Sundry Print Report

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

Well Name: UTAH 17/18 FED COM Well Location: T21S / R27E / SEC 17 / County or Parish/State: EDDY /

NENE / 32.4828338 / -104.2041307

Well Number: 712H Type of Well: CONVENTIONAL GAS Allottee or Tribe Name:

WELL

Lease Number: NMNM0560291 Unit or CA Name: Unit or CA Number:

US Well Number: Operator: MEWBOURNE OIL

COMPANY

Notice of Intent

Sundry ID: 2818925

Type of Submission: Notice of Intent

Type of Action: APD Change

Date Sundry Submitted: 10/25/2024 Time Sundry Submitted: 03:57

Date proposed operation will begin: 10/28/2024

Procedure Description: Mewbourne Oil Company request that the following change be made to the Utah 17/18 Fed Com 712H (APD ID: 10400097139): 1. Change casing design from 4-string to 3-string. Any potential fresh water will be protected by conductor casing set to 200'. During spud operations/surface casing interval, fresh water will be used unless salt is encountered, in which case brine will be used. 2. Change lateral hole size from 6.125" to 8.50". 3. Change Production and Liner casing to a tapered 7"-to-4.5" long string. 4. Please see attached: CsgAssumptions.

NOI Attachments

Procedure Description

Utah_17_18_Fed_Com_712H_CsgAssumptions_20241025155708.pdf

Utah_17_18_Fed_Com_712H_Sundry_20241025155655.pdf

Page 1 of 2

eceived by OCD: 12/6/2024 11:18:21 AM Well Name: UTAH 17/18 FED COM

Well Location: T21S / R27E / SEC 17 /

NENE / 32.4828338 / -104.2041307

County or Parish/State: Page 2 of

NM

Zip:

Well Number: 712H

Type of Well: CONVENTIONAL GAS

Allottee or Tribe Name:

Lease Number: NMNM0560291

Unit or CA Name:

Unit or CA Number:

US Well Number:

Operator: MEWBOURNE OIL

COMPANY

Conditions of Approval

Additional

Utah_17_18_Fed_Com_712H_CsgAssumptions_C_20241030102821.pdf

UTAH_17_18_FED_COM_712H_Sundry_2818925_COA_20241030102821.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: CONNER WHITLEY Signed on: OCT 25, 2024 03:57 PM

Name: MEWBOURNE OIL COMPANY

Title: ENGINEER

Street Address: 901 W TAOS ST

City: HOBBS State: NM

Phone: (806) 202-5974

Email address: CWHITLEY@MEWBOURNE.COM

Field

Representative Name:

Street Address:

City: State:

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: 10/31/2024

Signature: Chris Walls

Page 2 of 2

Form 3160-5 (June 2019)

UNITED STATES DEPARTMENT OF THE INTERIOR

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

BURI	EAU OF LAND MANAGEMEN	5. Lease Seriai No.			
Do not use this f	OTICES AND REPORTS ON Form for proposals to drill or TUSE Form 3160-3 (APD) for s	r to re-enter an	6. If Indian, Allottee or Tribe Name		
	TRIPLICATE - Other instructions on p		7. If Unit of CA/Agreement, N	ame and/or No.	
1. Type of Well	<u> </u>		8. Well Name and No.		
Oil Well Gas W	Vell Other				
2. Name of Operator		9. API Well No.			
3a. Address	3b. Phone N	No. (include area code)	10. Field and Pool or Explorate	ory Area	
4. Location of Well (Footage, Sec., T.,R	.,M., or Survey Description)		11. Country or Parish, State		
12. CHE	CK THE APPROPRIATE BOX(ES) TO	INDICATE NATURE	OF NOTICE, REPORT OR OTH	ER DATA	
TYPE OF SUBMISSION		TYP	E OF ACTION		
Notice of Intent		eepen ydraulic Fracturing	Production (Start/Resume) Reclamation	Water Shut-Off Well Integrity	
Subsequent Report		lew Construction	Recomplete	Other	
Final Abandonment Notice		lug and Abandon	Temporarily Abandon		
	Convert to Injection P peration: Clearly state all pertinent detail	lug Back	Water Disposal	1 1	
is ready for final inspection.)					
14. I hereby certify that the foregoing is	true and correct. Name (Printed/Typed)	Title			
Signatura					
Signature	THE SPACE FOR FE	Date	ATE OFICE USE		
A marroyad by	THE SPACE FUR FE	DENAL OR SIA	ALE OFICE USE		
Approved by		m: 4			
Conditions of approval if " 1	and Approval of this notice decree	Title		Date	
	ned. Approval of this notice does not war equitable title to those rights in the subject duct operations thereon.				
	3 U.S.C Section 1212, make it a crime for ents or representations as to any matter w		y and willfully to make to any de	partment or agency of the United States	

(Instructions on page 2)

GENERAL INSTRUCTIONS

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

SPECIFIC INSTRUCTIONS

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

Item 13: Proposals to abandon a well and subsequent reports of abandonment should include such special information as is required by the local Federal office. In addition, such proposals and reports should include reasons for the abandonment; data on any former or present productive zones or other zones with present significant fluid contents not sealed off by cement or otherwise; depths (top and bottom) and method of placement of cement plugs; mud or other material placed below, between and above plugs; amount, size, method of parting of any casing, liner or tubing pulled and the depth to the top of any tubing left in the hole; method of closing top of well and date well site conditioned for final inspection looking for approval of the abandonment. If the proposal will involve **hydraulic fracturing operations**, you must comply with 43 CFR 3162.3-3, including providing information about the protection of usable water. Operators should provide the best available information about all formations containing water and their depths. This information could include data and interpretation of resistivity logs run on nearby wells. Information may also be obtained from state or tribal regulatory agencies and from local BLM offices.

NOTICES

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

AUTHORITY: 30 U.S.C. 181 et seq., 351 et seq., 25 U.S.C. 396; 43 CFR 3160.

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

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

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

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

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

Response to this request is mandatory.

The BLM would like you to know that you do not have to respond to this or any other Federal agency-sponsored information collection unless it displays a currently valid OMB control number.

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

(Form 3160-5, page 2)

Additional Information

Location of Well

0. SHL: NENE / 1690 FNL / 205 FEL / TWSP: 21S / RANGE: 27E / SECTION: 17 / LAT: 32.4828338 / LONG: -104.2041307 (TVD: 0 feet, MD: 0 feet)
PPP: SENE / 660 FNL / 100 FEL / TWSP: 21S / RANGE: 27E / SECTION: 17 / LAT: 32.4856631 / LONG: -104.2037721 (TVD: 8679 feet, MD: 8774 feet)
PPP: SENE / 749 FNL / 0 FEL / TWSP: 21S / RANGE: 27E / SECTION: 18 / LAT: 32.4855365 / LONG: -104.2205506 (TVD: 8886 feet, MD: 14040 feet)
BHL: NWNW / 660 FNL / 100 FEL / TWSP: 21S / RANGE: 27E / SECTION: 18 / LAT: 32.4851275 / LONG: -104.2371148 (TVD: 8822 feet, MD: 19148 feet)

Mewbourne Oil Company, Utah 17/18 Fed Com 712H Sec 17, T21S, R27E SHL: 1690' FNL 205' FEL (Sec 17)

SHL: 1690' FNL 205' FEL (Sec 17) BHL: 660' FNL 100' FWL (Sec 18)

	Casing Program Design C						4.407	4.0	1.6 Dry	1.6 Dry
		Casing Pro	gram Design	C		BLM Minimum Safety Factors	1.125	1.0	1.8 Wet	1.8 Wet
String	Hole Size	Top MD	Top TVD	Bot MD	Bot TVD	Csg. Size	SF Collapse	SF Burst	SF Jt Tension	SF Body Tension
Surface	17.5"	0'	0'	1000'	1000'	13.375" 48# H40 STC	1.72	3.87	6.71	11.27
Intermediate	12.25"	0'	0'	2590'	2590'	9.625" 36# J55 LTC	1.75	3.04	4.86	6.05
Production	8.75"	0'	0'	8449'	8371'	7" 26# P110 LTC	1.38	2.21	3.15	3.78
Production	8.5"	8449'	8371'	19148'	8822'	4.5" 13.5# RYS110 CDC HTQ	2.00	2.32	14.08	13.89

Cement Program

Casing		# Sacks	Wt. lb/gal	Yield ft ³ /sack	TOC/BOC	Volume ft ³	% Excess	Slurry Description
13,375 in	LEAD	530	12.5	2.12	0' - 808'	1130	100%	Class C: Salt, Gel, Extender, LCM
13.373 III	TAIL	200	14.8	1.34	808' - 1000'	268	100%	Class C: Retarder
1st Stg 9.625 in	LEAD	160	12.5	2.12	1058' - 1915'	340	25%	Class C: Salt, Gel, Extender, LCM
18t Stg 9.025 III	TAIL	200	14.8	1.34	1915' - 2590'	268	2,370	Class C: Retarder
2nd Stg 9.625 in	LEAD	130	12.5	2.12	0' - 716'	280	250/	Class C: Salt, Gel, Extender, LCM
211d Stg 9.025 III	TAIL	100	14.8	1.34	716' - 1058'	134	25%	Class C: Retarder
7 in - 4.5 in	LEAD	820	12.5	2.12	1033' - 7139'	1740	25%	Class C: Salt, Gel, Extender, LCM, Defoamer
/ III - 4.5 III	TAIL	1850	13.5	1.85	7139' - 19148'	3423	23%	Class H: Retarder, Fluid Loss, Defoamer

Design A - Mud Program

Depth	Mud Wt	Mud Type
0' - 1000'	8.4 - 8.6	Fresh Water
1000' - 2590'	8.4 - 8.6	Fresh Water
2590' - 8449'	8.6 - 9.5	Cut-Brine
8449' - 19148'	10.0 - 11.	OBM

Geology

Geology					
Formation	Est. Top (TVD)	Mineral Resources	Formation	Est. Top (TVD)	Mineral Resources
Rustler			Yeso		
Castile			Delaware (Lamar)	2665'	Oil/Natural Gas
Salt Top	325'	None	Bell Canyon		
Marker Bed 126			Cherry Canyon		
Salt Base	551'	None	Manzanita Marker		
Yates	801'	Oil/Natural Gas	Basal Brushy Canyon		
Seven Rivers			Bone Spring	5089'	Oil/Natural Gas
Queen			1st Bone Spring	6471'	Oil/Natural Gas
Capitan	1083'	Usable Water	2nd Bone Spring	7170'	Oil/Natural Gas
Grayburg			3rd Bone Spring	8529'	Oil/Natural Gas
San Andres			Wolfcamp	8828'	Oil/Natural Gas

All casing strings will be tested in accordance with 43 CFR Part 3170 Subpart 3172. Must have table for contingency casing.

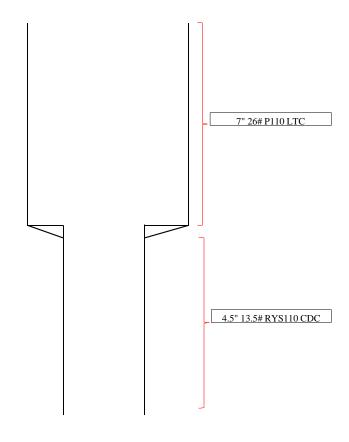
	Y or N
Is casing new? If used, attach certification as required in Onshore Order #1	Y
Is casing API approved? If no, attach casing specification sheet.	Y
Is premium or uncommon casing planned? If yes attach casing specification sheet.	Y
Does the above casing design meet or exceed BLM's minimum standards?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

Mewbourne Oil Company, Utah 17/18 Fed Com 712H

Sec 17, T21S, R27E SHL: 1690' FNL & 205' FEL (Sec 17) BHL: 660' FNL & 100' FWL (Sec 18)

Casing Design C

Hole Size	From	То	Csg. Size	#/ft	Grade	Conn.	SF Collapse	SF Burst	SF Jt Tension	SF Body Tension
8.75	0'	8449'		7" 26# P	110 LTC		1.38	2.21	3.15	3.78
8.5	8449'	19148'	4.5" 13	3.5# RYS	110 CDC	HTQ	2	2.32	14.08	13.89



PECOS DISTRICT DRILLING CONDITIONS OF APPROVAL

OPERATOR'S NAME: MEWBOURNE OIL COMPANY
WELL NAME & NO.: UTAH 17/18 FED COM 712H
APD ID: 10400097139
LOCATION: Section 17, T21S, R27E. NMP.
COUNTY: Eddy County, New Mexico ▼

Changes approved through engineering via **Sundry 2818925** on 10/30/2024. Any previous COAs not addressed within the updated COAs still apply.

COA

H_2S	0	No	•	Yes
Potash /	None	Secretary	© R-111-Q	☐ Open Annulus
WIPP				\square WIPP
Cave / Karst	C Low	Medium	C High	Critical
Wellhead	Conventional	Multibowl	O Both	Diverter
Cementing	☐ Primary Squeeze	☐ Cont. Squeeze	☐ EchoMeter	DV Tool
Special Req	Capitan Reef	☐ Water Disposal	✓ COM	Unit
Waste Prev.	C Self-Certification	C Waste Min. Plan	APD Submitted p	prior to 06/10/2024
Additional	▼ Flex Hose	☐ Casing Clearance	☐ Pilot Hole	Break Testing
Language	☐ Four-String	Offline Cementing	☐ Fluid-Filled	

SEE ORIGINAL COA FOR ALL OTHER REQUIREMENTS.

Note: The conductor pipe shall be set at approximately 200 ft. and cemented to surface to protect any potential fresh water. Surface casing interval shall be drilled with spud mud or water-based mud, switch to brine only if Salt is encountered.

A. CASING DESIGN

- 1. The 13-3/8 inch surface casing shall be set at approximately 1000 ft. and cemented to the surface. Rustler is at surface; BLM accepts Tansill/Yates as competent bed for surface casing set point for this well. If salt is encountered, set casing at least 25 ft. above the salt.
 - a. If cement does not circulate to the surface, the appropriate BLM office shall be notified and a temperature survey utilizing an electronic-type temperature survey with surface log readout will be used or a cement bond log shall be run to verify the top of the cement. Temperature survey will be run a minimum of six hours after pumping cement and ideally between 8-10 hours after completing the cement job.

- b. Wait on cement (WOC) time for a primary cement job will be a minimum of <u>8</u> hours or 500 psi 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 psi compressive strength, whichever is greater.
- d. If cement falls back, remedial cementing will be done prior to drilling out that string.
- 2. The 9-5/8 inch intermediate casing shall be set in a competent bed at approximately 2,590 ft. The minimum required fill of cement behind the 9-5/8 inch intermediate casing is:

Option 1 (Single Stage): Cement to surface. If cement does not circulate see B.1.a, c-d above. Wait on cement (WOC) time for a primary cement job is to include the lead cement slurry due to **cave/karst, and Capitan Reef.**

Option 2 (**Two-Stage**): The operator has proposed utilize a DV tool. Operator may adjust depth of DV tool if needed, adjust cement volumes accordingly. The DV tool may be cancelled if cement circulates to surface on the first stage.

- a. **First stage to DV tool:** Cement to circulate. If cement does not circulate off the DV tool, contact the appropriate BLM office before proceeding with second stage cement job.
- b. Second stage above DV tool: Cement to surface. If cement does not circulate see B.1.a, c-d above. Wait on cement (WOC) time for a primary cement job is to include the lead cement slurry due to cave/karst, and Capitan Reef.

Note: Excess cement for the 2^{nd} stage is below 25%, More cement might be needed.

- ❖ In <u>Capitan Reef Areas</u> if cement does not circulate to surface on the first two casing strings, the cement on the 3rd casing string must come to surface.
- ❖ In Medium Cave/Karst Areas if cement does not circulate to surface on the first two casing strings, the cement on the 3rd casing string must come to surface.
- ❖ Special Capitan Reef requirements. If lost circulation (50% or greater) occurs below the Base of the Salt, the operator shall do the following:
 (Use this for 3 string wells in the Capitan Reef, if 4 string well ensure FW based mud used across the Capitan interval)

- Switch to freshwater mud to protect the Capitan Reef and use freshwater mud until setting the intermediate casing. The appropriate BLM office is to be notified for a PET to witness the switch to fresh water.
- Daily drilling reports from the Base of the Salt to the setting of the intermediate casing are to be submitted to the BLM CFO engineering staff via e-mail by 0800 hours each morning. Any lost circulation encountered is to be recorded on these drilling reports. The daily drilling report should show mud volume per shift/tour. Failure to submit these reports will result in an Incidence of Non-Compliance being issued for failure to comply with the Conditions of Approval. If not already planned, the operator shall run a caliper survey for the intermediate well bore and submit to the appropriate BLM office.
- **3.** Operator has proposed to set **7** x **4-1/2** in. tapered production casing at approximately **19,148** ft. (8,822 ft. TVD). The minimum required fill of cement behind the tapered production casing is:
 - Cement should tie-back at least 200 feet into previous casing string or **50 ft. above Capitan reef top**, whichever is greater. Operator shall provide method of verification.

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)

Contact Eddy County Petroleum Engineering Inspection Staff:

Email or call the Carlsbad Field Office, 620 East Greene St., Carlsbad, NM 88220; **BLM_NM_CFO_DrillingNotifications@BLM.GOV**; (575) 361-2822.

- 1. Unless the production casing has been run and cemented or the well has been properly plugged, the drilling rig shall not be removed from over the hole without prior approval.
 - a. In the event the operator has proposed to drill multiple wells utilizing a skid/walking rig. Operator shall secure the wellbore on the current well, after installing and testing the wellhead, by installing a blind flange of like pressure rating to the wellhead and a pressure gauge that can be monitored while drilling is performed on the other well(s).
 - b. When the operator proposes to set surface casing with Spudder Rig
 - i. Notify the BLM when moving in and removing the Spudder Rig.

- ii. Notify the BLM when moving in the 2nd Rig. Rig to be moved in within 90 days of notification that Spudder Rig has left the location.
- iii. BOP/BOPE test to be conducted per **43 CFR 3172** as soon as 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 doghouse or stairway area.
- **3.** For intervals in which cement to surface is required, cement to surface should be verified with a visual check and density or pH check to differentiate cement from spacer and drilling mud. The results should be documented in the driller's log and daily reports.

A. CASING

- 1. Changes to the approved APD casing program need prior approval if the items substituted are of lesser grade or different casing size or are Non-API. The Operator can exchange the components of the proposal with that of superior strength (i.e. changing from J-55 to N-80, or from 36# to 40#). Changes to the approved cement program need prior approval if the altered cement plan has less volume or strength or if the changes are substantial (i.e. Multistage tool, ECP, etc.). The initial wellhead installed on the well will remain on the well with spools used as needed.
- 2. Wait on cement (WOC) for Potash Areas: After cementing but before commencing any tests, the casing string shall stand cemented under pressure until both of the following conditions have been met: 1) cement reaches a minimum compressive strength of 500 psi for all cement blends of both lead and tail cement, 2) until cement has been in place at least 8 hours. WOC time will be recorded in the driller's log. The casing integrity test can be done (prior to the cement setting up) immediately after bumping the plug.
- 3. Wait on cement (WOC) for Water Basin: After cementing but before commencing any tests, the casing string shall stand cemented under pressure until both of the following conditions have been met: 1) cement reaches a minimum compressive strength of 500 psi at the shoe, 2) until cement has been in place at least 8 hours. WOC time will be recorded in the driller's log. See individual casing strings for details regarding lead cement slurry requirements. The casing integrity test can be done (prior to the cement setting up) immediately after bumping the plug.

- **4.** Provide compressive strengths including hours to reach required 500 pounds compressive strength prior to cementing each casing string. Have well specific cement details onsite prior to pumping the cement for each casing string.
- **5.** No pea gravel permitted for remedial or fall back remedial without prior authorization from the BLM engineer.
- **6.** On that portion of any well approved for a 5M BOPE system or greater, a pressure integrity test of each casing shoe shall be performed. Formation at the shoe shall be tested to a minimum of the mud weight equivalent anticipated to control the formation pressure to the next casing depth or at total depth of the well. This test shall be performed before drilling more than 20 feet of new hole.
- 7. If hardband drill pipe is rotated inside casing, returns will be monitored for metal. If metal is found in samples, drill pipe will be pulled and rubber protectors which have a larger diameter than the tool joints of the drill pipe will be installed prior to continuing drilling operations.
- **8.** Whenever a casing string is cemented in the R-111-Q potash area, the NMOCD requirements shall be followed.

B. PRESSURE CONTROL

- 1. All blowout preventer (BOP) and related equipment (BOPE) shall comply with well control requirements as described in 43 CFR 3172.
- 2. If a variance is approved for a flexible hose to be installed from the BOP to the choke manifold, the following requirements apply: The flex line must meet the requirements of API 16C. Check condition of flexible line from BOP to choke manifold, replace if exterior is damaged or if line fails test. Line to be as straight as possible with no hard bends and is to be anchored according to Manufacturer's requirements. The flexible hose can be exchanged with a hose of equal size and equal or greater pressure rating. Anchor requirements, specification sheet and hydrostatic pressure test certification matching the hose in service, to be onsite for review. These documents shall be posted in the company man's trailer and on the rig floor.
- **3.** 5M or higher system requires an HCR valve, remote kill line and annular to match. The remote kill line is to be installed prior to testing the system and tested to stack pressure.
- **4.** If the operator has proposed a multi-bowl wellhead assembly in the APD. The following requirements must be met:
 - i. Wellhead shall be installed by manufacturer's representatives, submit documentation with subsequent sundry.
 - ii. If the welding is performed by a third party, the manufacturer's representative shall monitor the temperature to verify that it does not exceed the maximum temperature of the seal.

- iii. Manufacturer representative shall install the test plug for the initial BOP test.
- iv. Whenever any seal subject to test pressure is broken, all the tests in 43 CFR 3172.6(b)(9) must be followed.
- v. If the cement does not circulate and one-inch operations would have been possible with a standard wellhead, the well head shall be cut off, cementing operations performed and another wellhead installed.
- **5.** The appropriate BLM office shall be notified a minimum of 4 hours in advance for a representative to witness the tests.
 - i. In a water basin, for all casing strings utilizing slips, these are to be set as soon as the crew and rig are ready and any fallback cement remediation has been done. The casing cut-off and BOP installation can be initiated four hours after installing the slips, which will be approximately six hours after bumping the plug. For those casing strings not using slips, the minimum wait time before cut-off is eight hours after bumping the plug. BOP/BOPE testing can begin after cut-off or once cement reaches 500 psi compressive strength (including lead cement), whichever is greater. However, if the float does not hold, cut-off cannot be initiated until cement reaches 500 psi compressive strength (including lead when specified).
 - ii. In potash areas, for all casing strings utilizing slips, these are to be set as soon as the crew and rig are ready and any fallback cement remediation has been done. For all casing strings, casing cut-off and BOP installation can be initiated at twelve hours after bumping the cement plug. The BOPE test can be initiated after bumping the cement plug with the casing valve open. (Only applies to single stage cement jobs, prior to the cement setting up.)
 - iii. The tests shall be done by an independent service company utilizing a test plug not a cup or J-packer and can be initiated immediately with the casing valve open. The operator also has the option of utilizing an independent tester to test without a plug (i.e. against the casing) pursuant to **43 CFR 3172** with the pressure not to exceed 70% of the burst rating for the casing. Any test against the casing must meet the WOC time for 8 hours or 500 pounds compressive strength, whichever is greater, prior to initiating the test (see casing segment as lead cement may be critical item).
 - iv. The test shall be run on a 5000-psi chart for a 2-3M BOP/BOP, on a 10000 psi chart for a 5M BOP/BOPE and on a 15000 psi chart for a 10M BOP/BOPE. If a linear chart is used, it shall be a one-hour chart. A circular chart shall have a maximum 2-hour clock. If a twelve hour or twenty-four-hour chart is used, tester shall make a notation that it is run with a two hour clock.
 - v. The results of the test shall be reported to the appropriate BLM office.

- vi. All tests are required to be recorded on a calibrated test chart. A copy of the BOP/BOPE test chart and a copy of independent service company test will be submitted to the appropriate BLM office.
- vii. The BOP/BOPE test shall include a low-pressure test from 250 to 300 psi. The test will be held for a minimum of 10 minutes if test is done with a test plug and 30 minutes without a test plug. This test shall be performed prior to the test at full stack pressure.
- viii. BOP/BOPE must be tested by an independent service company within 500 feet of the top of the Wolfcamp formation if the time between the setting of the intermediate casing and reaching this depth exceeds 20 days. This test does not exclude the test prior to drilling out the casing shoe as per 43 CFR 3172.

C. DRILLING MUD

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

D. WASTE MATERIAL AND FLUIDS

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

SA 10/30/2024

Mewbourne Oil Company, Utah 17/18 Fed Com 712H Sec 17, T21S, R27E

SHL: 1690' FNL 205' FEL (Sec 17) BHL: 660' FNL 100' FWL (Sec 18)

		Casing Pro	gram Design	С		BLM Minimum Safety Factors	1.125	1.0	1.6 Dry	1.6 Dry
									1.8 Wet	1.8 Wet
String	Hole Size	Top MD	Top TVD	Bot MD	Bot TVD	Csg. Size	SF Collapse	SF Burst	SF Jt Tension	SF Body Tension
Surface	17.5"	0'	0'	1000'	1000'	13.375" 48# H40 STC	1.72	3.87	6.71	11.27
Intermediate	12.25"	0'	0'	2590'	2590'	9.625" 36# J55 LTC	1.75	3.04	4.86	6.05
Production	8.75"	0'	0'	8449'	8371'	7" 26# P110 LTC	1.38	2.21	3.15	3.78
Production	8.5"	8449'	8371'	10699'	8822'	4.5" 13.5# P110 LTC	1.99	2.32	11.13	13.89

Cement Program

Casing		# Sacks	Wt. lb/gal	Yield ft ³ /sack	TOC/BOC	Volume ft ³	% Excess	Slurry Description
13.375 in	LEAD	530	12.5	2.12	0' - 808'	1130	100%	Class C: Salt, Gel, Extender, LCM
13.373 III	TAIL	200	14.8	1.34	808' - 1000'	268	100%	Class C: Retarder
1st Stg 9.625 in	LEAD	160	12.5	2.12	1058' - 1915'	340	25%	Class C: Salt, Gel, Extender, LCM
18t Stg 9.025 III	TAIL	200	14.8	1.34	1915' - 2590'	268	2,370	Class C: Retarder
2nd Stg 9.625 in	LEAD	130	12.5	2.12	0' - 716'	280	250/	Class C: Salt, Gel, Extender, LCM
2110 Stg 9.025 III	TAIL	100	14.8	1.34	716' - 1058'	134	25%	Class C: Retarder
7 in - 4.5 in	LEAD	820	12.5	2.12	1033' - 7139'	1740	25%	Class C: Salt, Gel, Extender, LCM, Defoamer
/ III - 4.5 III	TAIL	1850	13.5	1.85	7139' - 19148'	3423	23%	Class H: Retarder, Fluid Loss, Defoamer

Design A - Mud Program

Depth	Mud Wt	Mud Type
	8.4 - 8.6	
0' - 1000'	8.4 - 8.6	Fresh Water
1000' - 2590'	10.0 - 10.2	Brine
2590' - 8449'	8.6 - 9.5	Cut-Brine
8449' - 19148'	10.0 - 11.	OBM

Geology

Geology					
Formation	Est. Top (TVD)	Mineral Resources	Formation	Est. Top (TVD)	Mineral Resources
Rustler			Yeso		
Castile			Delaware (Lamar)	2665'	Oil/Natural Gas
Salt Top	325'	None	Bell Canyon		
Marker Bed 126			Cherry Canyon		
Salt Base	551'	None	Manzanita Marker		
Yates	801'	Oil/Natural Gas	Basal Brushy Canyon		
Seven Rivers			Bone Spring	5089'	Oil/Natural Gas
Queen			1st Bone Spring	6471'	Oil/Natural Gas
Capitan	1083'	Usable Water	2nd Bone Spring	7170'	Oil/Natural Gas
Grayburg			3rd Bone Spring	8529'	Oil/Natural Gas
San Andres			Wolfcamp	8828'	Oil/Natural Gas

All casing strings will be tested in accordance with 43 CFR Part 3170 Subpart 3172. Must have table for contingency casing.

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

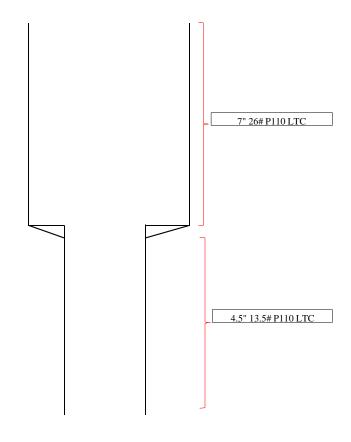
Mewbourne Oil Company, Utah 17/18 Fed Com 712H

Sec 17, T21S, R27E SHL: 1690' FNL & 205' FEL (Sec 17)

BHL: 660' FNL & 100' FWL (Sec 18)

Casing Design C

	Hole Size	From	То	Csg. Size	#/ft	Grade	Conn.	SF Collapse	SF Burst	SF Jt Tension	SF Body Tension
Γ	8.75	0'	8449'	7" 26# P110 LTC			1.38	2.21	3.15	3.78	
Γ	8.5	8449'	10699'	4.5" 13.5# P110 LTC			1.99	2.32	11.13	13.89	



Mewbourne Oil Company

Sundry Request:

Mewbourne Oil Company request that the following change be made to the Utah 17/18 Fed Com 712H (APD ID: 10400097139):

- 1. Change casing design from 4-string to 3-string. Any potential fresh water will be protected by conductor casing set to 200'. During spud operations/surface casing interval, fresh water will be used unless salt is encountered, in which case brine will be used.
- 2. Change lateral hole size from 6.125" to 8.50".
- 3. Change Production and Liner casing to a tapered 7"-to-4.5" long string.
- 4. Please see attached: CsgAssumptions.

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

General Information Phone: (505) 629-6116

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

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

CONDITIONS

Action 409425

CONDITIONS

Operator:	OGRID:
MEWBOURNE OIL CO	14744
P.O. Box 5270	Action Number:
Hobbs, NM 88241	409425
	Action Type:
	[C-103] NOI Change of Plans (C-103A)

CONDITIONS

Created By	Condition	Condition Date
andrew.fordyce	None	7/1/2025