | 22.186 | -5.529 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 5900.000         | 26.406 | 174.413        | 5325.955 | 24.779 0.000 | 26.800 -0.000 | 12.534 0.000     | 0.000  | 26.800 | 22.611 | -5.520 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 000.0009         | 24.406 | 174.413        | 5416.279 | 25.247 0.000 | 27.304 -0.000 | 12.773 0.000     | 0.000  | 27.304 | 23.033 | -5.511 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 6100.000         | 22.406 | 22.406 174.413 | 5508.046 | 25.673 0.000 | 27.791 -0.000 | 12.995 0.000     | 0.000  | 27.791 | 23.450 | -5.504 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 6200.000         | 20.406 | 174.413        | 5601.143 | 26.057 0.000 | 28.261 -0.000 | 13.201 0.000     | 0.000  | 28.261 | 23.861 | -5.496 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 6300.000         | 18.406 | 174.413        | 5695.458 | 26.397 0.000 | 28.713 -0.000 | 13.391 0.000     | 0.000  | 28.713 | 24.265 | -5.490 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 6400.000         | 16.406 | 174.413        | 5790.874 | 26.693 0.000 | 29.148 -0.000 | 13.567 0.000     | 0.000  | 29.148 | 24.659 | -5.484 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 6500.000         | 14.406 | 174.413        | 5887.276 | 26.945 0.000 | 29.564 -0.000 | 13.729 0.000     | 0.000  | 29.564 | 25.044 | -5.478 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 000.0099         | 12.406 | 174.413        | 5984.546 | 27.152 0.000 | 29.962 -0.000 | 13.878 0.000     | 0.000  | 29.962 | 25.417 | -5.473 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 6700.000         | 10.406 | 10.406 174.413 | 6082.566 | 27.314 0.000 | 30.341 -0.000 | 14.016 0.000     | 0.000  | 30.341 | 25.778 | -5.469 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 6800.000         | 8.406  | 174.413        | 6181.217 | 27.431 0.000 | 30.702 -0.000 | 14.144 0.000     | 0.000  | 30.702 | 26.126 | -5.465 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 000.0069         | 6.406  | 174.413        | 6280.377 | 27.502 0.000 | 31.043 -0.000 | 14.261 0.000     | 0.000  | 31.043 | 26.460 | -5.461 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 7000.000         | 4.406  | 174.413        | 6379.928 | 27.529 0.000 | 31.366 -0.000 | 14.371 0.000     | 0.000  | 31.366 | 26.780 | -5.458 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 7100.000         | 2.406  | 174.413        | 6479.746 | 27.511 0.000 | 31.670 -0.000 | 14.474 0.000     | 0.000  | 31.670 | 27.085 | -5.455 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 7200.000         | 0.406  | 174.413        | 6579.711 | 27.449 0.000 | 31.955 -0.000 | 14.571 0.000     | 0.000  | 31.955 | 27.374 | -5.453 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 7220.289         | 0.000  | 0.000          | 000.0099 | 27.474 0.000 | 31.968 0.000  | 14.590 0.000     | 0.000  | 32.006 | 27.429 | -5.454 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 7300.000         | 0.000  | 0.000          | 6679.711 | 27.682 0.000 | 32.149 0.000  | 14.666 0.000     | 0.000  | 32.188 | 27.638 | -5.469 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 7400.000         | 0.000  | 0.000          | 6779.711 | 27.945 0.000 | 32.379 0.000  | 14.762 0.000     | 0.000  | 32.417 | 27.901 | -5.487 | XOMR2_OWSG<br>MWD+IFR1+MS |
| 7500.000         | 0.000  | 0.000          | 6879.711 | 28.211 0.000 | 32.611 0.000  | 14.862 0.000     | 0.000  | 32.649 | 28.166 | -5.505 | XOMR2_OWSG<br>MWD+IFR1+MS |

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|------------------|-------|-------|----------|--------------|--------|-------|------------------|--------|--------|--------|-----------------------------------|
| 7600.000         | 0.000 | 0.000 | 6979.711 | 28.478 0.000 | 32.845 | 0.000 | 14.965 0.000     | 00000  | 32.884 | 28.433 | -5.523 XOMR2_OWSG<br>MWD+IFR1+MS  |
| 7700.000         | 0.000 | 0.000 | 7079.711 | 28.747 0.000 | 33.082 | 0.000 | 15.070 0.000     | 0.000  | 33.120 | 28.703 | -5.541 XOMR2_OWSG<br>MWD+IFR1+MS  |
| 7800.000         | 0.000 | 0.000 | 7179.711 | 29.018 0.000 | 33.321 | 0.000 | 15.179 0.000     | 0.000  | 33.359 | 28.974 | -5.559 XOMR2 OWSG<br>MWD+IFR1+MS  |
| 7900.000         | 0.000 | 0.000 | 7279.711 | 29.291 0.000 | 33,561 | 0.000 | 15.291 0.000     | 0.000  | 33.600 | 29.247 | -5.577 XOMR2_OWSG<br>MWD+IFR1+MS  |
| 8000.000         | 0.000 | 0.000 | 7379.711 | 29.566 0.000 | 33.804 | 0.000 | 15.405 0.000     | 0.000  | 33.843 | 29.522 | -5.594 XOMR2 OWSG<br>MWD+IFR1+MS  |
| 8100.000         | 0.000 | 0.000 | 7479.711 | 29.843 0.000 | 34.049 | 0.000 | 15.523 0.000     | 0.000  | 34.088 | 29.799 | -5.612 XOMR2 OWSG<br>MWD+IFR1+MS  |
| 8200.000         | 0.000 | 0.000 | 7579.711 | 30.121 0.000 | 34.296 | 0.000 | 15.644 0.000     | 00000  | 34.335 | 30.077 | -5.630 XOMR2_OWSG<br>MWD+IFR1+MS  |
| 8300.000         | 0.000 | 0.000 | 7679.711 | 30.401 0.000 | 34,545 | 0.000 | 15.768 0.000     | 00000  | 34.584 | 30.358 | -5.648 XOMR2 OWSG<br>MWD+IFR1+MS  |
| 8400.000         | 0.000 | 0.000 | 7779.711 | 30.683 0.000 | 34.796 | 0.000 | 15.895 0.000     | 0.000  | 34.835 | 30.639 | -5.665 XOMR2 OWSG<br>MWD+IFR1+MS  |
| 8500.000         | 0.000 | 0.000 | 7879.711 | 30.966 0.000 | 35.049 | 0.000 | 16.025 0.000     | 0.000  | 35.087 | 30.923 | -5.683 XOMR2 OWSG<br>MWD+IFR1+MS  |
| 8600.000         | 0.000 | 0.000 | 7979.711 | 31.251 0.000 | 35.303 | 0.000 | 16.159 0.000     | 0.000  | 35.342 | 31.208 | -5.701 XOMR2_OWSG<br>MWD+IFR1+MS  |
| 8700.000         | 0.000 | 0.000 | 8079.711 | 31.537 0.000 | 35.560 | 0.000 | 16.296 0.000     | 0.000  | 35.598 | 31.494 | -5.719 XOMR2_OWSG<br>MWD+IFR1+MS  |
| 8800.000         | 0.000 | 0.000 | 8179.711 | 31.825 0.000 | 35.818 | 0.000 | 16.436 0.000     | 0.000  | 35.856 | 31.782 | -5.736 XOMR2_OWSG<br>MWD+IFR1+MS  |
| 8900.000         | 0.000 | 0.000 | 8279.711 | 32.114 0.000 | 36.078 | 0.000 | 16.580 0.000     | 0.000  | 36.116 | 32.071 | -5.754 XOMR2_OWSG<br>-MWD+IFR1+MS |
| 9000.0006        | 0.000 | 0.000 | 8379.711 | 32.405 0.000 | 36.339 | 0.000 | 16.727 0.000     | 0.000  | 36.377 | 32.362 | -5.771 XOMR2 OWSG<br>-MWD+IFR1+MS |
| 9100.000         | 0.000 | 0.000 | 8479.711 | 32.697 0.000 | 36.602 | 0.000 | 16.877 0.000     | 0.000  | 36.641 | 32.654 | -5.789 XOMR2 OWSG<br>MWD+IFR1+MS  |
| 9200.000         | 0.000 | 0.000 | 8579.711 | 32.990 0.000 | 36.867 | 0.000 | 17.031 0.000     | 0.000  | 36.905 | 32.947 | -5.806 XOMR2_OWSG<br>MWD+IFR1+MS  |
| 9300.000         | 0.000 | 0.000 | 8679.711 | 33.285 0.000 | 37.133 | 0.000 | 17.189 0.000     | 0.000  | 37.172 | 33.242 | -5.824 XOMR2_OWSG<br>MWD+IFR1+MS  |
| 9400.000         | 0.000 | 0.000 | 8779.711 | 33.580 0.000 | 37.401 | 0.000 | 17.350 0.000     | 0.000  | 37.439 | 33.538 | -5.841 XOMR2_OWSG<br>MWD+IFR1+MS  |
| 9500.000         | 0.000 | 0.000 | 8879.711 | 33.877 0.000 | 37.670 | 0.000 | 17.514 0.000     | 0.000  | 37.709 | 33.835 | -5.859 XOMR2_OWSG<br>MWD+IFR1+MS  |

|                  | -5.876 XOMR2_OWSG<br>MWD+IFR1+MS | -5.893 XOMR2_OWSG<br>MWD+IFR1+MS | -5.911 XOMR2_OWSG<br>MWD+IFR1+MS | -5.928 XOMR2_OWSG MWD+IFR1+MS | -5.945 XOMR2_OWSG<br>MWD+IFR1+MS | -5.956 XOMR2_OWSG<br>MWD+IFR1+MS | -5.961 XOMR2_OWSG<br>MWD+IFR1+MS | -5.960 XOMR2_OWSG<br>MWD+IFR1+MS | -5.934 XOMR2_OWSG<br>MWD+IFR1+MS | -5.880 XOMR2_OWSG<br>MWD+IFR1+MS | -5.800 XOMR2_OWSG MWD+IFR1+MS | -5.697 XOMR2_OWSG<br>MWD+IFR1+MS | -5.579 XOMR2_OWSG<br>MWD+IFR1+MS | -5.453 XOMR2_OWSG<br>MWD+IFR1+MS | -5.326 XOMR2_OWSG<br>MWD+IFR1+MS | -5.207 XOMR2_OWSG<br>MWD+IFR1+MS | -5.103 XOMR2_OWSG<br>MWD+IFR1+MS | -5.031 XOMR2_OWSG<br>MWD+IFR1+MS | -5.024 XOMR2_OWSG<br>MWD+IFR1+MS | -4.940 XOMR2_OWSG MWD+IFR1+MS |
|------------------|----------------------------------|----------------------------------|----------------------------------|-------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|-------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|-------------------------------|
|                  | 34.133                           | 34.432                           | 34.733                           | 35.035                        | 35.337                           | 35.529                           | 35.637                           | 35.891                           | 36.086                           | 36.219                           | 36.294                        | 36.318                           | 36.301                           | 36.256                           | 36.197                           | 36.137                           | 36.092                           | 36.075                           | 36.075                           | 36.069                        |
|                  | 37.980                           | 38.252                           | 38.526                           | 38.801                        | 39.077                           | 39.252                           | 39,353                           | 39.609                           | 39.839                           | 40.041                           | 40.216                        | 40.363                           | 40.485                           | 40.583                           | 40.659                           | 40.714                           | 40.749                           | 40.763                           | 40.764                           | 40.783                        |
| Report           | 0.000                            | 0.000                            | 0.000                            | 0.000                         | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                         | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                         |
| Well Plan Report | 17.682 0.000                     | 17.854 0.000                     | 18.029 0.000                     | 18.207 0.000                  | 18.390 0.000                     | 18.506 0.000                     | 18.574 0.000                     | 18.751 0.000                     | 18.923 0.000                     | 19.102 0.000                     | 19.300 0.000                  | 19.526 0.000                     | 19.790 0.000                     | 20.098 0.000                     | 20.455 0.000                     | 20.859 0.000                     | 21.305 0.000                     | 21.723 0.000                     | 21.781 0.000                     | 22.279 0.000                  |
|                  | 37.941 0.000                     | 38.214 0.000                     | 38.487 0.000                     | 38.762 0.000                  | 39.039 0.000                     | 39.214 0.000                     | 39.318 0.000                     | 39.574 0.000                     | 39.804 0.000                     | 40.007 0.000                     | 40.181 0.000                  | 40.329 0.000                     | 40.451 0.000                     | 40.550 0.000                     | 40.626 0.000                     | 40.682 0.000                     | 40.718 0.000                     | 40.733 0.000                     | 40.733 0.000                     | 40.753 0.000                  |
|                  | 34.176 0.000 3                   | 34.475 0.000 3                   | 34.775 0.000 3                   | 35.077 0.000 3                | 35.379 0.000 3                   | 35.571 0.000 3                   | 35.143 0.000 3                   | 33.601 0.000 3                   | 31.536 0.000 3                   | 29.044 0.000 4                   | 26.261 0.000 4                | 23.383 0.000 4                   | 20.696 0.000 4                   | 18.591 0.000 4                   | 17.530 0.000 4                   | 17.839 0.000 4                   | 19.474 0.000 4                   | 21.723 0.000 4                   | 21.781 0.000 4                   | 22.279 0.000 4                |
|                  | 8979.711                         | 9079.711                         | 9179.711                         | 9279.711                      | 9379.711                         | 9442.803                         | 9479.694                         | 9578.878                         | 9675.414                         | 9767.422                         | 9853.111                      | 9930.815                         | 9999.020                         | 359.738 10056.398                | 359.738 10101.834                | 359.738 10134.443                | 359.738 10153.589                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000             |
|                  | 0.000                            | 0.000                            | 0.000                            | 0.000                         | 0.000                            | 0.000                            | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                       | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                       |
|                  | 0.000                            | 0.000                            | 0.000                            | 0.000                         | 0.000                            | 0.000                            | 2.953                            | 10.953                           | 18.953                           | 26.953                           | 34.953                        | 42.953                           | 50.953                           | 58.953                           | 66.953                           | 74.953                           | 82.953                           | 90.000                           | 90.000                           | 90.000                        |
| 7/29/24, 3:35 PM | 000.0096                         | 9700.000                         | 9800.000                         | 000.0066                      | 10000.000                        | 10063.092                        | 10100.000                        | 10200.000                        | 10300.000                        | 10400.000                        | 10500.000                     | 10600.000                        | 10700.000                        | 10800.000                        | 10900.000                        | 11000.000                        | 11100.000                        | 11188.092                        | 11200.000                        | 11300.000                     |

| 7/29/24, 3:35 PM |        |                          |                   |              |        |       | \$         | Well Plan Report | ort   |        |        |                                  |
|------------------|--------|--------------------------|-------------------|--------------|--------|-------|------------|------------------|-------|--------|--------|----------------------------------|
| 11400.000        | 90.000 | 90.000 359.738 10159.000 | 10159.000         | 22.792 0.000 | 40.793 | 0.000 | 22.792 0.0 | 0.000            | 0.000 | 40.821 | 36.065 | -4.839 XOMR2_OWSG<br>MWD+IFR1+MS |
| 11500.000        | 000.06 | 359.738                  | 359.738 10159.000 | 23.321 0.000 | 40.851 | 0.000 | 23.321 0.0 | 0.000            | 0.000 | 40.879 | 36.061 | -4.722 XOMR2_OWSG MWD+IFR1+MS    |
| 11600.000        | 90.000 | 359.738 1                | 10159.000         | 23.864 0.000 | 40.928 | 0.000 | 23.864 0.0 | 0.000            | 0.000 | 40.955 | 36.058 | -4.590 XOMR2_OWSG<br>MWD+IFR1+MS |
| 11700.000        | 90.000 | 359.738 1                | 10159.000         | 24.420 0.000 | 41.024 | 0.000 | 24.420 0.0 | 0.000            | 0.000 | 41.049 | 36.056 | -4.447 XOMR2_OWSG<br>MWD+IFR1+MS |
| 11800.000        | 90.000 | 359.738                  | 359.738 10159.000 | 24.988 0.000 | 41.139 | 0.000 | 24.988 0.0 | 0.000            | 0.000 | 41.163 | 36.054 | -4.294 XOMR2_OWSG MWD+IFR1+MS    |
| 11900.000        | 90.000 | 359.738 10159.000        | 10159.000         | 25.568 0.000 | 41.272 | 0.000 | 25.568 0.0 | 0.000            | 0.000 | 41.294 | 36.053 | -4.133 XOMR2_OWSG<br>MWD+IFR1+MS |
| 12000.000        | 000'06 | 359.738                  | 359.738 10159.000 | 26.158 0.000 | 41.424 | 0000  | 26.158 0.0 | 0.000            | 0.000 | 41.445 | 36.053 | -3.968 XOMR2_OWSG MWD+IFR1+MS    |
| 12100.000        | 000'06 | 359.738 1                | 10159.000         | 26.758 0.000 | 41.593 | 0000  | 26.758 0.0 | 0.000            | 0.000 | 41.613 | 36.053 | -3.800 XOMR2_OWSG<br>MWD+IFR1+MS |
| 12200.000        | 90.000 | 359.738 1                | 10159.000         | 27.368 0.000 | 41.780 | 0.000 | 27.368 0.0 | 0.000            | 0.000 | 41.799 | 36.054 | -3.631 XOMR2_OWSG MWD+IFR1+MS    |
| 12300.000        | 90.000 | 359.738                  | 359.738 10159.000 | 27.986 0.000 | 41.985 | 0.000 | 27.986 0.0 | 0.000            | 0.000 | 42.003 | 36.056 | -3.463 XOMR2_OWSG MWD+IFR1+MS    |
| 12400.000        | 90.000 | 359.738                  | 359.738 10159.000 | 28.613 0.000 | 42.208 | 0.000 | 28.613 0.0 | 0.000            | 0.000 | 42.224 | 36.058 | -3.298 XOMR2_OWSG MWD+IFR1+MS    |
| 12500.000        | 90.000 | 359.738                  | 359.738 10159.000 | 29.247 0.000 | 42.447 | 0.000 | 29.247 0.0 | 0.000            | 0.000 | 42.462 | 36.061 | -3.136 XOMR2_OWSG<br>MWD+IFR1+MS |
| 12600.000        | 90.000 | 359.738                  | 359.738 10159.000 | 29.889 0.000 | 42.704 | 0.000 | 29.889 0.0 | 0.000            | 0.000 | 42.717 | 36.064 | -2.979 XOMR2_OWSG MWD+IFR1+MS    |
| 12700.000        | 000'06 | 359.738 1                | 10159.000         | 30.537 0.000 | 42.976 | 0.000 | 30.537 0.0 | 0.000            | 0.000 | 42.989 | 36.068 | -2.827 XOMR2_OWSG MWD+IFR1+MS    |
| 12800.000        | 90.000 | 359.738                  | 359.738 10159.000 | 31.191 0.000 | 43.266 | 0.000 | 31.191 0.0 | 0.000            | 0.000 | 43.277 | 36.073 | -2.680 XOMR2_OWSG<br>MWD+IFR1+MS |
| 12900.000        | 90.000 | 359.738                  | 359.738 10159.000 | 31.851 0.000 | 43.570 | 0.000 | 31.851 0.0 | 0.000            | 0.000 | 43.581 | 36.078 | -2.541 XOMR2_OWSG<br>MWD+IFR1+MS |
| 13000.000        | 90.000 | 359.738                  | 359.738 10159.000 | 32.517 0.000 | 43.891 | 0.000 | 32.517 0.0 | 0.000            | 0.000 | 43.901 | 36.084 | -2.407 XOMR2_OWSG MWD+IFR1+MS    |
| 13100.000        | 90.000 | 359.738                  | 359.738 10159.000 | 33.188 0.000 | 44.227 | 0.000 | 33.188 0.0 | 0.000            | 0.000 | 44.236 | 36.091 | -2.281 XOMR2_OWSG MWD+IFR1+MS    |
| 13200.000        | 90.000 | 359.738 1                | 10159.000         | 33.864 0.000 | 44.577 | 0.000 | 33.864 0.0 | 0.000            | 0.000 | 44.586 | 36.098 | -2.160 XOMR2_OWSG MWD+IFR1+MS    |
| 13300.000        | 90.000 | 359.738 10159.000        | 10159.000         | 34.544 0.000 | 44.942 | 0.000 | 34.544 0.0 | 0.000            | 0.000 | 44.950 | 36.105 | -2.047 XOMR2_OWSG MWD+IFR1+MS    |

|                  | -1.940 XOMR2_OWSG<br>MWD+IFR1+MS | -1.838 XOMR2_OWSG<br>MWD+IFR1+MS | -1.743 XOMR2_OWSG<br>-MWD+IFR1+MS | -1.654 XOMR2_OWSG<br>MWD+IFR1+MS | -1.570 XOMR2_OWSG<br>MWD+IFR1+MS | -1.491 XOMR2_OWSG<br>MWD+IFR1+MS | -1.417 XOMR2_OWSG<br>-MWD+IFR1+MS | -1.347 XOMR2_OWSG<br>MWD+IFR1+MS | -1.282 XOMR2_OWSG<br>MWD+IFR1+MS | -1.221 XOMR2_OWSG<br>MWD+IFR1+MS | -1.163 XOMR2_OWSG<br>MWD+IFR1+MS | -1.110 XOMR2_OWSG<br>-MWD+IFR1+MS | -1.059 XOMR2_OWSG<br>MWD+IFR1+MS | -1.012 XOMR2_OWSG<br>-MWD+IFR1+MS | -0.967 XOMR2_OWSG<br>MWD+IFR1+MS | -0.925 XOMR2_OWSG<br>MWD+IFR1+MS | -0.886 XOMR2_OWSG<br>MWD+IFR1+MS | -0.849 XOMR2_OWSG<br>MWD+IFR1+MS | -0.814 XOMR2_OWSG<br>MWD+IFR1+MS | -0.781 XOMR2_OWSG<br>MWD+IFR1+MS |
|------------------|----------------------------------|----------------------------------|-----------------------------------|----------------------------------|----------------------------------|----------------------------------|-----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|-----------------------------------|----------------------------------|-----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|
|                  | 7                                | Ϋ.                               | 7                                 | 7                                | 7                                | 7                                | 7                                 | 7                                | 7                                | 7                                | 7                                | 7                                 | 7                                | 7                                 | Ō.                               | O                                | O                                | Ò.                               | O .                              | Ō.                               |
|                  | 36.113                           | 36.122                           | 36.132                            | 36.142                           | 36.152                           | 36.164                           | 36.175                            | 36.188                           | 36.201                           | 36.215                           | 36.229                           | 36.244                            | 36.260                           | 36.276                            | 36.293                           | 36.310                           | 36.328                           | 36.347                           | 36.366                           | 36.386                           |
|                  | 45.329                           | 45.721                           | 46.127                            | 46.547                           | 46.979                           | 47.423                           | 47.880                            | 48.348                           | 48.828                           | 49.318                           | 49.820                           | 50.332                            | 50.854                           | 51.386                            | 51.927                           | 52.478                           | 53.038                           | 53.606                           | 54.182                           | 54.767                           |
| Report           | 0.000                            | 0.000                            | 0.000                             | 0.000                            | 0.000                            | 0.000                            | 0.000                             | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                             | 0.000                            | 0.000                             | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            |
| Well Plan Report | 35.229 0.000                     | 35.918 0.000                     | 36.611 0.000                      | 37.307 0.000                     | 38.007 0.000                     | 38.710 0.000                     | 39.416 0.000                      | 40.126 0.000                     | 40.837 0.000                     | 41.552 0.000                     | 42.269 0.000                     | 42.988 0.000                      | 43.710 0.000                     | 44.434 0.000                      | 45.160 0.000                     | 45.887 0.000                     | 46.617 0.000                     | 47.348 0.000                     | 48.081 0.000                     | 48.816 0.000                     |
|                  | 0.000                            | 0.000                            | 0.000                             | 0.000                            | 0.000                            | 0.000                            | 0.000                             | 000.0                            | 0.000                            | 0.000                            | 0.000                            | 0.000                             | 0.000                            | 0.000                             | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            |
|                  | 45.322 (                         | 45.715 (                         | 46.121 (                          | 46.541                           | 46.974                           | 47.418                           | 47.875 (                          | 48.344 (                         | 48.824 (                         | 49.315 (                         | 49.817                           | 50.329 (                          | 50.852                           | 51.384 (                          | 51.925 (                         | 52.476 (                         | 53.036 (                         | 53.604 (                         | 54.181 (                         | 54.766 (                         |
|                  | 35.229 0.000                     | 35.918 0.000                     | 36.611 0.000                      | 37.307 0.000                     | 38.007 0.000                     | 38.710 0.000                     | 39.416 0.000                      | 40.126 0.000                     | 40.837 0.000                     | 41.552 0.000                     | 42.269 0.000                     | 42.988 0.000                      | 43.710 0.000                     | 44.434 0.000                      | 45.160 0.000                     | 45.887 0.000                     | 46.617 0.000                     | 47.348 0.000                     | 48.081 0.000                     | 48.816 0.000                     |
|                  | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                 | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                 | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                 | 359.738 10159.000                | 359.738 10159.000                 | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                |
|                  | 359.738                          | 359.738                          | 359.738                           | 359.738                          | 359.738                          | 359.738                          | 359.738                           | 359.73                           | 359.738                          | 359.738                          | 359.73                           | 359.738                           | 359.738                          | 359.738                           | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.73                           |
|                  | 90.000                           | 90.000                           | 90.000                            | 90.000                           | 90.000                           | 90.000                           | 90.000                            | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                            | 90.000                           | 90.000                            | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           |
| 7/29/24, 3:35 PM | 13400.000                        | 13500.000                        | 13600.000                         | 13700.000                        | 13800.000                        | 13900.000                        | 14000.000                         | 14100.000                        | 14200.000                        | 14300.000                        | 14400.000                        | 14500.000                         | 14600.000                        | 14700.000                         | 14800.000                        | 14900.000                        | 15000.000                        | 15100.000                        | 15200.000                        | 15300.000                        |

| /29/24, 3:35 PM |        |         |                   |              |        |       |        | Well Plan Report | eport |        |        |   |               |
|-----------------|--------|---------|-------------------|--------------|--------|-------|--------|------------------|-------|--------|--------|---|---------------|
| 15400.000       | 90.000 | 359.738 | 359.738 10159.000 | 49.552 0.000 | 55.358 | 0.000 | 49.552 | 0.000            | 0.000 | 55.359 | 36.407 | -0.751 XOMR2_OWSG                       | OWSG<br>R1+MS |
| 15500.000       | 90.000 | 359 738 | 10159.000         | 50.290 0.000 | 55.958 | 0.000 | 50.290 | 0.000            | 0.000 | 55.959 | 36.428 | -0.722 XOMR2_OWSG<br>-0.722 MWD+IFR1+MS | WSG<br>1+MS   |
| 15600.000       | 90.000 | 359.738 | 10159.000         | 51.029 0.000 | 56.566 | 0.000 | 51.029 | 0.000            | 0.000 | 56.567 | 36.450 | -0.694 XOMR2_OWSG<br>MWD+IFR1+MS        | WSG<br>1+MS   |
| 15700.000       | 90.000 | 359.738 | 10159.000         | 51.769 0.000 | 57.181 | 0.000 | 51.769 | 0.000            | 0.000 | 57.181 | 36.473 | -0.669 XOMR2_OWSG<br>MWD+IFR1+MS        | WSG<br>1+MS   |
| 15800.000       | 90.000 |         | 359.738 10159.000 | 52.511 0.000 | 57.802 | 0.000 | 52.511 | 0.000            | 0.000 | 57.803 | 36.496 | -0.644 XOMR2_OWSG MWD+IFR1+MS           | WSG<br>1+MS   |
| 15900.000       | 90.000 |         | 359.738 10159.000 | 53.254 0.000 | 58.430 | 0.000 | 53.254 | 0.000            | 0.000 | 58.431 | 36.519 | -0.621 XOMR2_OWSG<br>-MWD+IFR1+MS       | WSG<br>1+MS   |
| 16000.000       | 90.000 | 359.738 | 359.738 10159.000 | 53.998 0.000 | 59.065 | 0.000 | 53,998 | 0.000            | 0.000 | 59.066 | 36.544 | -0.600 XOMR2_OWSG<br>-MWD+IFR1+MS       | WSG<br>1+MS   |
| 16100.000       | 90.000 | 359.738 | 10159.000         | 54.743 0.000 | 59.706 | 0.000 | 54.743 | 0.000            | 0.000 | 90 706 | 36.569 | -0.579 XOMR2_OWSG<br>MWD+IFR1+MS        | WSG<br>1+MS   |
| 16200.000       | 90.000 | 359.738 | 10159.000         | 55.490 0.000 | 60.353 | 0.000 | 55.490 | 0.000            | 0.000 | 60.353 | 36.594 | -0.560 XOMR2_OWSG<br>-0.560 MWD+IFR1+MS | WSG<br>1+MS   |
| 16300.000       | 90.000 | 359.738 | 359.738 10159.000 | 56.237 0.000 | 61.006 | 0.000 | 56.237 | 0.000            | 0.000 | 61.006 | 36.621 | -0.542 XOMR2_OWSG<br>MWD+IFR1+MS        | WSG<br>1+MS   |
| 16400.000       | 90.000 |         | 359.738 10159.000 | 56.985 0.000 | 61.664 | 0.000 | 56.985 | 0.000            | 0.000 | 61.664 | 36.647 | -0.524 XOMR2_OWSG<br>-0.524 MWD+IFR1+MS | WSG<br>1+MS   |
| 16500.000       | 90.000 |         | 359.738 10159.000 | 57.735 0.000 | 62.328 | 0.000 | 57.735 | 0.000            | 0.000 | 62.328 | 36.675 | -0.508 XOMR2_OWSG<br>MWD+IFR1+MS        | WSG<br>1+MS   |
| 16600.000       | 90.000 | 359.738 | 10159.000         | 58.485 0.000 | 62.997 | 0.000 | 58.485 | 0.000            | 0.000 | 62.998 | 36.703 | -0.493 XOMR2_OWSG<br>-0.493 MWD+IFR1+MS | OWSG<br>R1+MS |
| 16700.000       | 90.000 | 359.738 | 10159.000         | 59.236 0.000 | 63.672 | 0.000 | 59.236 | 0.000            | 0.000 | 63.672 | 36.732 | -0.478 XOMR2_OWSG<br>-0.478 MWD+IFR1+MS | WSG<br>1+MS   |
| 16800.000       | 90.000 | 359.738 | 10159.000         | 59.988 0.000 | 64.351 | 0.000 | 59.988 | 0.000            | 0.000 | 64.351 | 36.761 | -0.464 XOMR2_OWSG<br>-MWD+IFR1+MS       | WSG<br>1+MS   |
| 16900.000       | 90.000 |         | 359.738 10159.000 | 60.741 0.000 | 65.035 | 0.000 | 60.741 | 0.000            | 0.000 | 65.035 | 36.791 | -0.451 XOMR2_OWSG<br>-0.451 MWD+IFR1+MS | OWSG<br>R1+MS |
| 17000.000       | 90.000 |         | 359.738 10159.000 | 61.495 0.000 | 65.724 | 0.000 | 61.495 | 0.000            | 0.000 | 65.724 | 36.822 | -0.438 XOMR2_OWSG<br>-0.438 MWD+IFR1+MS | WSG<br>1+MS   |
| 17100.000       | 90.000 |         | 359.738 10159.000 | 62.249 0.000 | 66.418 | 0.000 | 62.249 | 0.000            | 0.000 | 66.418 | 36.853 | -0.427 XOMR2_OWSG<br>-0.427 MWD+IFR1+MS | WSG<br>1+MS   |
| 17200.000       | 90.000 | 359.738 | 10159.000         | 63.004 0.000 | 67.115 | 0.000 | 63.004 | 0.000            | 0.000 | 67.116 | 36.885 | -0.415 XOMR2_OWSG<br>-0.415 MWD+IFR1+MS | OWSG<br>R1+MS |
| 17300.000       | 90.000 |         | 359.738 10159.000 | 63.760 0.000 | 67.817 | 0.000 | 63.760 | 0.000            | 0.000 | 67.818 | 36.917 | -0.405 XOMR2_OWSG MWD+IFR1+MS           | WSG<br>1+MS   |

| 7/29/24, 3:35 PM |        |                   |                   |              |        |       | Well Plan Report | Report |        |        |                                  |
|------------------|--------|-------------------|-------------------|--------------|--------|-------|------------------|--------|--------|--------|----------------------------------|
| 17400.000        | 90.000 | 359.738 10159.000 | 10159.000         | 64.517 0.000 | 68.524 | 0.000 | 64.517 0.000     | 0.000  | 68.524 | 36.950 | -0.394 XOMR2_OWSG<br>MWD+IFR1+MS |
| 17500.000        | 90.000 |                   | 359.738 10159.000 | 65.274 0.000 | 69.234 | 0.000 | 65.274 0.000     | 0.000  | 69.234 | 36.984 | -0.385 XOMR2_OWSG<br>MWD+IFR1+MS |
| 17600.000        | 90.000 |                   | 359.738 10159.000 | 66.032 0.000 | 69.948 | 0.000 | 66.032 0.000     | 0.000  | 69.948 | 37.018 | -0.376 XOMR2_OWSG<br>MWD+IFR1+MS |
| 17700.000        | 90.000 |                   | 359.738 10159.000 | 66.791 0.000 | 70.666 | 0.000 | 66.791 0.000     | 0.000  | 70.666 | 37.053 | -0.367 XOMR2_OWSG<br>MWD+IFR1+MS |
| 17800.000        | 90.000 | 359.738           | 10159.000         | 67.550 0.000 | 71.387 | 0.000 | 67.550 0.000     | 0.000  | 71.387 | 37.088 | -0.359 XOMR2_OWSG<br>MWD+IFR1+MS |
| 17900.000        | 90.000 |                   | 359.738 10159.000 | 68.309 0.000 | 72.112 | 0.000 | 68.309 0.000     | 0.000  | 72.112 | 37.124 | -0.351 XOMR2_OWSG<br>MWD+IFR1+MS |
| 18000.000        | 90.000 |                   | 359.738 10159.000 | 69.070 0.000 | 72.841 | 0.000 | 69.070 0.000     | 0.000  | 72.841 | 37.161 | -0.343 XOMR2_OWSG<br>MWD+IFR1+MS |
| 18100.000        | 90.000 |                   | 359.738 10159.000 | 69.831 0.000 | 73.573 | 0.000 | 69.831 0.000     | 0.000  | 73.573 | 37.198 | -0.336 XOMR2_OWSG<br>MWD+IFR1+MS |
| 18200.000        | 90.000 | 359.738           | 10159.000         | 70.592 0.000 | 74.308 | 0.000 | 70.592 0.000     | 0.000  | 74.308 | 37.236 | -0.329 XOMR2_OWSG<br>MWD+IFR1+MS |
| 18300.000        | 90.000 | 359.738           | 10159.000         | 71.354 0.000 | 75.046 | 0.000 | 71.354 0.000     | 0.000  | 75.046 | 37.274 | -0.323 XOMR2_OWSG<br>MWD+IFR1+MS |
| 18400.000        | 90.000 |                   | 359.738 10159.000 | 72.116 0.000 | 75.787 | 0.000 | 72.116 0.000     | 0.000  | 75.787 | 37.313 | -0.316 XOMR2_OWSG<br>MWD+IFR1+MS |
| 18500.000        | 90.000 |                   | 359.738 10159.000 | 72.879 0.000 | 76.531 | 0.000 | 72.879 0.000     | 0.000  | 76.531 | 37.353 | -0.310 XOMR2_OWSG<br>MWD+IFR1+MS |
| 18600.000        | 90.000 |                   | 359.738 10159.000 | 73.642 0.000 | 77.278 | 0.000 | 73.642 0.000     | 0.000  | 77.278 | 37.393 | -0.305 XOMR2_OWSG<br>MWD+IFR1+MS |
| 18700.000        | 90.000 |                   | 359.738 10159.000 | 74.406 0.000 | 78.028 | 0.000 | 74.406 0.000     | 0.000  | 78.028 | 37.434 | -0.299 XOMR2_OWSG<br>MWD+IFR1+MS |
| 18800.000        | 90.000 | 359.738           | 10159.000         | 75.170 0.000 | 78.780 | 0.000 | 75.170 0.000     | 0.000  | 78.780 | 37.475 | -0.294 XOMR2_OWSG<br>MWD+IFR1+MS |
| 18900.000        | 90.000 |                   | 359.738 10159.000 | 75.934 0.000 | 79.536 | 0.000 | 75.934 0.000     | 0.000  | 79.536 | 37.517 | -0.289 XOMR2_OWSG<br>MWD+IFR1+MS |
| 19000.000        | 90.000 |                   | 359.738 10159.000 | 76.699 0.000 | 80.293 | 0.000 | 76.699 0.000     | 0.000  | 80.293 | 37.560 | -0.285 XOMR2_OWSG<br>MWD+IFR1+MS |
| 19100.000        | 90.000 |                   | 359.738 10159.000 | 77.465 0.000 | 81.053 | 0.000 | 77.465 0.000     | 0.000  | 81.053 | 37.603 | -0.280 XOMR2_OWSG<br>MWD+IFR1+MS |
| 19200.000        | 90.000 |                   | 359.738 10159.000 | 78.231 0.000 | 81.816 | 0.000 | 78.231 0.000     | 0.000  | 81.816 | 37.647 | -0.276 XOMR2_OWSG<br>MWD+IFR1+MS |
| 19300.000        | 90.000 |                   | 359.738 10159.000 | 78.997 0.000 | 82.581 | 0.000 | 78.997 0.000     | 0.000  | 82.581 | 37.691 | -0.272 XOMR2_OWSG<br>MWD+IFR1+MS |

|                  | -0.268 XOMR2_OWSG<br>MWD+IFR1+MS | -0.264 XOMR2_OWSG<br>MWD+IFR1+MS | -0.261 XOMR2 OWSG<br>MWD+IFR1+MS | -0.257 XOMR2 OWSG<br>MWD+IFR1+MS | -0.254 XOMR2 OWSG<br>MWD+IFR1+MS | -0.251 XOMR2 OWSG<br>MWD+IFR1+MS | -0.248 XOMR2_OWSG<br>-0.248 MWD+IFR1+MS | -0.245 XOMR2 OWSG<br>-0.245 MWD+IFR1+MS | -0.242 XOMR2 OWSG<br>-0.242 MWD+IFR1+MS | -0.239 XOMR2 OWSG<br>MWD+IFR1+MS | -0.237 XOMR2 OWSG<br>MWD+IFR1+MS | -0.234 XOMR2_OWSG<br>-0.234 MWD+IFR1+MS | -0.232 XOMR2_OWSG<br>-0.232 MWD+IFR1+MS | -0.230 XOMR2_OWSG<br>-0.230 MWD+IFR1+MS | -0.228 XOMR2 OWSG<br>MWD+IFR1+MS | -0.226 XOMR2 OWSG<br>MWD+IFR1+MS | -0.224 XOMR2 OWSG<br>-0.224 MWD+IFR1+MS | -0.222 XOMR2_OWSG<br>-0.222 MWD+IFR1+MS | -0.220 XOMR2 OWSG<br>MWD+IFR1+MS | -0.218 XOMR2_OWSG<br>MWD+IFR1+MS |
|------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|---|---|---|----------------------------------|----------------------------------|---|---|---|----------------------------------|----------------------------------|---|---|----------------------------------|----------------------------------|
|                  | 37.736                           | 37.782                           | 37.828                           | 37.874                           | 37.921                           | 37.969                           | 38.017                                  | 38.066                                  | 38.116                                  | 38.165                           | 38.216                           | 38.267                                  | 38.319                                  | 38.371                                  | 38.424                           | 38.477                           | 38.531                                  | 38.585                                  | 38.640                           | 38.695                           |
|                  | 83.348                           | 84.118                           | 84.889                           | 85.663                           | 86.439                           | 87.217                           | 87.996                                  | 88.778                                  | 89.561                                  | 90.347                           | 91.134                           | 91.922                                  | 92.713                                  | 93.505                                  | 94.298                           | 95.093                           | 95.890                                  | 96.688                                  | 97.487                           | 98.288                           |
| ı Report         | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                                   | 0.000                                   | 0.000                                   | 0.000                            | 0.000                            | 0.000                                   | 0.000                                   | 0.000                                   | 0.000                            | 0.000                            | 0.000                                   | 0.000                                   | 0.000                            | 0.000                            |
| Well Plan Report | 79.763 0.000                     | 80.530 0.000                     | 81.297 0.000                     | 82.065 0.000                     | 82.833 0.000                     | 83.601 0.000                     | 84.369 0.000                            | 85.138 0.000                            | 85.907 0.000                            | 86.676 0.000                     | 87.446 0.000                     | 88.216 0.000                            | 88.986 0.000                            | 89.756 0.000                            | 90.527 0.000                     | 91.298 0.000                     | 92.069 0.000                            | 92.840 0.000                            | 93.612 0.000                     | 94.384 0.000                     |
|                  | 8 0.000                          | 8 0.000                          | 000.0 6                          | 3 0.000                          | 000.0 6                          | 00000 2                          | 00000 9                                 | 8 0.000                                 | 1 0.000                                 | 00000 2                          | 4 0.000                          | 2 0.000                                 | 3 0.000                                 | 2 0.000                                 | 8 0.000                          | 3 0.000                          | 0.000                                   | 8 0.000                                 | 00000 2                          | 0.000                            |
|                  | 83.348                           | 84.118                           | 84.889                           | 85.663                           | 86.439                           | 87.217                           | 87.996                                  | 88.778                                  | 89.561                                  | 90.347                           | 91.134                           | 91.922                                  | 92.713                                  | 93.505                                  | 94.298                           | 95.093                           | 95.890                                  | 96.688                                  | 97.487                           | 98.288                           |
|                  | 79.763 0.000                     | 80.530 0.000                     | 81.297 0.000                     | 82.065 0.000                     | 82.833 0.000                     | 83.601 0.000                     | 84.369 0.000                            | 85.138 0.000                            | 85.907 0.000                            | 86.676 0.000                     | 87.446 0.000                     | 88.216 0.000                            | 88.986 0.000                            | 89.756 0.000                            | 90.527 0.000                     | 91.298 0.000                     | 92.069 0.000                            | 92.840 0.000                            | 93.612 0.000                     | 94.384 0.000                     |
|                  | 359.738 10159.000                | 10159.000                        | 10159.000                        | 10159.000                        | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                       | 10159.000                               | 10159.000                               | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                       | 10159.000                               | 10159.000                               | 359.738 10159.000                | 359.738 10159.000                | 10159.000                               | 10159.000                               | 359.738 10159.000                | 359.738 10159.000                |
|                  | 359 738                          | 359.738                          | 359 738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                                 | 359 738                                 | 359.738                                 | 359.738                          | 359 738                          | 359 738                                 | 359 738                                 | 359.738                                 | 359.738                          | 359.738                          | 359.738                                 | 359 738                                 | 359.738                          | 359.738                          |
|                  | 000.06                           | 90.000                           | 90.000                           | 000.06                           | 90.000                           | 90.000                           | 90.000                                  | 000.06                                  | 90.000                                  | 90.000                           | 90.000                           | 90.000                                  | 90.000                                  | 90.000                                  | 90.000                           | 90.000                           | 90.000                                  | 90.000                                  | 90.000                           | 000.06                           |
| 7/29/24, 3:35 PM | 19400.000                        | 19500.000                        | 19600.000                        | 19700.000                        | 19800.000                        | 19900.000                        | 20000.000                               | 20100.000                               | 20200.000                               | 20300.000                        | 20400.000                        | 20500.000                               | 20600.000                               | 20700.000                               | 20800.000                        | 20900.000                        | 21000.000                               | 21100.000                               | 21200.000                        | 21300.000                        |
|                  | leased                           | to Im                            | aging:                           | 6/13/2                           | 025 10                           | 0:38:32                          | AM                                      |   |   |                                  |                                  |   |   |   |                                  |                                  |   |   |                                  |                                  |

|                  | -0.217 XOMR2_OWSG<br>-MWD+IFR1+MS | -0.215 XOMR2_OWSG<br>MWD+IFR1+MS | -0.214 XOMR2_OWSG<br>MWD+IFR1+MS | -0.212 XOMR2_OWSG<br>MWD+IFR1+MS | -0.211 XOMR2_OWSG<br>-0.211 MWD+IFR1+MS | -0.209 XOMR2_OWSG<br>MWD+IFR1+MS | -0.208 XOMR2_OWSG<br>MWD+IFR1+MS | -0.207 XOMR2 OWSG<br>MWD+IFR1+MS | -0.206 XOMR2_OWSG<br>MWD+IFR1+MS | -0.205 XOMR2_OWSG<br>MWD+IFR1+MS | -0.204 XOMR2_OWSG<br>MWD+IFR1+MS | -0.203 XOMR2_OWSG<br>MWD+IFR1+MS | -0.202 XOMR2_OWSG<br>MWD+IFR1+MS | -0.201 XOMR2_OWSG<br>MWD+IFR1+MS | -0.200 XOMR2_OWSG<br>MWD+IFR1+MS | -0.199 XOMR2_OWSG<br>MWD+IFR1+MS | -0.198 XOMR2_OWSG<br>MWD+IFR1+MS | -0.197 XOMR2_OWSG<br>MWD+IFR1+MS | -0.196 XOMR2_OWSG<br>MWD+IFR1+MS | -0.196 XOMR2_OWSG<br>MWD+IFR1+MS |
|------------------|-----------------------------------|----------------------------------|----------------------------------|----------------------------------|---|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|----------------------------------|
|                  | 38.751                            | 38.808                           | 38.865                           | 38.922                           | 38.980                                  | 39.039                           | 39.098                           | 39.157                           | 39.217                           | 39.278                           | 39.339                           | 39.401                           | 39.463                           | 39.526                           | 39.589                           | 39.652                           | 39.717                           | 39.781                           | 39.846                           | 39.912                           |
|                  | 060'66                            | 99.894                           | 100.698                          | 101.505                          | 102.312                                 | 103.120                          | 103.930                          | 104.741                          | 105.553                          | 106.366                          | 107.180                          | 107.995                          | 108.811                          | 109.628                          | 110.446                          | 111.265                          | 112.085                          | 112.906                          | 113.728                          | 114.551                          |
| Well Plan Report | 0.000                             | 00000                            | 0.000                            | 0.000                            | 0.000                                   | 0.000                            | 0.000                            | 0000                             | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            |
| Well Plan        | 95.156 0.000                      | 95.928 0.000                     | 96.700 0.000                     | 97.473 0.000                     | 98.246 0.000                            | 99.019 0.000                     | 99.792 0.000                     | 100.565 0.000                    | 101.339 0.000                    | 102.113 0.000                    | 102.886 0.000                    | 103.660 0.000                    | 104.435 0.000                    | 105.209 0.000                    | 105.983 0.000                    | 106.758 0.000                    | 107.533 0.000                    | 108.308 0.000                    | 109.083 0.000                    | 109.858 0.000                    |
|                  | 0.000                             | 0.000                            | 0.000                            | 0.000                            | 0.000                                   | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            | 0.000                            |
|                  | 060'66                            | 99.894                           | 100.698                          | 101.504                          | 102.312                                 | 103.120                          | 103.930                          | 104.741                          | 105.553                          | 106.366                          | 107.180                          | 107.995                          | 108.811                          | 109.628                          | 110.446                          | 111.265                          | 112.085                          | 112.906                          | 113.728                          | 114.551                          |
|                  | 95.156 0.000                      | 95.928 0.000                     | 000.0 007.96                     | 97.473 0.000                     | 98.246 0.000                            | 99.019 0.000                     | 99.792 0.000                     | 100.565 0.000                    | 101.339 0.000                    | 102.113 0.000                    | 102.886 0.000                    | 103.660 0.000                    | 104.435 0.000                    | 105.209 0.000                    | 105.983 0.000                    | 106.758 0.000                    | 107.533 0.000                    | 108.308 0.000                    | 109.083 0.000                    | 109.858 0.000                    |
|                  | 359.738 10159.000                 | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                       | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                | 359.738 10159.000                |
|                  | 359 738                           | 359.738                          | 359.738                          | 359.738                          | 359.738                                 | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359 738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                          | 359.738                          |
|                  | 90.000                            | 90.000                           | 90.000                           | 90.000                           | 90.000                                  | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           | 90.000                           |
| 7/29/24, 3:35 PM | 21400.000                         | 21500.000                        | . 21600.000                      | 21700.000                        | 21800.000                               | 21900.000                        | 22000.000                        | 22100.000                        | 22200.000                        | 22300.000                        | 22400.000                        | 22500.000                        | 22600.000                        | 22700.000                        | 22800.000                        | 22900.000                        | 23000.000                        | 23100.000                        | 23200.000                        | 23300.000                        |

6929.00 CIRCLE

634526.00

416648.50

24380.33

BHL 7

| 7/29/24, 3:35 PM |        |                             |  |          |               |       |                      | Well Plan Report | Report |              |        |         |                           |
|------------------|--------|-----------------------------|--|----------|---------------|-------|----------------------|------------------|--------|--------------|--------|---------|---------------------------|
| 23400.000        | 90.000 | 359.738 10159.000           | 110.634                                | 0.000    | 115.374       | 0.000 | 0.000 110.634        | 0.000            | 0.000  | 115.374      | 39.978 | -0.195  | XOMR2_OWSG<br>MWD+IFR1+MS |
| 23500.000        | 90.000 | 359.738 10159.000           | 111,409                                | 0.000    | 116.199       | 0 000 | 111.409              | 0.000            | 0.000  | 116.199      | 40.045 | -0.194  | XOMR2_OWSG<br>MWD+IFR1+MS |
| 23600.000        | 90.000 | 359.738 10159.000           | 112.185                                | 0.000    | 117.024       | 0.000 | 0.000 112.185        | 0.000            | 0.000  | 117.024      | 40.112 | -0.194  | XOMR2_OWSG<br>MWD+IFR1+MS |
| 23700.000        | 90.000 | 359.738 10159.000           | 112.960                                | 0.000    | 117.850       | 0.000 | 112.960              | 0.000            | 0.000  | 117.850      | 40.179 | -0.193  | XOMR2_OWSG<br>MWD+IFR1+MS |
| 23800.000        | 90.000 | 359.738 10159.000           | 113.736                                | 0.000    | 118.677       | 0.000 | 113.736              | 0.000            | 0.000  | 118.677      | 40.247 | -0.192  | XOMR2_OWSG<br>MWD+IFR1+MS |
| 23900.000        | 90.000 | 359.738 10159.000           | 114.512                                | 0.000    | 119.504       | 0.000 | 114.512              | 0.000            | 0.000  | 119.504      | 40.316 | -0.192  | XOMR2_OWSG<br>MWD+IFR1+MS |
| 24000.000        | 90.000 | 359.738 10159.000           | 115.288                                | 0.000    | 120.333       | 0.000 | 115.288              | 0.000            | 0.000  | 120.333      | 40.385 | -0.191  | XOMR2_OWSG<br>MWD+IFR1+MS |
| 24100.000        | 90.000 | 359.738 10159.000           | 116.065                                | 0.000    | 121.162       | 0.000 | 0.000 116.065        | 0.000            | 0.000  | 121.162      | 40.454 | -0.191  | XOMR2_OWSG<br>MWD+IFR1+MS |
| 24200.000        | 90.000 | 359.738 10159.000           | 116.841                                | 0.000    | 121.992       | 0.000 | 116.841              | 0.000            | 0.000  | 121.992      | 40.524 | -0.190  | XOMR2_OWSG<br>MWD+IFR1+MS |
| 24290.329        | 90.000 | 359.738 10159.000           | 117.542                                | 0.000    | 122.742       | 0.000 | 117.542              | 0.000            | 0.000  | 122.742      | 40.587 | -0.190  | XOMR2_OWSG<br>MWD+IFR1+MS |
| 24300.000        | 90.000 | 359.738 10159.000           | 117.617                                | 0.000    | 122.822       | 0.000 | 117.617              | 0.000            | 0.000  | 122.822      | 40.594 | -0.190  | XOMR2_OWSG<br>MWD+IFR1+MS |
| 24380.332        | 90.000 | 359.738 10159.000           | 118.241                                | 0.000    | 0.000 123.489 | 0.000 | 0.000 118.241 0.000  | 0.000            | 0.000  | 123.489      | 40.651 | -0.190  | XOMR2_OWSG<br>MWD+IFR1+MS |
| T sold           |        | U700 00 00 #811 0/0 1 20/00 | ;;;;;;;;;;;;;;;;;;;;;;;;;;;;;;;;;;;;;; | 000      | 7             |       |                      |                  |        |              |        |         |                           |
| ाबा । बापुरा     |        | LOVEI LAN                   | Measured Depth                         | d Dept   | _             |       | <b>Grid Northing</b> | thing            | J      | Grid Easting |        | TVD MSL | Target Shape              |
| Target Name      |        |                             |  | (#)      |               |       |                      | (ft)             |        | (#)          |        | (ff)    |                           |
| FTP 7            |        |                             | •                                      | 11188.04 | _             |       | 403456.40            | 56.40            |        | 634586.20    |        | 6929.00 | CIRCLE                    |
| LTP 7            |        |                             | 8                                      | 24290.33 | ~             |       | 416558.50            | 58.50            |        | 634526.30    |        | 6929.00 | CIRCLE                    |

#### **Cement Variance Request**

#### **Intermediate Casing:**

XTO requests to pump a two stage cement job on the 7-5/8" intermediate casing string with the first stage being pumped conventionally with the calculated top of cement at the Brush Canyon (6196') and the second stage performed as a bradenhead squeeze with planned cement from the Brushy Canyon to surface. If cement is not visually confirmed to circulate to surface, the final cement top after the second stage job will be verified by Echo-meter. If necessary, a top out consisting of 1,500 sack of Class C cement + 3% Salt + 1% PreMag-M + 6% Bentonite Gel (2.30 yld, 12.91 ppg) will be executed as a contingency. If cement is still unable to circulate to surface, another Echo-meter run will be performed for cement top verification.

XTO will report to the BLM the volume of fluid (limited to 5 bbls) used to flush intermediate casing valves following backside cementing procedures.

XTO requests to pump an Optional Lead if well conditions dictate in an attempt to bring cement inside the first intermediate casing. If cement reaches the desired height, the BLM will be notified and the second stage bradenhead squeeze and subsequent TOC verification will be negated.

XTO requests the option to conduct the bradenhead squeeze and TOC verification offline as per standard approval from BLM when unplanned remediation is needed and batch drilling is approved. In the event the bradenhead is conducted, we will ensure the first stage cement job is cemented properly and the well is static with floats holding and no pressure on the csg annulus as with all other casing strings where batch drilling operations occur before moving off the rig. The TA cap will also be installed per Cactus procedure and pressure inside the casing will be monitored via the valve on the TA cap as per standard batch drilling ops.

#### **Production Casing:**

XTO requests the option to offline cement and remediate (if needed) surface and intermediate casing strings where batch drilling is approved and if unplanned remediation is needed. XTO will ensure well is static with no pressure on the csg annulus, as with all other casing strings where batch drilling operations occur before moving off the rig. The TA cap will also be installed when applicable per Cactus procedure and pressure inside the casing will be monitored via the valve on the TA cap as per standard batch drilling ops. Offline cement operations will then be conducted after the rig is moved off the current well to the next well in the batch sequence.

5-1/2" Ca

O I I OVELL HEAD I I O

# State of New Mexico Energy, Minerals and Natural Resources Department

Submit Electronically Via E-permitting

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

# NATURAL GAS MANAGEMENT PLAN

This Natural Gas Management Plan must be submitted with each Application for Permit to Drill (APD) for a new or recompleted well.

# Section 1 – Plan Description Effective May 25, 2021

| I. Operator:             | XTO Permian Operating             | OGRID:              | 373075           | Date: 07 / 29 / 2024 |
|--------------------------|-----------------------------------|---------------------|------------------|----------------------|
| II. Type: ⊠ Original     | ☐ Amendment due to ☐ 19.15.27.9.I | D(6)(a) NMAC □ 19.1 | 5.27.9.D(6)(b) 1 | NMAC □ Other.        |
| If Other, please describ | pe:                               |                     |                  |                      |

III. Well(s): Provide the following information for each new or recompleted well or set of wells proposed to be drilled or proposed to be recompleted from a single well pad or connected to a central delivery point.

| Well Name                          | API | ULSTR              | Footages                 | Anticip<br>ated Oil<br>BBL/D | 3 yr<br>Anticipated<br>decline Oil<br>BBL/D | Anticipa<br>ted Gas<br>MCF/D | 3 yr<br>Anticipated<br>decline Gas<br>MCF/D | Anticipated<br>Produced<br>Water<br>BBL/D | 3 yr<br>Anticipated<br>decline<br>Water<br>BBL/D |
|------------------------------------|-----|--------------------|--------------------------|------------------------------|---|------------------------------|---|---|--|
| Poker Lake<br>Unit 20-17<br>BD 201 | TBD | 20<br>T25S<br>R30E | 1434 FSL;<br>1904<br>FWL | 500                          | 125   | 1,500                        | 900   | 1,250                                     | 400  |
| Poker Lake<br>Unit 20-17<br>BD 202 | TBD | 20<br>T25S<br>R30E | 1433 FSL;<br>1934<br>FWL | 1,100                        | 125   | 2,750                        | 900   | 3,750                                     | 700  |
| Poker Lake<br>Unit 20-17<br>BD 203 | TBD | 20<br>T25S<br>R30E | 1432 FSL;<br>1964<br>FWL | 500                          | 125   | 1,500                        | 900   | 1,250                                     | 400  |
| Poker Lake<br>Unit 20-17<br>BD 204 | TBD | 20<br>T25S<br>R30E | 1431 FSL;<br>1994<br>FWL | 1,200                        | 175   | 3,000                        | 1,200                                       | 4,250                                     | 900  |
| Poker Lake<br>Unit 20-8<br>BD 205  | TBD | 20<br>T25S<br>R30E | 1430 FSL;<br>2024<br>FWL | 600                          | 150   | 1,750                        | 1,000                                       | 1,500                                     | 400  |
| Poker Lake<br>Unit 20-8<br>BD 206  | TBD | 20<br>T25S<br>R30E | 1813 FSL;<br>1604 FEL    | 1,200                        | 175   | 3,000                        | 1,200                                       | 4,250                                     | 900  |
| Poker Lake<br>Unit 20-8<br>BD 207  | TBD | 20<br>T25S<br>R30E | 1813 FSL;<br>1574 FEL    | 600                          | 150   | 1,750                        | 1,000                                       | 1,500                                     | 400  |
| Poker Lake<br>Unit 20-8<br>BD 208  | TBD | 20<br>T25S<br>R30E | 1813 FSL;<br>1544 FEL    | 1,200                        | 175   | 3,000                        | 1,200                                       | 4,250                                     | 900  |
| Poker Lake<br>Unit 20-8<br>BD 209  | TBD | 20<br>T25S<br>R30E | 1813 FSL;<br>1514 FEL    | 1,300                        | 200   | 3,500                        | 1,400                                       | 4,750                                     | 1,100  |

| Poker Lake<br>Unit 20-8  | TBD  | 20<br>T25S   | 1813 FSL;<br>1484 FEL | 600         | 75   | 7,250 | 2,700 | 4,750  | 900 |
|--------------------------|------|--------------|-----------------------|-------------|------|-------|-------|--------|-----|
| BD 210                   |      | R30E         |                       |             |      |       |       |        |     |
| Poker Lake               | TBD  | 18           | 265 FNL;              | 1,200       | 175  | 3,000 | 1,200 | 4,250  | 900 |
| Unit 18-30               |      | T25S         | 2395 FEL              |             |      |       |       |        |     |
| BD 200H                  |      | R30E         |                       |             |      |       |       |        |     |
| Poker Lake               | TBD  | 18           | 265 FNL;              | 600         | 150  | 1,750 | 1,000 | 1,500  | 400 |
| Unit 18-30               |      | T25S         | 2365 FEL              |             |      |       |       |        |     |
| BD 201H                  |      | R30E         |                       |             |      |       |       |        |     |
| Poker Lake               | TBD  | 18           | 265 FNL;              | 1,200       | 175  | 3,000 | 1,200 | 4,250  | 900 |
| Unit 18-30               |      | T25S         | 2335 FEL              |             |      |       |       |        |     |
| BD 202H                  |      | R30E         | 265777                | 600         | 1.70 | 1.770 | 1.000 | 1.700  | 100 |
| Poker Lake               | TBD  | 18           | 265 FNL;              | 600         | 150  | 1,750 | 1,000 | 1,500  | 400 |
| Unit 18-30               |      | T25S         | 2305 FEL              |             |      |       |       |        |     |
| BD 203H                  | TD D | R30E         | 265 77 11             | 1 100       | 105  | 2.750 | 200   | 2.7.50 | 700 |
| Poker Lake               | TBD  | 18           | 265 FNL;              | 1,100       | 125  | 2,750 | 900   | 3,750  | 700 |
| Unit 18-19               |      | T25S         | 2275 FEL              |             |      |       |       |        |     |
| BD 204H                  | TDD  | R30E         | 0 ( 5 T) H            | <b>5</b> 00 | 105  | 1.500 | 200   | 1.250  | 400 |
| Poker Lake               | TBD  | 18           | 265 FNL;              | 500         | 125  | 1,500 | 900   | 1,250  | 400 |
| Unit 18-19               |      | T25S         | 1935 FEL              |             |      |       |       |        |     |
| BD 205H                  | TDD  | R30E         | 265 ENH               | 1.100       | 105  | 2.750 | 000   | 2.750  | 700 |
| Poker Lake               | TBD  | 18<br>T250   | 265 FNL;              | 1,100       | 125  | 2,750 | 900   | 3,750  | 700 |
| Unit 18-19               |      | T25S         | 1905 FEL              |             |      |       |       |        |     |
| BD 206H                  | TDD  | R30E         | 265 ENIL              | 500         | 125  | 1.500 | 000   | 1.250  | 400 |
| Poker Lake<br>Unit 18-19 | TBD  | 18<br>T25S   | 265 FNL;              | 500         | 125  | 1,500 | 900   | 1,250  | 400 |
|                          |      |              | 1875 FEL              |             |      |       |       |        |     |
| BD 207H                  | TDD  | R30E<br>18   | 265 ENII :            | 1 100       | 125  | 2.750 | 900   | 2.750  | 700 |
| Poker Lake<br>Unit 18-19 | TBD  | T25S         | 265 FNL;              | 1,100       | 125  | 2,750 | 900   | 3,750  | 700 |
| BD 208H                  | 1    | R30E         | 1845 FEL              |             |      |       |       |        |     |
| Poker Lake               | TBD  | 18           | 265 FNL;              | 500         | 50   | 5,500 | 1,700 | 4,000  | 600 |
| Unit 18-19               | עפו  |              |                       | 300         | 30   | 3,300 | 1,/00 | 4,000  | 000 |
| BD 209H                  |      | T25S<br>R30E | 1815 FEL              |             |      |       |       |        |     |
| DD 2090                  |      | KOUE         |                       |             |      |       |       |        |     |

IV. Central Delivery Point Name:\_\_PLU Brushy Draw 18 (PLU 18-30/18-19) and PLU Brushy Draw 20 (PLU 20-17/20-8) [See 19.15.27.9(D)(1) NMAC]

V. Anticipated Schedule: Provide the following information for each new or recompleted well or set of wells proposed to be drilled or

proposed to be recompleted from a single well pad or connected to a central delivery point

| proposed to be recomple | cica mom a sm | gic wen pad of con | nected to a cent | laruchvery point. |              |                  |
|-------------------------|---------------|--------------------|------------------|-------------------|--------------|------------------|
| Well Name               | API           | Spud Date          | TD Reached       | Completion        | Initial Flow | First Production |
|                         |               |                    | Date             | Commencement Date | Back Date    | Date             |
|                         |               |                    |                  |                   |              |                  |
| Poker Lake Unit 20-17   |               |                    |                  |                   |              |                  |
| BD 201                  | TDD           | A                  | TBD              | TBD               | TDD          | TDD              |
| B 1 1 1 11 1100 17      | TBD           | August 2025        | 180              | IBD               | TBD          | TBD              |
| Poker Lake Unit 20-17   |               |                    |                  |                   |              |                  |
| BD 202                  | TBD           | August 2025        | TBD              | TBD               | TBD          | TBD              |
| Poker Lake Unit 20-17   |               | 8                  |                  |                   |              |                  |
| BD 203                  |               |                    |                  |                   |              |                  |
|                         | TBD           | August 2025        | TBD              | TBD               | TBD          | TBD              |
| Poker Lake Unit 20-17   |               |                    |                  |                   |              |                  |
| BD 204                  | TDD           | 4                  | TDD              | TDD               | TDD          | TDD              |
|                         | TBD           | August 2025        | TBD              | TBD               | TBD          | TBD              |
| Poker Lake Unit 20-8    |               |                    |                  |                   |              |                  |
| BD 205                  | TBD           | August 2025        | TBD              | TBD               | TBD          | TBD              |
| Poker Lake Unit 20-8    | 100           | August 2023        | 100              | IDD               | IDD          | 100              |
| BD 206                  |               |                    |                  |                   |              |                  |
| BB 200                  | TBD           | August 2025        | TBD              | TBD               | TBD          | TBD              |
| Poker Lake Unit 20-8    |               | _                  |                  |                   |              |                  |
| BD 207                  |               |                    |                  |                   |              |                  |
|                         | TBD           | August 2025        | TBD              | TBD               | TBD          | TBD              |

| Poker Lake Unit 20-8<br>BD 208   | TBD | August 2025  | TBD | TBD | TBD | TBD |
|----------------------------------|-----|--------------|-----|-----|-----|-----|
| Poker Lake Unit 20-8<br>BD 209   | TBD | August 2025  | TBD | TBD | TBD | TBD |
| Poker Lake Unit 20-8<br>BD 210   | TBD | August 2025  | TBD | TBD | TBD | TBD |
| Poker Lake Unit 18-30<br>BD 200H | TBD | October 2025 | TBD | TBD | TBD | TBD |
| Poker Lake Unit 18-30<br>BD 201H | TBD | October 2025 | TBD | TBD | TBD | TBD |
| Poker Lake Unit 18-30<br>BD 202H | TBD | October 2025 | TBD | TBD | TBD | TBD |
| Poker Lake Unit 18-30<br>BD 203H | TBD | October 2025 | TBD | TBD | TBD | TBD |
| Poker Lake Unit 18-19<br>BD 204H | TBD | October 2025 | TBD | TBD | TBD | TBD |
| Poker Lake Unit 18-19<br>BD 205H | TBD | October 2025 | TBD | TBD | TBD | TBD |
| Poker Lake Unit 18-19<br>BD 206H | TBD | October 2025 | TBD | TBD | TBD | TBD |
| Poker Lake Unit 18-19<br>BD 207H | TBD | October 2025 | TBD | TBD | TBD | TBD |
| Poker Lake Unit 18-19<br>BD 208H | TBD | October 2025 | TBD | TBD | TBD | TBD |
| Poker Lake Unit 18-19<br>BD 209H | TBD | October 2025 | TBD | TBD | TBD | TBD |

| VI. Separation Equipment: 🗆 Attach a complete description of how Operator will size separation equipment to optimize g | as capture. |
|--|-------------|
|--|-------------|

VII. Operational Practices: ☐ Attach a complete description of the actions Operator will take to comply with the requirements of Subsection A through F of 19.15.27.8 NMAC.

VIII. Best Management Practices: ☐ Attach a complete description of Operator's best management practices to minimize venting during active and planned maintenance.

# Section 2 – Enhanced Plan EFFECTIVE APRIL 1, 2022

Beginning April 1, 2022, an operator that is not in compliance with its statewide natural gas capture requirement for the applicable reporting area must complete this section.

 $\boxtimes$  Operator certifies that it is not required to complete this section because Operator is in compliance with its statewide natural gas capture requirement for the applicable reporting area.

#### IX. Anticipated Natural Gas Production:

| We                    | 11                   | API  | Anticipated Average<br>Natural Gas Rate MCF/I | Anticipated Volume of Natural Gas for the First Year MCF                                      |
|-----------------------|----------------------|--|---|---|
| X. Natural Gas Gat    | hering System (NC    | GGS):  |   |   |
| Operator              | System               | ULSTR of Tie-in  | Anticipated Gathering<br>Start Date           | Available Maximum Daily Capacity of System Segment Tie-in                                     |
| production operation  | s to the existing or | planned interconnect of t  |   | nticipated pipeline route(s) connecting the em (s), and the maximum daily capacity of nected. |
|                       |                      | thering system $\square$ will $\square$ o the date of first produc |   | gather 100% of the anticipated natural gas  |
|                       |                      |  |   | ted to the same segment, or portion, of the n line pressure caused by the new well(s).        |
| ☐ Attach Operator's   | s plan to manage pr  | oduction in response to the  | he increased line pressure.                   |   |
| Section 2 as provided | d in Paragraph (2) o |  | 27.9 NMAC, and attaches a                     | SA 1978 for the information provided in full description of the specific information          |

# Section 3 - Certifications Effective May 25, 2021

Operator certifies that, after reasonable inquiry and based on the available information at the time of submittal:

☑ Operator will be able to connect the well(s) to a natural gas gathering system in the general area with sufficient capacity to transport one hundred percent of the anticipated volume of natural gas produced from the well(s) commencing on the date of first production, taking into account the current and anticipated volumes of produced natural gas from other wells connected to the pipeline ga thering system; or ☐ Operator will not be able to connect to a natural gas gathering system in the general area with sufficient capacity to transport one hundred percent of the anticipated volume of natural gas produced from the well(s) commencing on the date of first production, taking into account the current and anticipated volumes of produced natural gas from other wells connected to the pipeline gathering system. If Operator checks this box, Operator will select one of the following: Well Shut-In. \( \times \) Operator will shut-in and not produce the well until it submits the certification required by Paragraph (4) of Subsection D of 19.15.27.9 NMAC; or Venting and Flaring Plan. 

Operator has attached a venting and flaring plan that evaluates and selects one or more of the potential alternative beneficial uses for the natural gas until a natural gas gathering system is available, including: power generation on lease; **(b)** power generation for grid;

- compression on lease; (c)
- liquids removal on lease; (d)
- reinjection for underground storage; (e)
- reinjection for temporary storage; **(f)**
- reinjection for enhanced oil recovery; **(g)**
- (h) fuel cell production; and
- other alternative beneficial uses approved by the division. (i)

# **Section 4 - Notices**

- 1. If, at any time after Operator submits this Natural Gas Management Plan and before the well is spud:
- (a) Operator becomes aware that the natural gas gathering system it planned to connect the well(s) to has become unavailable or will not have capacity to transport one hundred percent of the production from the well(s), no later than 20 days after becoming aware of such information, Operator shall submit for OCD's approval a new or revised venting and flaring plan containing the information specified in Paragraph (5) of Subsection D of 19.15.27.9 NMAC; or
- Operator becomes aware that it has, cumulatively for the year, become out of compliance with its baseline natural gas capture rate or natural gas capture requirement, no later than 20 days after becoming aware of such information, Operator shall submit for OCD's approval a new or revised Natural Gas Management Plan for each well it plans to spud during the next 90 days containing the information specified in Paragraph (2) of Subsection D of 19.15.27.9 NMAC, and shall file an update for each Natural Gas Management Plan until Operator is back in compliance with its baseline natural gas capture rate or natural gas capture requirement.
- 2. OCD may deny or conditionally approve an APD if Operator does not make a certification, fails to submit an adequate venting and flaring plan which includes alternative beneficial uses for the anticipated volume of natural gas produced, or if OCD determines that Operator will not have a dequate natural gas takea way capacity at the time a well will be spud.

I certify that, after reasonable inquiry, the statements in and attached to this Natural Gas Management Plan are true and correct to the best of my knowledge and acknowledge that a false statement may be subject to civil and criminal penalties under the Oil and Gas Act.

| Signature: ALPAL                                      |
|---|
| Printed Name:   |
| Title:  |
| E-mail Address:                                       |
| Date:   |
| Phone:  |
| OIL CONSERVATION DIVISION                             |
| (Only applicable when submitted as a standalone form) |
| Approved By:  |
| Title:  |
| Approval Date:  |
| Conditions of Approval:                               |
|   |
|   |
|   |
|   |



#### VI. Separation Equipment:

XTO Permian Operating LLC. utilizes a "stage separation" process in which oil and gas separation is carried out through a series of separators operating at successively reduced pressures. Hydrocarbon liquids are produced into a high-pressure inlet separator, then carried through one or more lower pressure separation vessels before entering the storage tanks. The purpose of this separation process is to attain maximum recovery of liquid hydrocarbons from the fluids and allow maximum capture of produced gas into the sales pipeline. XTO utilizes a series of Low-Pressure Compression units to capture gas off the staged separation and send it to the sales pipeline. This process minimizes the amount of flash gas that enters the end-stage storage tanks that is subsequently vented or flared.

#### VII. Operational Practices

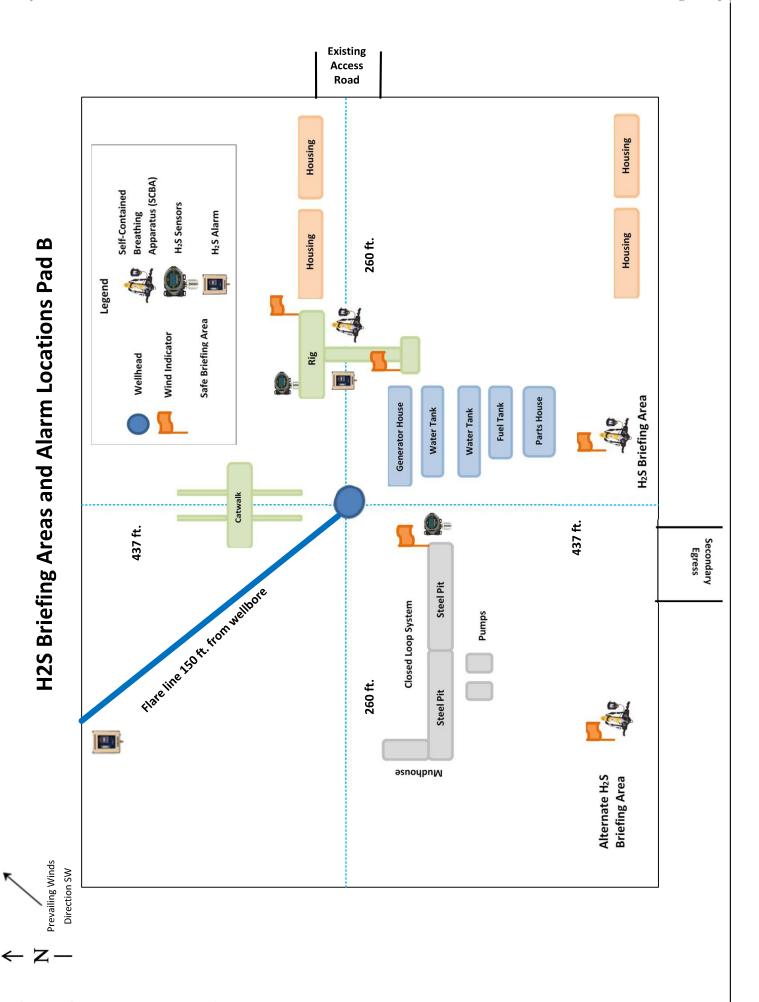
XTO Permian Operating LLC will employ best management practices and control technologies to maximize the recovery and minimize waste of natural gas through venting and flaring.

- During drilling operations, XTO will utilize flares to capture and control natural gas, where technically feasible. If flaring is deemed technically in-feasible, XTO will employ best management practices to minimize or reduce venting to the extent possible.
- During completions operations, XTO will utilize Green Completion methods to capture gas produced during well completions that is otherwise vented or flared. If capture is technically infeasible, flares will be used to control flow back fluids entering into frac tanks during initial flowback. Upon indication of first measurable hydrocarbon volumes, XTO Permian Operating LLCwill turn operations to onsite separation vessels and flow to the gathering pipeline.
- During production operations, XTO Permian Operating LLC will take every practical effort to minimize waste of natural gas through venting and flaring by:
  - Designing and constructing facilities in a manner consistent to achieve maximum capture and control of hydrocarbon liquids & produced gas
  - Utilizing a closed-loop capture system to collect, and route produced gas to sales line via low pressure compression, or to a flare/combustor
  - Flaring in lieu of venting, where technically feasible
  - Utilizing auto-ignitors or continuous pilots, with thermocouples connected to Scada, to quickly detect and resolve issues related to malfunctioning flares/combustors
  - Employ the use of automatic tank gauging to minimize storage tank venting during loading events
  - Installing air-driven or electric-driven pneumatics & combustion engines, where technically feasible to minimize venting to the atmosphere
  - Confirm equipment is properly maintained and repaired through a preventative maintenance and repair program to ensure equipment meets all manufacturer specifications

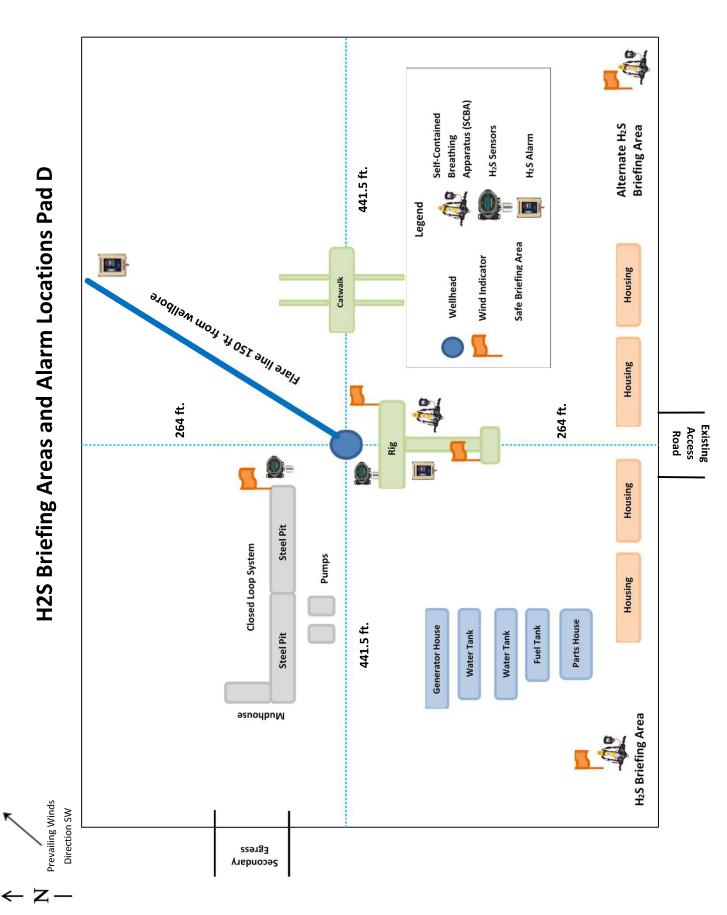
 Conduct and document AVO inspections on the frequency set forth in Part 27 to detect and repair any onsite leaks as quickly and efficiently as is feasible.

VIII. Best Management Practices during Maintenance

XTO Permian Operating LLC. will utilize best management practices to minimize venting during active and planned maintenance activities. XTO is operating under guidance that production facilities permitted under NOI permits have no provisions to allow high pressure flaring and high-pressure flaring is only allowed in disruption scenarios so long as the duration is less than eight hours. When technically feasible, flaring during maintenance activities will be utilized in lieu of venting to the atmosphere. XTO will work with third-party operators during scheduled maintenance of downstream pipeline or processing plants to address those events ahead of time to minimize venting. Actions considered include identifying alternative capture approaches or planning to temporarily reduce production or shut in the well to address these circumstances.



H2S Briefing Areas and Alarm Locations Pad D



**<u>Subject:</u>** Request for a Variance Allowing break Testing of the Blowout Preventer Equipment (BOPE)

XTO Energy requests a variance to ONLY test broken pressure seals on the BOPE and function test BOP when skidding a drilling rig between multiple wells on a pad.

#### **Background**

Onshore Oil and Gas Order CFR Title 43 Part 3170, Drilling Operations, Sections III.A.2.i.iv.B states that the BOP test must be performed whenever any seal subject to test pressure is broken. The current interpretation of the Bureau of Land Management (BLM) requires a complete BOP test and not just a test of the affected component. CFR Title 43 Part 3170 states, "Some situation may exist either on a well-by-well basis or field-wide basis whereby it is commonly accepted practice to vary a particular minimum standard(s) established in this order. This situation can be resolved by requesting a variance...". XTO Energy feels the break testing the BOPE is such a situation. Therefore, as per CFR Title 43 Part 3170, XTO Energy submits this request for the variance.

#### **Supporting Documentation**

CFR Title 43 Part 3170 became effective on December 19, 1988 and has remained the standard for regulating BLM onshore drilling operations for over 30 years. During this time there have been significant changes in drilling technology. BLM continues to use the variance request process to allow for the use of modern technology and acceptable engineering practices that have arisen since CFR Title 43 Part 3170 was originally released. The XTO Energy drilling rig fleet has many modern upgrades that allow the intact BOP stack to be moved between well slots on a multi-well pad, as well as, wellhead designs that incorporate quick connects facilitating release of the BOP from the wellhead without breaking any BOP stack components apart. These technologies have been used extensively offshore, and other regulators, API, and many operators around the world have endorsed break testing as safe and reliable.



Figure 1: Winch System attached to BOP Stack



Figure 2: BOP Winch System

American Petroleum Institute (API) standards, specification and recommended practices are considered the industry standard and are consistently utilized and referenced by the industry. CFR Title 43 Part 3170recognizes API recommended Practices (RP) 53 in its original development. API Standard 53, *Well Control Equipment Systems for Drilling Wells* (Fifth Edition, December 2018, Annex C, Table C.4) recognizes break testing as an acceptable practice. Specifically, API Standard 53, Section 5.3.7.1 states "A pressure test of the pressure containing component shall be performed following the disconnection or repair, limited to the affected component." See Table C.4 below for reference.

| Tab  | ole C.4—Initial Pressure Te   | esting, Surface BOP Stacks   |  |
|--|---|--|--|
|  | Pressure Test—Low   | Pressure Test-   | -High Pressure <sup>ac</sup>   |
| Component to be Pressure<br>Tested   | Pressure <sup>ac</sup><br>psig (MPa)  | Change Out of<br>Component, Elastomer,<br>or Ring Gasket   | No Change Out of<br>Component, Elastomer,<br>or Ring Gasket                      |
| Annular preventer <sup>b</sup>   | 250 to 350 (1.72 to 2.41)   | RWP of annular preventer   | MASP or 70% annular<br>RWP, whichever is lower.                                  |
| Fixed pipe, variable bore,<br>blind, and BSR preventers <sup>bd</sup>  | 250 to 350 (1.72 to 2.41)   | RWP of ram preventer or<br>wellhead system,<br>whichever is lower  | ITP  |
| Choke and kill line and BOP<br>side outlet valves below ram<br>preventers (both sides)   | 250 to 350 (1.72 to 2.41)   | RWP of side outlet valve or<br>wellhead system,<br>whichever is lower  | ITP  |
| Choke manifold—upstream of chokes <sup>e</sup>   | 250 to 350 (1.72 to 2.41)   | RWP of ram preventers or<br>wellhead system,<br>whichever is lower   | ITP  |
| Choke manifold—downstream of chokese   | 250 to 350 (1.72 to 2.41)   | RWP of valve(s), line(s), or M<br>whichever is lower   | MASP for the well program,   |
| Kelly, kelly valves, drill pipe<br>safety valves, IBOPs  | 250 to 350 (1.72 to 2.41)   | MASP for the well program  |  |
| <ul> <li>Annular(s) and VBR(s) shall be pre</li> <li>For pad drilling operations, moving<br/>pressure-controlling connections</li> <li>For surface offshore operations, the</li> </ul> | during the evaluation period. The pssure tested on the largest and sm from one wellhead to another within when the integrity of a pressure se ram BOPs shall be pressure testand operations, the ram BOPs shall | oressure shall not decrease below the<br>allest OD drill pipe to be used in well<br>n the 21 days, pressure testing is req | program.<br>juired for pressure-containing an<br>the closing and locking pressur |

The Bureau of Safety and Environmental Enforcement (BSEE), Department of Interior, has also utilized the API standards, specification and best practices in the development of its offshore oil and gas regulations and incorporates them by reference within its regulations.

Break testing has been approved by the BLM in the past with other operators based on the detailed information provided in this document.

XTO Energy feels break testing and our current procedures meet the intent of CFR Title 43 Part 317 Oand often exceed it. There has been no evidence that break testing results in more components failing than seen on full BOP tests. XTO Energy's internal standards requires complete BOPE tests more often than that of CFR Title 43 Part 3170 (Every 21 days). In addition to function testing the annular, pipe rams and blind rams after

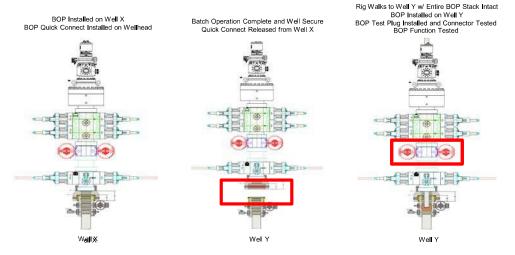
each BOP nipple up, XTO Energy performs a choke drill with the rig crew prior to drilling out every casing shoe. This is additional training for the rig crew that exceeds the requirements of the CFR Title 43 Part 3170.

#### **Procedures**

- XTO Energy will use this document for our break testing plan for New Mexico Delaware basin.
  The summary below will be referenced in the APD or Sundry Notice and receive approval prior
  to implementing this variance.
- 2. XTO Energy will perform BOP break testing on multi-wells pads where multiple intermediate sections can be drilled and cased within the 21-day BOP test window.
  - a. A full BOP test will be conducted on the first well on the pad.
  - b. The first intermediate hole section drilled on the pad will be the deepest. All of the remaining hole sections will be the same depth or shallower.
    - i. Our Lower WC targets set the intermediate casing shoe no deeper than the Wolfcamp B.
    - ii. Our Upper WC targets set the intermediate casing shoe shallower than the Wolfcamp B.
  - c. A Full BOP test will be required if the intermediate hole section being drilled has a MASP over 5M.
  - d. A full BOP test will be required prior to drilling any production hole.
- 3. After performing a complete BOP test on the first well, the intermediate hole section will be drilled and cased, two breaks would be made on the BOP equipment.
  - a. Between the HCV valve and choke line connection
  - b. Between the BOP quick connect and the wellhead
- 4. The BOP is then lifted and removed from the wellhead by a hydraulic system.
- 5. After skidding to the next well, the BOP is moved to the wellhead by the same hydraulic system and installed.
- 6. The connections mentioned in 3a and 3b will then be reconnected.
- 7. Install test plug into the wellhead using test joint or drill pipe.
- 8. A shell test is performed against the upper pipe rams testing the two breaks.
- 9. The shell test will consist of a 250 psi low test and a high test to the value submitted in the APD or Sundry (e.g. 5,000 psi or 10,000psi).
- 10. Function test will be performed on the following components: lower pipe rams, blind rams, and annular.

- 11. For a multi-well pad the same two breaks on the BOP would be made and on the next wells and steps 4 through 10 would be repeated.
- 12. A second break test would only be done if the intermediate hole section being drilled could not be completed within the 21 day BOP test window.

Note: Picture below highlights BOP components that will be tested during batch operations



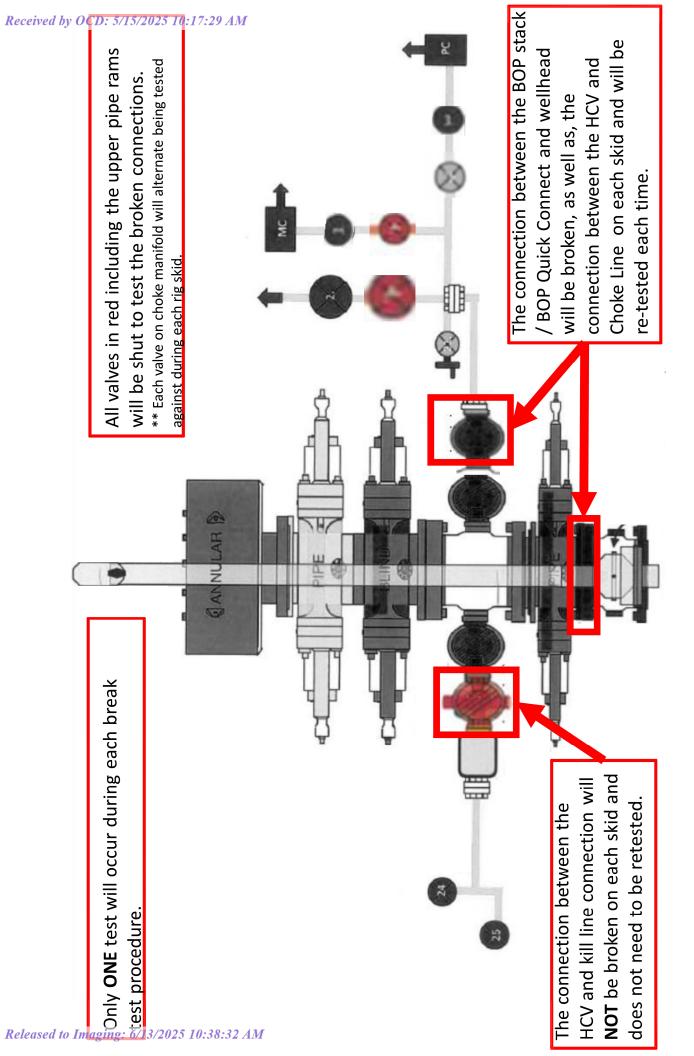
#### Summary

A variance is requested to **ONLY** test broken pressure seals on the BOP equipment when moving from wellhead to wellhead which is in compliance with API Standard 53. API Standard 53 states, that for pad drilling operation, moving from one wellhead to another within 21 days, pressure testing is required for pressure-containing and pressure-controlling connections when the integrity of a pressure seal is broken.

The BOP will be secured by a hydraulic carrier or cradle. The BLM will be contacted if a Well Control event occurs prior to the commencement of a BOPE Break Testing operation.

Based on discussions with the BLM on February 27th 2020 and the supporting documentation submitted to the BLM, we will request permission to ONLY retest broken pressure seals if the following conditions are met:

- 1. After a full BOP test is conducted on the first well on the pad.
- 2. The first intermediate hole section drilled on the pad will be the deepest. All of the remaining hole sections will be the same depth or shallower.
- 3. Full BOP test will be required if the intermediate hole section being drilled has a MASP over 5M.
- 4. Full BOP test will be required prior to drilling the production hole.





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WEB: www.gates.com/oilandgas

NEW CHOKE HOSE

INSTAUED 02-10-2024

# CERTIFICATE OF CONFORMANCE

This is to verify that the items detailed below meet the requirements of the Customer's Purchase Order referenced herein, and are in Conformance with applicable specifications, and that Records of Required Tests are on file and subject to examination. The following items were inspected and hydrostatically tested at **Gates Engineering & Services North America** facilities in Houston, TX, USA.

| CU | ST | ON | ER: |  |
|----|----|----|-----|--|
|    | -  |    |     |  |

NABORS DRILLING TECHNOLOGIES USA DBA NABORS DRILLING USA

CUSTOMER P.O.#:

15582803 (TAG NABORS PO #15582803 SN 74621 ASSET 66-1531)

CUSTOMER P/N:

IMR RETEST SN 74621 ASSET #66-1531

PART DESCRIPTION:

RETEST OF CUSTOMER 3" X 45 FT 16C CHOKE & KILL HOSE ASSEMBLY C/W 4 1/16" 10K

FLANGES

SALES ORDER #:

529480

QUANTITY:

- 1

SERIAL #:

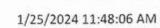
74621 H3-012524-1

SIGNATURE: 7. CUSTUSE

TITLE: QUALITY ASSURANCE

DATE: 1/25/2024

# H3-15/16





# TEST REPORT

CUSTOMER

Company:

Nabors Industries Inc.

TEST OBJECT

Serial number: H3-012524-1

Lot number:

Production description: 74621/66-1531

Sales order #: 529480

Description:

74621/66-1531

3.0 x 4-1/16 10K

3.0 x 4-1/16 10K

Customer reference:

FG1213

Hose ID:

3" 16C CK

TEST INFORMATION

Test pressure hold:

Work pressure hold:

Length difference:

Length difference:

Test procedure: Test pressure:

Work pressure:

GTS-04-053

3600.00

15000.00 psi

sec

psi

10000.00

sec

900.00 0.00

% inch Fitting 1:

Part number:

Part number:

Description:

Fitting 2:

Part number:

Description:

Length:

45

feet

n. . . . 1/2

Visual check:

Pressure test result:

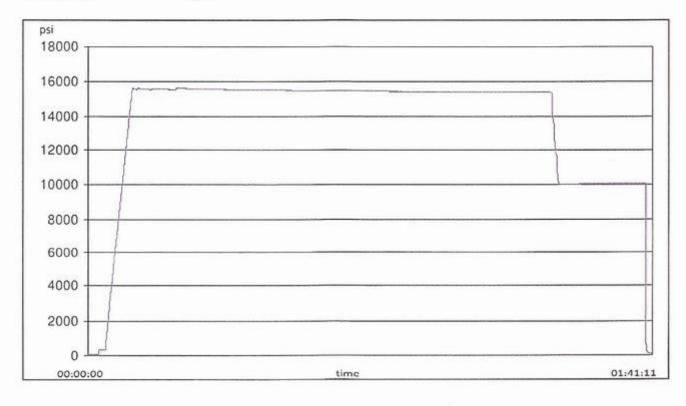
Length measurement result:

Test operator:

Travis

PASS

0.00





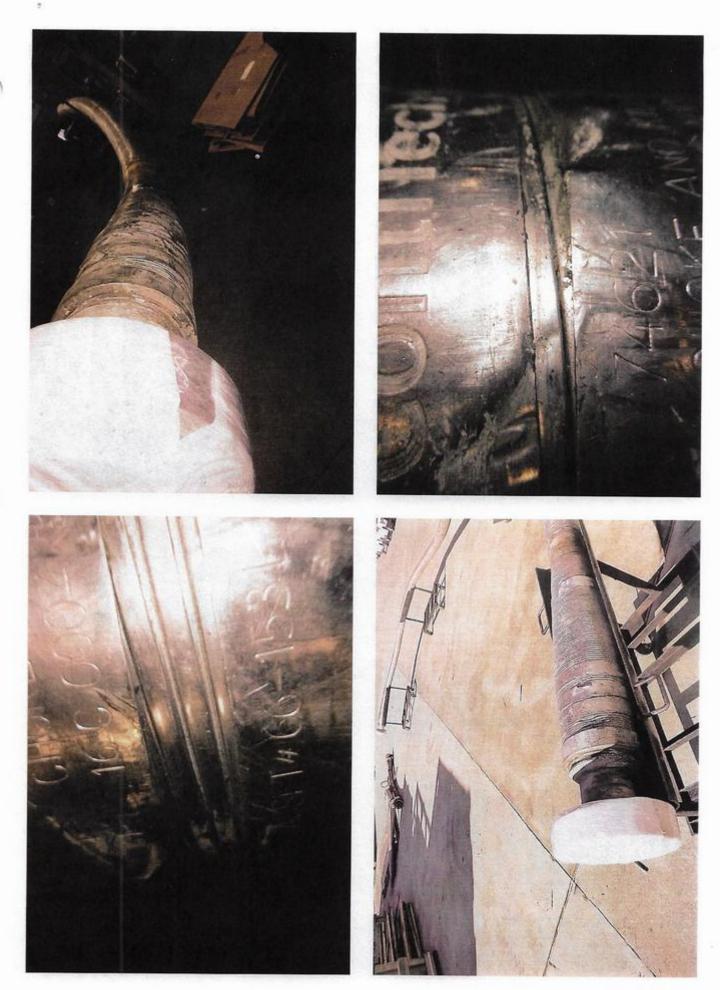
H3-15/16

1/25/2024 11:48:06 AM

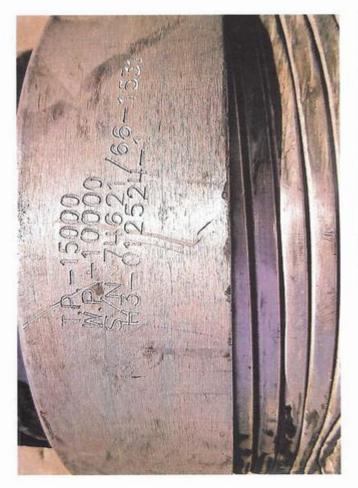
# **TEST REPORT**

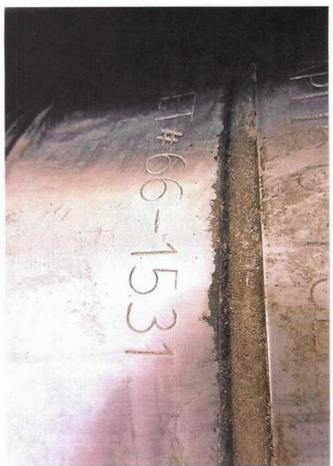
# **GAUGE TRACEABILITY**

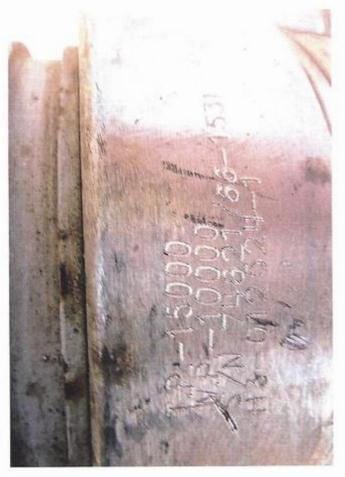
| Description | Serial number | Calibration date | Calibration due date |
|-------------|---------------|------------------|----------------------|
| S-25-A-W    | 110D3PHO      | 2023-06-06       | 2024-06-06           |
| S-25-A-W    | 110IQWDG      | 2023-05-16       | 2024-05-16           |
| Comment     |               |                  |                      |
|             |               |                  |                      |
|             |               |                  |                      |
|             |               |                  |                      |
|             |               |                  |                      |
|             |               |                  |                      |



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## XTO Permian Operating, LLC Offline Cementing Variance Request

XTO requests the option to cement the surface and intermediate casing strings offline as a prudent batch drilling efficiency of acreage development.

#### 1. Cement Program

No changes to the cement program will take place for offline cementing.

## 2. Offline Cementing Procedure

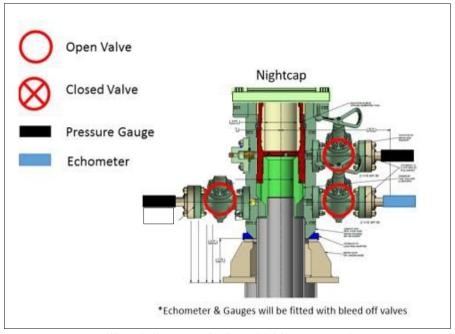
The operational sequence will be as follows. If a well control event occurs, the BLM will be contacted for approval prior to conducting offline cementing operations.

- 1. Run casing as per normal operations. While running casing, conduct negative pressure test and confirm integrity of the float equipment (float collar and shoe)
- 2. Land casing with mandrel
- 3. Fill pipe with kill weight fluid, do not circulate through floats and confirm well is static
- 4. Set annular packoff shown below and pressure test to confirm integrity of the seal. Pressure ratings of wellhead components and valves is 5,000 psi.
- 5. After confirmation of both annular barriers and internal barriers, nipple down BOP and install cap flange.
  - a. If any barrier fails to test, the BOP stack will not be nippled down until after the cement job is completed with cement 500ft above the highest formation capable of flow with kill weight mud above or after it has achieved 50-psi compressive strength if kill weight fluid cannot be verified.



Annular packoff with both external and internal seals

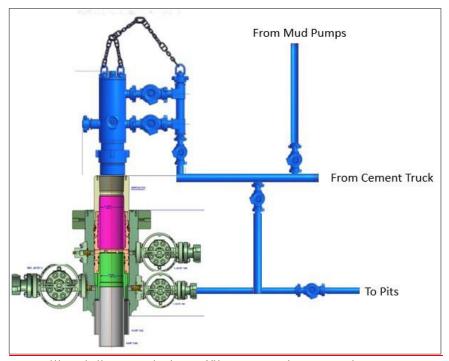
#### XTO Permian Operating, LLC Offline Cementing Variance Request



Wellhead diagram during skidding operations

- 6. Skid rig to next well on pad.
- 7. Confirm well is static before removing cap flange, flange will not be removed and offline cementing operations will not commence until well is under control. If well is not static, casing outlet valves will provide access to both the casing ID and annulus. Rig or third party pump truck will kill well prior to cementing or nippling up for further remediation.
  - a. Well Control Plan
    - i. The Drillers Method will be the primary well control method to regain control of the wellbore prior to cementing, if wellbore conditions do not permit the drillers method other methods of well control may be used
    - ii. Rig pumps or a 3<sup>rd</sup> party pump will be tied into the upper casing valve to pump down the casing ID
    - iii. A high pressure return line will be rigged up to lower casing valve and run to choke manifold to control annular pressure
    - iv. Once influx is circulated out of the hole, kill weight mud will be circulated
    - v. Well will be confirmed static
    - vi. Once confirmed static, cap flange will be removed to allow for offline cementing operations to commence
- 8. Install offline cement tool
- 9. Rig up cement equipment

## XTO Permian Operating, LLC Offline Cementing Variance Request



Wellhead diagram during offline cementing operations

- 10. Circulate bottoms up with cement truck
  - a. If gas is present on bottoms up, well will be shut in and returns rerouted through gas buster to handle entrained gas
  - b. Max anticipated time before circulating with cement truck is 6 hrs
- 11. Perform cement job taking returns from the annulus wellhead valve
- 12. Confirm well is static and floats are holding after cement job
- 13. Remove cement equipment, offline cement tools and install night cap with pressure gauge for monitoring.

XTO respectfully requests approval to utilize a spudder rig to pre-set surface casing.

## Description of Operations:

- 1. Spudder rig will move in to drill the surface hole and pre-set surface casing on the well.
  - After drilling the surface hole section, the spudder rig will run casing and cement following all of the applicable rules and regulations (OnShore Order 2, all COAs and NMOCD regulations).
  - b. The spudder rig will utilize fresh water-based mud to drill the surface hole to TD. Solids control will be handled entirely on a closed loop basis. No earth pits will be used.
- 2. The wellhead will be installed and tested as soon as the surface casing is cut off and WOC time has been reached.
- 3. A blind flange at the same pressure rating as the wellhead will be installed to seal the wellbore. Pressure will be monitored with needle valves installed on two wing valves.
  - a. A means for intervention will be maintained while the drilling rig is not over the well.
- 4. Spudder rig operations are expected to take 2-3 days per well on the pad.
- 5. The BLM will be contacted and notified 24 hours prior to commencing spudder rig operations.
- 6. Drilling Operations will begin with a larger rig and a BOP stack equal to or greater than the pressure rating that was permitted will be nippled up and tested on the wellhead before drilling operations resume on each well.
  - a. The larger rig will move back onto the location within 90 days from the point at which the wells are secured and the spudder rig is moved off location.
  - b. The BLM will be notified 24 hours before the larger rig moves back on the pre-set locations
- 7. XTO will have supervision on the rig to ensure compliance with all BLM and NMOCD regulations and to oversee operations.
- 8. Once the rig is removed, XTO will secure the wellhead area by placing a guard rail around the cellar area.

05/14/2025

Received by OCD: 5/15/2025 10:17:29 AM
U.S. Department of the Interior
BUREAU OF LAND MANAGEMENT

BUREAU OF LAND MANAGEMENT

**APD ID:** 10400100973

Operator Name: XTO PERMIAN OPERATING LLC

Well Name: POKER LAKE UNIT 20-8 BD

Well Type: OIL WELL

Submission Date: 09/23/2024

Well Number: 207H

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:** 

Poker\_Lake\_Unit\_20\_8\_BD\_207H\_Existing\_Road\_Map\_20240912031048.pdf

Existing Road Purpose: ACCESS 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? NO

# **Section 3 - Location of Existing Wells**

**Existing Wells Map?** YES

**Existing Well map Attachment:** 

Released to Imaging: 6/13/2025 10:38:32 AM

Poker\_Lake\_Unit\_20\_17\_\_\_20\_8\_BD\_1Mile\_Radius\_20240911065741.pdf

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

Submit or defer a Proposed Production Facilities plan? SUBMIT

**Production Facilities description:** A. Production Facilities. No New facility is required for the Poker Lake Unit 20-17/20-8 BD wells. Once drilled and completed, the wells will flow to the Poker Lake Unit 20-17/20-8 BD battery. B. Flowlines. No further flowlines disturbance is requested. C. Gas Pipeline. No Gas Sales line is required for this well. No additional surface disturbance is needed. D. Disposal Facilities. Produced water will be hauled from location to a commercial or private disposal facility as needed. E. Flare. - Check in facility plot attached. F. Aboveground Structures. All permanent (on site six months or longer) aboveground structures constructed or installed on location and not subject to safety requirements will be painted earth-tone colors such as BLM Standard Environmental Color Chart (CC-001: June 2008) that reduce the visual impacts of the built environment. G. Containment Berms. Containment berms will be constructed completely around any production facilities designed. The containment berms will be constructed of compacted caliche, be sufficiently impervious, away from cut or fill areas. H. Electrical. No additional electrical is required for this well. No additional surface disturbance is needed. I. Facility Description- Kindly see the facility plot attached.

#### **Production Facilities map:**

XTO\_DB\_BDWST\_00CTB\_PLOT\_000\_0\_Model\_6\_18\_18\_20240911053241.pdf

# Section 5 - Location and Types of Water Supply

## **Water Source Table**

Water source type: OTHER

**Describe type:** Fresh Water

Water source use type: DUST CONTROL

SURFACE CASING

**STIMULATION** 

Source latitude: Source longitude:

Source datum:

City:

Water source permit type: PRIVATE CONTRACT

Water source transport method: TRUCKING

Source land ownership: COMMERCIAL

Source transportation land ownership: FEDERAL

Water source volume (barrels): 550000 Source volume (acre-feet): 70.89120298

Source volume (gal): 23100000

Water source type: OTHER

Describe type: Raw Produced Water

Water source use type: INTERMEDIATE/PRODUCTION

**CASING** 

Source latitude: Source longitude:

Source datum:

City:

Water source permit type: PRIVATE CONTRACT

Water source transport method: PIPELINE

Source land ownership: COMMERCIAL

Source transportation land ownership: FEDERAL

Water source volume (barrels): 550000 Source volume (acre-feet): 70.89120298

Source volume (gal): 23100000

Water source type: RECYCLED

Water source use type: INTERMEDIATE/PRODUCTION

CASING

Source latitude: Source longitude:

Source datum:

City:

Water source permit type: PRIVATE CONTRACT

Water source transport method: PIPELINE

Source land ownership: COMMERCIAL

Source transportation land ownership: FEDERAL

Water source volume (barrels): 550000 Source volume (acre-feet): 70.89120298

Water source and transportation

Poker\_Lake\_Unit\_20\_8\_BD\_207H\_Vicinity\_Map\_20240912031210.pdf

Water source comments: The well will be drilled using a combination of water mud systems as outlined in the Drilling Program. Water composition depends on the mud type needed per formation to protect useable water. Fresh water is trucked to location for use in surface casing drilling and cementing. All other water is either brackish (3P) or raw produced water (XOM) that is all piped from either a pipeline or a pond 32.1483028, -103.922338) to the drilling location. Anticipated water usage for drilling includes an estimated 50,000 barrels of water to drill a horizontal well in a combination of fresh water and brine as detailed in the mud program in the drilling plans. These volumes are calculated for ~1.5bbls per foot of hole drilled with excess to accommodate any lost circulation or wash out that may occur. Actual water volumes used during operations will depend on the depth of the well, length of horizontal sections, and the losses that may occur

during the operation. Temporary water lines will be permitted via a Temporary Water Line Approved Decision letter and/or any necessary Right of Way Grants as needed based on drilling and completion schedules. Well completion is expected to require approximately 550,000 barrels of water per horizontal well. Actual water volumes used during operations will depend on the depth of the well and length of horizontal sections.

New water well? N

## **New Water Well Info**

Well latitude: Well Longitude: Well datum:

Well target aquifer:

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**

Using any construction materials: NO

**Construction Materials description:** 

Construction Materials source location

# Section 7 - Methods for Handling

Waste type: DRILLING

Waste content description: Cuttings

Amount of waste: 2100 pounds

Waste disposal frequency: One Time Only

**Safe containment description:** The well will be drilled utilizing a closed-loop mud system. Drill cuttings will be held in roll-off style mud boxes and taken to a New Mexico Oil Conservation Division (NMOCD) approved disposal site.

Safe containment attachment:

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

**FACILITY** 

Disposal type description:

Disposal location description: R360 Environmental Solutions 4507 W Carlsbad Hwy, Hobbs, NM 88240

Waste type: DRILLING

Waste content description: FLUID

Amount of waste: 500 barrels

Waste disposal frequency: One Time Only

Safe containment description: Steel Mud Boxes

Safe containment attachment:

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

**FACILITY** 

Disposal type description:

Disposal location description: R360 Environmental Solutions 4507 W Carlsbad Hwy, Hobbs, NM 88240

Waste type: GARBAGE

Waste content description: All garbage, junk and non-flammable waste materials will be contained in a self-contained, portable dumpster or trash cage, to prevent scattering and will be removed and deposited in an approve sanitary landfill. Immediately after drilling all debris and other waste materials on and around the well location not contained in the trash cage will be cleaned up and removed from the location. No potentially adverse materials or substances will be left on the location.

Amount of waste: 250 pounds

Waste disposal frequency: Weekly

Safe containment description: All garbage, junk and non-flammable waste materials will be contained in a self-contained, portable dumpster or trash cage, to prevent scattering and will be removed and deposited in an approve sanitary landfill. Immediately after drilling all debris and other waste materials on and around the well location not contained in the trash cage will be cleaned up and removed from the location. No potentially adverse materials or substances will be left on the location.

#### Safe containment attachment:

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

**FACILITY** 

Disposal type description:

Disposal location description: A licensed 3rd party contractor will be used to haul and dispose of garbage.

Waste type: SEWAGE

**Waste content description:** Portable, self-contained toilets will be provided for human waste disposal. Upon completion of drilling and completion activities, or as required, the toilet holding tanks will be pumped and the contents thereof disposed of in an approved sewage disposal facility. All state and local laws and regulations pertaining to the disposal of human and solid waste will be complied with. This equipment will be properly maintained during the drilling and completion operations and will be removed when all operations are complete.

Amount of waste: 250 gallons

Waste disposal frequency: Weekly

Safe containment description: Portable, self-contained toilets will be provided for human waste disposal.

Upon completion of drilling and completion activities, or as required, the toilet holding tanks will be pumped and the contents thereof disposed of in an approved sewage disposal facility. All state and local laws and regulations pertaining to the disposal of human and solid waste will be complied with. This equipment will be properly maintained during the drilling and completion operations and will be removed when all operations are complete.

Safe containment attachment:

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

**FACILITY** 

Disposal type description:

Disposal location description: A licensed 3rd party contractor to haul and dispose of human waste.

## **Reserve Pit**

Reserve Pit being used? NO

Temporary disposal of produced water into reserve pit? NO

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? Y

**Description of cuttings location** Cuttings. The well will be drilled utilizing a closed-loop mud system. Drill cuttings will be held in roll-off style mud boxes and taken to a New Mexico Oil Conservation Division (NMOCD) approved disposal site. Drilling Fluids. These will be contained in steel mud pits and then taken to a NMOCD approved commercial disposal facility. Produced Fluids. Water produced from the well will be held temporarily in steel tanks and then taken to a NMOCD approved commercial disposal facility. Oil produced during operations will be stored in s until sold.

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?

**Cuttings area liner** 

Cuttings area liner specifications and installation description

# **Section 8 - Ancillary**

Are you requesting any Ancillary Facilities?: N

**Ancillary Facilities** 

Comments:

Section 9 - Well Site

#### Well Site Layout Diagram:

Poker\_Lake\_Unit\_20\_8\_BD\_207H\_RL\_20240917121236.pdf

Poker\_Lake\_Unit\_20\_8\_BD\_207H\_Well\_Site\_Plat\_Updated\_20250327163048.pdf

Comments: Multi-Well Pad.

#### Section 10 - Plans for Surface

Type of disturbance: No New Surface Disturbance Multiple Well Pad Name: POKER LAKE UNIT 20-8 BD

Multiple Well Pad Number: D

#### Recontouring

XTO\_POKER\_LAKE\_UNIT\_20\_17\_20\_8\_BD\_PAD\_B\_INTERIM\_RECLAMATION\_FINAL\_3\_20\_2025\_20250327162931.pdf

XTO POKER LAKE UNIT 20 17 20 8 BD PAD D INTERIM RECLAMATION FINAL 3 20 2025 20250327162931.pdf

**Drainage/Erosion control construction:** Initial seedbed preparation will consist of recontouring to the appropriate interim or final reclamation standard. All compacted areas to be seeded will be ripped to a minimum depth of 18 inches with a minimum furrow spacing of 2 feet, followed by recontouring the surface and then evenly spreading the stockpiled topsoil. Prior to seeding, the seedbed will be scarified to a depth of no less than 4-6 inches.

**Drainage/Erosion control reclamation:** Erosion features are equal to or less than surrounding area and erosion control is sufficient so that water naturally infiltrates into the soil and gullying, head cutting, slumping, and deep or excessive rills (greater than 3 inches) are not observed.

Well pad proposed disturbance Well pad interim reclamation (acres): 0 Well pad long term disturbance

(acres): (acres):

Road proposed disturbance (acres): Road interim reclamation (acres): 0 Road long term disturbance (acres): 0

Powerline proposed disturbance Powerline interim reclamation (acres): Powerline long term disturbance

(acres): 0 (acres): 0

Pipeline proposed disturbance Pipeline interim reclamation (acres): 0 Pipeline long term disturbance

(acres): (acres): 0

Other proposed disturbance (acres): Other interim reclamation (acres): 0 Other long term disturbance (acres): 0

Total proposed disturbance: 0 Total interim reclamation: 0 Total long term disturbance: 0

#### **Disturbance Comments:**

**Reconstruction method:** The original stockpiled topsoil will be spread over the areas being reclaimed and the original landform will be restored for all disturbed areas including well pads, production facilities, roads,

pipelines, and utility corridors as close as possible to the original topography. The location will then be ripped and seeded.

**Topsoil redistribution:** The original stockpiled topsoil will be spread over the areas being reclaimed and the original landform will be restored for all disturbed areas including well pads, production facilities, roads, pipelines, and utility corridors as close as possible to the original topography. The location will then be ripped and seeded.

**Soil treatment:** A self-sustaining, vigorous, diverse, native (or otherwise approved) plant community will be established on the site with a density sufficient to control erosion and invasion by non-native plants and to re-establish wildlife habitat or forage production. At a minimum, the established plant community will consist of species included in the seed mix and/or desirable species occurring in the surrounding natural vegetation.

**Existing Vegetation at the well pad:** Soils are classified as Simona Gravelly Fine Sandy Loam and Simona-Bippus Complex. Simona soils are found on alluvial fans and plans and form in mixed alluvium and/or Aeolian sands. Bippus soils are found on alluvial fans and floodplains and form in mixed alluvium. The Simona-Bippus soils are dominant to the east and the Simona Gravelly Fine Sandy Loams are dominant to the West. Dominant vegetation species include: mesquite, sumac snakeweed, and various forbs and grasses. Ground cover is minimal, offering 90 percent visibility.

## **Existing Vegetation at the well pad**

<style isBold=&quot;true&quot;&gt;Existing Vegetation Community at the road:&lt;/style&gt; Soils are classified as Simona Gravelly Fine Sandy Loam and Simona-Bippus Complex. Simona soils are found on alluvial fans and plans and form in mixed alluvium and/or Aeolian sands. Bippus soils are found on alluvial fans and floodplains and form in mixed alluvium. The SimonaBippus soils are dominant to the east and the Simona Gravelly Fine Sandy Loams are dominant to the West. Dominant vegetation species include: mesquite, sumac snakeweed, and various forbs and grasses. Ground cover is minimal, offering 90 percent visibility.

## **Existing Vegetation Community at the road**

<style isBold=&quot;true&quot;&gt;Existing Vegetation Community at the pipeline:&lt;/style&gt; Soils are classified as Simona Gravelly Fine Sandy Loam and Simona-Bippus Complex. Simona soils are found on alluvial fans and plans and form in mixed alluvium and/or Aeolian sands. Bippus soils are found on alluvial fans and floodplains and form in mixed alluvium. The SimonaBippus soils are dominant to the east and the Simona Gravelly Fine Sandy Loams are dominant to the West. Dominant vegetation species include: mesquite, sumac snakeweed, and various forbs and grasses. Ground cover is minimal, offering 90 percent visibility.

#### **Existing Vegetation Community at the pipeline**

<style isBold=&quot;true&quot;&gt;Existing Vegetation Community at other disturbances:&lt;/style&gt; Soils are classified as Simona Gravelly Fine Sandy Loam and Simona-Bippus Complex. Simona soils are found on alluvial fans and plans and form in mixed alluvium and/or Aeolian sands. Bippus soils are found on alluvial fans and floodplains and form in mixed alluvium. The SimonaBippus soils are dominant to the east and the Simona Gravelly Fine Sandy Loams are dominant to the West. Dominant vegetation species include: mesquite, sumac snakeweed, and various forbs and grasses. Ground cover is minimal, offering 90 percent visibility.

**Existing Vegetation Community at other disturbances** 

Non native seed used? N

Non native seed description:

Seedling transplant description:

Will seedlings be transplanted for this project? N

Seedling transplant description attachment:

Will seed be harvested for use in site reclamation? N

Seed harvest description:

Seed harvest description attachment:

Seed

**Seed Table** 

Seed Summary

Seed Type Pounds/Acre

Seed reclamation

**Operator Contact/Responsible Official** 

First Name: Robert Last Name: Bartels

Phone: (406)478-3617 Email: Robert.e.bartels@exxonmobil.com

**Seedbed prep:** Initial seedbed preparation will consist of recontouring to the appropriate interim or final reclamation standard. All compacted areas to be seeded will be ripped to a minimum depth of 18 inches with a minimum furrow spacing of 2 feet, followed by recontouring the surface and then evenly spreading the stockpiled topsoil. Prior to seeding, the seedbed will be scarified to a depth of no less than 4-6 inches. If the site is to be broadcast seeded, the surface will be left rough enough to trap seed and snow, control erosion, and increase water infiltration.

Total pounds/Acre:

**Seed BMP:** If broadcast seeding is to be used and is delayed, final seedbed preparation will consist of contour cultivating to a depth of 4-6 inches within 24 hours prior to seeding, dozer tracking, or other imprinting to break the soil crust and create seed germination micro-sites.

**Seed method:** Seeding will be conducted no more than two weeks following completion of final seedbed preparation. A certified weed-free seed mix designed by the BLM to meet reclamation standards will be used.

Existing invasive species? N

Existing invasive species treatment description:

**Existing invasive species treatment** 

**Weed treatment plan description:** Weed control for all phases will be through the use of approved pesticides and herbicides according to applicable State, Federal and local laws.

Weed treatment plan

**Monitoring plan description:** Monitoring of invasive and noxious weeds will be visual and as-needed. If it is determined additional methods are required to monitor invasive and noxious weeds, appropriate BLM authorities will be contacted with a plan of action for approval prior to implementation.

Monitoring plan

Success standards: 100% compliance with applicable regulations.

**Pit closure description:** There will be no reserve pit as each well will be drilled utilizing a closed loop mud system. The closed loop system will meet the NMOCD requirements 19.15.17.

Pit closure attachment:

# Section 11 - Surface

| Section 11 - Surface                   |     |
|--|-----|
| Disturbance type: EXISTING ACCESS ROAL | )   |
| Describe:                              |     |
| Surface Owner: BUREAU OF LAND MANAG    | EM  |
| 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:                 |     |
|  |     |
|  |     |
|  |     |
|  |     |
| Disturbance type: WELL PAD             |     |
| Describe:                              |     |
| Surface Owner: BUREAU OF LAND MANAG    | EME |
| 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:                 |     |
| Military Local Office:                 |     |

**USFS Ranger District:** 

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Other Local Office:

**USFS** Region:

**USFS** Forest/Grassland:

**USFS Ranger District:** 

**Disturbance type:** TRANSMISSION LINE

Describe:

Surface Owner: BUREAU OF LAND MANAGEMENT

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:** 

Disturbance type: OTHER

Describe: FLOWLINE

Surface Owner: BUREAU OF LAND MANAGEMENT

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:** 

Section 12 - Other

Right of Way needed? N

Use APD as ROW?

ROW Type(s):

**ROW** 

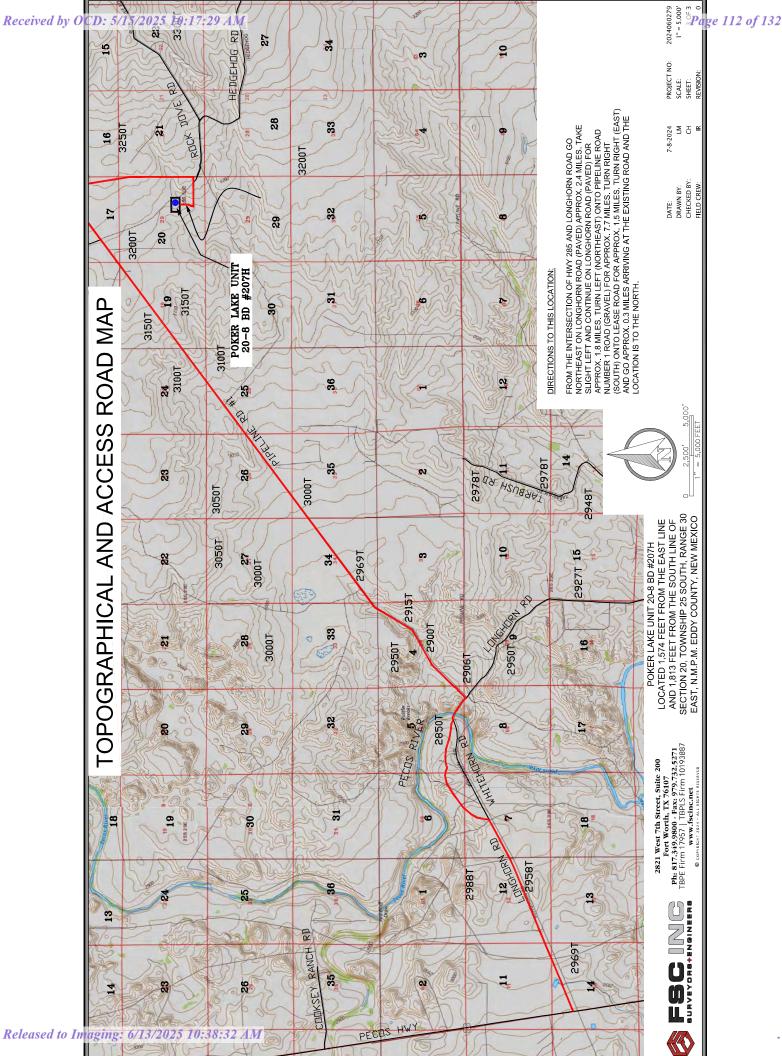
**SUPO Additional Information:** SUPO written for all wells in section/project area.

Use a previously conducted onsite? Y

**Previous Onsite information:** The XTO Permian Operating, LLC. representatives and BLM NRS were on location for onsite on 3/10/2021.

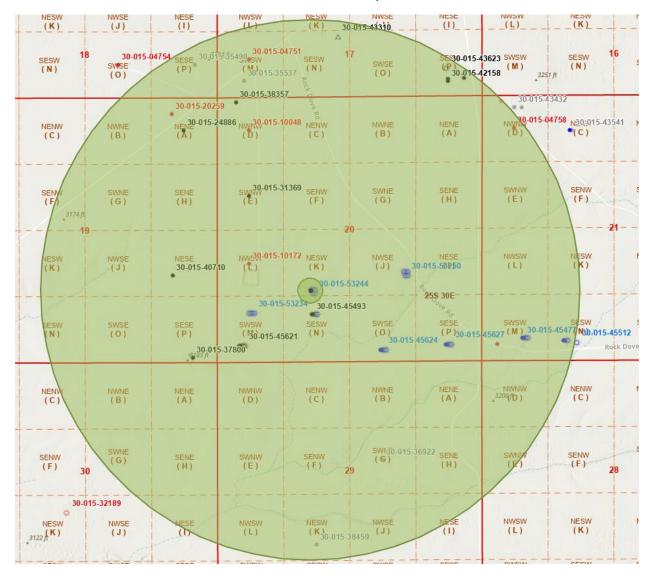
**Other SUPO** 

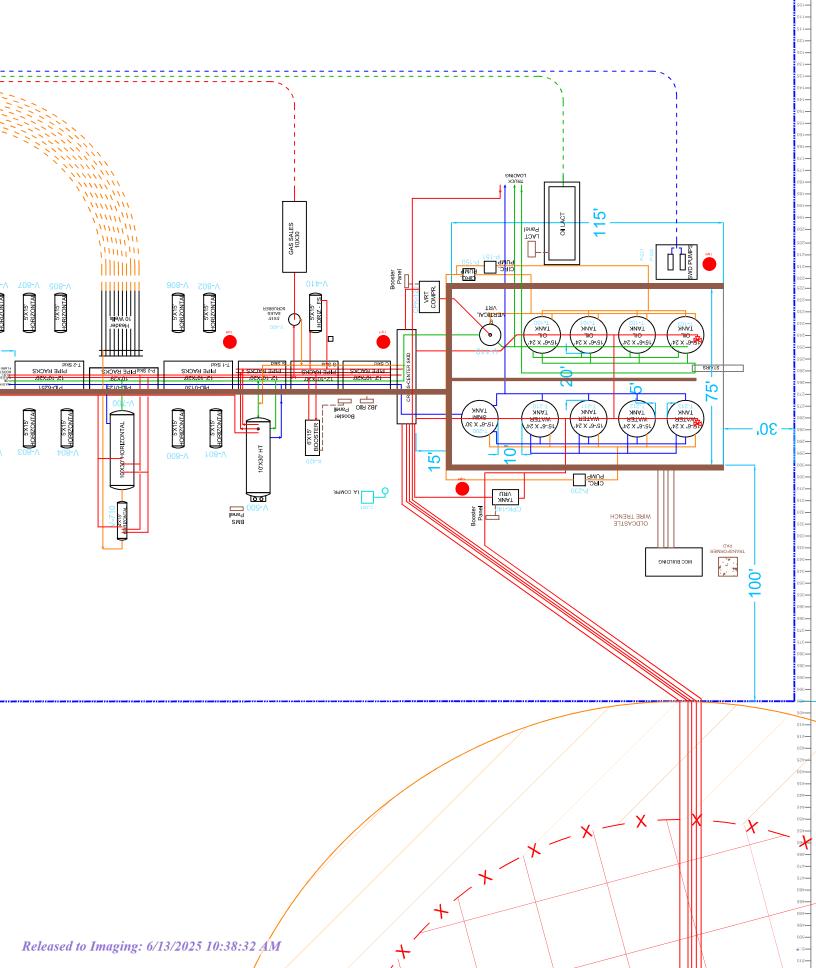
Poker\_Lake\_Unit\_20\_17\_\_\_20\_8\_BD\_SUPO\_20250319081359.pdf

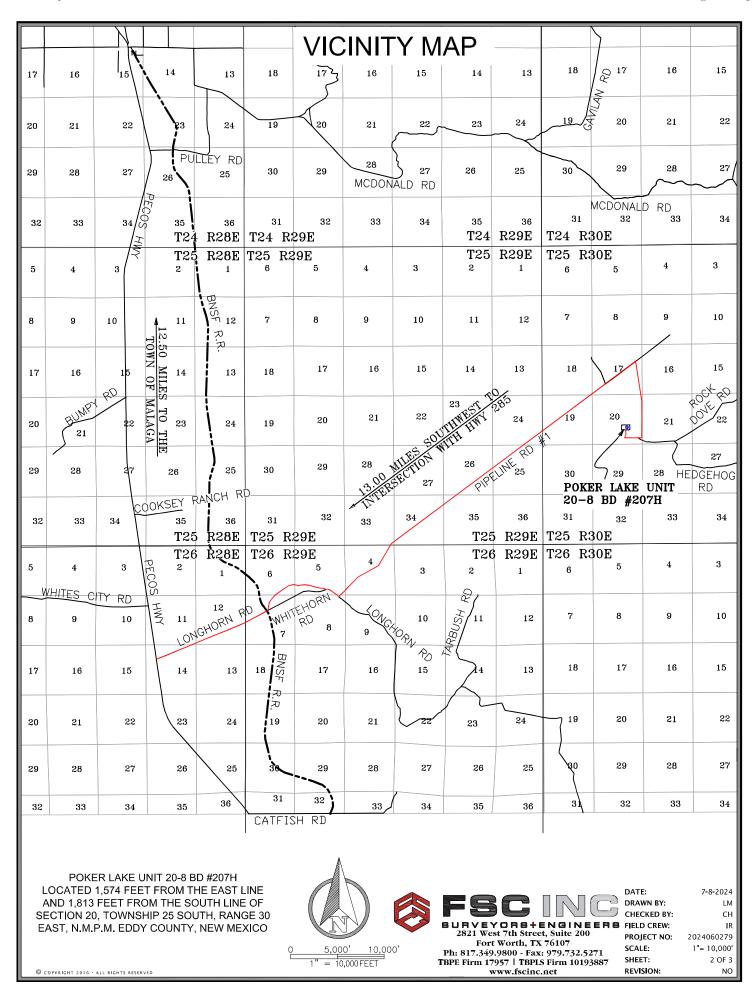


#### Poker Lake Unit 20-17 & 20-8 BD

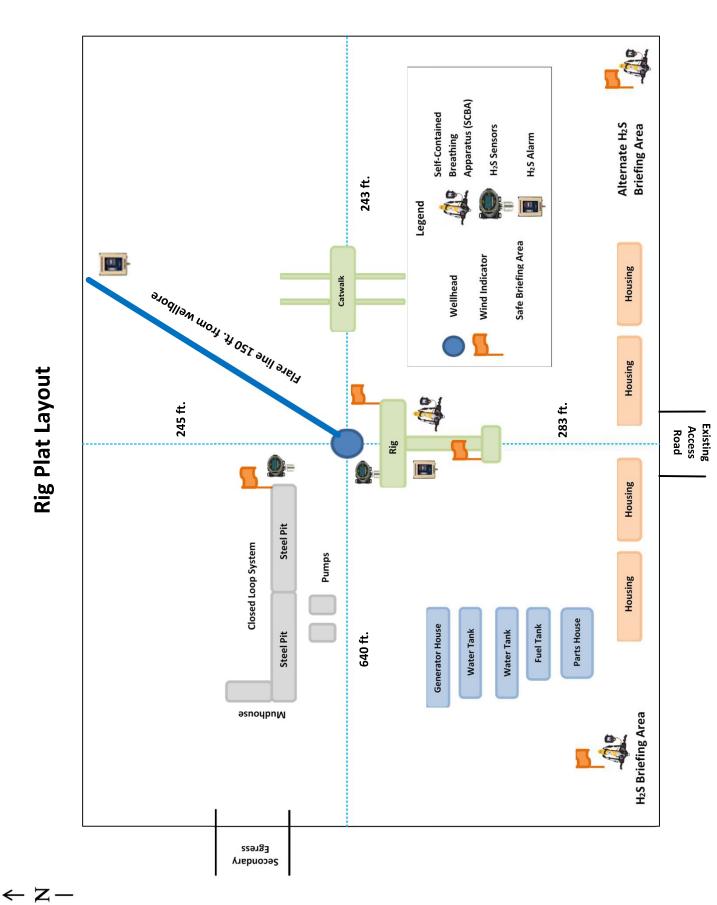
#### 1-Mile Radius Map

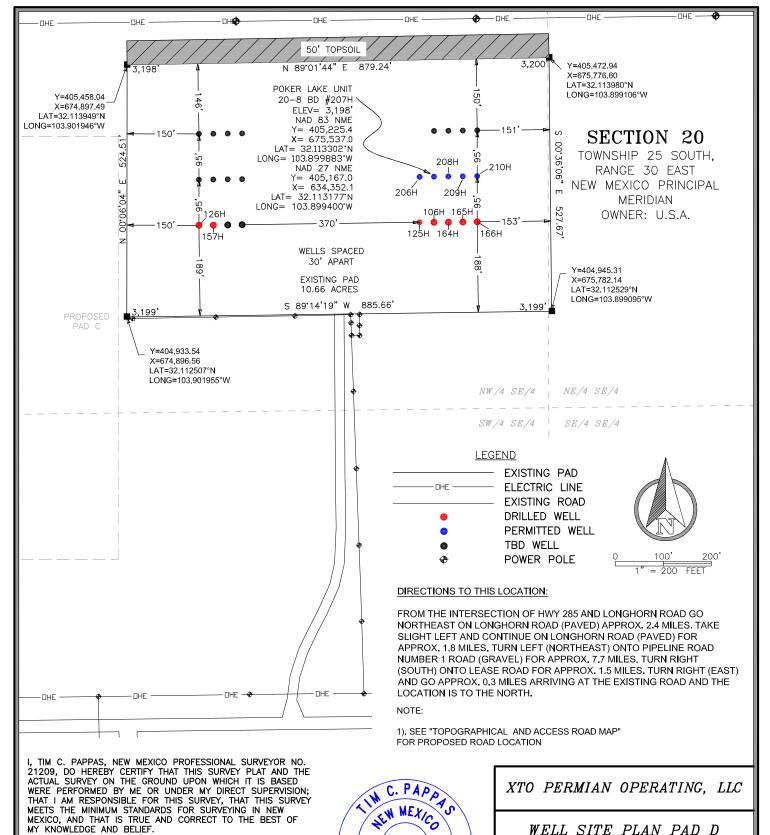






# Rig Plat Layout





16 July 2024

TIM C. PAPPAS REGISTERED PROFESSIONAL LAND SURVEYOR STATE OF NEW MEXICO NO. 21209



2821 West 7th Street, Suite 200 Fort Worth, TX 76107 Ph: 817.349.9800 - Fax: 979.732.5271 TBPE Firm 17957 | TBPLS Firm 10193887 www.fscinc.net
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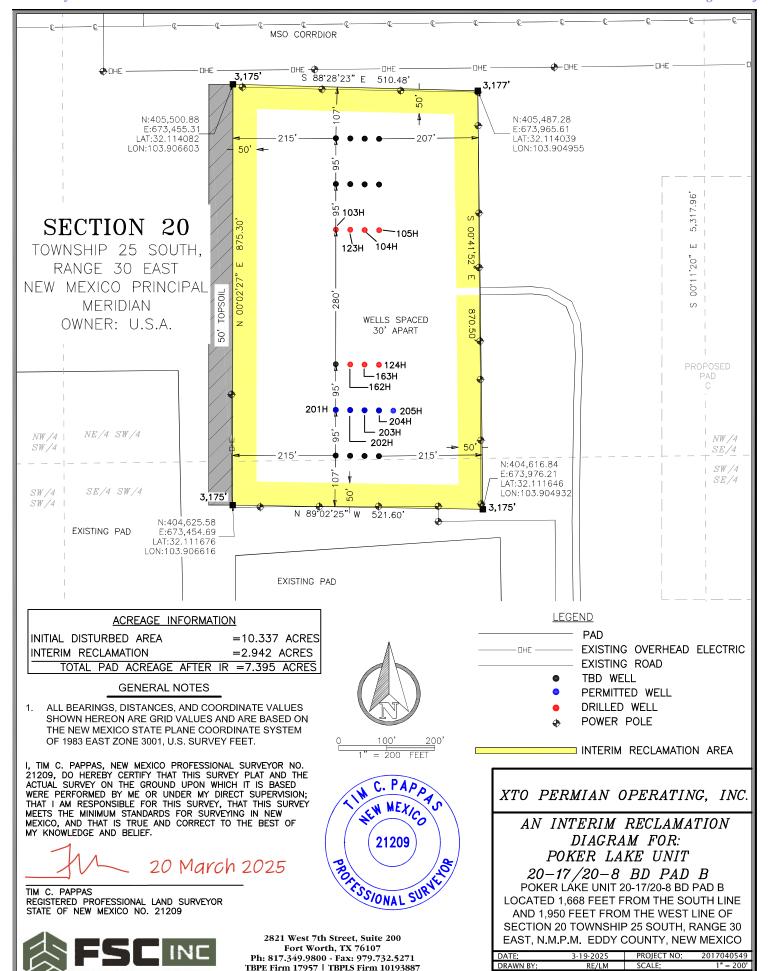
21209

POTTS SONAL SUR

#### WELL SITE PLAN PAD D

POKER LAKE UNIT 20-8 BD #207H LOCATED 1,574 FEET FROM THE EAST LINE AND 1,813 FEET FROM THE SOUTH LINE OF SECTION 20, TOWNSHIP 25 SOUTH, RANGE 30 EAST, N.M.P.M. EDDY COUNTY, NEW MEXICO

|   | DATE:       | 7-8-2024 | PROJECT NO: | 2024060279 |
|---|-------------|----------|-------------|------------|
|   | DRAWN BY:   | LM       | SCALE:      | 1" = 100'  |
| 1 | CHECKED BY: | CH       | SHEET:      | 1 OF 3     |
|   | FIELD CREW: | RE       | REVISION:   | 1          |

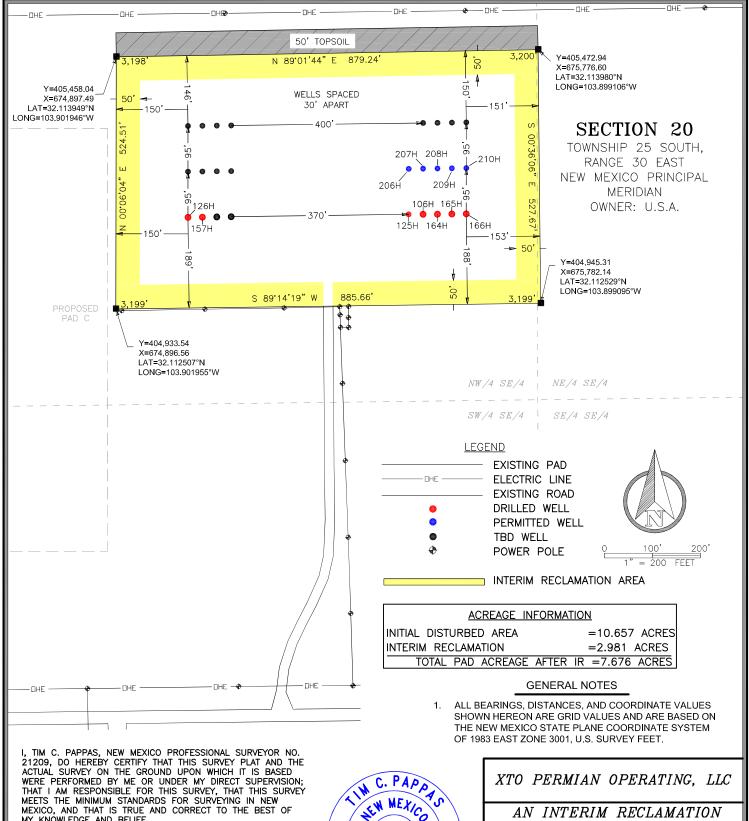


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CHECKED BY

FIELD CREW

SHEET



MY KNOWLEDGE AND BELIEF.

20 March 2025

TIM C. PAPPAS REGISTERED PROFESSIONAL LAND SURVEYOR STATE OF NEW MEXICO NO. 21209



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21209

POPTS SONAL SUR

DIAGRAM FOR: POKER LAKE UNIT

20-17/20-8 BD PAD D

POKER LÁKE UNIT 20-17/20-8 BD PAD D LOCATED 1,773 FEET FROM THE EAST LINE AND 1,793 FEET FROM THE SOUTH LINE OF SECTION 20, TOWNSHIP 25 SOUTH, RANGE 30 EAST, N.M.P.M. EDDY COUNTY, NEW MEXICO

| DATE:       | 3-20-2025 | PROJECT NO: | 2017040549 |
|-------------|-----------|-------------|------------|
| DRAWN BY:   | LM        | SCALE:      | 1" = 200'  |
| CHECKED BY: | CH        | SHEET:      | 1 OF 1     |
| FIELD CREW: | RE        | REVISION:   |            |
|             |           |             |            |

#### Well Site Locations

The results of the Poker Lake Unit 20-17/20-8 BD Development Program will develop economic quantities of oil and gas in the Poker Lake Unit 20-17/20-8 BD with multiple primary formations targeted. Well locations are determined based on cross-section variations and details. Locations will be selected to minimize the likelihood of encountering faults and/or drilling hazards while still targeting suitably productive zones.

If drilling results in an unproductive well, the well will be plugged and abandoned as soon as practical after the conclusion of production testing. Productive wells may be shut-in temporarily for BLM authorization for production activities and facilities.

### Poker Lake Unit 20-17/20-8 BD Sec-20, T25 S, Range 30 E

|                               |                      | SHL N/S<br>Footage |                      | SHL E/W<br>Footage |
|-------------------------------|----------------------|--------------------|----------------------|--------------------|
| Name                          | SHL N/S Footage (ft) | Line               | SHL E/W Footage (ft) | Line               |
| Poker Lake Unit 20-17 BD 201H | 1434                 | FSL                | 1904                 | FWL                |
| Poker Lake Unit 20-17 BD 202H | 1433                 | FSL                | 1934                 | FWL                |
| Poker Lake Unit 20-17 BD 203H | 1432                 | FSL                | 1964                 | FWL                |
| Poker Lake Unit 20-8 BD 204H  | 1431                 | FSL                | 1994                 | FWL                |
| Poker Lake Unit 20-8 BD 205H  | 1431                 | FSL                | 2024                 | FWL                |
| Poker Lake Unit 20-8 BD 206H  | 1813                 | FSL                | 1604                 | FEL                |
| Poker Lake Unit 20-8 BD 207H  | 1813                 | FSL                | 1574                 | FEL                |
| Poker Lake Unit 20-8 BD 208H  | 1813                 | FSL                | 1544                 | FEL                |
| Poker Lake Unit 20-8 BD 209H  | 1813                 | FSL                | 1514                 | FEL                |
| Poker Lake Unit 20-8 BD 210H  | 1813                 | FSL                | 1484                 | FEL                |

#### **Surface Use Plan**

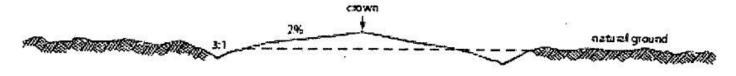
#### 1. Existing Roads

- A. From the intersection of Highway 285 and Longhorn Road, go Northeast on Longhorn Road (paved) Approx. 2.4 Miles. Take Slight Left and continue on Longhorn Road (Paved) for Approx 1.8 miles. Turn Left (Northeast) onto pipeline road number 1 road (Gravel) for Approx. 7.7 Miles. Turn Right (South) onto Lease Road for Approx. 1.5 Miles. Turn Right (East) and go approx. 0.8 Miles arriving at the existing road and the location is to the northwest. Transportation maps identifying existing roads that will be used to access the project area are included from FSC, Inc. marked as, 'Topographical and Access Road Map'.
- B. Transportation Plan identifying existing roads that will be used to access the project area is included from FSC, Inc. marked as, Topographical and Access Road Map. All equipment and vehicles will be confined to the routes shown on the Topographical and Access Map as provided by FSC, Inc. Maintenance of the access roads will continue until abandonment and reclamation of the well pads is completed.

#### 2. New or Upgraded Access Roads

- A. **New Roads**. There are no new roads necessary to access the Poker Lake Unit 20-17/20-8 BD location.
- B. Well Pads. The well pads selected for development determines which existing roads will be upgraded.

- C. Anticipated Traffic. After well completion, travel to each well site will include one lease operator truck. The Central Battery will require one lease operator truck to continually travel to each well site to monitor the working order of the wells and to check well equipment for proper operation. Additional traffic will include one maintenance truck periodically throughout the year for pad upkeep and weed removal. Well service trips will include only the traffic necessary to work on the wells or provide chemical treatments periodically and as needed throughout the year.
- D. **Routing**. All equipment and vehicles will be confined to the travel routes laid out in the vicinity map provided by FSC INC unless otherwise approved by the BLM and applied for by XTO PERMIAN OPERATING LLC
- E. **Road Dimensions**. The maximum width of the driving surface of new roads will be 14 feet. The roads will be crowned and ditched with a 2% slope from the tip of the crown to the edge of the driving surface. The ditches will be 1 foot deep with 3:1 slope. The driving surface will be made of 8" rolled and compacted caliche.



#### **Level Ground Section**

- F. **Surface Material**. Surface material will be native caliche. The average grade of all roads will be approximately 3%.
- G. Fence Cuts: No.
- H. Fences: No.
- I. Cattle Guards: No.
- J. **Turnouts**: No.
- K. Culverts: No.
- L. **Cuts and Fills**: look at attached plats.
- M. **Topsoil**. Approximately 6 inches of topsoil (root zone) is stripped from the access road prior to any construction activity. The topsoil that was stripped will be spread along the edge of well pad as depicted in plat. The topsoil will be seeded with the proper seed mix designated by the BLM.
- N. **Maintenance**. The access road will be constructed and maintained as necessary to prevent soil erosion and accommodate all-weather traffic. The road will be crowned and ditched with water turnouts installed as necessary to provide for proper drainage along with access road route.
- O. **Drainage**. The access road and associated drainage structures will be constructed and maintained in accordance with road guidelines contained in the joint BLM/USFS publication: Surface Operating Standards for Oil and Gas Exploration and Development, The Gold Book, Fourth Edition and/or BLM Manual Section 9113 concerning road construction standards on projects subject to federal jurisdiction.

#### 3. Location of Existing Wells

A. See attached 1-mile radius well map.

#### 4. Location of Existing Production Facilities

- A. **Production Facilities**. No New facility is required for the Poker Lake Unit 20-17/20-8 BD wells.

  Once drilled and completed, the wells will flow to the Poker Lake Unit 20-17/20-8 BD battery.
- B. Flowlines. No further flowlines disturbance is requested.
- C. Gas Pipeline. No Gas Sales line is required for this well. No additional surface disturbance is needed.

- D. **Disposal Facilities**. Produced water will be hauled from location to a commercial or private disposal facility as needed.
- E. Flare. Check in facility plot attached.
- F. **Aboveground Structures**. All permanent (on site six months or longer) aboveground structures constructed or installed on location and not subject to safety requirements will be painted earth-tone colors such as BLM Standard Environmental Color Chart (CC-001: June 2008) that reduce the visual impacts of the built environment.
- G. **Containment Berms**. Containment berms will be constructed completely around any production facilities designed. The containment berms will be constructed of compacted caliche, be sufficiently impervious, away from cut or fill areas.
- H. **Electrical**. No additional electrical is required for this well. No additional surface disturbance is needed.
- I. Facility Description- Kindly see the facility plot attached.

#### 5. Location and Types of Water Supply

The well will be drilled using a combination of water mud systems as outlined in the Drilling Program. Water composition depends on the mud type needed per formation to protect useable water. Fresh water is trucked to location for use in surface casing drilling and cementing. All other water is either brackish (3P) or raw produced water (XOM) that is all piped from either a pipeline or a pond 32.1483028, -103.922338) to the drilling location.

Anticipated water usage for drilling includes an estimated 50,000 barrels of water to drill a horizontal well in a combination of fresh water and brine as detailed in the mud program in the drilling plans. These volumes are calculated for ~1.5bbls per foot of hole drilled with excess to accommodate any lost circulation or wash out that may occur. Actual water volumes used during operations will depend on the depth of the well, length of horizontal sections, and the losses that may occur during the operation.

Temporary water lines will be permitted via a Temporary Water Line Approved Decision letter and/or any necessary Right of Way Grants as needed based on drilling and completion schedules. Well completion is expected to require approximately 550,000 barrels of water per horizontal well. Actual water volumes used during operations will depend on the depth of the well and length of horizontal sections

#### 6. Construction Activities – No new construction

Construction, reclamation, and/or routine maintenance will not be conducted during periods when the soil conditions for construction could lead to impacts to the surrounding environment, or when watershed damage is likely to occur because of these activities.

Any construction material that may be required for surfacing of the drill pad and access road will be from a contractor having a permitted source of materials within the general area. No construction materials will be removed from federal lands without prior approval from the appropriate surface management agency.

Well Pad. No New construction

#### 7. Methods for Handling Waste

- **Cuttings**. The well will be drilled utilizing a closed-loop mud system. Drill cuttings will be held in roll-off style mud boxes and taken to a New Mexico Oil Conservation Division (NMOCD) approved disposal site.
- **Drilling Fluids**. These will be contained in steel mud pits and then taken to a NMOCD approved commercial disposal facility.

- Produced Fluids. Water produced from the well will be held temporarily in steel tanks and then taken to
  a NMOCD approved commercial disposal facility. Oil produced during operations will be stored in s until
  sold.
- Sewage. Portable, self-contained toilets will be provided for human waste disposal. Upon completion of
  drilling and completion activities, or as required, the toilet holding tanks will be pumped and the contents
  thereof disposed of in an approved sewage disposal facility. All state and local laws and regulations
  pertaining to the disposal of human and solid waste will be complied with. This equipment will be properly
  maintained during the drilling and completion operations and will be removed when all operations are
  complete.
- Garbage and Other Waste Materials. All garbage, junk and non-flammable waste materials will be
  contained in a self-contained, portable dumpster or trash cage, to prevent scattering and will be removed
  and deposited in an approve sanitary landfill. Immediately after drilling all debris and other waste
  materials on and around the well location not contained in the trash cage will be cleaned up and removed
  from the location. No potentially adverse materials or substances will be left on the location.
- Debris. Immediately after removal of the drilling rig, all debris and other waste materials not contained in the trash cage will be cleaned and removed from the well location. No potential adverse materials or substances will be left on location.

#### • Hazardous Materials.

- i. All drilling wastes identified as hazardous substances by the Comprehensive Environmental Response Compensation Liability Act (CERCLA) removed from the location and not reused at another drilling location will be disposed of at a hazardous waste facility approved by the U.S. Environmental Protection Agency (EPA).
- ii. XTO PERMIAN OPERATING LLC and its contractors will comply with all applicable Federal, State and local laws and regulations, existing or hereafter enacted promulgated, regarding any hazardous material, as defined in this paragraph, that will be used, produced, transported or stored on the oil and gas lease. "Hazardous material" means any substance, pollutant or contaminant that is listed as hazardous under the CERCLA of 1980, as amended, 42 U.S.C 9601 et seq., and its regulation. The definition of hazardous substances under CERLCA includes any 'hazardous waste" as defined in the RCRA of 1976, as amended, 42 U.S.C. 6901 et seq., and its regulations. The term hazardous material also includes any nuclear or nuclear by-product material as defined by the Atomic Energy Act of 1954, as amended, 42 U.C.S. 2011 et seq. The term does not include petroleum, including crude oil or any fraction thereof that is not otherwise specifically listed or designated as a hazardous substance under CERCLA Section 101 (14) U.S.C. 9601 (14) nor does the term include natural gas.
- iii. No hazardous substances or wastes will be stored on the location after completion of the well.
- iv. Chemicals brought to location will be on the Toxic Substance Control Act (TSCA) approved inventory list.
- v. All undesirable events (fires, accidents, blowouts, spills, discharges) as specified in Notice to Lessees (NTL) 3A will be reported to the BLM Carlsbad Field Office. Major events will be reported verbally within 24 hours, followed by a written report within 15 days. "Other than Major Events" will be reported in writing within 15 days.

#### 8. Ancillary Facilities

A. **Ancillary Facilities**. No off-pad ancillary facilities are planned during the exploration phase including, but not limited to campsites, airstrips or staging areas.

#### 9. Well Site Layout

**Rig Plat Diagrams**: There is 1 multi-well pad in the Poker Lake Unit 20-17/20-8 BD lease. This will allow enough space for cuts and fills, topsoil storage, and storm water control. Interim reclamation of these pads is anticipated after the drilling and completion of all wells on the pad. A well site layout for the pad is attached.

• Pad B is a 26-well pad expected to be 875.50'x521.60'.

**Closed-Loop System**: There will be no reserve pit as each well will be drilled utilizing a closed loop mud system. The closed loop system will meet the NMOCD requirements 19.15.17.

**V-Door Orientation**: These pads were staked with multiple v-door orientations. The following list is from West to East in accordance with the staked section and as agreed upon with Zane Kirsch, BLM Natural Resource Specialist, present at on-site inspection.

• Pad A has a V-Door Orientation: East

All equipment and vehicles will be confined to the approved disturbed areas of this APD (i.e., access road, well pad and topsoil storage areas

#### 10. Plans for Surface Reclamation:

XTO Permian Operating, LLC. requests a variance from interim reclamation until all drilling and completion activities have been finished on the pads as these are multi-well pads where drilling and completion will be consecutive with the other wells on the pad. Once activities are completed, XTO Permian Operating, LLC. will coordinate interim reclamation with the appropriate BLM personnel or use the following plan:

Non-Commercial Well (Not Productive), Interim & Final Reclamation:

*Definition:* Reclamation includes disturbed areas where the original landform and a natural vegetative community will be restored, and it is anticipated the site will not be disturbed for future development.

#### Reclamation Standards:

The portions of the pad not essential to production facilities or space required for workover operations will be reclaimed and seeded as per BLM requirements for interim reclamation. (See Interim Reclamation plats attached).

All equipment and trash will be removed, and the surfacing material will be removed from the well pad and road and transported to the original caliche pit or used to maintain other roads. The location will then be ripped and seeded.

The original stockpiled topsoil will be spread over the areas being reclaimed and the original landform will be restored for all disturbed areas including well pads, production facilities, roads, pipelines, and utility corridors as close as possible to the original topography. The location will then be ripped and seeded.

A self-sustaining, vigorous, diverse, native (or otherwise approved) plant community will be established on the site with a density sufficient to control erosion and invasion by non-native plants and to re-establish wildlife habitat or forage production. At a minimum, the established plant community will consist of species included in the seed mix and/or desirable species occurring in the surrounding natural vegetation.

Erosion features are equal to or less than surrounding area and erosion control is sufficient so that water naturally infiltrates into the soil and gullying, head cutting, slumping, and deep or excessive rills (greater than 3 inches) are not observed.

The site will be free of State or County listed noxious weeds, oil field debris and equipment, and contaminated soil. Invasive and non-native noxious weeds will be controlled.

#### Seeding:

- <u>Seedbed Preparation</u>: Initial seedbed preparation will consist of recontouring to the appropriate interim or final reclamation standard. All compacted areas to be seeded will be ripped to a minimum depth of 18 inches with a minimum furrow spacing of 2 feet, followed by recontouring the surface and then evenly spreading the stockpiled topsoil. Prior to seeding, the seedbed will be scarified to a depth of no less than 4-6 inches. If the site is to be broadcast seeded, the surface will be left rough enough to trap seed and snow, control erosion, and increase water infiltration.
- If broadcast seeding is to be used and is delayed, final seedbed preparation will consist of contour cultivating to a depth of 4-6 inches within 24 hours prior to seeding, dozer tracking, or other imprinting to break the soil crust and create seed germination micro-sites.
- <u>Seed Application</u>. Seeding will be conducted no more than two weeks following completion of final seedbed preparation. A certified weed-free seed mix designed by the BLM to meet reclamation standards will be used.
- If the site is harrowed or dragged, seed will be covered by no more than 0.25 inch of soil.

#### 11. Surface Ownership

- The Poker Lake Unit 20-17/20-8 BD is 100% of the surface is under the administrative jurisdiction of the Bureau of Land Management.
- The surface is multiple use with the primary uses of the region for grazing and to produce oil and gas.

#### 12. Other Information

#### Surveying

- Well Sites. Well pad locations have been staked. Surveys of the Existing access roads and well pad
  locations have been completed by FSC, Inc, a registered professional land surveyor. Center stake surveys
  with access roads have been completed on State and Federal lands with Zane Kirsch, Bureau of Land
  Management Natural Resource Specialist in attendance, on February 15, 2022.
- Cultural Resources Archaeology: A Class III Cultural Resources Examination was completed previously.
- **Dwellings and Structures**. There are no dwellings or structures within 2 miles of this location.

#### Soils and Vegetation

**Environmental Setting**. Soils are classified as Simona Gravelly Fine Sandy Loam and Simona-Bippus Complex. Simona soils are found on alluvial fans and plans and form in mixed alluvium and/or Aeolian sands. Bippus soils are found on alluvial fans and floodplains and form in mixed alluvium. The Simona-Bippus soils are dominant to the east and the Simona Gravelly Fine Sandy Loams are dominant to the West. Dominant vegetation species include: mesquite, sumac snakeweed, and various forbs and grasses. Ground cover is minimal, offering 90 percent visibility.

Traffic. No truck traffic will be operated during periods or in areas of saturated ground when surface
rutting could occur. The access road will be constructed and maintained as necessary to prevent soil
erosion and accommodate all-weather traffic. The road will be crowned and ditched with water turnouts
installed as necessary to provide for proper drainage along the access road route.

• Water. There is no permanent or live water in the immediate or within the project area.

#### 13. Bond Coverage

Bond Coverage is Nationwide. Bond Number: COB000050

Onsite- The XTO Permian Operating, LLC. representatives and BLM NRS were on location for onsite on 3/10/2021.

#### **Operator's Representatives:**

The XTO PERMIAN OPERATING LLC representatives for ensuring compliance of the surface use plan are listed below:

#### Surface:

Robert Bartels
Project Execution Planner
XTO Energy, Incorporated
6401 Holiday Hill Road Bldg 5
Midland, Texas 79701
robert.e.bartels@exxonmobil.com

Phone: (406) 478-3671

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

**Operator Name:** XTO PERMIAN OPERATING LLC

Well Name: POKER LAKE UNIT 20-8 BD Well Number: 207H

Well Type: OIL WELL Well Work Type: Drill

#### **Section 1 - General**

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

#### **Section 2 - Lined**

Would you like to utilize Lined Pit PWD options? N

**Produced Water Disposal (PWD) Location:** 

PWD surface owner: PWD disturbance (acres):

**Other PWD Surface Owner Description:** 

Lined pit PWD on or off channel:

Lined pit PWD discharge volume (bbl/day):

Lined pit

Pit liner description:

Pit liner manufacturers

Precipitated solids disposal:

Decribe precipitated solids disposal:

Precipitated solids disposal

Lined pit precipitated solids disposal schedule:

Lined pit precipitated solids disposal schedule

Lined pit reclamation description:

Lined pit reclamation

Leak detection system description:

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**Lined pit Monitor description:** 

**Lined pit Monitor** 

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

#### **Section 3 - Unlined**

Would you like to utilize Unlined Pit PWD options? N

**Produced Water Disposal (PWD) Location:** 

PWD disturbance (acres): PWD surface owner:

Other PWD Surface Owner Description:

Unlined pit PWD on or off channel:

Unlined pit PWD discharge volume (bbl/day):

**Unlined pit** 

Precipitated solids disposal:

Decribe precipitated solids disposal:

Precipitated solids disposal

Unlined pit precipitated solids disposal schedule:

Unlined pit precipitated solids disposal schedule

Unlined pit reclamation description:

Unlined pit reclamation

**Unlined pit Monitor description:** 

**Unlined pit Monitor** 

Do you propose to put the produced water to beneficial use?

Beneficial use user

Estimated depth of the shallowest aquifer (feet):

**Precipitated Solids Permit** 

Does the produced water have an annual average Total Dissolved Solids (TDS) concentration equal to or less than that of the existing water to be protected?

TDS lab results:

Geologic and hydrologic

State

**Unlined Produced Water Pit Estimated** 

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

#### Section 4 -

Would you like to utilize Injection PWD options? N

**Produced Water Disposal (PWD) Location:** 

PWD surface owner: PWD disturbance (acres):

**Other PWD Surface Owner Description:** 

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

**Underground Injection Control (UIC) Permit?** 

**UIC Permit** 

#### **Section 5 - Surface**

Would you like to utilize Surface Discharge PWD options? N

**Produced Water Disposal (PWD) Location:** 

PWD surface owner: PWD disturbance (acres):

Other PWD Surface Owner Description:

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:

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#### Section 6 -

Would you like to utilize Other PWD options?  ${\sf N}$ 

**Produced Water Disposal (PWD) Location:** 

PWD surface owner:

PWD disturbance (acres):

**PWD Surface Owner Description:** 

Other PWD discharge volume (bbl/day):

Other PWD type description:

Other PWD type

Have other regulatory requirements been met?

Other regulatory requirements

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

**APD ID:** 10400100973

**Operator Name: XTO PERMIAN OPERATING LLC** 

Well Name: POKER LAKE UNIT 20-8 BD

Well Type: OIL WELL

Submission Date: 09/23/2024

Well Number: 207H

Well Work Type: Drill

Highlighted data reflects the most recent changes Show Final Text

#### **Bond**

Federal/Indian APD: FED

**BLM Bond number:** COB000050

**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 amount:** 

**Reclamation bond rider amount:** 

Additional reclamation bond information attachment:

Sante Fe Main Office Phone: (505) 476-3441

General Information Phone: (505) 629-6116

Online Phone Directory https://www.emnrd.nm.gov/ocd/contact-us

## State of New Mexico Energy, Minerals and Natural Resources Oil Conservation Division 1220 S. St Francis Dr. Santa Fe, NM 87505

CONDITIONS

Action 463637

#### **CONDITIONS**

| Operator:                  | OGRID:  |
|----------------------------|---|
| XTO PERMIAN OPERATING LLC. | 373075  |
| 6401 HOLIDAY HILL ROAD     | Action Number:  |
| MIDLAND, TX 79707          | 463637  |
|                            | Action Type:  |
|                            | [C-101] BLM - Federal/Indian Land Lease (Form 3160-3) |

#### CONDITIONS

| Created By  | Condition   | Condition<br>Date |
|-------------|---|-------------------|
| mvenkatesh  | Cement is required to circulate on both surface and intermediate1 strings of casing.  | 5/15/2025         |
| mvenkatesh  | If cement does not circulate on any string, a Cement Bond Log (CBL) is required for that string of casing.  | 5/15/2025         |
| ward.rikala | Notify the OCD 24 hours prior to casing & cement.   | 6/13/2025         |
| ward.rikala | File As Drilled C-102 and a directional Survey with C-104 completion packet.  | 6/13/2025         |
| ward.rikala | Once the well is spud, to prevent ground water contamination through whole or partial conduits from the surface, the operator shall drill without interruption through the fresh water zone or zones and shall immediately set in cement the water protection string. | 6/13/2025         |
| ward.rikala | Oil base muds are not to be used until fresh water zones are cased and cemented providing isolation from the oil or diesel. This includes synthetic oils. Oil based mud, drilling fluids and solids must be contained in a steel closed loop system.                  | 6/13/2025         |