

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

<b>Well Name:</b> POKER LAKE UNIT 30-19 BS	<b>Well Location:</b> T25S / R31E / SEC 30 / NWNE /	<b>County or Parish/State:</b>
<b>Well Number:</b> 124H	<b>Type of Well:</b> CONVENTIONAL GAS WELL	<b>Allottee or Tribe Name:</b>
<b>Lease Number:</b> NMLC061634B	<b>Unit or CA Name:</b>	<b>Unit or CA Number:</b> NMNM71016X
<b>US Well Number:</b> 3001553438	<b>Well Status:</b> Approved Application for Permit to Drill	<b>Operator:</b> XTO PERMIAN OPERATING LLC

**Notice of Intent**

**Sundry ID:** 2759057

**Type of Submission:** Notice of Intent

**Type of Action:** APD Change

**Date Sundry Submitted:** 11/01/2023

**Time Sundry Submitted:** 10:20

**Date proposed operation will begin:** 11/23/2023

**Procedure Description:** \*\* Surface hole Change, First and Last Take Point Changes, Bottomhole Location Change, Drilling Plan Change, Casing/Cement Change XTO Permian Operating, LCC. requests permission to make the following changes to the original APD: No Additional Surface Disturbance SHL: fr/533'FNL & 2618'FEL to 533'FNL & 2618'FEL FTP: fr/2310'FNL & 2010'FWL to 2115'FNL & 1725'FWL LTP: fr/100'FNL & 2010'FWL to 2506'FSL & 1725'FWL BHL: fr/50'FNL & 2010'FWL to 2605'FSL & 1725'FWL, Section 18-T25S-R31E Additionally, XTO Permian Operating, LLC. respectfully requests permission to upsize the casing design. The surface, intermediate and production hole, casing, and cement based on the attached drilling program. Due to the design change in these strings, the wellhead configuration has also changed based on the attached drilling program. Casing/Cement design per the attached drilling program. Attachments: C102 Drilling Program MBS Directional Plan

**NOI Attachments**

**Procedure Description**

PLU\_30\_19\_BS\_124H\_Sundry\_Attachments\_20231101101913.pdf

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**Well Location:** T25S / R31E / SEC 30 / NWNE /

**County or Parish/State:**

**Well Number:** 124H

**Type of Well:** CONVENTIONAL GAS WELL

**Allottee or Tribe Name:**

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**Unit or CA Name:**

**Unit or CA Number:** NMNM71016X

**US Well Number:** 3001553438

**Well Status:** Approved Application for Permit to Drill

**Operator:** XTO PERMIAN OPERATING LLC

### Conditions of Approval

#### Additional

Sec\_30\_25S\_31E\_NMP\_Sundry\_2759057\_Poker\_Lake\_Unit\_30\_19\_BS\_124H\_COAs\_20231127125254.pdf

### Operator

I certify that the foregoing is true and correct. 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. Electronic submission of Sundry Notices through this system satisfies regulations requiring a

**Operator Electronic Signature:** CASSIE EVANS

**Signed on:** NOV 01, 2023 10:19 AM

**Name:** XTO PERMIAN OPERATING LLC

**Title:** Regulatory Analyst

**Street Address:** 6401 Holiday Hill Road, Bldg 5

**City:** Midland

**State:** TX

**Phone:** (432) 218-3671

**Email address:** CASSIE.EVANS@EXXONMOBIL.COM

### Field

**Representative Name:**

**Street Address:**

**City:**

**State:**

**Zip:**

**Phone:**

**Email address:**

### BLM Point of Contact

**BLM POC Name:** CHRISTOPHER WALLS

**BLM POC Title:** Petroleum Engineer

**BLM POC Phone:** 5752342234

**BLM POC Email Address:** cwalls@blm.gov

**Disposition:** Approved

**Disposition Date:** 12/01/2023

**Signature:** Chris Walls

Form 3160-5  
(June 2019)

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

FORM APPROVED  
OMB No. 1004-0137  
Expires: October 31, 2021

**SUNDRY NOTICES AND REPORTS ON WELLS**  
**Do not use this form for proposals to drill or to re-enter an abandoned well. Use Form 3160-3 (APD) for such proposals.**

5. Lease Serial No. **NMLC061634B**

6. If Indian, Allottee or Tribe Name

**SUBMIT IN TRIPLICATE** - Other instructions on page 2

1. Type of Well <input type="checkbox"/> Oil Well <input checked="" type="checkbox"/> Gas Well <input type="checkbox"/> Other		7. If Unit of CA/Agreement, Name and/or No. <b>NMNM71016X</b>
2. Name of Operator <b>XTO PERMIAN OPERATING LLC</b>		8. Well Name and No. <b>POKER LAKE UNIT 30-19 BS/124H</b>
3a. Address <b>6401 HOLIDAY HILL ROAD BLDG 5, MIDLAND,</b>	3b. Phone No. (include area code) <b>(432) 683-2277</b>	9. API Well No. <b>3001553438</b>
4. Location of Well (Footage, Sec., T.,R.,M., or Survey Description) <b>SEC 30/T25S/R31E/NMP</b>		10. Field and Pool or Exploratory Area <b>PURPLE SAGE/WOLFCAMP (GAS)</b>
		11. Country or Parish, State <b>EDDY/NM</b>

12. CHECK THE APPROPRIATE BOX(ES) TO INDICATE NATURE OF NOTICE, REPORT OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION				
<input checked="" type="checkbox"/> Notice of Intent	<input type="checkbox"/> Acidize	<input type="checkbox"/> Deepen	<input type="checkbox"/> Production (Start/Resume)	<input type="checkbox"/> Water Shut-Off	
<input type="checkbox"/> Subsequent Report	<input type="checkbox"/> Alter Casing	<input type="checkbox"/> Hydraulic Fracturing	<input type="checkbox"/> Reclamation	<input type="checkbox"/> Well Integrity	
<input type="checkbox"/> Final Abandonment Notice	<input type="checkbox"/> Casing Repair	<input type="checkbox"/> New Construction	<input type="checkbox"/> Recomplete	<input type="checkbox"/> Other	
	<input checked="" type="checkbox"/> Change Plans	<input type="checkbox"/> Plug and Abandon	<input type="checkbox"/> Temporarily Abandon		
	<input type="checkbox"/> Convert to Injection	<input type="checkbox"/> Plug Back	<input type="checkbox"/> Water Disposal		

13. Describe Proposed or Completed Operation: Clearly state all pertinent details, including estimated starting date of any proposed work and approximate duration thereof. If the proposal is to deepen directionally or recomplete horizontally, give subsurface locations and measured and true vertical depths of all pertinent markers and zones. Attach the Bond under which the work will be performed or provide the Bond No. on file with BLM/BIA. Required subsequent reports must be filed within 30 days following completion of the involved operations. If the operation results in a multiple completion or recompletion in a new interval, a Form 3160-4 must be filed once testing has been completed. Final Abandonment Notices must be filed only after all requirements, including reclamation, have been completed and the operator has determined that the site is ready for final inspection.)

\*\* Surface hole Change, First and Last Take Point Changes, Bottomhole Location Change, Drilling Plan Change, Casing/Cement Change

XTO Permian Operating, LCC. requests permission to make the following changes to the original APD:

No Additional Surface Disturbance

SHL: fr/533FNL & 2618FEL to 533FNL & 2618FEL

FTP: fr/2310FNL & 2010FWL to 2115FNL & 1725FWL

LTP: fr/100FNL & 2010FWL to 2506FSL & 1725FWL

Continued on page 3 additional information

14. I hereby certify that the foregoing is true and correct. Name (Printed/Typed) <b>CASSIE EVANS / Ph: (432) 218-3671</b>	Title <b>Regulatory Analyst</b>
Signature (Electronic Submission)	Date <b>11/01/2023</b>

**THE SPACE FOR FEDERAL OR STATE OFFICE USE**

Approved by <b>CHRISTOPHER WALLS / Ph: (575) 234-2234 / Approved</b>	Title <b>Petroleum Engineer</b>	Date <b>12/01/2023</b>
Conditions of approval, if any, are attached. Approval of this notice 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.		Office <b>CARLSBAD</b>

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.

(Instructions on page 2)

## GENERAL INSTRUCTIONS

This form is designed for submitting proposals to perform certain well operations and reports of such operations when completed as indicated on Federal and Indian lands pursuant to applicable Federal law 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, are either shown below, will be issued by or may be obtained from the local Federal office.

## SPECIFIC INSTRUCTIONS

*Item 4* - Locations on Federal or Indian land should be described in accordance with Federal requirements. Consult the local Federal office for specific instructions.

*Item 13*: Proposals to abandon a well and subsequent reports of abandonment should include such special information as is required by the local Federal office. In addition, such proposals and reports should include reasons for the abandonment; data on any former or present productive zones or other zones with present significant fluid contents not sealed off by cement or otherwise; depths (top and bottom) and method of placement of cement plugs; mud or other material placed below, between and above plugs; amount, size, method of parting of any casing, liner or tubing pulled and the depth to the top of any tubing left in the hole; method of closing top of well and date well site conditioned for final inspection looking for approval of the abandonment. 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 the 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., 351 et seq., 25 U.S.C. 396; 43 CFR 3160.

PRINCIPAL PURPOSE: The information is used to: (1) Evaluate, when appropriate, approve applications, and report completion of subsequent well operations, on a Federal or Indian lease; and (2) document for administrative use, information for the management, disposal and use of National Resource lands and resources, such as: (a) evaluating the equipment and procedures to be used during a proposed subsequent well operation and reviewing the completed well operations for compliance with the approved plan; (b) requesting and granting approval to perform those actions covered by 43 CFR 3162.3-2, 3162.3-3, and 3162.3-4; (c) reporting the beginning or resumption of production, as required by 43 CFR 3162.4-1(c) and (d) analyzing future applications to drill or modify operations in light of data obtained and methods used.

ROUTINE USES: Information from the record and/or the record will be transferred to appropriate Federal, State, local or foreign agencies, when relevant to civil, criminal or regulatory investigations or prosecutions in connection with congressional inquiries or to consumer reporting agencies to facilitate collection of debts owed the Government.

EFFECT OF NOT PROVIDING THE INFORMATION: Filing of this notice and report and disclosure of the information is mandatory for those subsequent well operations specified in 43 CFR 3162.3-2, 3162.3-3, 3162.3-4.

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

The BLM collects this information to evaluate proposed and/or completed subsequent well operations on Federal or Indian oil and gas leases.

Response to this request is mandatory.

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 Collection Clearance Officer (WO-630), 1849 C St., N.W., Mail Stop 401 LS, Washington, D.C. 20240

## Additional Information

### Additional Remarks

BHL: fr/50FNL & 2010FWL to 2605FSL & 1725FWL, Section 18-T25S-R31E

Additionally, XTO Permian Operating, LLC. respectfully requests permission to upsize the casing design. The surface, intermediate and production hole, casing, and cement based on the attached drilling program. Due to the design change in these strings, the wellhead configuration has also changed based on the attached drilling program.

Casing/Cement design per the attached drilling program.

Attachments:

C102

Drilling Program

MBS

Directional Plan

### Location of Well

0. SHL: NWNE / 533 FNL / 2618 FEL / TWSP: 25S / RANGE: 31E / SECTION: 30 / LAT: 32.10707 / LONG: -103.817294 ( TVD: 0 feet, MD: 0 feet )

PPP: SENW / 2310 FNL / 2010 FWL / TWSP: 25S / RANGE: 31E / SECTION: 30 / LAT: 32.102182 / LONG: -103.819529 ( TVD: 11060 feet, MD: 11386 feet )

BHL: NENW / 50 FNL / 2010 FWL / TWSP: 25S / RANGE: 31E / SECTION: 19 / LAT: 32.123011 / LONG: -103.819463 ( TVD: 11780 feet, MD: 20000 feet )

## PECOS DISTRICT DRILLING CONDITIONS OF APPROVAL

<b>OPERATOR'S NAME:</b>	XTO Permian Operating LLC
<b>WELL NAME &amp; NO.:</b>	Poker Lake Unit 30-19 BS 124H
<b>LOCATION:</b>	Sec 30-25S-31E-NMP
<b>COUNTY:</b>	Eddy County, New Mexico

*Changes approved through engineering via **Sundry 2759057** on 11/27/2023. Any previous COAs not addressed within the updated COAs still apply.*

COA

<b>H<sub>2</sub>S</b>	<input checked="" type="radio"/> No	<input type="radio"/> Yes		
<b>Potash / WIPP</b>	<input checked="" type="radio"/> None	<input type="radio"/> Secretary	<input type="radio"/> R-111-P	<input type="checkbox"/> WIPP
<b>Cave / Karst</b>	<input type="radio"/> Low	<input checked="" type="radio"/> Medium	<input type="radio"/> High	<input type="radio"/> Critical
<b>Wellhead</b>	<input type="radio"/> Conventional	<input checked="" type="radio"/> Multibowl	<input type="radio"/> Both	<input type="radio"/> Diverter
<b>Cementing</b>	<input type="checkbox"/> Primary Squeeze	<input checked="" type="checkbox"/> Cont. Squeeze	<input checked="" type="checkbox"/> EchoMeter	<input type="checkbox"/> DV Tool
<b>Special Req</b>	<input type="checkbox"/> Break Testing	<input type="checkbox"/> Water Disposal	<input type="checkbox"/> COM	<input checked="" type="checkbox"/> Unit
<b>Variance</b>	<input checked="" type="checkbox"/> Flex Hose	<input type="checkbox"/> Casing Clearance	<input type="checkbox"/> Pilot Hole	<input type="checkbox"/> Capitan Reef
<b>Variance</b>	<input type="checkbox"/> Four-String	<input checked="" type="checkbox"/> Offline Cementing	<input type="checkbox"/> Fluid-Filled	<input type="checkbox"/> Open Annulus
<input type="checkbox"/> <b>Batch APD / Sundry</b>				

### A. HYDROGEN SULFIDE

Hydrogen Sulfide (H<sub>2</sub>S) monitors shall be installed prior to drilling out the surface shoe. If H<sub>2</sub>S is detected in concentrations greater than 100 ppm, the Hydrogen Sulfide area shall meet 43 CFR 3176 requirements, which includes equipment and personnel/public protection items. If Hydrogen Sulfide is encountered, provide measured values and formations to the BLM.

### B. CASING

1. The **13-3/8** inch surface casing shall be set at approximately 1,147 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.
  - 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:

Operator has proposed to cement in two stages by conventionally cementing the first stage and performing a bradenhead squeeze on the second stage, contingent upon no returns to surface.

- a. First stage: Operator will cement with intent to reach the top of the **Brushy Canyon at 6790'**
  - b. Second stage:
    - Operator will perform bradenhead squeeze and top-out. Cement to surface. If cement does not reach surface, the appropriate BLM office shall be notified. **Wait on cement (WOC) time for a primary cement job is to include the lead cement slurry due to cave/karst, Capitan Reef, or potash.**
- ❖ In Medium Cave/Karst Areas if cement does not circulate to surface on the first two casing strings, the cement on the 3rd casing string must come to surface.

**Operator has proposed to pump down 7-5/8" X 5-1/2" 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.**

**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 **300 feet** into previous casing string. Operator shall provide method of verification. Additional tieback requirements due to not meeting 0.422" clearance requirement per 43 CFR 3172. **Wait on cement (WOC) time for a primary cement job is to include the lead cement slurry due to cave/karst, Capitan Reef, or potash.**

### 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. Minimum working pressure of the blowout preventer (BOP) and related equipment (BOPE) required for drilling below the surface casing shoe shall be **10,000 (10M) psi. Variance is approved to use a 5000 (5M) Annular which shall be tested to 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 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.

#### 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
    - Notify the BLM when moving in and removing the Spudder Rig.
    - 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.
    - BOP/BOPE test to be conducted per **43 CFR part 3170 Subpart 3172** as soon as 2nd 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. The record of the drilling rate along with the GR/N well log run from TD to surface (horizontal well – vertical portion of hole) shall be submitted to the BLM office as well as all other logs run on the borehole 30 days from completion. If available, a digital copy of the logs is to be submitted in addition to the paper copies. The Rustler top and top and bottom of Salt are to be recorded on the Completion Report.

## 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, 2) until cement has been in place at least 24 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-P 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 part 3170 Subpart 3172** and **API STD 53 Sec. 5.3**.
  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:
    - 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. Whenever any seal subject to test pressure is broken, all the tests in **43 CFR part 3170 Subpart 3172** must be followed.
    - e. 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.
    - a. In a water basin, for all casing strings utilizing slips, these are to be set as soon as the crew and rig are ready and any fallback cement remediation has been done. The casing cut-off and BOP installation can be initiated four hours after installing the slips, which will be approximately six hours after bumping the

plug. For those casing strings not using slips, the minimum wait time before cut-off is eight hours after bumping the plug. BOP/BOPE testing can begin after cut-off or once cement reaches 500 psi compressive strength (including lead 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).

- b. 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.)
- c. 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 part 3170 Subpart 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 water basin (8 hours) or potash (24 hours) or 500 pounds compressive strength, whichever is greater, prior to initiating the test (see casing segment as lead cement may be critical item).
- d. 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.
- e. The results of the test shall be reported to the appropriate BLM office.
- f. 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.
- g. 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.
- h. 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 part 3170 Subpart 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.

District I  
1625 N. French Dr., Hobbs, NM 88240  
Phone: (575) 393-6161 Fax: (575) 393-0720  
District II  
811 S. First St., Artesia, NM 88210  
Phone: (575) 748-1283 Fax: (575) 748-9720  
District III  
1000 Rio Brazos Road, Aztec, NM 87410  
Phone: (505) 334-6178 Fax: (505) 334-6170  
District IV  
1220 S. St. Francis Dr., Santa Fe, NM 87505  
Phone: (505) 476-3460 Fax: (505) 476-3462

State of New Mexico  
Energy, Minerals & Natural Resources Department  
OIL CONSERVATION DIVISION  
1220 South St. Francis Dr.  
Santa Fe, NM 87505

Form C-102  
Revised August 1, 2011  
Submit one copy to appropriate  
District Office

AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

<sup>1</sup> API Number 30-015- 53438		<sup>2</sup> Pool Code 97975		<sup>3</sup> Pool Name WC-015 G-06 S243119C;BONE SPRING	
<sup>4</sup> Property Code		<sup>5</sup> Property Name POKER LAKE UNIT 30-19 BS			<sup>6</sup> Well Number 124H
<sup>7</sup> OGRID No. 373075		<sup>8</sup> Operator Name XTO PERMIAN OPERATING, LLC.			<sup>9</sup> Elevation 3,397'

<sup>10</sup> Surface Location

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
B	30	25 S	31 E		533	NORTH	2,618	EAST	EDDY

<sup>11</sup> Bottom Hole Location If Different From Surface

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
K	18	25 S	31 E		2,605	SOUTH	1,725	WEST	EDDY

<sup>12</sup> Dedicated Acres 320	<sup>13</sup> Joint or Infill	<sup>14</sup> Consolidation Code	<sup>15</sup> Order No.
--------------------------------------	-------------------------------	----------------------------------	-------------------------

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.

<sup>16</sup>

**LEGEND**

- SECTION LINE
- PROPOSED WELLBORE
- NEW MEXICO MINERAL LEASE
- 330' BUFFER
- DEDICATED ACREAGE

**SHL (NAD83 NME)**  
Y = 403,070.9  
X = 701,118.3  
LAT. = 32.107070 °N  
LONG. = 103.817294 °W

**LTP (NAD83 NME)**  
Y = 411,420.6  
X = 700,136.1  
LAT. = 32.130035 °N  
LONG. = 103.820338 °W

**FTP (NAD83 NME)**  
Y = 401,482.4  
X = 700,148.4  
LAT. = 32.102716 °N  
LONG. = 103.820451 °W

**BHL (NAD83 NME)**  
Y = 411,519.6  
X = 700,136.1  
LAT. = 32.130307 °N  
LONG. = 103.820336 °W

**CORNER COORDINATES (NAD83 NME)**

A - Y = 400,933.8 N	X = 699,752.5 E
B - Y = 403,594.7 N	X = 699,750.0 E
C - Y = 406,255.0 N	X = 699,752.2 E
D - Y = 408,911.7 N	X = 699,751.9 E
E - Y = 411,512.9 N	X = 699,749.8 E
F - Y = 400,944.7 N	X = 701,070.7 E
G - Y = 403,603.8 N	X = 701,083.0 E
H - Y = 406,265.0 N	X = 701,080.8 E
I - Y = 408,921.8 N	X = 701,078.7 E
J - Y = 411,539.5 N	X = 701,075.6 E

**SHL (NAD27 NME)**  
Y = 403,012.9  
X = 659,932.8  
LAT. = 32.106945 °N  
LONG. = 103.816815 °W

**LTP (NAD27 NME)**  
Y = 411,362.4  
X = 658,951.2  
LAT. = 32.129910 °N  
LONG. = 103.819857 °W

**FTP (NAD27 NME)**  
Y = 401,424.4  
X = 658,962.9  
LAT. = 32.102591 °N  
LONG. = 103.819972 °W

**BHL (NAD27 NME)**  
Y = 411,461.4  
X = 658,951.2  
LAT. = 32.130183 °N  
LONG. = 103.819855 °W

**CORNER COORDINATES (NAD27 NME)**

A - Y = 400,875.9 N	X = 658,566.9 E
B - Y = 403,536.7 N	X = 658,569.6 E
C - Y = 406,196.9 N	X = 658,566.8 E
D - Y = 408,853.6 N	X = 658,566.6 E
E - Y = 411,454.7 N	X = 658,564.9 E
F - Y = 400,886.7 N	X = 659,885.1 E
G - Y = 403,545.8 N	X = 659,897.5 E
H - Y = 406,206.9 N	X = 659,895.5 E
I - Y = 408,863.7 N	X = 659,893.4 E
J - Y = 411,481.2 N	X = 659,890.6 E

**<sup>17</sup> OPERATOR CERTIFICATION**

I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief, and that this organization either owns a working interest or unleased mineral interest in the land including the proposed bottom hole location or has a right to drill this well at this location pursuant to a contract with an owner of such a mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division.

*Cassie Evans* 10/21/23  
Signature Date

Cassie Evans  
Printed Name

cassie.evans@exxonmobil.com  
E-mail Address

**<sup>18</sup> SURVEYOR CERTIFICATION**

I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my belief.

10-5-2023  
Date of Survey

KC/LM 2019082911

Signature and Seal of  
Professional Surveyor:

I, TIM C. PAPPAS, NEW MEXICO PROFESSIONAL SURVEYOR NO. 21209, DO HEREBY CERTIFY THAT THIS SURVEY PLAT AND THE ACTUAL SURVEY ON THE GROUND UPON WHICH IT IS BASED WERE PERFORMED BY ME OR UNDER MY DIRECT SUPERVISION; THAT I AM RESPONSIBLE FOR THIS SURVEY, THAT THIS SURVEY MEETS THE MINIMUM STANDARDS FOR SURVEYING IN NEW MEXICO, AND THAT IS TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF.

*Tim C. Pappas*

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

9 OCT 2023

TIM C. PAPPAS 21209  
Certificate Number

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

XTO Energy Inc.  
 PLU 30-19 BS 124H  
 Projected TD: 21170.21' MD / 10095' TVD  
 SHL: 533' FNL & 2618' FEL , Section 30, T25S, R31E  
 BHL: 2605' FSL & 1725' FWL , Section 18, T25S, R31E  
 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	1047'	Water
Top of Salt	1403'	Water
Base of Salt	3989'	Water
Delaware	4182'	Water
Brushy Canyon	6748'	Water/Oil/Gas
Bone Spring	8088'	Water
1st Bone Spring	9014'	Water/Oil/Gas
2nd Bone Spring	9677'	Water/Oil/Gas
<b>Target/Land Curve</b>	<b>10095'</b>	<b>Water/Oil/Gas</b>

\*\*\* Hydrocarbons @ Brushy Canyon  
 \*\*\* Groundwater depth 40' (per NM State Engineers Office).

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 @ 1147' (256' 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 9808.62' and cemented to surface. A 6.75 inch curve and 6.75 inch lateral hole will be drilled to 21170.21 MD/TD and 5.5 inch production casing will be set at TD and cemented back up in the intermediate shoe (estimated TOC 9508.62 feet).

3. Casing Design

Hole Size	Depth	OD Csg	Weight	Grade	Collar	New/Used	SF Burst	SF Collapse	SF Tension
12.25	0' – 1147'	9.625	40	J-55	BTC	New	1.30	5.49	13.73
8.75	0' – 4000'	7.625	29.7	RY P-110	Flush Joint	New	2.18	2.52	1.92
8.75	4000' – 9808.62'	7.625	29.7	HC L-80	Flush Joint	New	1.58	1.87	2.35
6.75	0' – 9708.62'	5.5	20	RY P-110	Semi-Premium	New	1.26	1.76	2.19
6.75	9708.62' - 21170.21'	5.5	20	RY P-110	Semi-Flush	New	1.26	1.69	2.19

- XTO requests the option to utilize a spudder rig (Atlas Copco RD20 or Equivalent) to set and cement surface casing per this Sundry
- XTO requests to not utilize centralizers in the curve and lateral
- 7.625 Collapse analyzed using 50% evacuation based on regional experience.
- 5.5 Tension calculated using vertical hanging weight plus the lateral weight multiplied by a friction factor of 0.35
- Test on Casing will be limited to 70% burst of the casing or 1500 psi, whichever is less
- XTO requests the option to use 5" BTC Float equipment for the the production casing

**Wellhead:**

Permanent Wellhead – Multibowl System

A. Starting Head: 11" 10M top flange x 9-5/8" bottom

B. Tubing Head: 11" 10M bottom flange x 7-1/16" 15M top flange

- Wellhead will be installed by manufacturer's representatives.
- Manufacturer will monitor welding process to ensure appropriate temperature of seal.
- Operator will test the 7-5/8" casing per BLM Onshore Order 2
- Wellhead Manufacturer representative will not be present for BOP test plug installation

#### 4. Cement Program

##### **Surface Casing: 9.625, 40 New BTC, J-55 casing to be set at +/- 1147'**

Lead: 280 sxs EconoCem-HLTRRC (mixed at 10.5 ppg, 1.87 ft<sup>3</sup>/sx, 10.13 gal/sx water)  
 Tail: 130 sxs Class C + 2% CaCl (mixed at 14.8 ppg, 1.35 ft<sup>3</sup>/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 +/- 9808.62'**

###### 1st Stage

Optional Lead: 360 sxs Class C (mixed at 10.5 ppg, 2.77 ft<sup>3</sup>/sx, 15.59 gal/sx water)  
 TOC: Surface  
 Tail: 280 sxs Class C (mixed at 14.8 ppg, 1.35 ft<sup>3</sup>/sx, 6.39 gal/sx water)  
 TOC: Brushy Canyon @ 6748  
 Compressives: 12-hr = 900 psi 24 hr = 1150 psi

###### 2nd Stage

Lead: 0 sxs Class C (mixed at 12.9 ppg, 2.16 ft<sup>3</sup>/sx, 9.61 gal/sx water)  
 Tail: 760 sxs Class C (mixed at 14.8 ppg, 1.33 ft<sup>3</sup>/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 (6748') 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 +/- 21170.21'**

Lead: 20 sxs NeoCem (mixed at 11.5 ppg, 2.69 ft<sup>3</sup>/sx, 15.00 gal/sx water) Top of Cement: 9508.62 feet  
 Tail: 800 sxs VersaCem (mixed at 13.2 ppg, 1.51 ft<sup>3</sup>/sx, 8.38 gal/sx water) Top of Cement: 10008.62 feet  
 Compressives: 12-hr = 800 psi 24 hr = 1500 psi

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. Pressure Control Equipment

Once the permanent WH is installed on the 9.625 casing, the blow out preventer equipment (BOP) will consist of a 13-5/8" minimum 5M Hydril and a 13-5/8" minimum 5M Double Ram BOP. MASP should not exceed 4341 psi. In any instance where 10M BOP is required by BLM, XTO requests a variance to utilize 5M annular with 10M ram preventers (a common BOP configuration, which allows use of 10M rams in unlikely event that pressures exceed 5M).

All BOP testing will be done by an independent service company. Annular pressure tests will be limited to 50% of the working pressure. When nipping up on the 9.625, 5M bradenhead and flange, the BOP test will be limited to 5000 psi. When nipping up on the 7.625, the BOP will be tested to a minimum of 5000 psi. All BOP tests will include a low pressure test as per BLM regulations. The 5M BOP diagrams are attached. Blind rams will be functioned tested each trip, pipe rams will be functioned tested each day.

A variance is requested to allow use of a flex hose as the choke line from the BOP to the Choke Manifold. If this hose is used, a copy of the manufacturer's certification and pressure test chart will be kept on the rig. Attached is an example of a certification and pressure test chart. The manufacturer does not require anchors.

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 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. Based on discussions with the BLM on February 27th 2020, 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. When skidding to drill an intermediate section that does not penetrate into the Wolfcamp.

**6. Proposed Mud Circulation System**

INTERVAL	Hole Size	Mud Type	MW (ppg)	Viscosity (sec/qt)	Fluid Loss (cc)
0' - 1147'	12.25	FW/Native	8.4-8.9	35-40	NC
1147' - 9808.62'	8.75	FW / Cut Brine / Direct Emulsion	10.2-10.7	30-32	NC
9808.62' - 21170.21'	6.75	OBM	12.5-13	50-60	NC - 20

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 9-5/8" surface casing with brine solution. A 9.7 ppg - 10.2 ppg cut 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**

Mud Logger: Mud Logging Unit (2 man) below intermediate casing.

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. The maximum anticipated bottom hole pressure for this well is 6562 psi.

**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.

# Well Plan Report - POKER LAKE UNIT 30-19 BS 124H

**Measured Depth:** 21170.21 ft

**Site:** 30-19

**TVD RKB:** 10087.00 ft

**Slot:** POKER LAKE UNIT 30-19 BS 124H

**Location**

**Cartographic Reference System:** New Mexico East - NAD 27

**Northing:** 403012.90 ft

**Easting:** 659932.80 ft

**RKB:** 3429.00 ft

**Ground Level:** 3389.00 ft

**North Reference:** Grid

**Convergence Angle:** 0.27 Deg

**Plan Sections** POKER LAKE UNIT 30-19 BS 124H

Measured Depth (ft)	Inclination (Deg)	Azimuth (Deg)	TVD RKB (ft)	Y Offset (ft)	X Offset (ft)	Build Rate (Deg/100ft)	Turn Rate (Deg/100ft)	Dogleg Rate (Deg/100ft)	Target
0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00	0.00	
1100.00	0.00	0.00	1108.00	0.00	0.00	0.00	0.00	0.00	
2722.14	32.44	202.81	2644.84	-412.17	-173.30	2.00	0.00	2.00	
5715.67	32.44	202.81	5171.16	-1892.53	-795.75	0.00	0.00	0.00	
7337.82	0.00	0.00	6708.00	-2304.70	-969.06	-2.00	0.00	2.00	
10008.62	0.00	0.00	9378.80	-2304.70	-969.06	0.00	0.00	0.00	
11133.62	90.00	359.93	10095.00	-1588.50	-969.90	8.00	0.00	8.00	FTP 7
21071.63	90.00	359.93	10095.00	8349.50	-981.60	0.00	0.00	0.00	LTP 7
21170.21	90.00	359.93	10095.00	8448.09	-981.72	0.00	0.00	0.00	BHL 7

**Position Uncertainty** POKER LAKE UNIT 30-19 BS 124H

Measured	TVD	Highside	Lateral	Vertical	Magnitude	Semi-major	Semi-minor	Semi-minor	Tool
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Depth (ft)	Inclination (°)	Azimuth (°)	RKB (ft)	Error (ft)	Bias (ft)	Error (ft)	Bias (ft)	Error (ft)	Bias (ft)	of Bias (ft)	Error (ft)	Error (ft)	Azimuth (°)	Used
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	MWD+IFR1+MS
100.000	0.000	0.000	100.000	0.700	0.000	0.350	0.000	2.300	0.000	0.000	0.751	0.220	112.264	MWD+IFR1+MS
200.000	0.000	0.000	200.000	1.112	0.000	0.861	0.000	2.310	0.000	0.000	1.259	0.627	122.711	MWD+IFR1+MS
300.000	0.000	0.000	300.000	1.497	0.000	1.271	0.000	2.325	0.000	0.000	1.698	0.986	125.469	MWD+IFR1+MS
400.000	0.000	0.000	400.000	1.871	0.000	1.658	0.000	2.347	0.000	0.000	2.108	1.344	126.713	MWD+IFR1+MS
500.000	0.000	0.000	500.000	2.240	0.000	2.034	0.000	2.374	0.000	0.000	2.503	1.701	127.419	MWD+IFR1+MS
600.000	0.000	0.000	600.000	2.607	0.000	2.405	0.000	2.407	0.000	0.000	2.888	2.059	127.873	MWD+IFR1+MS
700.000	0.000	0.000	700.000	2.971	0.000	2.773	0.000	2.444	0.000	0.000	3.267	2.417	128.190	MWD+IFR1+MS
800.000	0.000	0.000	800.000	3.334	0.000	3.138	0.000	2.486	0.000	0.000	3.642	2.775	128.423	MWD+IFR1+MS
900.000	0.000	0.000	900.000	3.696	0.000	3.502	0.000	2.532	0.000	0.000	4.014	3.133	128.602	MWD+IFR1+MS
1000.000	0.000	0.000	1000.000	4.058	0.000	3.865	0.000	2.582	0.000	0.000	4.384	3.491	128.744	MWD+IFR1+MS
1100.000	0.000	0.000	1100.000	4.419	0.000	4.228	0.000	2.635	0.000	0.000	4.752	3.849	128.859	MWD+IFR1+MS
1200.000	2.000	202.805	1199.980	5.035	-0.000	4.258	0.000	2.691	0.000	0.000	5.094	4.189	128.005	MWD+IFR1+MS
1300.000	4.000	202.805	1299.838	5.797	-0.000	4.615	0.000	2.752	0.000	0.000	5.884	4.516	127.436	MWD+IFR1+MS
1400.000	6.000	202.805	1399.452	6.482	-0.000	4.973	0.000	2.817	0.000	0.000	6.596	4.847	127.195	MWD+IFR1+MS
1500.000	8.000	202.805	1498.702	7.112	-0.000	5.332	0.000	2.890	0.000	0.000	7.255	5.183	127.073	MWD+IFR1+MS
1600.000	10.000	202.805	1597.465	7.699	-0.000	5.694	0.000	2.973	0.000	0.000	7.872	5.525	127.015	MWD+IFR1+MS
1700.000	12.000	202.805	1695.623	8.252	-0.000	6.059	0.000	3.068	0.000	0.000	8.455	5.873	127.001	MWD+IFR1+MS
1800.000	14.000	202.805	1793.055	8.775	-0.000	6.429	0.000	3.176	0.000	0.000	9.012	6.227	127.024	MWD+IFR1+MS
1900.000	16.000	202.805	1889.643	9.274	-0.000	6.806	0.000	3.299	0.000	0.000	9.547	6.589	127.080	MWD+IFR1+MS
2000.000	18.000	202.805	1985.268	9.751	-0.000	7.190	0.000	3.439	0.000	0.000	10.062	6.960	127.171	MWD+IFR1+MS
2100.000	20.000	202.805	2079.816	10.210	-0.000	7.583	0.000	3.597	0.000	0.000	10.561	7.341	127.296	MWD+IFR1+MS
2200.000	22.000	202.805	2173.169	10.653	-0.000	7.986	0.000	3.774	0.000	0.000	11.045	7.733	127.461	MWD+IFR1+MS
2300.000	24.000	202.805	2265.215	11.081	-0.000	8.400	0.000	3.970	0.000	0.000	11.517	8.136	127.669	MWD+IFR1+MS
2400.000	26.000	202.805	2355.841	11.497	-0.000	8.827	0.000	4.188	0.000	0.000	11.978	8.552	127.927	MWD+IFR1+MS
2500.000	28.000	202.805	2444.937	11.902	-0.000	9.268	0.000	4.427	0.000	0.000	12.429	8.981	128.243	MWD+IFR1+MS
2600.000	30.000	202.805	2532.394	12.296	-0.000	9.723	0.000	4.687	0.000	0.000	12.871	9.425	128.626	MWD+IFR1+MS
2700.000	32.000	202.805	2618.107	12.682	-0.000	10.194	0.000	4.971	0.000	0.000	13.304	9.884	129.089	MWD+IFR1+MS
2722.145	32.443	202.805	2636.841	12.723	-0.000	10.296	0.000	4.999	0.000	0.000	13.369	9.986	129.180	MWD+IFR1+MS
2800.000	32.443	202.805	2702.545	12.974	-0.000	10.664	0.000	5.130	0.000	0.000	13.585	10.355	129.654	MWD+IFR1+MS
2900.000	32.443	202.805	2786.938	13.311	-0.000	11.157	0.000	5.314	0.000	0.000	13.877	10.842	130.492	MWD+IFR1+MS

3000.000	32.443	202.805	2871.331	13.662	-0.000	11.662	0.000	5.510	0.000	0.000	14.182	11.337	131.505	MWD+IFR1+MS
3100.000	32.443	202.805	2955.723	14.024	-0.000	12.174	0.000	5.714	0.000	0.000	14.498	11.837	132.669	MWD+IFR1+MS
3200.000	32.443	202.805	3040.116	14.396	-0.000	12.693	0.000	5.926	0.000	0.000	14.824	12.341	134.009	MWD+IFR1+MS
3300.000	32.443	202.805	3124.508	14.778	-0.000	13.218	0.000	6.144	0.000	0.000	15.160	12.846	-44.448	MWD+IFR1+MS
3400.000	32.443	202.805	3208.901	15.167	-0.000	13.748	0.000	6.369	0.000	0.000	15.507	13.352	-42.671	MWD+IFR1+MS
3500.000	32.443	202.805	3293.294	15.564	-0.000	14.282	0.000	6.600	0.000	0.000	15.865	13.858	-40.627	MWD+IFR1+MS
3600.000	32.443	202.805	3377.686	15.969	-0.000	14.820	0.000	6.836	0.000	0.000	16.235	14.361	-38.287	MWD+IFR1+MS
3700.000	32.443	202.805	3462.079	16.380	-0.000	15.362	0.000	7.077	0.000	0.000	16.618	14.860	-35.627	MWD+IFR1+MS
3800.000	32.443	202.805	3546.472	16.797	-0.000	15.907	0.000	7.321	0.000	0.000	17.014	15.354	-32.642	MWD+IFR1+MS
3900.000	32.443	202.805	3630.864	17.220	-0.000	16.455	0.000	7.570	0.000	0.000	17.424	15.841	-29.352	MWD+IFR1+MS
4000.000	32.443	202.805	3715.257	17.648	-0.000	17.005	0.000	7.822	0.000	0.000	17.851	16.319	-25.817	MWD+IFR1+MS
4100.000	32.443	202.805	3799.650	18.081	-0.000	17.558	0.000	8.078	0.000	0.000	18.293	16.788	-22.132	MWD+IFR1+MS
4200.000	32.443	202.805	3884.042	18.519	-0.000	18.113	0.000	8.336	0.000	0.000	18.752	17.246	-18.419	MWD+IFR1+MS
4300.000	32.443	202.805	3968.435	18.961	-0.000	18.671	0.000	8.597	0.000	0.000	19.226	17.695	-14.806	MWD+IFR1+MS
4400.000	32.443	202.805	4052.828	19.406	-0.000	19.229	0.000	8.861	0.000	0.000	19.715	18.134	-11.402	MWD+IFR1+MS
4500.000	32.443	202.805	4137.220	19.856	-0.000	19.790	0.000	9.127	0.000	0.000	20.217	18.566	-8.279	MWD+IFR1+MS
4600.000	32.443	202.805	4221.613	20.309	-0.000	20.352	0.000	9.395	0.000	0.000	20.729	18.990	-5.472	MWD+IFR1+MS
4700.000	32.443	202.805	4306.006	20.765	-0.000	20.916	0.000	9.666	0.000	0.000	21.252	19.410	-2.983	MWD+IFR1+MS
4800.000	32.443	202.805	4390.398	21.225	-0.000	21.480	0.000	9.938	0.000	0.000	21.782	19.826	-0.796	MWD+IFR1+MS
4900.000	32.443	202.805	4474.791	21.687	-0.000	22.046	0.000	10.212	0.000	0.000	22.319	20.239	1.118	MWD+IFR1+MS
5000.000	32.443	202.805	4559.184	22.152	-0.000	22.613	0.000	10.488	0.000	0.000	22.861	20.650	2.792	MWD+IFR1+MS
5100.000	32.443	202.805	4643.576	22.619	-0.000	23.181	0.000	10.765	0.000	0.000	23.408	21.060	4.256	MWD+IFR1+MS
5200.000	32.443	202.805	4727.969	23.089	-0.000	23.750	0.000	11.044	0.000	0.000	23.959	21.469	5.542	MWD+IFR1+MS
5300.000	32.443	202.805	4812.361	23.561	-0.000	24.320	0.000	11.324	0.000	0.000	24.513	21.878	6.674	MWD+IFR1+MS
5400.000	32.443	202.805	4896.754	24.034	-0.000	24.891	0.000	11.606	0.000	0.000	25.070	22.286	7.674	MWD+IFR1+MS
5500.000	32.443	202.805	4981.147	24.510	-0.000	25.462	0.000	11.889	0.000	0.000	25.630	22.695	8.562	MWD+IFR1+MS
5600.000	32.443	202.805	5065.539	24.988	-0.000	26.034	0.000	12.174	0.000	0.000	26.192	23.105	9.354	MWD+IFR1+MS
5700.000	32.443	202.805	5149.932	25.467	-0.000	26.607	0.000	12.459	0.000	0.000	26.755	23.515	10.063	MWD+IFR1+MS
5715.673	32.443	202.805	5163.159	25.542	-0.000	26.695	0.000	12.504	0.000	0.000	26.842	23.579	10.179	MWD+IFR1+MS
5800.000	30.756	202.805	5234.980	26.043	-0.000	27.168	0.000	12.746	0.000	0.000	27.308	23.930	10.675	MWD+IFR1+MS
5900.000	28.756	202.805	5321.790	26.671	-0.000	27.718	0.000	13.056	0.000	0.000	27.860	24.395	10.773	MWD+IFR1+MS
6000.000	26.756	202.805	5410.279	27.269	-0.000	28.251	0.000	13.349	0.000	0.000	28.397	24.868	10.721	MWD+IFR1+MS
6100.000	24.756	202.805	5500.340	27.822	-0.000	28.767	0.000	13.618	0.000	0.000	28.917	25.340	10.617	MWD+IFR1+MS

6200.000	22.756	202.805	5591.862	28.328	-0.000	29.263	0.000	13.865	0.000	0.000	29.419	25.807	10.466	MWD+IFR1+MS
6300.000	20.756	202.805	5684.734	28.787	-0.000	29.741	0.000	14.091	0.000	0.000	29.902	26.269	10.271	MWD+IFR1+MS
6400.000	18.756	202.805	5778.843	29.198	-0.000	30.199	0.000	14.297	0.000	0.000	30.367	26.724	10.035	MWD+IFR1+MS
6500.000	16.756	202.805	5874.074	29.562	-0.000	30.638	0.000	14.484	0.000	0.000	30.813	27.170	9.760	MWD+IFR1+MS
6600.000	14.756	202.805	5970.312	29.877	-0.000	31.057	0.000	14.654	0.000	0.000	31.240	27.607	9.449	MWD+IFR1+MS
6700.000	12.756	202.805	6067.439	30.144	-0.000	31.456	0.000	14.809	0.000	0.000	31.648	28.032	9.103	MWD+IFR1+MS
6800.000	10.756	202.805	6165.336	30.362	-0.000	31.836	0.000	14.949	0.000	0.000	32.037	28.445	8.724	MWD+IFR1+MS
6900.000	8.756	202.805	6263.885	30.533	-0.000	32.196	0.000	15.077	0.000	0.000	32.407	28.846	8.313	MWD+IFR1+MS
7000.000	6.756	202.805	6362.965	30.655	-0.000	32.537	0.000	15.193	0.000	0.000	32.759	29.232	7.871	MWD+IFR1+MS
7100.000	4.756	202.805	6462.455	30.729	-0.000	32.858	0.000	15.300	0.000	0.000	33.092	29.604	7.400	MWD+IFR1+MS
7200.000	2.756	202.805	6562.235	30.756	-0.000	33.161	0.000	15.399	0.000	0.000	33.408	29.960	6.902	MWD+IFR1+MS
7300.000	0.756	202.805	6662.183	30.736	-0.000	33.446	0.000	15.492	0.000	0.000	33.705	30.301	6.378	MWD+IFR1+MS
7337.818	0.000	0.000	6700.000	30.442	0.000	33.757	0.000	15.526	0.000	0.000	33.798	30.397	6.414	MWD+IFR1+MS
7400.000	0.000	0.000	6762.182	30.597	0.000	33.894	0.000	15.581	0.000	0.000	33.935	30.551	6.474	MWD+IFR1+MS
7500.000	0.000	0.000	6862.182	30.847	0.000	34.118	0.000	15.673	0.000	0.000	34.159	30.801	6.534	MWD+IFR1+MS
7600.000	0.000	0.000	6962.182	31.102	0.000	34.346	0.000	15.766	0.000	0.000	34.387	31.056	6.563	MWD+IFR1+MS
7700.000	0.000	0.000	7062.182	31.358	0.000	34.576	0.000	15.863	0.000	0.000	34.617	31.312	6.592	MWD+IFR1+MS
7800.000	0.000	0.000	7162.182	31.617	0.000	34.808	0.000	15.962	0.000	0.000	34.850	31.571	6.620	MWD+IFR1+MS
7900.000	0.000	0.000	7262.182	31.877	0.000	35.043	0.000	16.065	0.000	0.000	35.085	31.831	6.649	MWD+IFR1+MS
8000.000	0.000	0.000	7362.182	32.140	0.000	35.280	0.000	16.170	0.000	0.000	35.321	32.094	6.678	MWD+IFR1+MS
8100.000	0.000	0.000	7462.182	32.404	0.000	35.518	0.000	16.278	0.000	0.000	35.560	32.358	6.707	MWD+IFR1+MS
8200.000	0.000	0.000	7562.182	32.670	0.000	35.759	0.000	16.389	0.000	0.000	35.801	32.624	6.736	MWD+IFR1+MS
8300.000	0.000	0.000	7662.182	32.938	0.000	36.002	0.000	16.504	0.000	0.000	36.044	32.892	6.765	MWD+IFR1+MS
8400.000	0.000	0.000	7762.182	33.207	0.000	36.246	0.000	16.621	0.000	0.000	36.288	33.161	6.793	MWD+IFR1+MS
8500.000	0.000	0.000	7862.182	33.478	0.000	36.493	0.000	16.741	0.000	0.000	36.535	33.433	6.822	MWD+IFR1+MS
8600.000	0.000	0.000	7962.182	33.751	0.000	36.741	0.000	16.865	0.000	0.000	36.783	33.705	6.851	MWD+IFR1+MS
8700.000	0.000	0.000	8062.182	34.025	0.000	36.991	0.000	16.992	0.000	0.000	37.033	33.980	6.880	MWD+IFR1+MS
8800.000	0.000	0.000	8162.182	34.301	0.000	37.243	0.000	17.122	0.000	0.000	37.285	34.256	6.909	MWD+IFR1+MS
8900.000	0.000	0.000	8262.182	34.579	0.000	37.497	0.000	17.255	0.000	0.000	37.539	34.533	6.939	MWD+IFR1+MS
9000.000	0.000	0.000	8362.182	34.858	0.000	37.752	0.000	17.391	0.000	0.000	37.794	34.812	6.968	MWD+IFR1+MS
9100.000	0.000	0.000	8462.182	35.138	0.000	38.009	0.000	17.531	0.000	0.000	38.051	35.092	6.997	MWD+IFR1+MS
9200.000	0.000	0.000	8562.182	35.420	0.000	38.268	0.000	17.675	0.000	0.000	38.310	35.374	7.026	MWD+IFR1+MS
9300.000	0.000	0.000	8662.182	35.703	0.000	38.528	0.000	17.821	0.000	0.000	38.570	35.657	7.055	MWD+IFR1+MS

9400.000	0.000	0.000	8762.182	35.988	0.000	38.790	0.000	17.971	0.000	0.000	38.832	35.942	7.084	MWD+IFR1+MS
9500.000	0.000	0.000	8862.182	36.273	0.000	39.053	0.000	18.125	0.000	0.000	39.095	36.228	7.114	MWD+IFR1+MS
9600.000	0.000	0.000	8962.182	36.560	0.000	39.318	0.000	18.282	0.000	0.000	39.360	36.515	7.143	MWD+IFR1+MS
9700.000	0.000	0.000	9062.182	36.849	0.000	39.584	0.000	18.442	0.000	0.000	39.627	36.803	7.172	MWD+IFR1+MS
9800.000	0.000	0.000	9162.182	37.138	0.000	39.852	0.000	18.606	0.000	0.000	39.894	37.093	7.201	MWD+IFR1+MS
9900.000	0.000	0.000	9262.182	37.429	0.000	40.121	0.000	18.774	0.000	0.000	40.164	37.383	7.231	MWD+IFR1+MS
10008.620	0.000	0.000	9370.803	37.747	0.000	40.416	0.000	18.960	0.000	0.000	40.458	37.702	7.244	MWD+IFR1+MS
10100.000	7.310	359.933	9461.935	36.769	0.000	40.653	0.000	19.120	0.000	0.000	40.694	38.173	7.371	MWD+IFR1+MS
10200.000	15.310	359.933	9559.913	35.993	0.000	40.889	0.000	19.364	0.000	0.000	40.936	39.361	9.907	MWD+IFR1+MS
10300.000	23.310	359.933	9654.210	34.880	0.000	41.100	0.000	19.770	0.000	0.000	41.172	40.454	18.510	MWD+IFR1+MS
10400.000	31.310	359.933	9742.992	33.454	0.000	41.284	0.000	20.400	0.000	0.000	41.566	41.176	58.273	MWD+IFR1+MS
10500.000	39.310	359.933	9824.529	31.875	0.000	41.442	0.000	21.290	0.000	0.000	42.223	41.417	79.867	MWD+IFR1+MS
10600.000	47.310	359.933	9897.234	30.342	0.000	41.574	0.000	22.443	0.000	0.000	42.759	41.564	84.680	MWD+IFR1+MS
10700.000	55.310	359.933	9959.694	29.084	0.000	41.683	0.000	23.833	0.000	0.000	43.129	41.678	86.637	MWD+IFR1+MS
10800.000	63.310	359.933	10010.691	28.338	0.000	41.770	0.000	25.412	0.000	0.000	43.349	41.767	87.748	MWD+IFR1+MS
10900.000	71.310	359.933	10049.234	28.300	0.000	41.835	0.000	27.120	0.000	0.000	43.451	41.834	88.560	MWD+IFR1+MS
11000.000	79.310	359.933	10074.571	29.062	0.000	41.881	0.000	28.892	0.000	0.000	43.474	41.881	89.293	MWD+IFR1+MS
11100.000	87.310	359.933	10086.211	30.589	0.000	41.908	0.000	30.664	0.000	0.000	43.463	41.908	90.041	MWD+IFR1+MS
11133.620	90.000	359.933	10087.000	30.852	0.000	41.910	0.000	30.852	0.000	0.000	43.461	41.910	90.282	MWD+IFR1+MS
11200.000	90.000	359.933	10087.000	31.110	0.000	41.917	0.000	31.110	0.000	0.000	43.458	41.916	90.790	MWD+IFR1+MS
11300.000	90.000	359.933	10087.000	31.481	0.000	41.947	0.000	31.481	0.000	0.000	43.455	41.946	91.587	MWD+IFR1+MS
11400.000	90.000	359.933	10087.000	31.869	0.000	41.997	0.000	31.869	0.000	0.000	43.452	41.994	92.451	MWD+IFR1+MS
11500.000	90.000	359.933	10087.000	32.271	0.000	42.066	0.000	32.271	0.000	0.000	43.451	42.061	93.420	MWD+IFR1+MS
11600.000	90.000	359.933	10087.000	32.688	0.000	42.153	0.000	32.688	0.000	0.000	43.452	42.144	94.544	MWD+IFR1+MS
11700.000	90.000	359.933	10087.000	33.117	0.000	42.258	0.000	33.117	0.000	0.000	43.454	42.244	95.901	MWD+IFR1+MS
11800.000	90.000	359.933	10087.000	33.560	0.000	42.381	0.000	33.560	0.000	0.000	43.459	42.361	97.608	MWD+IFR1+MS
11900.000	90.000	359.933	10087.000	34.015	0.000	42.522	0.000	34.015	0.000	0.000	43.467	42.492	99.859	MWD+IFR1+MS
12000.000	90.000	359.933	10087.000	34.481	0.000	42.680	0.000	34.481	0.000	0.000	43.480	42.637	102.985	MWD+IFR1+MS
12100.000	90.000	359.933	10087.000	34.960	0.000	42.857	0.000	34.960	0.000	0.000	43.502	42.791	107.571	MWD+IFR1+MS
12200.000	90.000	359.933	10087.000	35.449	0.000	43.050	0.000	35.449	0.000	0.000	43.540	42.946	114.578	MWD+IFR1+MS
12300.000	90.000	359.933	10087.000	35.948	0.000	43.261	0.000	35.948	0.000	0.000	43.609	43.089	124.957	MWD+IFR1+MS
12400.000	90.000	359.933	10087.000	36.458	0.000	43.488	0.000	36.458	0.000	0.000	43.729	43.198	-42.456	MWD+IFR1+MS
12500.000	90.000	359.933	10087.000	36.977	0.000	43.732	0.000	36.977	0.000	0.000	43.905	43.267	-31.512	MWD+IFR1+MS

12600.000	90.000	359.933	10087.000	37.505	0.000	43.992	0.000	37.505	0.000	0.000	44.126	43.309	-23.990	MWD+IFR1+MS
12700.000	90.000	359.933	10087.000	38.043	0.000	44.269	0.000	38.043	0.000	0.000	44.379	43.335	-19.104	MWD+IFR1+MS
12800.000	90.000	359.933	10087.000	38.588	0.000	44.561	0.000	38.588	0.000	0.000	44.655	43.353	-15.835	MWD+IFR1+MS
12900.000	90.000	359.933	10087.000	39.142	0.000	44.868	0.000	39.142	0.000	0.000	44.953	43.367	-13.539	MWD+IFR1+MS
13000.000	90.000	359.933	10087.000	39.704	0.000	45.190	0.000	39.704	0.000	0.000	45.268	43.379	-11.851	MWD+IFR1+MS
13100.000	90.000	359.933	10087.000	40.273	0.000	45.528	0.000	40.273	0.000	0.000	45.599	43.389	-10.562	MWD+IFR1+MS
13200.000	90.000	359.933	10087.000	40.850	0.000	45.879	0.000	40.850	0.000	0.000	45.947	43.399	-9.546	MWD+IFR1+MS
13300.000	90.000	359.933	10087.000	41.433	0.000	46.245	0.000	41.433	0.000	0.000	46.309	43.408	-8.725	MWD+IFR1+MS
13400.000	90.000	359.933	10087.000	42.022	0.000	46.625	0.000	42.022	0.000	0.000	46.685	43.418	-8.046	MWD+IFR1+MS
13500.000	90.000	359.933	10087.000	42.618	0.000	47.018	0.000	42.618	0.000	0.000	47.076	43.427	-7.475	MWD+IFR1+MS
13600.000	90.000	359.933	10087.000	43.220	0.000	47.424	0.000	43.220	0.000	0.000	47.480	43.436	-6.988	MWD+IFR1+MS
13700.000	90.000	359.933	10087.000	43.828	0.000	47.842	0.000	43.828	0.000	0.000	47.897	43.446	-6.567	MWD+IFR1+MS
13800.000	90.000	359.933	10087.000	44.442	0.000	48.274	0.000	44.442	0.000	0.000	48.327	43.456	-6.199	MWD+IFR1+MS
13900.000	90.000	359.933	10087.000	45.060	0.000	48.717	0.000	45.060	0.000	0.000	48.768	43.467	-5.874	MWD+IFR1+MS
14000.000	90.000	359.933	10087.000	45.684	0.000	49.172	0.000	45.684	0.000	0.000	49.222	43.477	-5.585	MWD+IFR1+MS
14100.000	90.000	359.933	10087.000	46.313	0.000	49.639	0.000	46.313	0.000	0.000	49.688	43.488	-5.327	MWD+IFR1+MS
14200.000	90.000	359.933	10087.000	46.946	0.000	50.117	0.000	46.946	0.000	0.000	50.164	43.500	-5.093	MWD+IFR1+MS
14300.000	90.000	359.933	10087.000	47.584	0.000	50.605	0.000	47.584	0.000	0.000	50.652	43.512	-4.881	MWD+IFR1+MS
14400.000	90.000	359.933	10087.000	48.226	0.000	51.104	0.000	48.226	0.000	0.000	51.150	43.525	-4.688	MWD+IFR1+MS
14500.000	90.000	359.933	10087.000	48.873	0.000	51.614	0.000	48.873	0.000	0.000	51.659	43.538	-4.511	MWD+IFR1+MS
14600.000	90.000	359.933	10087.000	49.523	0.000	52.133	0.000	49.523	0.000	0.000	52.177	43.551	-4.349	MWD+IFR1+MS
14700.000	90.000	359.933	10087.000	50.177	0.000	52.662	0.000	50.177	0.000	0.000	52.705	43.565	-4.198	MWD+IFR1+MS
14800.000	90.000	359.933	10087.000	50.835	0.000	53.200	0.000	50.835	0.000	0.000	53.243	43.579	-4.059	MWD+IFR1+MS
14900.000	90.000	359.933	10087.000	51.497	0.000	53.747	0.000	51.497	0.000	0.000	53.789	43.594	-3.930	MWD+IFR1+MS
15000.000	90.000	359.933	10087.000	52.162	0.000	54.303	0.000	52.162	0.000	0.000	54.344	43.609	-3.809	MWD+IFR1+MS
15100.000	90.000	359.933	10087.000	52.830	0.000	54.868	0.000	52.830	0.000	0.000	54.908	43.625	-3.696	MWD+IFR1+MS
15200.000	90.000	359.933	10087.000	53.501	0.000	55.440	0.000	53.501	0.000	0.000	55.480	43.642	-3.590	MWD+IFR1+MS
15300.000	90.000	359.933	10087.000	54.176	0.000	56.021	0.000	54.176	0.000	0.000	56.061	43.658	-3.491	MWD+IFR1+MS
15400.000	90.000	359.933	10087.000	54.853	0.000	56.610	0.000	54.853	0.000	0.000	56.648	43.676	-3.398	MWD+IFR1+MS
15500.000	90.000	359.933	10087.000	55.533	0.000	57.206	0.000	55.533	0.000	0.000	57.244	43.694	-3.309	MWD+IFR1+MS
15600.000	90.000	359.933	10087.000	56.216	0.000	57.809	0.000	56.216	0.000	0.000	57.847	43.712	-3.226	MWD+IFR1+MS
15700.000	90.000	359.933	10087.000	56.902	0.000	58.419	0.000	56.902	0.000	0.000	58.456	43.731	-3.147	MWD+IFR1+MS
15800.000	90.000	359.933	10087.000	57.590	0.000	59.036	0.000	57.590	0.000	0.000	59.073	43.750	-3.072	MWD+IFR1+MS

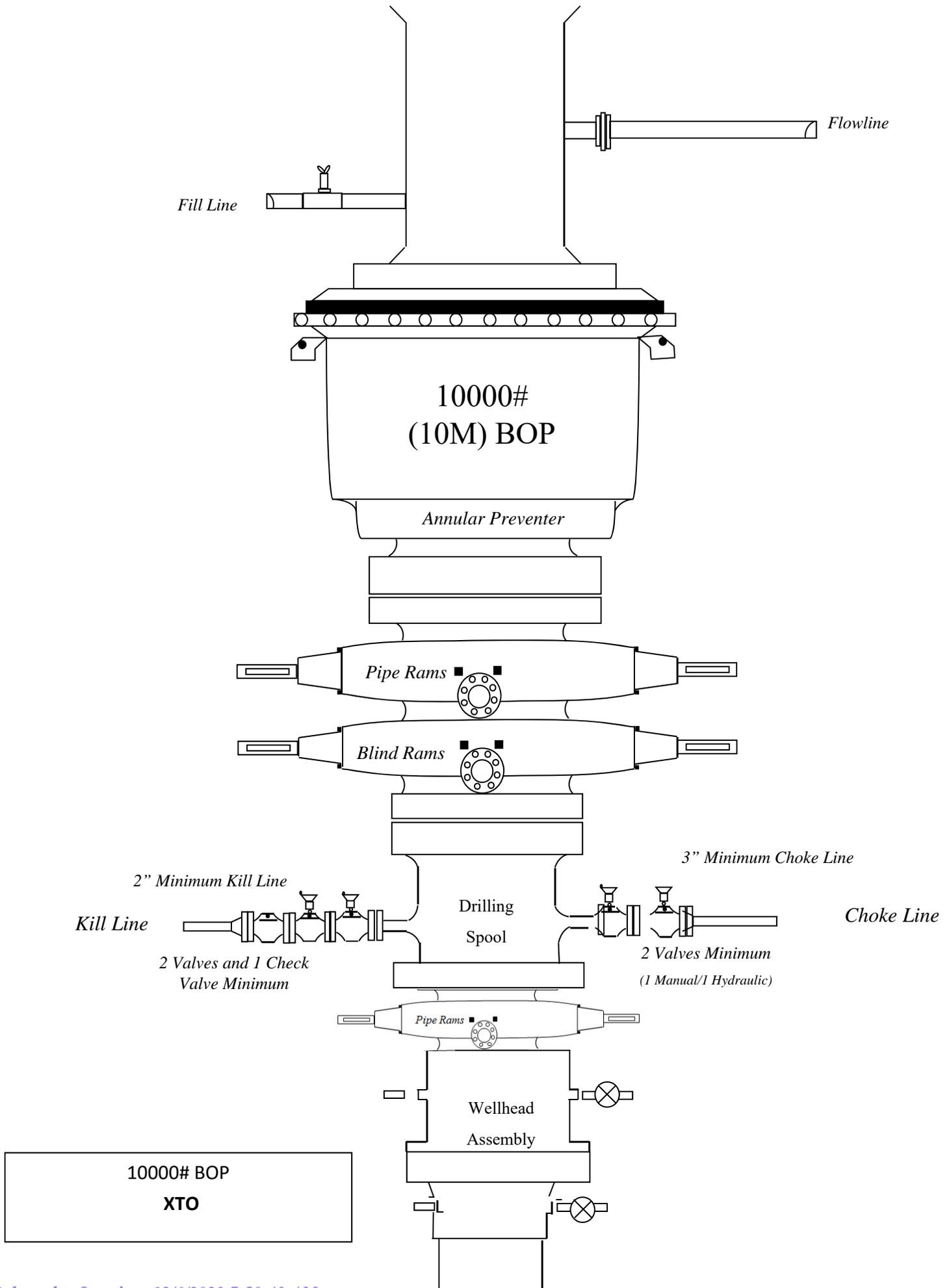
15900.000	90.000	359.933	10087.000	58.280	0.000	59.660	0.000	58.280	0.000	0.000	59.696	43.770	-3.001	MWD+IFR1+MS
16000.000	90.000	359.933	10087.000	58.973	0.000	60.290	0.000	58.973	0.000	0.000	60.326	43.790	-2.933	MWD+IFR1+MS
16100.000	90.000	359.933	10087.000	59.668	0.000	60.927	0.000	59.668	0.000	0.000	60.962	43.811	-2.869	MWD+IFR1+MS
16200.000	90.000	359.933	10087.000	60.366	0.000	61.569	0.000	60.366	0.000	0.000	61.604	43.832	-2.808	MWD+IFR1+MS
16300.000	90.000	359.933	10087.000	61.065	0.000	62.218	0.000	61.065	0.000	0.000	62.252	43.854	-2.749	MWD+IFR1+MS
16400.000	90.000	359.933	10087.000	61.767	0.000	62.872	0.000	61.767	0.000	0.000	62.905	43.877	-2.693	MWD+IFR1+MS
16500.000	90.000	359.933	10087.000	62.470	0.000	63.531	0.000	62.470	0.000	0.000	63.564	43.899	-2.639	MWD+IFR1+MS
16600.000	90.000	359.933	10087.000	63.176	0.000	64.196	0.000	63.176	0.000	0.000	64.229	43.923	-2.588	MWD+IFR1+MS
16700.000	90.000	359.933	10087.000	63.883	0.000	64.866	0.000	63.883	0.000	0.000	64.898	43.947	-2.538	MWD+IFR1+MS
16800.000	90.000	359.933	10087.000	64.592	0.000	65.540	0.000	64.592	0.000	0.000	65.573	43.971	-2.491	MWD+IFR1+MS
16900.000	90.000	359.933	10087.000	65.303	0.000	66.220	0.000	65.303	0.000	0.000	66.252	43.996	-2.446	MWD+IFR1+MS
17000.000	90.000	359.933	10087.000	66.015	0.000	66.905	0.000	66.015	0.000	0.000	66.936	44.021	-2.402	MWD+IFR1+MS
17100.000	90.000	359.933	10087.000	66.729	0.000	67.594	0.000	66.729	0.000	0.000	67.625	44.047	-2.360	MWD+IFR1+MS
17200.000	90.000	359.933	10087.000	67.445	0.000	68.287	0.000	67.445	0.000	0.000	68.318	44.074	-2.319	MWD+IFR1+MS
17300.000	90.000	359.933	10087.000	68.162	0.000	68.985	0.000	68.162	0.000	0.000	69.015	44.100	-2.280	MWD+IFR1+MS
17400.000	90.000	359.933	10087.000	68.881	0.000	69.686	0.000	68.881	0.000	0.000	69.716	44.128	-2.242	MWD+IFR1+MS
17500.000	90.000	359.933	10087.000	69.601	0.000	70.392	0.000	69.601	0.000	0.000	70.422	44.156	-2.206	MWD+IFR1+MS
17600.000	90.000	359.933	10087.000	70.322	0.000	71.102	0.000	70.322	0.000	0.000	71.131	44.184	-2.171	MWD+IFR1+MS
17700.000	90.000	359.933	10087.000	71.045	0.000	71.815	0.000	71.045	0.000	0.000	71.845	44.213	-2.137	MWD+IFR1+MS
17800.000	90.000	359.933	10087.000	71.769	0.000	72.533	0.000	71.769	0.000	0.000	72.561	44.242	-2.104	MWD+IFR1+MS
17900.000	90.000	359.933	10087.000	72.495	0.000	73.253	0.000	72.495	0.000	0.000	73.282	44.272	-2.072	MWD+IFR1+MS
18000.000	90.000	359.933	10087.000	73.221	0.000	73.978	0.000	73.221	0.000	0.000	74.006	44.302	-2.041	MWD+IFR1+MS
18100.000	90.000	359.933	10087.000	73.949	0.000	74.705	0.000	73.949	0.000	0.000	74.733	44.333	-2.012	MWD+IFR1+MS
18200.000	90.000	359.933	10087.000	74.678	0.000	75.436	0.000	74.678	0.000	0.000	75.464	44.365	-1.983	MWD+IFR1+MS
18300.000	90.000	359.933	10087.000	75.408	0.000	76.170	0.000	75.408	0.000	0.000	76.197	44.396	-1.955	MWD+IFR1+MS
18400.000	90.000	359.933	10087.000	76.139	0.000	76.907	0.000	76.139	0.000	0.000	76.934	44.429	-1.927	MWD+IFR1+MS
18500.000	90.000	359.933	10087.000	76.871	0.000	77.647	0.000	76.871	0.000	0.000	77.674	44.461	-1.901	MWD+IFR1+MS
18600.000	90.000	359.933	10087.000	77.605	0.000	78.390	0.000	77.605	0.000	0.000	78.417	44.495	-1.875	MWD+IFR1+MS
18700.000	90.000	359.933	10087.000	78.339	0.000	79.136	0.000	78.339	0.000	0.000	79.162	44.528	-1.850	MWD+IFR1+MS
18800.000	90.000	359.933	10087.000	79.074	0.000	79.885	0.000	79.074	0.000	0.000	79.911	44.563	-1.826	MWD+IFR1+MS
18900.000	90.000	359.933	10087.000	79.810	0.000	80.636	0.000	79.810	0.000	0.000	80.662	44.597	-1.803	MWD+IFR1+MS
19000.000	90.000	359.933	10087.000	80.547	0.000	81.390	0.000	80.547	0.000	0.000	81.415	44.633	-1.780	MWD+IFR1+MS
19100.000	90.000	359.933	10087.000	81.285	0.000	82.146	0.000	81.285	0.000	0.000	82.172	44.668	-1.757	MWD+IFR1+MS

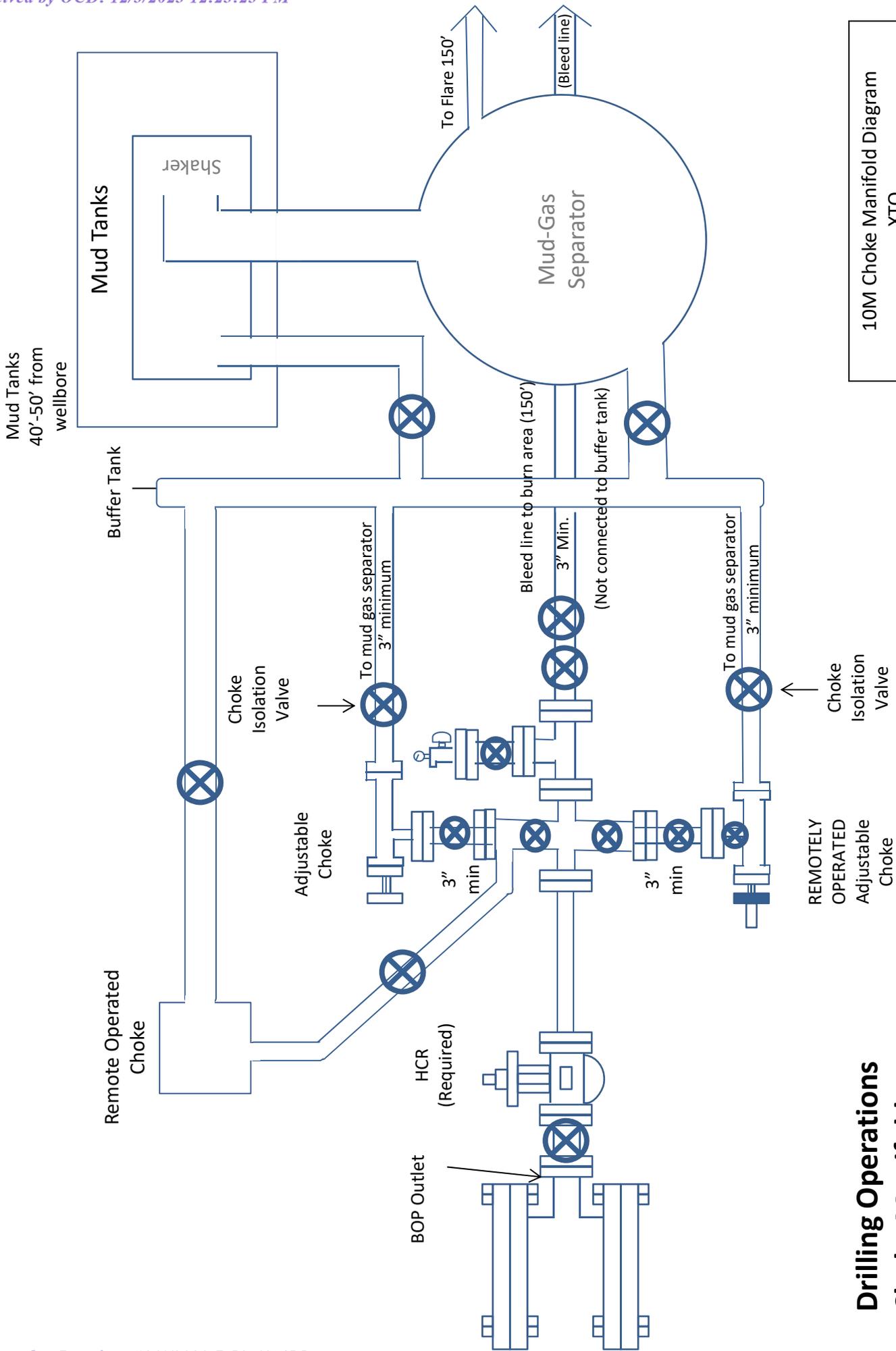
19200.000	90.000	359.933	10087.000	82.024	0.000	82.905	0.000	82.024	0.000	0.000	82.930	44.705	-1.736	MWD+IFR1+MS
19300.000	90.000	359.933	10087.000	82.764	0.000	83.667	0.000	82.764	0.000	0.000	83.691	44.741	-1.715	MWD+IFR1+MS
19400.000	90.000	359.933	10087.000	83.504	0.000	84.430	0.000	83.504	0.000	0.000	84.455	44.778	-1.694	MWD+IFR1+MS
19500.000	90.000	359.933	10087.000	84.246	0.000	85.196	0.000	84.246	0.000	0.000	85.220	44.816	-1.674	MWD+IFR1+MS
19600.000	90.000	359.933	10087.000	84.988	0.000	85.964	0.000	84.988	0.000	0.000	85.988	44.854	-1.654	MWD+IFR1+MS
19700.000	90.000	359.933	10087.000	85.730	0.000	86.734	0.000	85.730	0.000	0.000	86.758	44.893	-1.635	MWD+IFR1+MS
19800.000	90.000	359.933	10087.000	86.474	0.000	87.506	0.000	86.474	0.000	0.000	87.530	44.932	-1.616	MWD+IFR1+MS
19900.000	90.000	359.933	10087.000	87.218	0.000	88.281	0.000	87.218	0.000	0.000	88.304	44.971	-1.598	MWD+IFR1+MS
20000.000	90.000	359.933	10087.000	87.963	0.000	89.057	0.000	87.963	0.000	0.000	89.080	45.011	-1.581	MWD+IFR1+MS
20100.000	90.000	359.933	10087.000	88.709	0.000	89.835	0.000	88.709	0.000	0.000	89.858	45.052	-1.563	MWD+IFR1+MS
20200.000	90.000	359.933	10087.000	89.455	0.000	90.615	0.000	89.455	0.000	0.000	90.638	45.093	-1.546	MWD+IFR1+MS
20300.000	90.000	359.933	10087.000	90.202	0.000	91.397	0.000	90.202	0.000	0.000	91.420	45.134	-1.530	MWD+IFR1+MS
20400.000	90.000	359.933	10087.000	90.950	0.000	92.181	0.000	90.950	0.000	0.000	92.203	45.176	-1.513	MWD+IFR1+MS
20500.000	90.000	359.933	10087.000	91.698	0.000	92.967	0.000	91.698	0.000	0.000	92.989	45.218	-1.498	MWD+IFR1+MS
20600.000	90.000	359.933	10087.000	92.447	0.000	93.754	0.000	92.447	0.000	0.000	93.776	45.261	-1.482	MWD+IFR1+MS
20700.000	90.000	359.933	10087.000	93.197	0.000	94.542	0.000	93.197	0.000	0.000	94.564	45.304	-1.467	MWD+IFR1+MS
20800.000	90.000	359.933	10087.000	93.947	0.000	95.333	0.000	93.947	0.000	0.000	95.354	45.348	-1.452	MWD+IFR1+MS
20900.000	90.000	359.933	10087.000	94.697	0.000	96.125	0.000	94.697	0.000	0.000	96.146	45.392	-1.438	MWD+IFR1+MS
21000.000	90.000	359.933	10087.000	95.449	0.000	96.918	0.000	95.449	0.000	0.000	96.940	45.437	-1.423	MWD+IFR1+MS
21071.627	90.000	359.933	10087.000	95.986	0.000	97.487	0.000	95.986	0.000	0.000	97.508	45.469	-1.414	MWD+IFR1+MS
21100.000	90.000	359.933	10087.000	96.199	0.000	97.711	0.000	96.199	0.000	0.000	97.732	45.482	-1.410	MWD+IFR1+MS
21170.214	90.000	359.933	10087.000	96.726	0.000	98.269	0.000	96.726	0.000	0.000	98.290	45.514	-1.400	MWD+IFR1+MS

**Plan Targets**

POKER LAKE UNIT 30-19 BS 124H

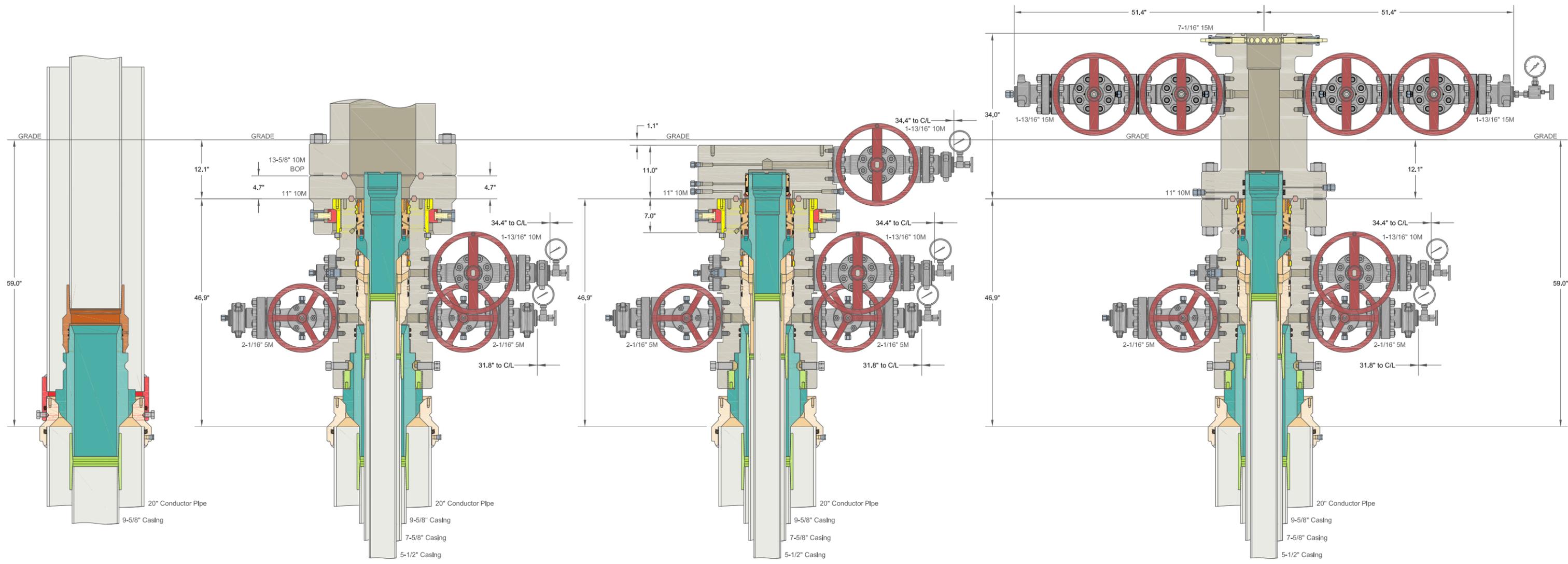
Target Name	Measured Depth (ft)	Grid Northing (ft)	Grid Easting (ft)	TVD MSL (ft)	Target Shape
FTP 7	11141.62	401424.40	658962.90	6666.00	RECTANGLE
LTP 7	21079.63	411362.40	658951.20	6666.00	RECTANGLE
BHL 7	21178.23	411461.40	658951.20	6666.00	RECTANGLE





10M Choke Manifold Diagram XTO

# Drilling Operations Choke Manifold 10M Service



ALL DIMENSIONS APPROXIMATE

### CACTUS WELLHEAD LLC

XTO ENERGY INC  
DELAWARE BASIN

20" x 9-5/8" x 7-5/8" x 5-1/2" MBU-T-CFL-R-DBLO Wellhead  
 With 11" 10M x 7-1/16" 15M CTH-DBLHPS Tubing Head  
 And 9-5/8", 7-5/8" & 5-1/2" Pin Bottom Mandrel Casing Hangers

DRAWN	VJK	31MAR22
APPRV		
DRAWING NO.	HBE0000479	

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**District II**  
 811 S. First St., Artesia, NM 88210  
 Phone:(575) 748-1283 Fax:(575) 748-9720  
**District III**  
 1000 Rio Brazos Rd., Aztec, NM 87410  
 Phone:(505) 334-6178 Fax:(505) 334-6170  
**District IV**  
 1220 S. St Francis Dr., Santa Fe, NM 87505  
 Phone:(505) 476-3470 Fax:(505) 476-3462

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

CONDITIONS

Action 290477

**CONDITIONS**

Operator: XTO PERMIAN OPERATING LLC. 6401 HOLIDAY HILL ROAD MIDLAND, TX 79707	OGRID: 373075
	Action Number: 290477
	Action Type: [C-103] NOI Change of Plans (C-103A)

**CONDITIONS**

Created By	Condition	Condition Date
ward.rikala	All original COA's still apply.	12/6/2023