Sundry Print Report

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

Well Name: POKER LAKE UNIT 22 Well Location: T24S / R30E / SEC 22 / County or Parish/State:

DTD NENW /

Well Number: 183H Type of Well: CONVENTIONAL GAS Allottee or Tribe Name:

WELL

Lease Number: NMNM068905 Unit or CA Name: Unit or CA Number:

US Well Number: 3001549887 Well Status: Approved Application for Operator: XTO PERMIAN

Permit to Drill OPERATING LLC

# **Notice of Intent**

**Sundry ID: 2761885** 

Type of Submission: Notice of Intent

Type of Action: APD Change

Date Sundry Submitted: 11/28/2023 Time Sundry Submitted: 12:10

Date proposed operation will begin: 11/27/2023

**Procedure Description:** XTO Permian Operating LLC. respectfully requests approval to make changes to the Approved APD as follows: SHL, BHL, FTP, LTP and Directional Drilling Plan, Casing and cement changes SHL: FROM: 203' FNL & 1536' FWL TO: 13' FNL & 2024' FWL of Section 22-T24S-R30E BHL: FROM: 198' FNL & 1870' FWL TO: 50' FNL & 1810' FWL of Section 3-T24S-R30E FTP: FROM: 100' FNL & 1536' FWL TO: 500' FNL & 1810' FWL of Section 22-T24S-R30E LTP: FROM: 328' FNL & 1870' FWL TO: 100' FNL & 1810' FWL of Section 3-T24S-R30E CASING CHANGES: 6" 26# P-110 casing will be run instead of 5-1/2" 23# P-110. ATTACHMENTS: New C-102, Directional Plan, Drilling Plan, Wellhead Design

# **NOI Attachments**

# **Procedure Description**

POKER\_LAKE\_UNIT\_22\_DTD\_183H\_signed\_11\_10\_2023\_20231214155154.pdf

Poker\_Lake\_Unit\_22\_DTD\_183H\_sundry\_attachments\_11\_16\_2023\_20231128120954.pdf

by OCD: 12/28/2023 4:45:35 PM Name: POKER LAKE UNIT 22

Well Number: 183H

DTD

Well Location: T24S / R30E / SEC 22 /

NENW /

County or Parish/State:

Page 2 of

**Allottee or Tribe Name:** 

Type of Well: CONVENTIONAL GAS

WELL

Lease Number: NMNM068905 **Unit or CA Name: Unit or CA Number:** 

**US Well Number: 3001549887** Well Status: Approved Application for **Operator: XTO PERMIAN** 

Permit to Drill OPERATING LLC

# **Conditions of Approval**

# **Additional**

Sec 22 24S 30E NMP Sundry 2761885 Poker Lake Unit 22 DTD 183H COAs 20231226113314.pdf

Sec\_22\_24S\_30E\_NMP\_Sundry\_2761885\_Poker\_Lake\_Unit\_22\_DTD\_183H\_Eng\_Worksheet\_20231226113314.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: RANELL (RUSTY) KLEIN Signed on: DEC 14, 2023 03:52 PM

Name: XTO PERMIAN OPERATING LLC

Title: Regulatory Analyst

Street Address: 6401 HOLIDAY HILL ROAD BLDG 5

City: MIDLAND State: TX

Phone: (432) 620-6700

Email address: RANELL.KLEIN@EXXONMOBIL.COM

**Field** 

**Representative Name:** 

**Street Address:** 

State: Zip: City:

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: 12/28/2023

Signature: Chris Walls

Page 2 of 2

Form 3160-5 (June 2019)

# UNITED STATES

FORM APPROVED
OMB No. 1004-0137
Expires: October 31, 202

DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

BUREAU O	F LAND MANAGEMENT		5. Lease Serial No. NMLC068905					
	ES AND REPORTS ON Wor proposals to drill or to form 3160-3 (APD) for su	o re-e	enter an		6. If Indian, Allottee	or Tribe	Name	
SUBMIT IN TRIPLIC	ATE - Other instructions on pag	ge 2			7. If Unit of CA/Agr	eement,	Name and/or No.	
1. Type of Well  Oil Well  Gas Well	Other				8. Well Name and N	<sup>0.</sup> POKI	ER LAKE UNIT 22 DTD/183H	
2. Name of Operator XTO PERMIAN OPERA	TING LLC				9. API Well No. 300	154988	7	
3a. Address 6401 HOLIDAY HILL ROAD BL	DG 5, MIDLAND, 3b. Phone No.	. (includ	le area code)		10. Field and Pool o			
	(432) 683-22	277			PURPLE SAGE/		AMP (GAS)	
4. Location of Well (Footage, Sec., T.,R.,M., or SEC 22/T24S/R30E/NMP	Survey Description)	11. Country or Parish, State  EDDY/NM						
12. CHECK THE	APPROPRIATE BOX(ES) TO IN	DICAT	E NATURE O	OF NOTIO	CE, REPORT OR O	HER D	ATA	
TYPE OF SUBMISSION			TYPE	E OF ACT	TION			
Notice of Intent	Acidize Dee	pen	[	Produ	action (Start/Resume	) [	Water Shut-Off	
			racturing [		ımation	Ļ	Well Integrity	
Subsequent Report	e 1 <u>—</u>	Consti	-	_	mplete		Other	
	= 1	g and Al g Back	andon [	_	orarily Abandon r Disposal			
XTO Permian Operating LLC. respects Directional Drilling Plan, Casing and cooking Plan, Casing and cooking Plan, Casing and cooking Plan, Casing and cooking Plan, Casing Plan, Casing Plan, Casing Plan, Casing Plan, Casing Changes: 6 26# P-110 casing Changes: 6 26# P-110 casing Plan, Plan	ement changes  D: 13 FNL & 2024 FWL of Section: D: 50 FNL & 1810 FWL of Section: D: 500 FNL & 1810 FWL of Section: D: 100 FNL & 1810 FWL of Section: D: 100 FNL & 1810 FWL of Section:	on 22- on 3-T: tion 22 tion 3-7 23# P-	Γ24S-R30E 24S-R30E -T24S-R30E - 24S-R30E 110.		PD as follows: SHI	., BHL,	FTP, LTP and	
14. I hereby certify that the foregoing is true and	correct. Name (Printed/Typed)							
RANELL (RUSTY) KLEIN / Ph: (432) 620-6	6700	Title	Regulatory	Analyst				
(Electronic Submission)		Date			12/14/	2023		
	THE SPACE FOR FED	ERA	OR STA	TE OF	ICE USE			
Approved by								
CHRISTOPHER WALLS / Ph: (575) 234-2	234 / Approved		Petrole Title	eum Eng	ineer	Date	12/28/2023	
Conditions of approval, if any, are attached. App certify that the applicant holds legal or equitable which would entitle the applicant to conduct ope	title to those rights in the subject l		Office CAR	LSBAD				

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.

## **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

(Form 3160-5, page 2)

# **Additional Information**

# **Location of Well**

0. SHL: NENW / 203 FNL / 1536 FWL / TWSP: 24S / RANGE: 30E / SECTION: 22 / LAT: 32.20997 / LONG: -103.872621 ( TVD: 0 feet, MD: 0 feet ) PPP: SENW / 100 FSL / 1577 FWL / TWSP: 24S / RANGE: 30E / SECTION: 15 / LAT: 32.210805 / LONG: -103.872488 ( TVD: 11607 feet, MD: 14574 feet ) PPP: SESW / 100 FSL / 1870 FWL / TWSP: 24S / RANGE: 30E / SECTION: 15 / LAT: 32.210811 / LONG: -103.87154 ( TVD: 11607 feet, MD: 11934 feet ) PPP: SENW / 300 FNL / 313 FWL / TWSP: 24S / RANGE: 30E / SECTION: 10 / LAT: 32.253158 / LONG: -103.876545 ( TVD: 11607 feet, MD: 17214 feet ) BHL: LOT 3 / 198 FNL / 1870 FWL / TWSP: 24S / RANGE: 30E / SECTION: 3 / LAT: 32.253529 / LONG: -103.871511 ( TVD: 11607 feet, MD: 27484 feet )

# PECOS DISTRICT DRILLING CONDITIONS OF APPROVAL

OPERATOR'S NAME: XTO Permian Operating LLC
WELL NAME & NO.: Poker Lake Unit 22 DTD 183H
LOCATION: Sec 22-24S-30E-NMP
COUNTY: Eddy County, New Mexico

Changes approved through engineering via **Sundry 2761885** on 12/26/2023. Any previous COAs not addressed within the updated COAs still apply.

COA

H <sub>2</sub> S	⊙ No	© Yes		
Potash / WIPP	None	Secretary	C R-111-P	□ WIPP
Cave / Karst	• Low	Medium	C High	Critical
Wellhead	Conventional	<ul><li>Multibowl</li></ul>	O Both	<ul><li>Diverter</li></ul>
Cementing	☐ Primary Squeeze	Cont. Squeeze	EchoMeter	□ DV Tool
Special Req	Break Testing	☐ Water Disposal	$\square$ COM	Unit
Variance	▼ Flex Hose	☐ Casing Clearance	☐ Pilot Hole	☐ Capitan Reef
Variance	☐ Four-String	Offline Cementing	☐ Fluid-Filled	☐ Open Annulus
		Batch APD / Sundry		

# A. HYDROGEN SULFIDE

Hydrogen Sulfide (H2S) monitors shall be installed prior to drilling out the surface shoe. If H2S 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 802 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 9-5/8 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 6163'
- 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.

Operator has proposed to pump down 13-3/8" X 9-5/8" 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 9-5/8" 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 6 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. 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 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.

# **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 Onshore Oil and Gas Order No. 2.
- 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 (API No. / US Well No. contains 30-015-####)
     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 (API No. / US Well No. contains 30-025-####)
    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 intergrity 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.

## Poker Lake Unit 22 DTD 183H

				Poke	r Lake Unit	t 22 DTD 183	Н					
13 3/8	surface o	esg in a	17 1/2	inch hole.		Design	Factors			Surfac	e e	
Segment	#/ft	Grade		Coupling	Body	Collapse	Burst	Length	B@s	a-B	a-C	Weigh
"A"	54.50	J	55	BTC	19.52	3.01	1.38	802	8	2.50	5.69	43,709
"B"				BTC				0				0
w/8.4#/g	g mud, 30min Sfc	Csg Test psig:	1,500	Tail Cmt	does not	circ to sfc.	Totals:	802	_			43,709
	of Proposed to			ent Volumes								
Hole	Annular	1 Stage	1 Stage	Min	1 Stage	Drilling	Calc	Req'd				Min Dis
Size	Volume	Cmt Sx	CuFt Cmt	Cu Ft	% Excess	Mud Wt	MASP	BOPE				Hole-Cp
17 1/2	0.6946	670	1097	557	97	9.00	1094	2M				1.56
9 5/8	casing ins		13 3/8		D. 1		Factors	1 11	D.O	Int 1		\A/ · ·
Segment	#/ft	Grade	440	Coupling	Body	Collapse	Burst	Length	B@s	a-B	a-C	Weigh
"A"	40.00	HCP		BTC	7.87	2.14	1.49	4,000	4	2.36	3.87	160,00
"B"	40.00	HCL	80	BTC	∞	2.14	1.09	4,954	3	1.72	3.87	198,16
	g mud, 30min Sfc				•		Totals:	8,954				358,16
		. ,		chieve a top of	0		urface or a	802				overlap.
Hole	Annular	1 Stage	1 Stage	Min	1 Stage	Drilling	Calc	Req'd				Min Dis
Size 12 1/4	<b>Volume</b> 0.3132	Cmt Sx 1840	CuFt Cmt 3961	Cu Ft 2844	% Excess 39	Mud Wt 9.50	<b>MASP</b> 3342	BOPE 5M				<b>Hole-Cp</b> 0.81
Tail cmt	casing ins	side the	9 5/8			Design Fa	rtors			Prod	1	
Segment	#/ft	Grade	7 5/0	Coupling	Joint	Collapse	Burst	Length	B@s	a-B	a-C	Weigh
"A"	26.00	RYP	110	Semi-Premiur	4.14	2.94	3.01	8,854	3	4.76	4.65	-
"B"	26.00	RYP		Semi-Premiur	∞	2.94	3.01	17,901	3	4.76		465,42
_	g mud, 30min Sfc		-	John Fromman		2.0 .	Totals:	26,755	•	•	1.00	695,63
				chieve a top of	8400	ft from si	urface or a	554				overlap.
Hole	Annular	1 Stage	1 Stage	Min	1 Stage	Drilling	Calc	Reg'd				Min Dis
Size	Volume	Cmt Sx	CuFt Cmt	Cu Ft	% Excess	Mud Wt	MASP	BOPE				Hole-Cp
8 1/2	0.1977	3020	4631	3647	27	11.50						0.81
Class 'C' tail cr	mt yld > 1.35											
	•											
#N/A												
0			6			Design	Factors		<(	Choose C	asing>	
Segment	#/ft	Grade		Coupling	#N/A	Collapse	Burst	Length			a-C	Weigh
"A"				0.00				0				0
"B"	"B" 0.00 0											0
w/8.4#/g	g mud, 30min Sfc	Csg Test psig:			Totals: 0							0
	Cmt vol cal	c below incl	udes this csg	TOC intended	#N/A	ft from si	urface or a	#N/A				overlap.
Hole	Annular	1 Stage	1 Stage	Min	1 Stage	Drilling	Calc	Req'd				Min Dis
Size	Volume	Cmt Sx	CuFt Cmt	Cu Ft	% Excess	Mud Wt	MASP	BOPE				Hole-Cp
0		#N/A	#N/A	0	#N/A							

Carlsbad Field Office 12/26/2023

Capitan Reef est top XXXX.

#N/A

Joint or Infill

Consolidation Code

<u>District I</u>
1625 N. French Dr., Hobbs, NM 88240
Phone: (575) 393-6161 Fax: (575) 393-0720
<u>District II</u>
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

District IV 1220 S. St. Francis Dr., Santa Fe, NM 87505 Phone: (505) 476-3460 Fax: (505) 476-3462

Dedicated Acres

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** 

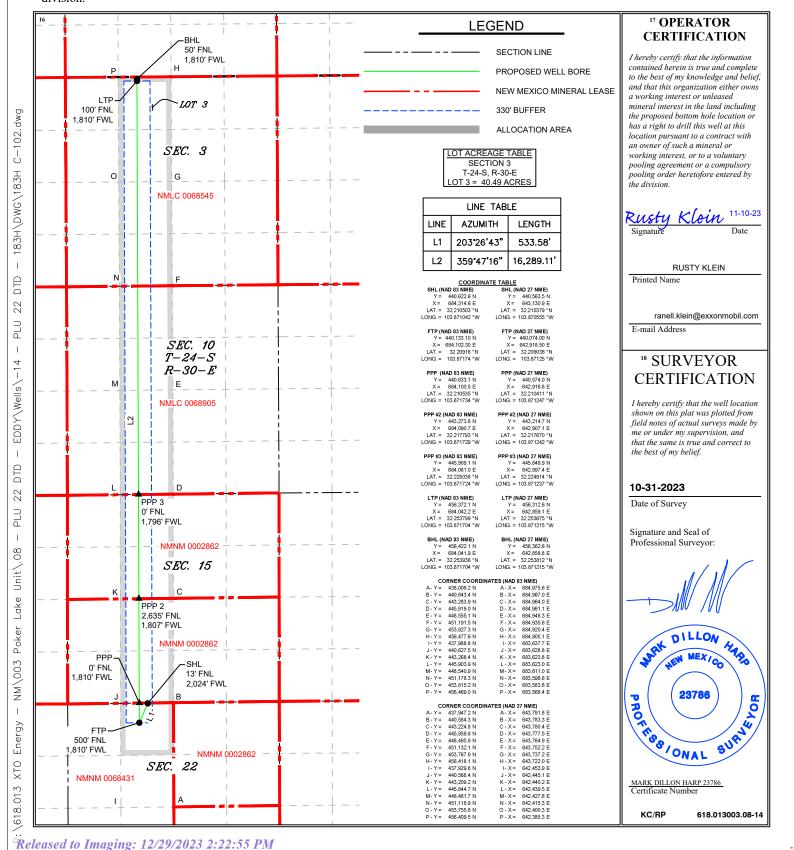
WELL LOCATION AND ACREAGE DEDICATION PLAT

<sup>1</sup> API Number	r	<sup>2</sup> Pool Code	Pool Name							
30-015-	49887	98220	98220 Purple Sage; Wolfcamp (gas)							
<sup>4</sup> Property Code		<sup>5</sup> Property Name								
333192		POKER LAKE UNIT 22 DTD								
<sup>7</sup> OGRID No.		<sup>8</sup> O	perator Name	<sup>9</sup> Elevation						
373075		XTO PERMIA	3,431'							

<sup>10</sup> Surface Location UL or lot no. Section Township North/South lin Feet from the East/West line С 22 **24S** 30E **NORTH** 2,024 **WEST EDDY** "Bottom Hole Location If Different From Surface UL or lot no. East/West line Section Feet from the County Township Rang Lot Idn Feet from the North/South line 3 **24S** 30E 50 **NORTH** 1,810 WEST **EDDY** 

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.

Order No.



Inter	it X	As Dril	led										
API #													
Оре	erator Na	me: IIAN OPI	ERATIN	IG, LL	_C	Property Poker L			22 DT	D			Well Number 183H
Kick (	Off Point	(KOP)											
UL	Section	Township	Range	Lot	Feet	Fron	n N/S	Fee	t	Fron	n E/W	County	
Latit	ude				Longitu	Longitude NAD							
First UL C	Take Poir Section 22	t (FTP)  Township 24S	Range 30E	Lot	Feet 500	From	m N/S	Fee 1,8		From We:	n E/W S <b>t</b>	County Eddy	
Latit	ude 20916			1	Longitu	ongitude N						NAD 83	
	Take Poin	1		T	T	- N/			T.	- h			
UL 3	Section 3	Township 24S	Range 30E	Lot	Feet 100	North		910	From		Count Eddy		
Latit 32.	ude 253799	9			Longitu 103.	nde <b>87170</b> 4	Ļ				NAD <b>83</b>		
		defining v	vell for th	ne Hori	izontal S <sub>l</sub>	pacing Un	it?						
	II is yes p ing Unit.	lease prov	ide API if	availa	ble, Ope	rator Nam	ie and	well r	numbe	r for I	Definii	ng well fo	or Horizontal
API #	<b>‡</b>												
Operator Name:						Property Name:							Well Number
						1							KZ 06/29/201

District I
1625 N French Dr., Hobbs, NM 88240
Phone (575) 393-6161 Fax: (575) 393-0720
District II
11 S First St., Artesia, NM 88210
Phone (575) 748-1283 Fax: (575) 748-9720
District III
1000 Rto Brazos Road, Aztec, NM 87410
Phone (505) 334-6178 Fax: (505) 334-6170
District IV
1220 S St. Francis Dr., Santa Fe, NM 87504
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

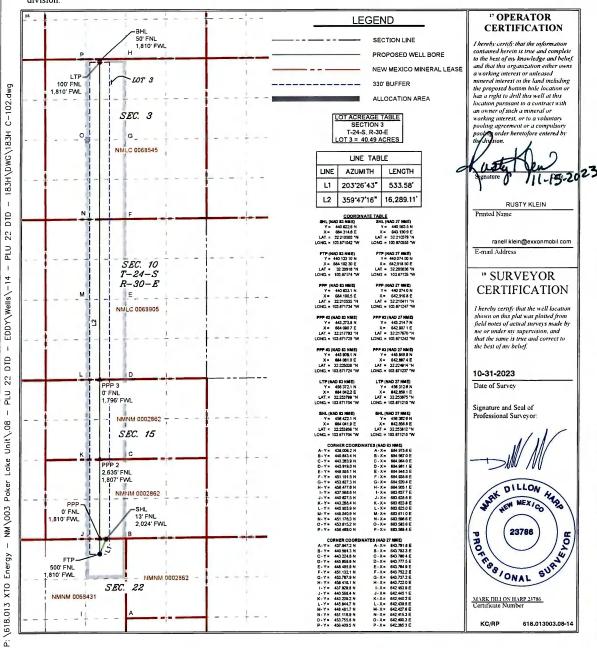
**AMENDED REPORT** 

WELL LOCATION AND ACREAGE DEDICATION PLAT

API Number 30-015-4	<sup>2</sup> Pool Code 98220	<sup>3</sup> Pool Name Purple Sage, Wolfcamp (gas)						
<sup>4</sup> Property Code 333192	Property POKER LAKE		<sup>6</sup> Well Number 183H					
OGRID No. 373075	*Operator XTO PERMIAN OI		°Elevation 3,431'					

					"Surface L	ocation								
UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County					
С	22	248	30E		13	NORTH	2,024	WEST	EDDY					
	"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					
3	3	245	30E		50	NORTH	1,810	WEST	EDDY					
12 Dedicated Acres	<sup>12</sup> Dedicated Acres   <sup>13</sup> Joint or Infill   <sup>14</sup> Consolidation Code   <sup>15</sup> Order No.													
960.98														

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.



Inten	t X	As Dril	led												
API #		···													
Оре	erator Na	me: IIAN OP	ERATIN	G, LL	С	Pro <sub>l</sub> Pok	perty N er La	lame ke U	: nit 2	22 DT	D			Well Number 183H	
Kick (	Off Point	(KOP)													
UL	Section	Township	Feet		From N	N/S	Feet	t	Fron	n E/W	County				
Latit	ude				Longitu	ude							NAD		
First <sup>-</sup>	Take Poir	nt (FTP)			·- <del></del>										
UL C	Section 22	Township 24S	Range 30E	Lot	Feet 500		From North		Feet 1,8		Fron	n E/W st	County <b>Eddy</b>		
Latitu 32.2	ude 20916				Longitu 103.8		74						NAD 83		
Last 7	Take Poin	t (LTP)													
UL 3	Section 3	Township 24S	Range 30E	Lot	Feet 100	From	n N/S th	Feet		From Wes		Count Eddy			
Latitu 32.2	ude 253799	9		L	Longitu 103.8		704					NAD 83			
Is this	s well the	defining v	vell for the	e Horiz	ontal Sp	pacing	g Unit?								
Is this	s well an i	infill well?			]										
	ll is yes pl ng Unit.	lease provi	ide API if a	availab	le, Oper	rator I	Name :	and v	vell n	umbei	for [	Definir	ng well fo	r Horizontal	
API#			]												
Ope	rator Nar	me:	<u> </u>			Prop	erty N	ame:						Well Number	

KZ 06/29/2018

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

XTO Energy Inc.
POKER LAKE UNIT 22 DTD 183H
Projected TD: 26755' MD / 9870' TVD
SHL: 13' FNL & 2024' FWL , Section 22, T24S, R30E
BHL: 50' FNL & 1810' FWL , Section 3, T24S, R30E
Eddy County, NM

# 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	702'	Water
Top of Salt	1109'	Water
Base of Salt	3747'	Water
Delaware	3990'	Water
Brushy Canyon	6163'	Water/Oil/Gas
Bone Spring	7832'	Water
1st Bone Spring	8627'	Water/Oil/Gas
2nd Bone Spring	9148'	Water/Oil/Gas
Target/Land Curve	9870'	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 13.375 inch casing @ 802' (307' 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 9.625 inch casing at 8954' and cemented to surface. A 8.5 inch curve and 8.5 inch lateral hole will be drilled to 26755 MD/TD and 6 inch production casing will be set at TD and cemented back up in the intermediate shoe (estimated TOC 8654 feet).

# 3. Casing Design

Hole Size	Depth	OD Csg	Weight	Grade	Collar	New/Used	SF Burst	SF Collapse	SF Tension
17.5	0' - 802'	13.375	54.5	J-55	втс	New	1.23	3.19	20.80
12.25	0' - 4000'	9.625	40	HC P-110	BTC	New	2.28	2.26	3.53
12.25	4000' – 8954'	9.625	40	HC L-80	втс	New	1.66	1.87	4.62
8.5	0' – 8854'	6	26	P-110	Semi-Flush	New	1.17	2.68	1.77
8.5	8854' - 26755'	6	26	P-110	Semi-Flush	New	1.17	2.40	1.99

<sup>·</sup> 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
- · 9.625 Collapse analyzed using 50% evacuation based on regional experience.
- · 6 Tension calculated using vertical hanging weight plus the lateral weight multiplied by a friction factor of 0.35
- XTO requests the option to use 5" BTC Float equipment for the the production casing

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

### Wellhead:

- <u>Permanent Wellhead Multibowl System</u>
  A. Starting Head: 13-5/8" 10M top flange x 13-3/8" SOW bottom (or equivalent)
- B. Tubing Head: 13-5/8" 10M bottom flange x 7-1/16" 15M top flange (or equivalent)
  - · Wellhead will be installed by manufacturer's representatives.
  - · Manufacturer will monitor welding process to ensure appropriate temperature of seal.
  - · Operator will test the 9-5/8" casing per BLM Onshore Order 2
  - · Wellhead Manufacturer representative will not be present for BOP test plug installation

# 4. Cement Program

Surface Casing: 13.375, 54.5 New BTC, J-55 casing to be set at +/- 802'

Lead: 370 sxs EconoCem-HLTRRC (mixed at 10.5 ppg, 1.87 ft3/sx, 10.13 gal/sx water) Tail: 300 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: 9.625, 40 New casing to be set at +/- 8954'

st Stage

Optional Lead: 1040 sxs Class C (mixed at 10.5 ppg, 2.77 ft3/sx, 15.59 gal/sx water)

TOC: Surface

Tail: 800 sxs Class C (mixed at 14.8 ppg, 1.35 ft3/sx, 6.39 gal/sx water)

TOC: Brushy Canyon @ 6163

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: 2170 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 (6163') 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: 6, 26 New Semi-Flush, P-110 casing to be set at +/- 26755'

Lead: 60 sxs NeoCem (mixed at 11.5 ppg, 2.69 ft3/sx, 15.00 gal/sx water) Top of Cement:

Tail: 2960 sxs VersaCem (mixed at 13.2 ppg, 1.51 ft3/sx, 8.38 gal/sx water) Top of Cement:

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 13.375 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 3474 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 nippling up on the 13.375, 5M bradenhead and flange, the BOP test will be limited to 5000 psi. When nippling up on the 9.625, 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	Viscosity	Fluid Loss
INTERVAL	Hole Size	Widd Type	(ppg)	(sec/qt)	(cc)
0' - 802'	17.5	FW/Native	8.5-9	35-40	NC
802' - 8954'	12.25	FW / Cut Brine / Direct Emulsion	9-9.5	30-32	NC
8954' - 26755'	8.5	ОВМ	11-11.5	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 13.375 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 5646 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.

Magnitude Semi-major Semi-minor Semi-minor Tool

# Well Plan Report - POKER LAKE UNIT 22 DTD 183H

11/8/23, 12:25 PM

30-015-49887

Well Plan Report

26754.56 ft	9870.00 ft		New Mexico East - NAD 27	440563.50 ft	643130.90 ft	3463.00 ft	3431.00 ft	Grid	0.25 Deg
Measured Depth:	TVD RKB:	Location	Cartographic Reference System:	Northing:	Easting:	RKB:	Ground Level:	North Reference:	Convergence Angle:

	Dogleg	Rate	1/100ft) Target	0.00	0.00	2.00	0.00	2.00	0.00	8.00 FTP 15	0.00 LTP 15	0.00 BHL 15
	Turn	Rate	Deg/100ft) (De	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
	Build	Rate	(Deg/100ft) (E	0.00	0.00	2.00	0.00	-2.00	0.00	8.00	0.00	0.00
		X Offset	(£)	0.00	0.00	-19.55	-190.23	-209.78	-209.78	-212.40	-271.80	-271.98
		Y Offset	(#)	0.00	0.00	-112.36	-1093.33	-1205.69	-1205.69	-489.50	15749.10	15799.66
22 DTD 183H	ΔΛΙ	RKB	(#)	-23.00	1077.00	1877.29	5299.71	6100.00	9153.80	9870.00	9870.00	9870.00
POKER LAKE UNIT 22 DTD 183H		Azimuth	(Deg)	00.00	0.00	189.87	189.87	0.00	0.00	359.79	359.79	359.79
POK		Inclination	(Deg)	0.00	0.00	16.22	16.22	0.00	0.00	90.00	90.00	90.00
Plan Sections	Measured	Depth	(#)	0.00	1100.00	1911.08	5475.41	6286.49	9340.29	10465.29	26704.00	26754.56

Vertical	
Lateral	
TVD Highside	
Measured	

POKER LAKE UNIT 22 DTD 183H

Position Uncertainty

file:///C:/Users/arsriva/Landmark/DecisionSpace/WellPlanning/Reports/POKERLAKEUNIT22DTD183H.HTML

Well Plan Report

11/8/23, 12:25 PM

(15.5) 15.50 M								בּ א	riaii Nepoi	<b>-</b>			
Depth	Inclination	Azimuth	RKB	Error	Bias	Error	Bias	Error	Bias	of Bias	Error	Error	Azimuth Used
(#)	(.)	(.)	(#)	(#)	(#)	(#)	(H)	Œ	(#)	<b>(£</b> )	(#)	£	(,)
0.000	0.000	0.000	-23.000	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	77.000	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	177.000	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	277.000	1.497	0.000	1.271	0.000	2.326	0.000	0.000	1.698	986.0	125,469 MWD+IFR1+MS
400.000	0.000	0.000	377.000	1.871	0.000	1.658	0.000	2.347	0.000	0.000	2.108	1.344	126.713 MWD+IFR1+MS
200,000	0.000	0000	477.000	2.240	0.000	2.034	0.000	2.375	0.000	0.000	2.503	1.701	127.419 MWD+IFR1+MS
000'009	0.000	0.000	577.000	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	677.000	2.971	0.000	2.773	0.000	2.445	0.000	0.000	3.267	2.417	128.190 MWD+IFR1+MS
800.000	0.000	0.000	777.000	3.334	0.000	3.138	0.000	2.487	0.000	0.000	3.642	2.775	128.423 MWD+IFR1+MS
900.006	0.000	0.000	877.000	3.696	0.000	3.502	0.000	2.533	0.000	0.000	4.014	3.133	128.602 MWD+IFR1+MS
1000.000	0.000	0.000	977.000	4.058	0.000	3.865	0.000	2.583	0.000	0.000	4.384	3.491	128.744 MWD+IFR1+MS
1100.000	0.000	0.000	1077,000	4.419	0.000	4.228	0.000	2.637	0.000	0.000	4.752	3.849	128.859 MWD+IFR1+MS
1200.000	2.000	189.870	1176.980	4.920	-0.000	4.396	0.000	2.693	0.000	0.000	5.089	4.201	126.624 MWD+IFR1+MS
1300.000	4.000	189.870	1276.838	5.698	-0.000	4.740	0.000	2.754	0.000	0.000	5.866	4.541	121.316 MWD+IFR1+MS
1400.000	000'9	189.870	1376.452	6.395	-0.000	5.085	0.000	2.819	0.000	0.000	6.577	4.873	119.090 MWD+IFR1+MS
1500.000	8.000	189.870	1475.702	7.034	-0.000	5.434	0.000	2.893	0.000	0.000	7.236	5.207	117.896 MWD+IFR1+MS
1600.000	10.000	189.870	1574.465	7.628	-0.000	5.786	0.000	2.976	0.000	0.000	7.853	5.544	117.172 MWD+IFR1+MS
1700.000	12.000	189.870	1672.623	8.187	-0.000	6.142	0.000	3.070	0.000	0.000	8.439	5.888	116.707 MWD+IFR1+MS
1800.000	14.000	189.870	1770.055	8.715	-0.000	6.505	0.000	3.178	0.000	0.000	8.997	6.237	116.404 MWD+IFR1+MS
1900.000	16.000	189.870	1866.643	9.218	-0.000	6.874	0.000	3.302	0.000	0.000	9.533	6.595	116,216 MWD+IFR1+MS
1911.078	16.222	189.870	1877.286	9.241	-0.000	6.912	0.000	3.303	0.000	0.000	9.563	6.635	116.201 MWD+IFR1+MS
2000.000	16.222	189.870	1962.668	9.477	-0.000	7.229	0.000	3.380	0.000	0.000	682.6	6.961	116.325 MWD+IFR1+MS
2100.000	16.222	189.870	2058.687	9.761	-0.000	7.610	0.000	3.474	0.000	0.000	10.066	7.343	116.725 MWD+IFR1+MS
2200.000	16.222	189.870	2154.705	10.055	-0.000	7.998	0.000	3.572	0.000	0.000	10.353	7.730	117.185 MWD+IFR1+MS
2300.000	16.222	189.870	2250.724	10.357	-0.000	8.390	0.000	3.674	0.000	0.000	10.648	8.121	117.668 MWD+IFR1+MS
2400.000	16.222	189.870	2346.743	10.667	-0.000	8.786	0.000	3.780	0.000	0.000	10.951	8.515	118.175 MWD+IFR1+MS
2500.000	16.222	189.870	2442.762	10.983	-0.000	9.184	0.000	3.889	0.000	0.000	11.259	8.912	118.706 MWD+IFR1+MS
2600.000	16.222	189.870	2538.781	11.305	-0.000	9.586	0.000	4.001	0.000	0.000	11.574	9.310	119.263 MWD+IFR1+MS
2700.000	16.222	189.870	2634.800	11.632	-0.000	9.990	0.000	4.116	0.000	0.000	11.893	9.711	119.848 MWD+IFR1+MS
2800.000	16.222	189.870	2730.819	11.965	-0.000	10.397	0.000	4.233	0.000	0.000	12.219	10.113	120.461 MWD+IFR1+MS
2900.000	16.222	189.870	2826.837	12.302	-0.000	10.805	0.000	4.353	0.000	0.000	12.548	10.516	121.105 MWD+IFR1+MS

11/8/23, 12:25 PM							S	Well Plan Report	<b>.</b>			
6200.000	1.730	189.870	6013.528	24.789	-0.000	24.388 0.000	9.144	0.000	0.000	25.230	23.797	-40.597 MWD+IFR1+MS
6286.485	0.000	0.000	6100.000	24.673	0.000	24.896 0.000	9.249	0.000	0.000	25.483	24.066	-40.470 MWD+IFR1+MS
6300.000	0.000	0.000	6113.515	24.712	0.000	24.933 0.000	9.265	0.000	0.000	25.520	24.106	-40.490 MWD+IFR1+MS
6400.000	0.000	0.000	6213.515	25.001	0.000	25.215 0.000	9.386	0.000	0.000	25.798	24.399	-40.590 MWD+IFR1+MS
6500.000	0.000	0.000	6313.515	25.297	0.000	25.504 0.000	9.509	0.000	0.000	26.088	24.694	-40.721 MWD+IFR1+MS
6600.000	0.000	0.000	6413.515	25.594	0.000	25.795 0.000	9.635	0.000	0.000	26.379	24.991	-40.849 MWD+IFR1+MS
6700.000	0.000	0.000	6513.515	25.893	0.000	26.087 0.000	9.763	0.000	0.000	26.673	25.289	-40.975 MWD+IFR1+MS
6800.000	0.000	0.000	6613,515	26.193	0.000	26.380 0.000	9.895	0.000	0.000	26.967	25.589	-41.100 MWD+IFR1+MS
000.0069	0.000	0.000	6713.515	26.495	0.000	26.676 0.000	10.029	0.000	0.000	27.263	25.890	-41.222 MWD+IFR1+MS
7000.000	0.000	0.000	6813.515	26.799	0.000	26.973 0.000	10.166	0.000	0.000	27.561	26.193	-41.343 MWD+IFR1+MS
7100.000	0.000	0.000	6913.515	27.103	0.000	27.271 0.000	10.306	0.000	0.000	27.860	26.497	-41.462 MWD+IFR1+MS
7200.000	0.000	0.000	7013.515	27.409	0.000	27.571 0.000	10.448	0.000	0.000	28.161	26.803	-41.579 MWD+IFR1+MS
7300.000	0.000	0.000	7113.515	27.716	0.000	27.872 0.000	10.594	0.000	0.000	28.463	27.110	-41.694 MWD+IFR1+MS
7400.000	0.000	0.000	7213,515	28.025	0.000	28.175 0.000	10.742	0.000	0.000	28.766	27.418	-41.808 MWD+IFR1+MS
7500.000	0.000	0.000	7313.515	28.334	0.000	28.479 0.000	10.894	0.000	0.000	29.070	27.727	-41.920 MWD+IFR1+MS
7600.000	0.000	0.000	7413.515	28.645	0.000	28.784 0.000	11.048	0.000	0.000	29.376	28.037	-42.031 MWD+IFR1+MS
7700.000	0.000	0.000	7513.515	28.957	0.000	29.090 0.000	11.206	0.000	0.000	29.683	28.349	-42.139 MWD+IFR1+MS
7800.000	0.000	0.000	7613.515	29.270	0.000	29.397 0.000	11.366	00000	0.000	29.991	28.661	-42.247 MWD+IFR1+MS
7900.000	0.000	0.000	7713.515	29.584	0.000	29.706 0.000	11.529	0.000	0.000	30.300	28.975	-42.352 MWD+IFR1+MS
8000.000	0.000	0.000	7813.515	29.899	0.000	30.016 0.000	11.696	0.000	0.000	30.610	29.290	-42.457 MWD+IFR1+MS
8100.000	0.000	0.000	7913.515	30.215	0.000	30.327 0.000	11.865	0.000	0.000	30.922	29.605	-42.559 MWD+IFR1+MS
8200,000	0.000	0.000	8013.515	30.532	0.000	30.638 0.000	12.038	00000	0.000	31,234	29.922	-42.661 MWD+IFR1+MS
8300.000	0.000	0.000	8113.515	30.849	0.000	30.951 0.000	12.213	00000	0.000	31.547	30.240	-42.761 MWD+IFR1+MS
8400.000	0.000	0.000	8213.515	31.168	0.000	31.265 0.000	12.392	00000	0.000	31.862	30,558	-42.859 MWD+IFR1+MS
8500.000	0.000	0.000	8313.515	31.487	0.000	31.580 0.000	12.574	0.000	0.000	32.177	30.877	-42.956 MWD+IFR1+MS
8600.000	0.000	0.000	8413.515	31.808	0.000	31.896 0.000	12.759	0.000	0.000	32.493	31.197	-43.052 MWD+IFR1+MS
8700.000	0.000	0.000	8513.515	32.129	0.000	32.212 0.000	12.947	0.000	0.000	32.810	31.518	-43.147 MWD+IFR1+MS
8800.000	0.000	0.000	8613.515	32.451	0.000	32.530 0.000	13.138	00000	0.000	33.128	31.840	-43.240 MWD+IFR1+MS
8900.000	0.000	0.000	8713.515	32.773	0.000	32.848 0.000	13.332	00000	0.000	33.446	32.163	-43.332 MWD+IFR1+MS
9000.000	0.000	0.000	8813.515	33.097	0.000	33.167 0.000	13.530	0.000	0.000	33.766	32.486	-43.422 MWD+IFR1+MS
9100.000	0.000	0.000	8913.515	33.421	0.000	33.487 0.000	13.730	0.000	0.000	34.086	32.810	-43.512 MWD+IFR1+MS
9200.000	0.000	0.000	9013.515	33.746	0.000	33.808 0.000	13.934	0.000	0.000	34.407	33.135	-43.600 MWD+IFR1+MS
9300.000	0.000	0.000	9113.515	34.071	0.000	34.129 0.000	14.141	0.000	0.000	34.729	33.460	-43.687 MWD+IFR1+MS

0.000         0.000         9.13.840         3.4.287         0.000         3.4.287         0.000         3.4.287         0.000         3.4.287         0.000         3.4.287         0.000         3.4.287         0.000         3.4.288         0.000<	≱						Well F	Well Plan Report				
4.777         389,790         921,344         339,74         0.000         14,349         0.000         0.000         35,685         34,348         1,028           2.777         389,790         921,2144         33,974         0.000         34,782         0.000         36,705         0.000         34,782         0.000         34,782         0.000         38,143         35,279         0.000         35,705         0.000         0.000         38,143         35,083         0.000         1,828         0.000         0.000         38,143         35,083         0.000         0.000         38,143         35,083         0.000         0.000         0.000         38,143         35,093         0.000         1,828         0.000         0.000         0.000         38,143         35,093         0.000         0.000         0.000         38,143         0.000         0.000         0.000         0.000         0.000         38,143         0.000	9340.288 0.0			34.201	0.000	34.257 0.000	14.226 0.0	000	0.000	34.855	33.591	-43.719 MWD+IFR1+MS
12.777         358.790         937.2144         33.888         0.000         34.772         0.000         35.685         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         34.782         0.000         36.680         0.000					0.000			000	0.000	35.063	33.801	
20.777         388,789         9407,886         33,738         0,000         35,037         0,000         15,020         0,000         37,038         34,772         38,473         38,683         10,102,881					0.000			000	0.000	35.863	34.348	
28.777         388,790         948,88 B4         33.128         0.000         55.40         0.000         1000         38.443         35.042         104,827           38.777         388,790         948,88 B4         33.128         0.000         35.541         0.000         35.542         0.000         35.773         36.727         36.82         0.000         35.774         0.000         35.774         0.000         36.720         0.000         0.000         0.000         40.308         35.784         101.3281 <t< td=""><td>9600.000 20.7</td><td></td><td></td><td></td><td>0.000</td><td></td><td></td><td>000</td><td>0.000</td><td>37.053</td><td>34.772</td><td></td></t<>	9600.000 20.7				0.000			000	0.000	37.053	34.772	
36.777         389.790         586.2581         32.148         0.000         35.548         0.000         0.000         39.057         35.342         0.002         35.44         0.000         35.748         0.000         0.000         0.000         35.748         0.000         35.748         0.000         35.748         0.000         35.748         0.000         0.000         0.000         40.544         35.245         101.286	9700.000 28.7				0.000			000	0.000	38.143	35.083	
44,777         38,979         96,68,265         30,917         0.000         36,770         0.000         39,777         35,565         101,786           62,777         38,789         9724,111         28,688         0.000         36,581         0.000         36,587         0.000         36,788         0.000         36,789         0.000         40,306         38,786         101,286           60,777         38,789         9874,101         28,841         0.000         22,740         0.000         40,877         38,786         101,286           76,777         38,799         9870,001         27,220         0.000         36,770         0.000         22,740         0.000         36,789         10,1660           90,000         38,799         9870,000         27,722         0.000         27,722         0.000         36,879         0.000         40,970         36,879         0.000         40,990         36,879         0.000         36,879         0.000         40,990         36,879         0.000         37,890         40,090         36,879         0.000         37,890         40,000         38,890         0.000         40,990         36,893         0.000         27,990         40,000         36,893         0.000	9800.000 36.7				0.000			000	0.000	39.057	35.342	
52.777         389.790         9724.101         29.588         0.000         36.980         0.000         40.584         35.758         101.282           60.777         385.790         97724.101         28.948         0.000         36.128         0.000         20.988         0.000         0.000         40.884         38.528         101.286           60.777         38.799         987.101         26.929         0.000         32.740         0.000         24.881         0.000         40.897         38.285         101.286           48.777         38.799         9870.000         27.720         0.000         36.400         0.000         24.980         38.283         101.286           90.000         38.799         9870.000         27.716         0.000         27.722         0.000         36.400         0.000         40.989         38.283         101.286           90.000         38.790         9870.000         27.746         0.000         27.746         0.000         27.746         0.000         36.400         0.000         40.900         36.848         0.000         27.746         0.000         36.400         0.000         40.900         36.928         101.0489           90.000         38.790	9900.000 44.7				0.000			000	0.000	39.777	35.565	
69.777         359.790         977.847         25.344         0.000         36.129         0.000         40.872         36.06         101.258           68.777         359.790         9871.426         27.390         0.000         36.170         0.000         40.877         36.066         101.258           76.777         359.790         9861.4426         27.390         0.000         36.470         0.000         24.583         0.000         40.970         36.186         101.258           90.000         359.790         9867.000         27.01         0.000         27.22         0.000         0.000         40.990         36.383         102.08           90.000         359.790         9867.000         27.01         0.000         27.284         0.000         27.284         0.000         27.284         0.000         40.990         36.389         102.089           90.000         359.790         9870.000         27.384         0.000         27.284         0.000         27.284         0.000         27.284         0.000         41.004         36.48         102.284           90.000         359.790         9870.000         27.284         0.000         27.284         0.000         41.003         36.48	10000.000 52.7				0.000			000	0.000	40.308	35.758	
68.777         359.790         9821.428         27.390         0.000         36.2740         0.000         40.970         36.186         101.388           78.777         359.790         9851.011         25.925         0.000         36.470         0.000         40.970         36.185         101.080           84.777         359.790         9851.011         25.925         0.000         36.590         0.000         40.998         36.283         100.000           90.000         359.790         9870.000         27.102         0.000         36.591         0.000         36.591         0.000         40.998         36.283         100.000           90.000         359.790         9870.000         27.102         0.000         36.591         0.000         36.591         0.000         36.591         0.000         36.591         0.000         41.009         36.283         100.000           90.000         359.790         9870.000         27.284         0.000         27.284         0.000         27.280         0.000         41.008         36.283         102.284           90.000         359.790         9870.000         27.284         0.000         27.284         0.000         27.284         0.000         37.48	10100.000 60.				0.000			000	0.000	40.664	35.925	
76.777         389.790         9851.011         26.926         0.000         36.400         0.000         24.583         0.000         40.930         36.185         101.660           84.777         389.790         9867.026         2.000         36.57         0.000         26.423         0.000         40.986         36.283         102.000           90.000         389.790         9870.000         27.022         0.000         27.584         0.000         41.001         36.388         102.000           90.000         389.790         9870.000         27.584         0.000         27.584         0.000         41.001         36.389         102.248           90.000         389.790         9870.000         27.884         0.000         27.884         0.000         41.008         36.484         102.384           90.000         389.790         9870.000         28.49         0.000         27.880         0.000         41.016         36.682         102.018           90.000         389.790         9870.000         28.48         0.000         28.48         0.000         41.026         36.88         102.38           90.000         389.790         9870.000         37.48         0.000         28.48	10200.000 68.				0.000			000	0.000	40.872	36.066	
84.777         359.79         9867.026         27.101         0.000         36.507         0.000         26.423         0.000         40.998         36.283         102.000           90.000         359.79         9870.000         27.022         0.000         27.022         0.000         27.022         0.000         41.001         36.333         102.048           90.000         359.79         9870.000         27.116         0.000         27.116         0.000         41.001         36.38         102.048           90.000         359.79         9870.000         27.38         0.000         27.38         0.000         41.004         41.004         36.38         102.048           90.000         359.79         9870.000         27.584         0.000         27.38         0.000         41.006         41.006         36.34         102.048           90.000         359.79         9870.000         27.284         0.000         27.284         0.000         41.006         36.448         102.548           90.000         359.79         9870.000         27.284         0.000         27.284         0.000         41.006         41.006         36.343         102.488           90.000         359.79	10300.000 76.				0.000			000	0.000	40.970	36.185	
90,000         359,79         9870,000         27,022         0,000         27,022         0,000         27,022         0,000         41,001         36,333         102,148           90,000         359,79         9870,000         27,116         0,000         27,338         0,000         27,338         0,000         27,338         0,000         36,883         0,000         27,338         0,000         41,009         36,849         102,348           90,000         359,79         9870,000         27,584         0,000         27,584         0,000         27,584         0,000         41,009         36,849         102,544           90,000         359,79         9870,000         27,584         0,000         27,584         0,000         27,584         0,000         41,036         36,849         102,544           90,000         359,79         9870,000         27,144         0,000         28,136         0,000         28,136         0,000         36,449         0,000         41,038         36,843         103,842           90,000         359,79         9870,000         27,248         0,000         28,440         0,000         28,440         0,000         37,446         0,000         28,440         0,000	10400.000 84.				0.000			000	0.000	40.998	36.283	
90,000         359,79         9870,000         27.116         0.000         27.116         0.000         27.138         0.000         27.338         0.000         27.338         0.000         27.338         0.000         27.338         0.000         27.338         0.000         27.338         0.000         27.338         0.000         27.338         0.000         27.338         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         27.349         0.000         0.000         0.000         41.026         0.000         27.349         0.000         27.340         0.000         27.340         0.000         27.340         0.000         27.340         0.000         27.340         0.000         0.000         0.000         0.000         0.000         0.000         0.	10465.288 90.0				0.000			000	0.000	41.001	36.333	
90,000         359,79         9F70,000         27,338         0,000         36,883         0,000         27,338         0,000         36,843         0,000         27,384         0,000         27,384         0,000         36,448         0,000         36,448         0,000         36,448         0,000         36,448         0,000         36,449         0,000         36,449         0,000         36,449         0,000         37,544         0,000         0,000         0,000         41,026         36,692         102,634           90,000         35,976         9F70,000         27,860         0,000         37,744         0,000         27,860         0,000         41,026         36,692         10,000           90,000         35,976         9F70,000         27,860         0,000         37,486         0,000         20,000         41,069         37,102         10,044,99           90,000         35,976         9F70,000         27,102         0,000         37,486         0,000         30,000         0,000         41,142         37,492         106,072           90,000         35,976         9F70,000         37,486         0,000         30,000         0,000         41,142         37,492         106,072	10500.000 90.0				0.000			000	0.000	41.003	36.358	
90,000         359,790         9870,000         27.584         0.000         27.584         0.000         27.584         0.000         27.584         0.000         27.584         0.000         41.026         36.581         102.882           90,000         359,790         9870,000         28.136         0.000         37.104         0.000         28.136         0.000         37.104         0.000         28.136         0.000         37.104         0.000         28.136         0.000         37.104         0.000         28.140         0.000         41.028         36.843         103.842           90,000         359,790         9870,000         28.440         0.000         28.440         0.000         28.440         0.000         41.089         37.199         104.489           90,000         359,790         9870,000         28.740         0.000         28.460         0.000         28.460         106.072         104.489         105.199           90,000         359,790         9870,000         28.740         0.000         28.460         0.000         41.089         37.402         106.072           90,000         359,790         9870,000         38.773         0.000         28.460         0.000         41.139	10600.000 90.				0.000			000	0.000	41.009	36.448	
90,000         359,790         987,000         27,850         0.000         27,860         0.000         27,860         0.000         27,860         0.000         41,025         36,692         103,342           90,000         359,790         987,000         28,136         0.000         28,136         0.000         28,136         0.000         28,136         0.000         41,035         36,833         103,842         104,869         37,192         104,469         104,069         37,193         104,442         104,442         104,442         104,442         104,442         104,442         106,073         104,442         106,073         104,442         106,073         104,443         106,172         104,443         106,073         104,443         106,073         104,443         106,073         104,443         106,073         104,443         106,073         104,443         106,073         104,443         104,443         104,443         104,443         104,443 <td>10700.000 90.0</td> <td></td> <td></td> <td></td> <td>0.000</td> <td></td> <td></td> <td>000</td> <td>0.000</td> <td>41.016</td> <td>36.561</td> <td></td>	10700.000 90.0				0.000			000	0.000	41.016	36.561	
90.000         359.790         9870.000         28.136         0.000         37.144         0.000         28.136         0.000         37.244         0.000         28.136         0.000         37.244         0.000         28.440         0.000         37.244         0.000         28.440         0.000         37.244         0.000         28.440         0.000         37.244         0.000         28.440         0.000         37.245         0.000         28.440         0.000         28.440         0.000         41.065         37.199         105.194           90.000         359.790         9870.000         29.460         0.000         29.460         0.000         0.000         41.052         37.199         105.194           90.000         359.790         9870.000         29.460         0.000         29.833         0.000         38.202         0.000         30.000         41.142         37.621         106.072           90.000         359.790         9870.000         30.222         0.000         38.742         0.000         30.222         0.000         38.742         0.000         41.142         38.358         111.798           90.000         359.790         9870.000         30.000         38.742         0.000	10800.000 90.				0.000			000	0.000	41.026	36.692	
90.000         359.790         9870.000         28.440         0.000         28.440         0.000         28.440         0.000         41.062         37.012         104.459           90.000         359.790         9870.000         28.782         0.000         28.762         0.000         41.069         37.199         106.114           90.000         359.790         9870.000         29.460         0.000         37.345         0.000         28.460         0.000         41.089         37.402         106.072           90.000         359.790         9870.000         29.460         0.000         29.460         0.000         41.142         37.855         106.072           90.000         359.790         9870.000         30.222         0.000         29.460         0.000         41.142         37.855         107.123           90.000         359.790         9870.000         30.222         0.000         30.222         0.000         41.142         37.855         107.123           90.000         359.790         9870.000         30.627         0.000         30.222         0.000         41.374         38.358         111.798           90.000         359.790         9870.000         31.479         0.0	10900.000 90.				0.000			000	0.000	41.038	36.843	
90.000         359.790         9870.000         28.762         0.000         28.762         0.000         41.069         37.199         105.144           90.000         359.790         9870.000         29.460         0.000         29.462         0.000         41.089         37.402         106.072           90.000         359.790         9870.000         29.460         0.000         29.460         0.000         41.113         37.621         106.072           90.000         359.790         9870.000         29.480         0.000         38.222         0.000         0.000         41.142         37.855         106.072           90.000         359.790         9870.000         38.478         0.000         29.460         0.000         41.142         37.855         108.390           90.000         359.790         9870.000         30.00         38.478         0.000         30.222         0.000         41.274         38.63         111.788           90.000         359.790         9870.000         31.046         0.000         0.000         41.341         38.429         114.089           90.000         359.790         9870.000         31.479         0.000         31.479         0.000         31.479	11000.000 90.			28.440	0.000			000	0.000	41.052	37.012	
90.000         359.790         9870.000         29.102         0.000         37.705         0.000         29.102         0.000         37.705         0.000         29.102         0.000         37.705         0.000         29.40         0.000         41.113         37.621         106.072           90.000         359.790         9870.000         29.460         0.000         38.222         0.000         41.142         37.855         108.390           90.000         359.790         9870.000         30.222         0.000         0.000         41.142         37.855         108.390           90.000         359.790         9870.000         30.627         0.000         30.627         0.000         30.627         0.000         31.442         37.855         108.390           90.000         359.790         9870.000         30.627         0.000         31.449         0.000         41.274         38.452         114.098           90.000         359.790         9870.000         31.449         0.000         31.449         0.000         41.341         38.852         114.098           90.000         359.790         9870.000         32.384         0.000         32.384         0.000         41.361         39.420<	11100.000 90.			28.762	0.000			000.	0.000	41.069	37.199	
90.000         359.790         9870.000         29.460         0.000         9.000         41.113         37.621         107.123           90.000         359.790         9870.000         29.833         0.000         9.000         0.000         41.142         37.855         108.390           90.000         359.790         9870.000         30.222         0.000         38.478         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         30.000         41.274         38.101         109.925           90.000         359.790         9870.000         31.479         0.000         31.479         0.000         31.479         0.000         31.479         0.000         31.440         0.000         31.440         0.000         41.427         38.420         120.460	11200.000 90.			29.102	0.000			.000	0.000	41.089	37.402	
90.000         359.790         9870.000         29.833         0.000         29.833         0.000         41.142         37.855         108.390           90.000         359.790         9870.000         30.222         0.000         30.222         0.000         30.222         0.000         30.222         0.000         41.178         38.101         109.925           90.000         359.790         9870.000         30.627         0.000         30.222         0.000         31.046         0.000         41.274         38.55         111.798           90.000         359.790         9870.000         31.046         0.000         31.479         0.000         41.274         38.623         111.798           90.000         359.790         9870.000         31.479         0.000         31.479         0.000         41.341         38.892         116.331           90.000         359.790         9870.000         32.384         0.000         32.384         0.000         41.534         39.663         129.564           90.000         359.790         9870.000         32.384         0.000         32.384         0.000         41.885         0.000         41.885         90.00         0.000         41.895         0.000 </td <td></td> <td></td> <td></td> <td>29.460</td> <td>0.000</td> <td></td> <td></td> <td>.000</td> <td>0.000</td> <td>41.113</td> <td>37.621</td> <td></td>				29.460	0.000			.000	0.000	41.113	37.621	
90.000         359.790         9870.000         38.478         0.000         30.222         0.000         41.178         38.101         109.925           90.000         359.790         9870.000         30.627         0.000         30.627         0.000         30.627         0.000         41.274         38.358         111.798           90.000         359.790         9870.000         31.479         0.000         31.479         0.000         31.479         0.000         41.274         38.623         111.798           90.000         359.790         9870.000         31.479         0.000         31.479         0.000         31.479         0.000         41.427         38.623         114.098           90.000         359.790         9870.000         31.479         0.000         31.479         0.000         41.427         38.623         114.098           90.000         359.790         9870.000         31.484         0.000         32.884         0.000         40.153         0.000         41.681         39.482         129.564           90.000         359.790         3870.00         31.349         0.000         41.865         0.000         41.865         39.882         44.936           90.000 <td></td> <td></td> <td></td> <td>29.833</td> <td>0.000</td> <td></td> <td></td> <td>000.</td> <td>0.000</td> <td>41.142</td> <td>37.855</td> <td></td>				29.833	0.000			000.	0.000	41.142	37.855	
90.000         359.790         9870.000         30.627         0.000         38.773         0.000         31.046         0.000         41.274         38.358         111.798           90.000         359.790         9870.000         31.046         0.000         31.046         0.000         31.046         0.000         41.274         38.623         114.098           90.000         359.790         9870.000         31.479         0.000         31.479         0.000         41.341         38.623         114.098           90.000         359.790         9870.000         31.925         0.000         31.925         0.000         31.925         0.000         41.427         39.160         120.409           90.000         359.790         9870.000         32.384         0.000         40.51         0.000         32.384         0.000         41.681         39.420         120.4622           90.000         359.790         9870.000         33.339         0.000         40.895         0.000         33.339         0.000         41.386         40.001         41.386         40.001         41.386         40.001         41.386         40.001         41.386         40.001         41.386         40.001         41.386         40					0.000			000.	0.000	41.178	38.101	
90.000         359.790         9870.000         31.046         0.000         31.046         0.000         31.046         0.000         31.046         0.000         41.274         38.623         114.098           90.000         359.790         9870.000         31.479         0.000         31.479         0.000         31.479         0.000         31.479         0.000         31.479         0.000         31.479         0.000         31.479         0.000         41.427         39.160         120.409           90.000         359.790         9870.000         32.384         0.000         40.123         0.000         32.386         0.000         41.538         39.420         120.409           90.000         359.790         9870.000         32.386         0.000         40.896         0.000         33.389         0.000         41.865         39.882         44.936           90.000         359.790         9870.000         33.834         0.000         41.377         0.000         34.339         0.000         42.372         40.071         33.798           90.000         359.790         9870.000         34.339         0.000         34.339         0.000         42.372         40.277         33.798				30.627	0.000			000.	0.000	41.221	38.358	
90.000         359.790         9870.000         31.479         0.000         31.479         0.000         31.479         0.000         41.341         38.892         116.931           90.000         359.790         9870.000         31.925         0.000         31.925         0.000         31.925         0.000         31.925         0.000         41.427         39.160         120.409           90.000         359.790         9870.000         32.384         0.000         40.501         0.000         32.856         0.000         41.865         39.863         129.564           90.000         359.790         9870.000         33.339         0.000         41.304         0.000         33.834         0.000         41.304         0.000         41.304         0.000         41.305 <t< td=""><td>11700.000 90.</td><td></td><td></td><td>31.046</td><td>0.000</td><td></td><td></td><td>.000</td><td>0.000</td><td>41.274</td><td>38.623</td><td></td></t<>	11700.000 90.			31.046	0.000			.000	0.000	41.274	38.623	
90.000         359.790         9870.000         31.925         0.000         31.925         0.000         32.384         0.000         40.123         0.000         41.427         39.160         120.409           90.000         359.790         9870.000         32.384         0.000         40.123         0.000         32.856         0.000         41.681         39.420         124.622           90.000         359.790         9870.000         32.856         0.000         40.501         0.000         32.856         0.000         41.681         39.663         129.564           90.000         359.790         9870.000         33.834         0.000         41.304         0.000         33.834         0.000         41.727         0.000         34.339         0.000         42.372         40.277         33.798	11800.000 90.			31.479	0.000			000.	0.000	41.341	38.892	
90.000         359.790         9870.000         32.384         0.000         40.123         0.000         32.385         0.000         40.513         0.000         41.631         39.420         129.663           90.000         359.790         9870.000         32.856         0.000         40.895         0.000         33.339         0.000         41.865         39.882         44.936           90.000         359.790         9870.000         33.834         0.000         41.374         0.000         33.834         0.000         41.727         0.000         34.339         0.000         42.372         40.071         -33.738	11900.000 90.			31.925	0.000			.000	0.000	41.427	39.160	
90.000359.7909870.00032.8560.00040.5010.00032.8560.00032.8560.00041.86539.663129.56490.000359.7909870.00033.3390.00041.3040.00033.8340.00041.3040.00041.3390.00042.37240.27740.27790.000359.7909870.00034.3390.00041.7270.00034.3390.00042.37240.22740.22733.798	12000.000 90.			32.384	0.000			.000	0.000	41.538	39.420	
90.000359.7909870.00033.3390.00040.8950.00033.8340.00033.8340.00041.3040.00041.3040.00033.8340.00041.7270.00034.3390.00042.37240.27740.227433.798				32.856	0.000			.000	0.000	41.681	39.663	
90.000359.7909870.00033.8340.00041.3040.00033.8340.00042.09540.071-39.24390.000359.7909870.00034.3390.00034.3390.00042.37240.22740.227-33.798				33.339	0.000			.000	0.000	41.865	39.882	
90.000 359.790 9870.000 34.339 0.000 41.727 0.000 34.339 0.000 0.000 42.372 40.227 -33.798				33.834	0.000			.000	0.000	42.095	40.071	
			000.078	34.339	0.000			000	0.000	42.372	40.227	

Well Plan Report

11/8/23, 12:25 PM

10/23, 12.23 IN							well riall hepor	_			
12500.000	90.000	359.790	9870.000	34.855	0.000	42.165 0.000	34.855 0.000	0.000	42.695	40.353	-28.943 MWD+IFR1+MS
12600.000	90.000	359.790	9870.000	35.381	0.000	42.616 0.000	35.381 0.000	0.000	43.056	40.454	-24.822 MWD+IFR1+MS
12700.000	90.000	359.790	9870.000	35.916	0.000	43.081 0.000	35.916 0.000	0.000	43.451	40.535	-21.419 MWD+IFR1+MS
12800.000	90.000	359.790	9870.000	36.460	0.000	43.558 0.000	36.460 0.000	0.000	43.874	40.602	-18.641 MWD+IFR1+MS
12900.000	90.000	359.790	9870.000	37.013	0.000	44.048 0.000	37.013 0.000	0.000	44.321	40.658	-16.373 MWD+IFR1+MS
13000.000	90.000	359.790	9870.000	37.574	0.000	44.550 0.000	37.574 0.000	0.000	44.789	40.706	-14.511 MWD+IFR1+MS
13100.000	90.000	359.790	9870.000	38.143	0.000	45.064 0.000	38.143 0.000	0.000	45.274	40.748	-12.969 MWD+IFR1+MS
13200.000	90.000	359.790	9870.000	38.720	0.000	45.589 0.000	38.720 0.000	0.000	45.775	40.786	-11.680 MWD+IFR1+MS
13300.000	90.000	359.790	9870.000	39.303	0.000	46.124 0.000	39.303 0.000	0.000	46.292	40.820	-10.592 MWD+IFR1+MS
13400.000	90.000	359.790	9870.000	39.894	0.000	46.670 0.000	39.894 0.000	0.000	46.821	40.852	-9.665 MWD+IFR1+MS
13500.000	90.000	359.790	9870.000	40.491	0.000	47.226 0.000	40.491 0.000	0.000	47.363	40.882	-8.868 MWD+IFR1+MS
13600.000	90.000	359.790	9870.000	41.095	0.000	47.792 0.000	41.095 0.000	0.000	47.917	40.911	-8.177 MWD+IFR1+MS
13700.000	90.000	359.790	9870.000	41.705	0.000	48.368 0.000	41.705 0.000	0.000	48.482	40.939	-7.574 MWD+IFR1+MS
13800.000	90.000	359.790	9870.000	42.320	0.000	48.952 0.000	42.320 0.000	0.000	49.057	40.966	-7.044 MWD+IFR1+MS
13900.000	90.000	359.790	9870.000	42.941	0.000	49.545 0.000	42.941 0.000	0.000	49.643	40.992	-6.574 MWD+IFR1+MS
14000.000	90.000	359.790	9870.000	43.567	0.000	50.147 0.000	43.567 0.000	0.000	50.237	41.018	-6.156 MWD+IFR1+MS
14100.000	90.000	359.790	9870.000	44.198	0.000	50.757 0.000	44.198 0.000	0.000	50.840	41.044	-5.783 MWD+IFR1+MS
14200.000	90.000	359.790	9870.000	44.834	0.000	51.375 0.000	44.834 0.000	0.000	51.452	41.069	-5.447 MWD+IFR1+MS
14300.000	90.000	359.790	9870.000	45.475	0.000	52.000 0.000	45.475 0.000	0.000	52.073	41.095	-5.143 MWD+IFR1+MS
14400.000	90.000	359.790	9870.000	46.120	0.000	52.632 0.000	46.120 0.000	0.000	52.700	41.120	-4.868 MWD+IFR1+MS
14500.000	90.000	359.790	9870.000	46.770	0.000	53.272 0.000	46.770 0.000	0.000	53,336	41.146	-4.618 MWD+IFR1+MS
14600.000	90.000	359.790	9870.000	47.423	0.000	53.918 0.000	47.423 0.000	0.000	53,978	41.172	-4.389 MWD+IFR1+MS
14700.000	90.000	359.790	9870.000	48.081	0.000	54.571 0.000	48.081 0.000	0.000	54.628	41.197	-4.180 MWD+IFR1+MS
14800.000	90.000	359.790	9870.000	48.742	0.000	55.231 0.000	48.742 0.000	0.000	55.284	41.224	-3.987 MWD+IFR1+MS
14900.000	90.000	359.790	9870.000	49.407	0.000	55.896 0.000	49.407 0.000	0.000	55.947	41.250	-3.810 MWD+IFR1+MS
15000.000	90.000	359.790	9870.000	50.075	0.000	56.567 0.000	50.075 0.000	0.000	56.615	41.277	-3.646 MWD+IFR1+MS
15100.000	90.000	359.790	9870.000	50.747	0.000	57.244 0.000	50.747 0.000	0.000	57.290	41.304	-3.494 MWD+IFR1+MS
15200.000	90.000	359.790	9870.000	51.422	0.000	57.927 0.000	51.422 0.000	0.000	57.970	41.331	-3.353 MWD+IFR1+MS
15300.000	90.000	359.790	9870.000	52.100	0.000	58.615 0.000	52.100 0.000	0.000	58.655	41.359	-3.222 MWD+IFR1+MS
15400.000	90.000	359.790	9870.000	52.781	0.000	59.307 0.000	52.781 0.000	0.000	59.346	41.387	-3.100 MWD+IFR1+MS
15500.000	90.000	359.790	9870.000	53.464	0.000	60.005 0.000	53.464 0.000	0.000	60.042	41.415	-2.985 MWD+IFR1+MS
15600.000	90.000	359.790	9870.000	54.151	0.000	60.708 0.000	54.151 0.000	0.000	60.743	41.444	-2.878 MWD+IFR1+MS
15700.000	90.000	359.790	9870.000	54.840	0.000	61.415 0.000	54.840 0.000	0.000	61.448	41.473	-2.778 MWD+IFR1+MS

11/8/23, 12:25 PM							Well Plan Report	Report			
15800.000	90.000	359.790	9870.000	55.532	0.000	62.126 0.000	55.532 0.000	0.000	62.159	41.503	-2.684 MWD+IFR1+MS
15900.000	90.000	359.790	9870.000	56.226	0.000	62.842 0.000	56.226 0.000	0.000	62.873	41.533	-2.595 MWD+IFR1+MS
16000.000	90.000	359.790	9870.000	56.922	0.000	63.562 0.000	56.922 0.000	0.000	63.592	41.563	-2.512 MWD+IFR1+MS
16100.000	90.000	359.790	9870.000	57.621	0.000	64.286 0.000	57.621 0.000	0.000	64.314	41.594	-2.433 MWD+IFR1+MS
16200.000	90.000	359.790	9870.000	58.322	0.000	65.014 0.000	58.322 0.000	0.000	65.041	41.625	-2.359 MWD+IFR1+MS
16300.000	90.000	359.790	9870.000	59.025	0.000	65.746 0.000	59.025 0.000	0.000	65.772	41.657	-2.289 MWD+IFR1+MS
16400.000	90.000	359.790	9870.000	59.730	0.000	66.481 0.000	59.730 0.000	0.000	905.99	41.689	-2.222 MWD+IFR1+MS
16500.000	90.000	359.790	9870.000	60.437	0.000	67.220 0.000	60.437 0.000	0.000	67.244	41.722	-2.159 MWD+IFR1+MS
16600.000	90.000	359.790	9870.000	61.146	0.000	67.962 0.000	61.146 0.000	0.000	67.985	41.755	-2.099 MWD+IFR1+MS
16700.000	90.000	359.790	9870.000	61.857	0.000	68.707 0.000	61.857 0.000	0.000	68.729	41.788	-2.042 MWD+IFR1+MS
16800.000	90.000	359.790	9870.000	62.569	0.000	69.456 0.000	62.569 0.000	00000	69.477	41.822	-1.988 MWD+IFR1+MS
16900.000	90.000	359.790	9870.000	63.284	0.000	70.207 0.000	63.284 0.000	00000	70.228	41.857	-1.937 MWD+IFR1+MS
17000.000	90.000	359.790	9870.000	64.000	0.000	70.962 0.000	64.000 0.000	00000	70.982	41.891	-1.888 MWD+IFR1+MS
17100.000	90.000	359.790	9870.000	64.717	0.000	71.719 0.000	64.717 0.000	00000	71.738	41.927	-1.841 MWD+IFR1+MS
17200.000	90.000	359.790	9870.000	65.436	0.000	72.480 0.000	65.436 0.000	0.000	72.498	41.963	-1.797 MWD+IFR1+MS
17300.000	90.000	359.790	9870.000	66.157	000'0	73.242 0.000	66.157 0.000	00000	73.260	41.999	-1.754 MWD+IFR1+MS
17400.000	90.000	359.790	9870.000	66.879	0.000	74.008 0.000	66.879 0.000	00000	74.025	42.035	-1.713 MWD+IFR1+MS
17500.000	90.000	359.790	9870.000	67.602	0.000	74.776 0.000	67,602 0,000	00000	74.793	42.073	-1.674 MWD+IFR1+MS
17600.000	90.000	359.790	9870.000	68.327	0.000	75.547 0.000	68.327 0.000	00000	75.563	42.110	-1.637 MWD+IFR1+MS
17700.000	90.000	359.790	9870.000	69.053	000.0	76.320 0.000	69.053 0.000	00000	76.335	42.148	-1.601 MWD+IFR1+MS
17800.000	90.000	359.790	9870.000	69.780	0.000	77.095 0.000	000.0 087.69	00000	77.110	42.187	-1.567 MWD+IFR1+MS
17900.000	90.000	359.790	9870.000	70.509	0.000	77.872 0.000	70.509 0.000	00000	77.887	42.226	-1.534 MWD+IFR1+MS
18000.000	90.000	359.790	9870.000	71.238	000.0	78.652 0.000	71.238 0.000	00000	78.666	42.265	-1.502 MWD+IFR1+MS
18100.000	90.000	359.790	9870,000	71.969	0.000	79.434 0.000	71.969 0.000	00000	79.448	42.305	-1.472 MWD+IFR1+MS
18200.000	90.000	359.790	9870,000	72.701	0.000	80.218 0.000	72.701 0.000	00000	80.231	42.346	-1.443 MWD+IFR1+MS
18300.000	90.000	359.790	9870.000	73.435	0.000	81.003 0.000	73.435 0.000	00000	81.016	42.387	-1.414 MWD+IFR1+MS
18400.000	90.000	359.790	9870.000	74.169	0.000	81.791 0.000	74.169 0.000	00000	81.804	42.428	-1.387 MWD+IFR1+MS
18500.000	90.000	359.790	9870,000	74.904	0.000	82.581 0.000	74.904 0.000	00000	82.593	42.470	-1.361 MWD+IFR1+MS
18600.000	90.000	359.790	9870.000	75.640	0.000	83.372 0.000	75.640 0.000	00000	83.384	42.512	-1.336 MWD+IFR1+MS
18700.000	90.000	359.790	9870.000	76.377	0.000	84.166 0.000	76.377 0.000	00000	84.177	42.555	-1.312 MWD+IFR1+MS
18800.000	90.000	359.790	9870.000	77.115	0.000	84.961 0.000	77.115 0.000	00000	84.972	42.598	-1.289 MWD+IFR1+MS
18900,000	90.000	359.790	9870.000	77.854	0.000	85.757 0.000	77.854 0.000	000'0 0	85.768	42.642	-1.266 MWD+IFR1+MS
19000.000	90.000	359.790	9870.000	78.594	0.000	86.555 0.000	78.594 0.000	0.000	86.566	42.686	-1.244 MWD+IFR1+MS

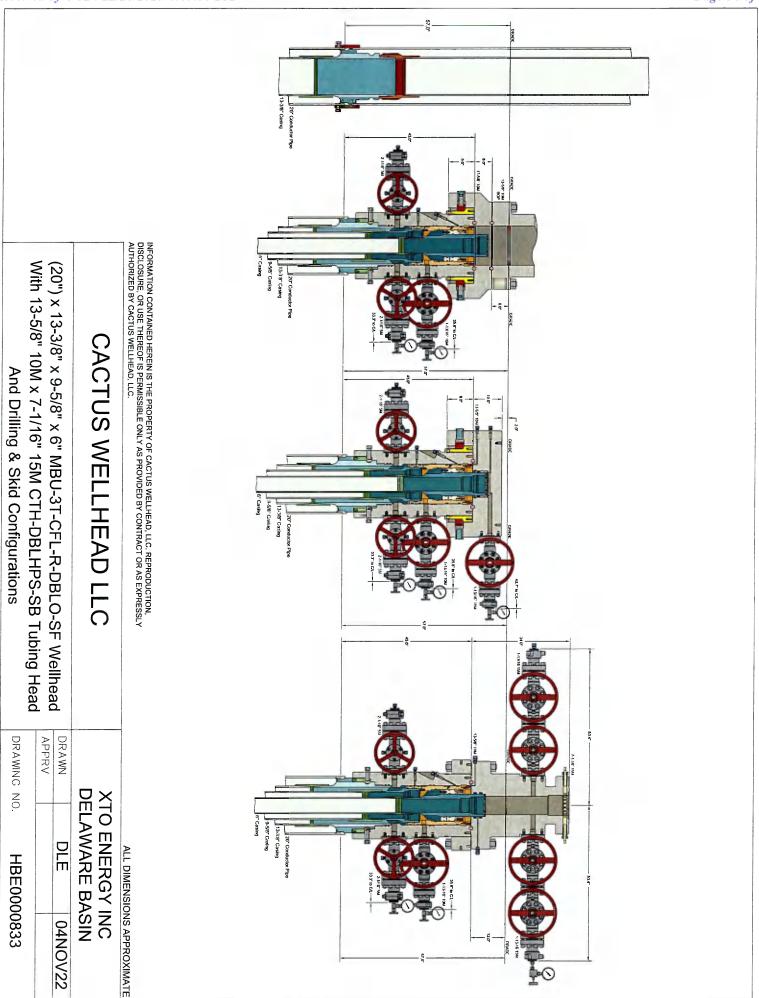
11/8/23, 12:25 PM								Well F	Well Plan Report				
19100.000	90.000	359.790	9870.000	79.335	0.000	87.355 (	0.000	79.335 0.0	0.000	0.000	87.366	42.730	-1.223 MWD+IFR1+MS
19200.000	90.000	359.790	9870.000	80.077	0.000	88.157 (	0.000	80.077 0.0	0.000	0.000	88.167	42.775	-1.203 MWD+IFR1+MS
19300.000	90.000	359.790	9870.000	80.819	0.000	88.960	0.000	80.819 0.0	0.000	0.000	88.969	42.821	-1.184 MWD+IFR1+MS
19400.000	90.000	359.790	9870.000	81.562	0.000	89.764 (	0.000	81.562 0.0	0.000	0.000	89.773	42.867	-1.165 MWD+IFR1+MS
19500.000	90.000	359.790	9870.000	82.306	0.000	90.570	0.000	82.306 0.0	0.000	0.000	90.579	42.913	-1.146 MWD+IFR1+MS
19600.000	90.000	359.790	9870.000	83.051	0.000	91.377 (	0.000	83.051 0.0	0.000	0.000	91.386	42.960	-1.128 MWD+IFR1+MS
19700.000	90.000	359.790	9870.000	83.797	0.000	92.185 (	0.000	83.797 0.0	0.000	0.000	92.194	43.007	-1.111 MWD+IFR1+MS
19800.000	90.000	359.790	9870.000	84.543	0.000	92.995	0.000	84.543 0.0	0.000	0.000	93.004	43.055	-1.094 MWD+IFR1+MS
19900.000	90.000	359.790	9870.000	85.290	0.000	93.806	0.000	85.290 0.0	0.000	0.000	93.815	43.103	-1.078 MWD+IFR1+MS
20000.000	90.000	359.790	9870.000	86.037	0.000	94.619	0.000	86.037 0.	0.000	0.000	94.627	43.152	-1.063 MWD+IFR1+MS
20100.000	90.000	359.790	9870.000	86.785	0.000	95.432	0.000	86.785 0.	0.000	0.000	95.440	43.201	-1.047 MWD+IFR1+MS
20200.000	90.000	359.790	9870.000	87.534	0.000	96.247	0.000	87.534 0.	0.000	0.000	96.255	43.250	-1.033 MWD+IFR1+MS
20300.000	90.000	359.790	9870.000	88.284	0.000	97.063	0.000	88.284 0.	0.000	0.000	97.070	43.300	-1.018 MWD+IFR1+MS
20400.000	90.000	359.790	9870.000	89.034	0.000	97.880	0.000	89.034 0.	0.000	0.000	97.887	43.351	-1.004 MWD+IFR1+MS
20500.000	90.000	359.790	9870.000	89.785	0.000	98.698	0.000	89.785 0.	0.000	0.000	98.705	43.402	-0.991 MWD+IFR1+MS
20600.000	90.000	359.790	9870.000	90.536	0.000	99.517	0.000	90.536 0.	0.000	0.000	99.524	43.453	-0.978 MWD+IFR1+MS
20700.000	90.000	359.790	9870.000	91.288	0.000	100.337	0.000	91.288 0.	0.000	0.000	100.344	43.505	-0.965 MWD+IFR1+MS
20800.000	90.000	359,790	9870.000	92.040	0.000	101.158	0.000	92.040 0.	0.000	0.000	101.165	43.557	-0.952 MWD+IFR1+MS
20900.000	90.000	359.790	9870.000	92.793	0.000	101.981	0.000	92.793 0.	0.000	0.000	101.987	43.610	-0.940 MWD+IFR1+MS
21000.000	90.000	359.790	9870.000	93.546	0.000	102.804	0.000	93.546 0.	0.000	0.000	102.811	43.663	-0.929 MWD+IFR1+MS
21100.000	90.000	359.790	9870.000	94.300	0.000	103.628	0.000	94.300 0.	0.000	0.000	103.635	43.716	-0.917 MWD+IFR1+MS
21200.000	90.000	359.790	9870.000	95.055	0.000	104.453	0.000	95.055 0.	0.000	0.000	104.459	43.770	-0.906 MWD+IFR1+MS
21300.000	90.000	359.790	9870.000	95.810	00000	105.279	0.000	95.810 0.	0.000	0.000	105.285	43.825	-0.895 MWD+IFR1+MS
21400.000	90.000	359.790	9870.000	96.565	0.000	106.106	0.000	96,565 0.	0.000	0.000	106.112	43.879	-0.885 MWD+IFR1+MS
21500.000	90.000	359.790	9870.000	97.321	0.000	106.934	0.000	97.321 0.	0.000	0.000	106.940	43.935	-0.874 MWD+IFR1+MS
21600.000	90.000	359.790	9870,000	98.077	0.000	107.762	0.000	98.077 0.	0.000	0.000	107.768	43.990	-0.864 MWD+IFR1+MS
21700.000	90.000	359.790	9870.000	98.834	0.000	108.592	0.000	98.834 0.	0.000	0.000	108.597	44.046	-0.855 MWD+IFR1+MS
21800.000	90,000	359.790	9870.000	99,591	0.000	109.422	0.000	99.591 0.	0.000	0.000	109.427	44.103	-0.845 MWD+IFR1+MS
21900.000	90.000	359.790	9870.000	100.349	0.000	110.253	0.000	100.349 0.	0.000	0.000	110.258	44.160	-0.836 MWD+IFR1+MS
22000.000	90.000	359.790	9870.000	101.107	0.000	111.084	0.000	101.107 0.	0.000	0.000	111.090	44.217	-0.827 MWD+IFR1+MS
22100.000	90.000	359.790	9870.000	101.865	0.000	111.917	0.000	101.865 0.	0.000	0.000	111.922	44.275	-0.818 MWD+IFR1+MS
22200.000	90.000	359.790	9870.000	102.624	0.000	112.750	0.000	102.624 0	0.000	0.000	112.755	44.333	-0.809 MWD+IFR1+MS
22300.000	90.000	359.790	9870.000	103.383	0.000	113.584	0.000	103.383 0	0.000	0.000	113.589	44.392	-0.801 MWD+IFR1+MS

Well Plan Report

11/8/23, 12:25 PM

0/20, 12:20 W									ial report					
22400.000	90.000	359.790	9870.000	104.143	0.000	114.419 (	0.000	104.143 0.	0.000	0.000	114.424	44.451	-0.793 MWD+IFR1+MS	
22500.000	90.000	359.790	9870.000	104.903	0.000	115.254 (	0.000	104.903 0.	0.000	0.000	115.259	44.510	-0.785 MWD+IFR1+MS	
22600.000	90.000	359.790	9870.000	105.663	0.000	116.090 (	0.000	105.663 0.	0.000	0.000	116.095	44.570	-0.777 MWD+IFR1+MS	
22700.000	90.000	359.790	9870.000	106.424	0.000	116.927 (	0.000	106.424 0.	0.000	0.000	116.931	44.630	-0.769 MWD+IFR1+MS	
22800.000	90.000	359.790	9870.000	107.185	0.000	117.764 (	0.000	107.185 0.	0.000	0.000	117.769	44.691	-0.762 MWD+IFR1+MS	
22900.000	90.000	359.790	9870.000	107.946	0.000	118.602	0.000	107.946 0.	0.000	0.000	118.606	44.752	-0.754 MWD+IFR1+MS	
23000.000	90.000	359.790	9870.000	108.708	0.000	119.440	0.000	108.708 0.	0.000	0.000	119.445	44.814	-0.747 MWD+IFR1+MS	
23100.000	90.000	359.790	9870.000	109.470	0.000	120.279	0.000	109.470 0.	0.000	0.000	120,284	44.875	-0.740 MWD+IFR1+MS	
23200.000	90.000	359.790	9870.000	110.233	0.000	121.119	0.000	110.233 0.	0.000	0.000	121.124	44.938	-0.733 MWD+IFR1+MS	
23300,000	90.000	359.790	9870.000	110.995	0.000	121.959	0.000	110.995 0.	0.000	0.000	121.964	45.000	-0.727 MWD+IFR1+MS	
23400.000	90.000	359.790	9870.000	111.758	0.000	122.800	0.000	111.758 0.	0.000	0.000	122.805	45.064	-0.720 MWD+IFR1+MS	
23500.000	90.000	359.790	9870.000	112.522	0.000	123.642	0.000	112.522 0.	0.000	0.000	123.646	45.127	-0.714 MWD+IFR1+MS	
23600.000	90.000	359.790	9870.000	113.285	0.000	124.484	0.000	113.285 0.	0.000	0.000	124.488	45.191	-0.707 MWD+IFR1+MS	
23700.000	90.000	359.790	9870.000	114.049	0.000	125.326	0.000	114.049 0	0.000	0.000	125.330	45.255	-0.701 MWD+IFR1+MS	
23800.000	90.000	359.790	9870.000	114.813	0.000	126.169	0.000	114.813 0	0.000	0.000	126.173	45.320	-0.695 MWD+IFR1+MS	
23900,000	90.000	359.790	9870.000	115.578	0.000	127.013	0.000	115.578 0	0.000	0.000	127.017	45.385	-0.689 MWD+IFR1+MS	
24000.000	90.000	359.790	9870.000	116.342	0.000	127.857	0.000	116.342 0	0.000	0.000	127.861	45.450	-0.684 MWD+IFR1+MS	
24100.000	90.000	359.790	9870.000	117.107	000.0	128.701	0.000	117.107 0	0.000	0.000	128.705	45.516	-0.678 MWD+IFR1+MS	
24200.000	90.000	359.790	9870.000	117.872	000.0	129.546	0.000	117.872 0	0.000	0.000	129.550	45.583	-0.672 MWD+IFR1+MS	
24300.000	90.000	359.790	9870.000	118.638	0.000	130.392	0.000	118.638 0	0.000	0.000	130.395	45.649	-0.667 MWD+IFR1+MS	
24400.000	90.000	359.790	9870.000	119.404	0.000	131.238	0.000	119.404 0	0.000	0.000	131.241	45.716	-0.662 MWD+IFR1+MS	
24500.000	90.000	359.790	9870.000	120.170	0.000	132.084	0.000	120.170 0	0.000	0.000	132.088	45.784	-0.656 MWD+IFR1+MS	
24600.000	90.000	359.790	9870.000	120.936	0.000	132.931	0.000	120.936 0	0.000	0.000	132.935	45.851	-0.651 MWD+IFR1+MS	
24700.000	90.000	359.790	9870.000	121.702	0.000	133.778	0.000	121.702 0	0.000	0.000	133.782	45.920	-0.646 MWD+IFR1+MS	
24800.000	90.000	359.790	9870.000	122.469	0.000	134.626	0.000	122.469 0	0.000	0.000	134.629	45.988	-0.641 MWD+IFR1+MS	
24900.000	90.000	359.790	9870.000	123.236	0.000	135.474	0.000	123.236 0	0.000	0.000	135.477	46.057	-0.637 MWD+IFR1+MS	
25000.000	90.000	359.790	9870.000	124.003	0.000	136.323	0.000	124.003 0	0.000	0.000	136.326	46.126	-0.632 MWD+IFR1+MS	
25100.000	90.000	359.790	9870.000	124.770	0.000	137.172	0.000	124.770 0	0.000	0.000	137.175	46.196	-0.627 MWD+IFR1+MS	
25200.000	90.000	359.790	9870.000	125.538	0.000	138,021	0.000	125.538 0	0.000	0.000	138.024	46.266	-0.623 MWD+IFR1+MS	
25300.000	90.000	359.790	9870.000	126.306	0.000	138.871	0.000	126.306 0	0.000	0.000	138.874	46.336	-0.618 MWD+IFR1+MS	
25400.000	90.000	359.790	9870.000	127.074	0.000	139.721	0.000	127.074 0	0.000	0.000	139.724	46.407	-0.614 MWD+IFR1+MS	
25500.000	90.000	359.790	9870.000	127.842	0.000	140.571	0.000	127.842 0	0.000	0.000	140.574	46.478	-0.610 MWD+IFR1+MS	
25600.000	90.000	359.790	9870.000	128.610	0.000	141.422	0.000	128.610 0	0.000	0.000	141.425	46.550	-0.605 MWD+IFR1+MS	

11/8/23, 12:25 PM								W	Well Plan Report	ţ			
25700.000	90.000	359.790	90.000 359.790 9870.000	129.379	0.000	0.000 142.274 0.000 129.379 0.000	0.000	129.379	0.000	0.000	142.276	46.622	-0.601 MWD+IFR1+MS
25800.000	90.000	359.790	9870.000	130.148	0.000	0.000 143.125	0.000	0.000 130.148	0.000	0.000	143.128	46.694	-0.597 MWD+IFR1+MS
25900.000	90.000	359.790	9870.000	130.917	0.000	.000 143.977	0.000	130.917	0.000	0.000	143.980	46.766	-0.593 MWD+IFR1+MS
26000.000	90.000	359.790	9870.000	131.686	0.000	.000 144.829	0.000	0.000 131.686	0.000	0.000	144.832	46.839	-0.589 MWD+IFR1+MS
26100.000	90.000	359.790	9870.000	132.455	0.000	.000 145.682		0.000 132.455	0.000	0.000	145.685	46.913	-0.585 MWD+IFR1+MS
26200.000	90.000	359.790	9870.000	133.225	0.000	,000 146,535	000.0	0.000 133.225	0.000	0.000	146.538	46,986	-0.582 MWD+IFR1+MS
26300.000	90.000	359.790	9870.000	133.994	0.000	.000 147.388		0.000 133.994	0.000	0.000	147.391	47.060	-0.578 MWD+IFR1+MS
26400.000	90.000	359.790	9870.000	134.764	0.000	.000 148.242		0.000 134.764	0.000	0.000	148.245	47.135	-0.574 MWD+IFR1+MS
26500.000	90.000	359.790	9870.000	135.534	0.000	.000 149.096		0.000 135.534	0.000	0.000	149.098	47.209	-0.571 MWD+IFR1+MS
26600.000	90.000	359.790	9870.000	136.304	0.000	0.000 149.950	0.000	0.000 136.304	0.000	0.000	149.953	47.284	-0.567 MWD+IFR1+MS
26703.997	90.000	359.790	9870.000	137.106	0.000	0.000 150.839	0.000	137.106	0.000	0.000	150.841	47,363	-0.563 MWD+IFR1+MS
26754.556	90.000	359.790	9870.000	137.495	0.000	0.000 151.270 0.000		137.495	0.000	0.000	151.273	47.401	-0.562 MWD+IFR1+MS
Plan Targets			POKER LAKE UNIT 22 DTD 183H	E UNIT 22	DTD 18	3H							
			2	Measured De	epth		Grio	<b>Grid Northing</b>	កា	<b>Grid Easting</b>	sting	LVD MSL	TVD MSL Target Shape
<b>Target Name</b>					<b>(£</b>			(#J)	6		(#)	<b>(£</b> )	
FTP 15				1046	10465.27			440074.00	0	6426	642918.50	6407.00	6407.00 RECTANGLE
LTP 15				26704.	04.00		-	456312.60	0	6428	642859.10	6407.00	6407.00 RECTANGLE
BHL 15				26754.	54.00		-	456362.60	0	6428	642858.80	6407.00	6407.00 RECTANGLE



# **U. S. Steel Tubular Products**

# 2/22/2022 2:07:15 PM

# 6.000" 26.00lb/ft (0.436" Wall) P110 HP USS-FREEDOM HTQ®

		debeleractions.	
MECHANICAL PROPERTIES	Pipe	USS-FREEDOM HTQ®	
Minimum Yield Strength	125,000	_	psi
Maximum Yield Strength	140,000	_	psi
Minimum Tensile Strength	130,000	-	psi
DIMENSIONS	Pipe	USS-FREEDOM HTQ®	
Outside Diameter	6.000	6.875	in.
Wall Thickness	0.436		in.
Inside Diameter	5.128	5.128	in.
Standard Drift	5.003	5.003	in.
Alternate Drift			in.
Nominal Linear Weight, T&C	26.00	-	lb/ft
Plain End Weight	25.93		lb/ft
SECTION AREA	Pipe	USS-FREEDOM HTQ <sup>®</sup>	
Critical Area	7.621	7.621	sq. in.
Joint Efficiency		100.0	%
PERFORMANCE	Pipe	USS-FREEDOM HTQ®	
Minimum Collapse Pressure	15,550	15,550	psi
Minimum Internal Yield Pressure	15,920	15,920	psi
Minimum Pipe Body Yield Strength	953,000	_	lb
Joint Strength		953,000	lb
Compression Rating		953,000	lb
Reference Length [4]		24,492	ft
Maximum Uniaxial Bend Rating [2]	-	95.5	deg/100 ft
IAKE-UP DATA	Pipe	USS-FREEDOM HTQ®	
Make-Up Loss		4.31	in.
Minimum Make-Up Torque [3]	-	15,000	ft-lb
Maximum Make-Up Torque [3]		21,000	ft-lb
Maximum Operating Torque[3]		44,000	ft-lb

# **Notes**

- 1. Other than proprietary collapse and connection values, performance properties have been calculated using standard equations defined by API 5C3 and do not incorporate any additional design or safety factors. Calculations assume nominal pipe OD, nominal wall thickness, and Specified Minimum Yield Strength (SMYS).
- 2. Uniaxial bending rating shown is structural only, and equal to compression efficiency.
- 3. Torques have been calculated assuming a thread compound friction factor of 1.0 and are recommended only. Field make-up torques may require adjustment based on actual field conditions (e.g. make-up speed, temperature, thread compound, etc.).
- 4. Reference length is calculated by joint strength divided by plain end weight with 1.5 safety factor.

# **Legal Notice**

All material contained in this publication is for general information only. This material should not therefore be used or relied upon for any specific application without independent competent professional examination and verification of accuracy, suitability and applicability. Anyone making use of this material does so at their own risk and assumes any and all liability resulting from such use. U. S. Steel disclaims any and all expressed or implied warranties of fitness for any general or particular application.

> U. S. Steel Tubular Products 460 Wildwood Forest Drive, Suite 300S Spring, Texas 77380

1-877-893-9461 connections@uss.com www.usstubular.com

8/27/2021 1:46:58 PM

# **U. S. Steel Tubular Products** 6.000" 26.00lb/ft (0.436" Wall) P110 RY USS-TALON HTQ™



MECHANICAL PROPERTIES	Pipe	USS-TALON HTQ™		[6]
Minimum Yield Strength	110,000	-	psi	-
Maximum Yield Strength	125,000		psi	-
Minimum Tensile Strength	125,000	-	psi	_
DIMENSIONS	Pipe	USS-TALON HTQ™		-
Outside Diameter	6.000	6.875	in.	-
Wall Thickness	0.436		in.	
Inside Diameter	5.128	5.128	in.	_
Standard Drift	5.003	5.003	in.	_
Alternate Drift			in.	-
Nominal Linear Weight, T&C	26.00	_	lb/ft	
Plain End Weight	25.93	_	lb/ft	_
SECTION AREA	Pipe	USS-TALON HTQ™		-
Critical Area	7.621	7.621	sq. in.	-
Joint Efficiency	-	100.0	%	[2]
PERFORMANCE	Pipe	USS-TALON HTQ™		-
Minimum Collapse Pressure	13,570	13,570	psi	
Minimum Internal Yield Pressure	14,010	14,010	psi	
Minimum Pipe Body Yield Strength	838,000		lb	-
Joint Strength		838,000	lb	
Compression Rating		838,000	lb	-
Reference Length		21,490	ft	[5]
Maximum Uniaxial Bend Rating	_	84.0	deg/100 ft	[3]
MAKE-UP DATA	Pipe	USS-TALON HTQ™		
Make-Up Loss	-	5.58	in.	_
Minimum Make-Up Torque	-	22,500	ft-lb	[4]
Maximum Make-Up Torque		25,500	ft-lb	[4]
Maximum Operating Torque	-	48,900	ft-lb	[4]

# **Notes**

- 1. Other than proprietary collapse and connection values, performance properties have been calculated using standard equations defined by API 5C3 and do not incorporate any additional design or safety factors. Calculations assume nominal pipe OD, nominal wall thickness, and Specified Minimum Yield Strength (SMYS).
- 2. Joint efficiencies are calculated by dividing the connection critical area by the pipe body area.
- 3. Uniaxial bend rating shown is structural only.
- 4. Torques have been calculated assuming a thread compound friction factor of 1.0 and are recommended only. Field make-up torques may require adjustment based on actual field conditions (e.g. make-up speed, temperature, thread compound, etc.).
- 5. Reference length is calculated by Joint Strength divided by Nominal Linear Weight, T&C with a 1.5 Safety factor.
- Coupling must meet minimum mechanical properties of the pipe.

# **Legal Notice**

All material contained in this publication is for general information only. This material should not therefore be used or relied upon for any specific application without independent competent professional examination and verification of accuracy, suitability and applicability. Anyone making use of this material does so at their own risk and assumes any and all liability resulting from such use, U. S. Steel disclaims any and all expressed or implied warranties of fitness for any general or particular application.

> U. S. Steel Tubular Products 460 Wildwood Forest Drive, Suite 300S Spring, Texas 77380

1-877-893-9461 connections@uss.com www.usstubular.com

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 Rd., Aztec, NM 87410 Phone:(505) 334-6178 Fax:(505) 334-6170

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 298280

# **CONDITIONS**

Operator:	OGRID:
XTO PERMIAN OPERATING LLC.	373075
6401 HOLIDAY HILL ROAD	Action Number:
MIDLAND, TX 79707	298280
	Action Type:
	[C-103] NOI Change of Plans (C-103A)

# CONDITIONS

Created By	Condition	Condition Date
ward.rikala	All original COA's still apply.	12/29/2023