Form 3160-3 (July 1992)

Drilling Plan

UNITED STATES DEPARTMENT OF THE INTERIOR

BUREAU OF LAND MANAGEMENT

N. M. Oil SUBMIT IN TRIP TE (Other instructions SERIOR 811 S. 1817 S.

ARTESIA, NM 88210-2834

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5. LEASE DESIGNATION AND SIERIAL NO.

NMNM 680393

FORM APPROVED	
OMB NO. 1004-C136	
pires: February 28, 1995	

DRILL D. TYPE OF WORK b. TYPE OF WELL OIL GAS WELL D.		DEEPEN			7. UNIT AGREEMENT NAME	
OIL GAS WELL 2. NAME OF OPERATOR	OTHER				7. UNIT AGREEMENT NAME	
	· · · · · · · · · · · · · · · · · · ·		SINGLE ZONE	MULTIPLE ZONE	8 FARM OR LEASE NAME, WEL	
Membourne On Company	14744				Fren 7 Federal #	2
3. ADDRESS AND TELEPHONE NO.	14744 V				30-015-	51264
PO Box 5270, Hobbs, Ne	10. FIELD AND POOL, OR WILD					
4. LOCATION OF WELL (Report location	****		note *1		Norht Shugart Mor	row
At surface 990' FNL & 1980		will ally state requirem	якэ.) Д	FO.	11. SEC , T., R., M., OR BLK.	
At proposed prod. zone ,	1		. 1966	LOE/WED	AND SURVEY OR AREA	
Same (Init B			-4RIFSIA	Sec. 7 T-18S R-3	1E
14. DISTANCE IN MILES AND DIRECTION	ON FROM NEAREST TO	VN OR POST OFFICE*			12. COUNTY OR PARISH 13	. STATE
6 Miles SE of Loco Hills,	New Mexico				Eddy	NM
15. DISTANCE FROM PROPOSED* LOCATION TO NEAREST			16. NO. OF ACRES IN LEASE	17. NO. OF TO THE	ACRES ASSIGNED S WELL	
PROPERTY OR LEASE LINE, FT (Also to nearest drig, unit line, if any)	t	660'	320		320	
18. DISTANCE FROM PROPOSED LOC TO NEAREST WELL, DRILLING, CO	MOLETED		19. PROPOSED DEPTH	20. ROTAR	Y OR CABLE TOOLS	
OR APPLIED FOR, ON THIS LEASE		330'	12200		Rotary	
21. ELEVATIONS (Show whether DF, RT	r, GR, etc.)				22. APPROX. DATE WORK WI	LL START*
365 0					07/20/00	
23.	-	PROPOSED CASI	NG AND CEME	PAN-CONTR	OLLED WATER IN	
SIZE OF HOLE GRA	IZE OF HOLE GRADE, SIZE OF CASING WEIGHT P		ER FOOT SETTING DEPTH		QUANTITY OF CEMENT	
17 1/2	H-40 13 3/8	48#	600		Circl to Suite 125	
12 1/4	J-55 9 5/8	36#	4500		Tie into 13 3/8 čšģ	TO YOU
8 3/4	N-80 5 1/2	17#	12200		1000' above upper most	zones

Mewbourne Oil Company proposes to drill a well sufficient to test the Morrow formation for Hydrocarbon production. If successful, 5 1/2" casing will be set to total depth. If the test proves to be noncommercial, the well will be plugged and abandoned in a manner consistent with regulations. Specific plans are presented in the following attachments.

Surface Use & Op	Jeralion Flan	
Exhibit #1	Location & Elevation Plat	
Exhibit #2 & 2A	Schematic of BOP & Choke Manifold	
Exhibit #3 &3A	Plat of Exisiting Road.	APPROVAL SUBJECT TO
Exhibit #4	List of wells in Immediate Vicinity	
Exhibit #5	Schematic of Drilling Rig	GENERAL REQUIREMENTS AND
Exhibit #6	Schematic of Proposed Production Facility	SPECIAL STIPULATIONS
Exhibit #7	H2S Contingency Plan	ATTACHE

IN ABOVE SPACE DESCRIBE PROGRAM: If proposal is to deepen, give data on present productive zone and proposed new productive zone. If proposal is to drill or deepen directionally, give pertinent data on subsurface locations and measured and true vertical depths. Give blowout preventer program, if any. 24 DATE 06/19/00 District Manager APPROVAL DATE PERMIT NO. Application approval does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon CONDITIONS OF APPROVAL, IF ANY:

/S/L	AR	RY	D.	BR	ΑY

Assistant Field Manager,

APPROVED BY

Lands And Minerals

APPROVED FOR 1 YEAR

ROSWELL, NM JUN 21 2000 AECEIVED

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<u>Drilling Program</u> Mewbourne Oil Company

Fren 7 Federal Com #2 990' FNL & 1980' FEL Section 8 T-18S R-31E Eddy County, New Mexico Lease Number NMNM-680393



1. The estimated top of geological markers are as follows:

1886'
3022'
3240'
3724'
4370'
5121'
7240'
7822'
8728'
9040'
10626'
10918'
11470'

2. Estimated depths of anticipated fresh water, oil, or gas:

Water

Approximately 200'

Hydrocarbons

All zones below San Andres

3. Pressure control equipment:

Two thousand psi working pressure annular BOP's will be installed on the 13-3/8" surface casing. Pressure tests will be conducted prior to drilling out under all casing strings. BOP controls will be installed prior to drilling under surface casing and will remain in use until completion of drilling operations. BOP's will be inspected and operated daily to insure mechanical integrity and the inspection will be recorded on the daily drilling report.

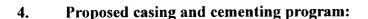
Kelly cock and a sub equipped with a full opening valve sized to fit the drill pipe and collars will be available on the rig floor in the open position when the kelly is not in use.

Drilling Program

Mewbourne Oil Company

Fren 7 Federal Com #2

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A. Casing Program:

Hole Size	Casing	Wt/Ft.	<u>Grade</u>	<u>Depth</u>
17-1/2"	13-3/8"	48#	H40	0-600'
12-1/4"	9-5/8"	36#	J55	0-4500'
8-3/4"	5-1/2"	17#	N80	0-12200'

Minimum casing design factors: Collapse 1.125, Burst 1.0, Tensile strength 1.8.

B. Cementing Program

- i. Surface Casing: 200 sacks Class "C" light cement containing ½ #/sk cellophane flakes, 3% CaCl, 5 lbs/sack gilsonite. 200 sacks Class "C" penmen containing 3% CaCl.
- ii. <u>Intermediate Casing:</u> 900 sacks 35:65 pozmix cement containing 6% gel, 5 lbs/sack gilsonite. 200 sacks Class "C" cement containing 2% CaCl.
- iii. Production Casing: 600 sacks Class "H" cement containing fluid loss additive, friction reducer additive, compressive strength enhancer, and NaCl. Shallower productive zones may be protected by utilizing and multiple stage cementing tool in the production casing below potentially productive zones and cementing with a light cement slurry.

5. Mud Program:

Interval	Type System	<u>Weight</u>	Viscosity	Fluid Loss
0'-600'	FW spud mud	8.6-9.4	32-34	NA
600'-4500'	Brine water	10.0-10.2	28-30	NA
4500'-10700'	Cut brine water	8.8-9.2	28.30	NA
10700'-12200)' Cut brine water	9.2-9.8	32-42	8-12

6. Evaluation Program:

Samples:

10'samples from intermediate casing to TD

Logging:

Compensated density and dual laterlog from intermediate casing

to TD

Coring:

As needed for evaluation

Drill Stem Tests:

As needed for evaluation

^{*}Mewbourne Oil Company reserves the right to change cement designs as hole conditions may warrant.

Drilling Program Mewbourne Oil Company

Fren 7 Federal Com #2

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7. **Downhole Conditions**

Zones of abnormal pressure:

None anticipated

Zones of lost circulation:

Anticipated in surface and intermediate holes

Maximum bottom hole temperature: 180 degree F

Maximum bottom hole pressure:

8.3 lbs/gal gradient or less

Anticipated Starting Date: 8.

Mewbourne Oil Company intends to drill this well as soon as possible after receiving approval with approximately 35 days involved in drilling operations and an additional 10 days involved in completion operations on the project.

MULTI-POINT SURFACE USE AND OPERATIONS PLAN MEWBOURNE OIL COMPANY

Fren 7 Federal Com #2 990' FNL & 1980' FEL Section 7-T18S-R31E Eddy County, New Mexico Lease Number NMNM-680393

This plan is submitted with Form 3160-3, Application for Permit to Drill, Covering the above described well. The purpose of this plan is to describe the location of the proposed well, the proposed construction activities and operations plan, the magnitude of the surface disturbance involved, and the procedures to be followed in restoring the surface so that a complete appraisal can be made of the environmental impact associated with the proposed operations.

1. Existing Roads:

- A. Exhibit #3 is a road map showing the location of the proposed well. Exhibit #3A is a topographic map showing the location of the proposed well and access road. Existing roads are highlighted in yellow and proposed roads are highlighted in green.
- B. Directions to location: East from Loco Hills on Highway 82 approximately 5 miles turn south on Eddy County Road #222 (Shugart Road). Go south approximately 3 miles and turn right on caliche road. Go west 1 mile. Turn left and go south ¼ mile. Turn right and go 1 mile. Turn left & go 1/4 mile. Turn right & go ½ mile. Turn left to location.

2. Proposed Access Road:

- A No new road is needed. Enter the location pad from the Southeast corner.
- B. Access to location has an existing grade to facilitate adequate drainage.

3. Location of Existing Wells:

There are producing wells within the immediate vicinity of the well site. Exhibit #4 shows the proposed well and existing wells within a one mile radius.

4. Location of Existing and/or Proposed Facilities:

- A. There are no production facilities on this lease at the present time.
- B. In the event that the well is productive, production facilities will be located on the well pad.
- C. If the well is productive, restoration plans are as follows:

MULTI-POINT SURFACE USE AND OPERATIONS PLAN

MEWBOURNE OIL COMPANY

Fren 7 Federal Com #2 Page 2

- i. The reserve pit will be back-filled after the contents of the pit are allowed to dry (within 180 days after the well is completed).
- ii. Within 90 days of cessation of drilling and completion operations, all equipment not necessary for production operations will be removed. The location will be cleaned of all trash and junk to assure the well site is left as aesthetically pleasing as reasonably possible
- iii. All production vessels left on location will be painted to conform with BLM painting stipulations within 180 days of installation.

5. Location and Type of Water Supply

The well will be drilled with a combination of fresh water and brine water based mud systems. The water will be obtained from commercial suppliers in the area and hauled to the location by transport trucks over existing and proposed roads as indicated in Exhibit #3.

6. Source of Construction Materials

All material required for construction of the drill pad and access roads will be obtained from private, state, or federal pits. The construction contractor will be solely responsible for securing construction materials required for this operation and paying any royalties that may be required on those materials.

7. Methods of Handling Waste Disposal:

- A. Drill cuttings not retained for evaluation purposed will be disposed of in the reserve pit.
- B. Drilling fluids will be allowed to evaporate in the reserve pit prior to closure.
- C. Water produced during operations will be disposed of in the reserve pit.
- D. If any liquid hydrocarbons are produced during operations, those liquids will be stored in suitable tanks until sold.
- E. Current regulations regarding the proper disposal of human waste will be followed.
- F. All trash, junk, and other waste materials will be stored in proper containers to prevent dispersal and will be removed to an appropriate facility within one week of cessation of drilling and completion activities.

8. Ancillary Facilities

There are no ancillary facilities within the immediate vicinity of the proposed well site.

MULTI-POINT SURFACE USE AND OPERATIONS PLAN

MEWBOURNE OIL COMPANY

Fren 7 Federal Com #2

Page 3

9. Well Site Layout

- A diagram of the drill pad is shown in Exhibit #5. Dimensions of the pad, pits, and location of major rig components are shown.
- B. The reserve pit will be lined with a high quality plastic sheeting to prevent migration of fluids.
- C. The pad dimension of 400' X 400' has been staked and flagged.
- D. An archaeological survey has been conducted on the proposed access road and location pad.

10. Plans for Restoration of Surface

- A. Upon cessation of the proposed operations, if the well is abandoned, the location and road will be ripped and re-seeded per BLM guidelines. The reserve pit area, after allowing to dry will be leveled. The entire location will be restored to the original contour as much as reasonable possible. All trash, garbage, and pit lining will be hauled to appropriate disposal to assure the location is aesthetically pleasing as reasonable possible. All restoration work will be completed within 180 days of cessation of activities.
- B. The disturbed area will be restored by re-seeding during the proper growing season with a mixture of native grasses as stipulated by the BLM.
- C. Three sides of the reserve pit will be fenced prior to and during drilling operations. The reserve pit will be fenced on the fourth side after the drilling rig is removed to prevent the endangerment of livestock. The fence will remain in place until the pit area has been leveled and restored.
- D. Upon cessation of the proposed operations, if the well is not abandoned, the reserve pit area will be treated as outlined above within the prescribed amount of time. Any additional caliche required for production facilities will be obtained from a source as described in Section 6.

11. Surface Ownership:

The surface is owned by:

Bureau of Land Management

12. Other Information

- A. Topography: Refer to the archaeological report for a detailed description of flora, fauna, soil characteristics, dwellings, and historical or cultural sites.
- B. The primary use of the surface at the location is for grazing of livestock.

MULTI-POINT SURFACE USE AND OPERATIONS PLAN

MEWBOURNE OIL COMPANY

Fren 7 Federal Com #2 Page 4

13. Operator's Representative:

A. Through APD approval and drilling operations:

Mickey Young, District Manager Mewbourne Oil Company PO Box 5270 Hobbs, NM 88241 505-393-5905

B. Through completion and production operations:

Mickey Young, District Manager Mewbourne Oil Company PO Box 5270 Hobbs, NM 88241 505-393-5905

14. Certification

I hereby certify that I, or persons under my direct supervision, have inspected the proposed drill site and access route; that I am familiar with the conditions which currently exist; that the statements made in this plan are to the best of my knowledge, true and correct; and the work associated with the operations proposed herein will be performed by Mewbourne Oil Company, its contractors and subcontractors, in accordance with this plan and the terms and conditions under which it is approved. This statement is subject to the provisions of 18 U.S.C. 1001 for the filing of a false statement.

Date:	6/19/00	Signature: All you
Date		

N.M. Micky Young, District Manager Mewbourne Oil Company PO Box 5270 Hobbs, NM 88241 (505) 393-5905

Instruction on back Submit to Appropriate District Office

State Lease - 4 Copies Fee Lease - 3 Copies

DISTRICT II P.O. Drawer DD, Artonia, NM 88210

DISTRICT III 1000 Rio Brance Rd., Astec, NM 87410

OIL CONSERVATION DIVISION P.O. Box 2088 Santa Fe, New Mexico 87504-2088

☐ AMENDEI) REPORT

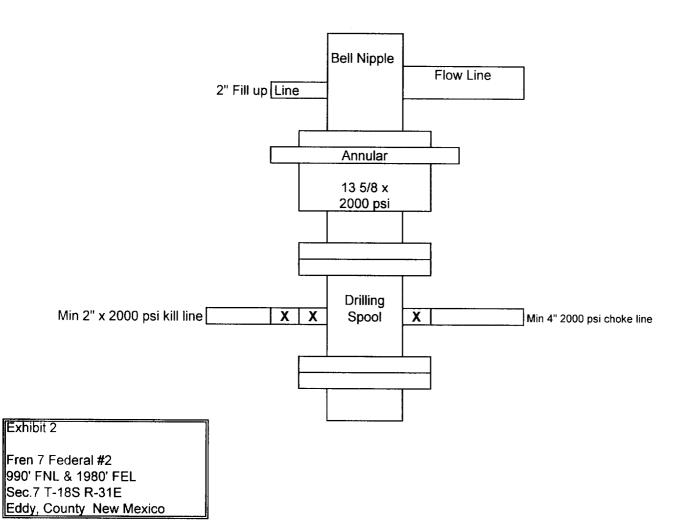
WELL LOCATION AND ACREAGE DEDICATION PLAT

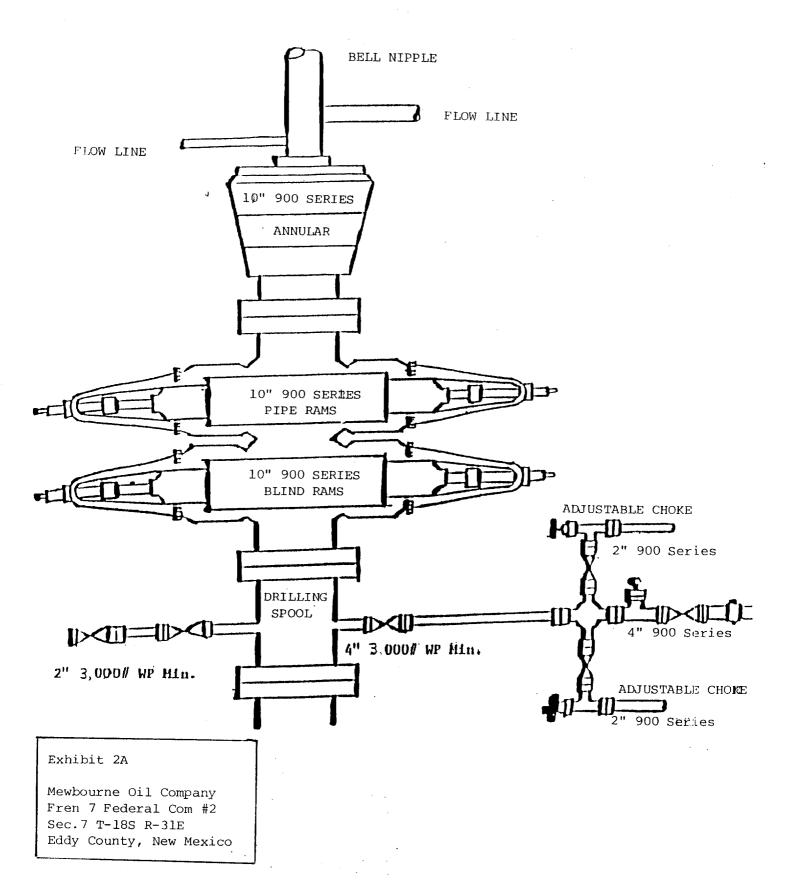
API	Number			Pool Code	Pool Name				
Property (ode		Property Name FREN "7" FEDERAL COM.					Well Number	
OGRID No).		Operator Name MEWBOURNE OIL COMPANY					Elevation 3650	
		1			Surface Loc	ation			
UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
B	7	185	31E		990	NORTH	1980	EAST	EDDY
		1	Bottom	Hole Loc	cation If Diffe	erent From Sur	face		
UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
Dedicated Acre	Joint	or Infill Co	nsolidation	Code Or	der No.	<u> </u>		<u> </u>	1

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

3655 3640 3653 3640	1980'	OPERATOR CERTIFICATION I hereby certify the the tylormation contained herein is true and complete to the best of my knowledge and belief. Signature
		Printed Name District Massingre Title L/18 000 Date SURVEYOR CERTIFICATION
		I hereby certify that the well location charm on this plat was plotted from field noise of actual surveys made by me or under my supervison, and that the mone is true and cerrect to the best of my belief. 6/05/2000 Date Surveysed Signature of Booth of
		Signature of Boat of O Profestional Silvegor (Constitution of the Constitution of the

Mewbourne Oil Company BOP Scematic for 12 1/4 Hole

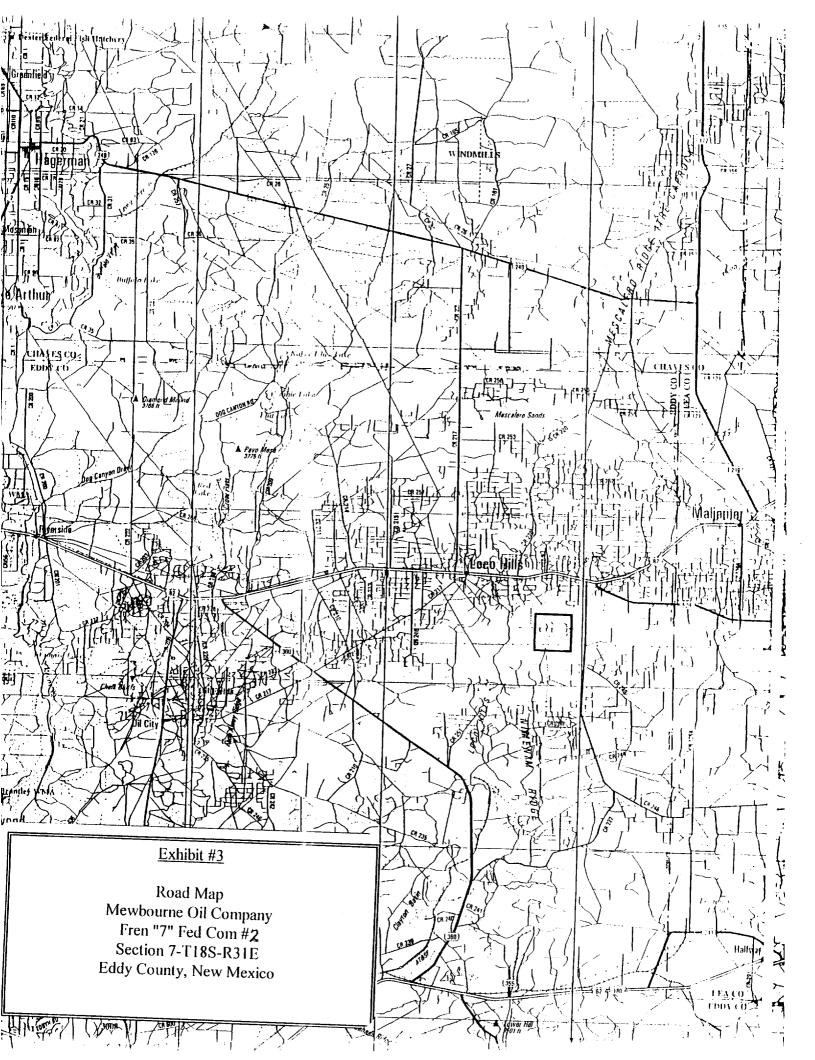




Notes Regarding Blowout Preventer Mewbourne Oil Company

Fren "7" Federal Com #2 990' FNL & 1980' FEL Section 7- T18S-R31E Eddy County, New Mexico Lease Number NMNM-680393

- 1. Drilling nipple (bell nipple) to be constructed so that it can be removed without the use of a welder through the opening of the rotary table, with minimum internal diameter equal to blowout preventer bore.
- 2. Blowout preventer and all fittings must be in good condition with a minimum 2000 psi working pressure in the big holes & 3000 psi in the production hole.
- 3. Safety valve must be available on the rig floor at all times with proper connections to install in the drill string. Valve must be full bore with minimum 3000 psi working pressure.
- 4. Equipment through which bit must pass shall be at least as large as internal diameter of the casing.
- 5. A kelly cock shall be installed on the kelly at all times.
- 6. Blowout preventer closing equipment to include and accumulator of at least 40 gallon capacity, two independent sources of pressure on closing unit, and meet all other API specifications.



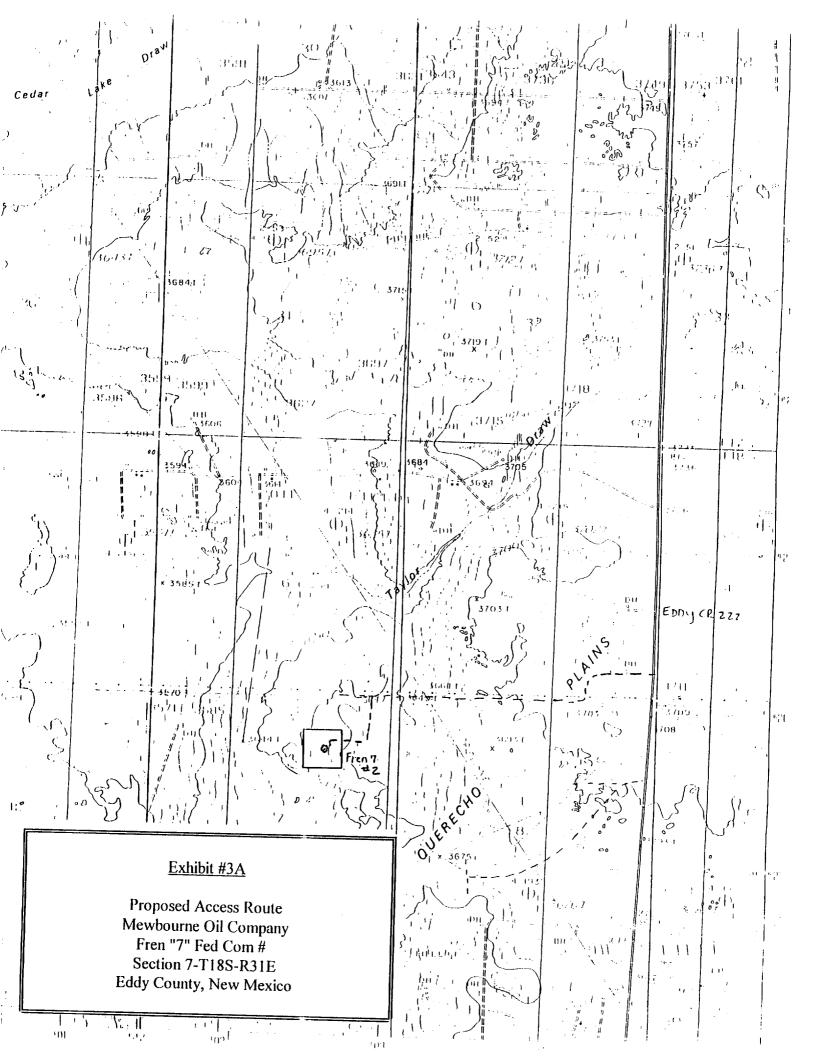


EXHIBIT #4

STATUS OF WELLS IN IMMEDIATE VICINITY

MEWBOURNE OIL COMPANY Fren "7" Federal Com #2 990' FNL & 1980' FEL Section 7-T18S-R31E

Eddy County, New Mexico Lease Number NMNM-33437, NMNM-680393

Section 7-T18S-R31E

Operator:

Mitchell Energy Corp.

Well Name: Unit Letter:

Allied "7" Fed #1

Status:

Producing oil well

Field:

North Shugart Bone Spring

Operator:

Mitchell Energy Corp.

Well Name:

Allied "7" Fed #2 Unit Letter:

Status:

Producing oil well

Field:

North Shugart Bone Spring

Operator:

Mitchell Energy Corp. Allied "7" Fed #3

Well Name:

Unit Letter: В

Status:

Producing oil well

Field:

North Shugart Bone Spring

Operator:

Mitchell Energy Corp. Allied "7" Fed #4

Well Name:

Unit Letter: Н

Status:

Producing oil well

Field:

North Shugart Bone Spring

Section 5-T18S-R31E

Operator:

Harvey E. Yates Co. Parker "5" Fed #1

Well Name: Unit Letter:

М :

Status:

Producing oil well

Field:

North Shugart Bone Spring

Operator:

Harvey E. Yates Co. Parker "5" Fed #2

Well Name: Unit Letter:

Status:

Producing oil well

Field:

North Shugart Bone Spring

Operator:

Harvey E. Yates Co. Parker "5" Fed #3

Well Name:

Unit Letter:

Producing oil well

Status: Field:

North Shugart Bone Spring

Operator:

Harvey E. Yates Co. Parker "5" Fed #4

Well Name:

Unit Letter:

Status:

Ν

Producing oil well

Field:

North Shugart Bone Spring

Operator: Well Name: Harvey E. Yates Co. Parker "5" Fed #5

Unit Letter:

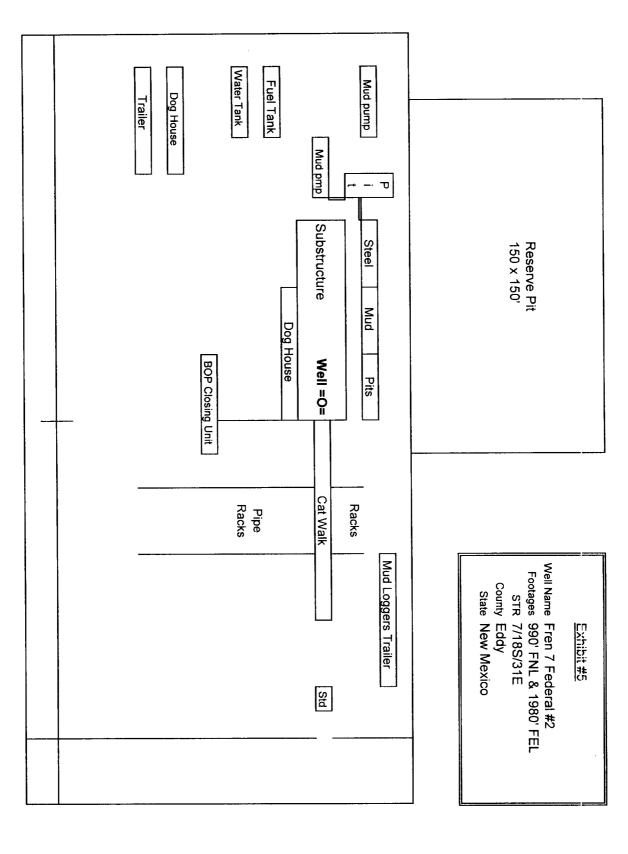
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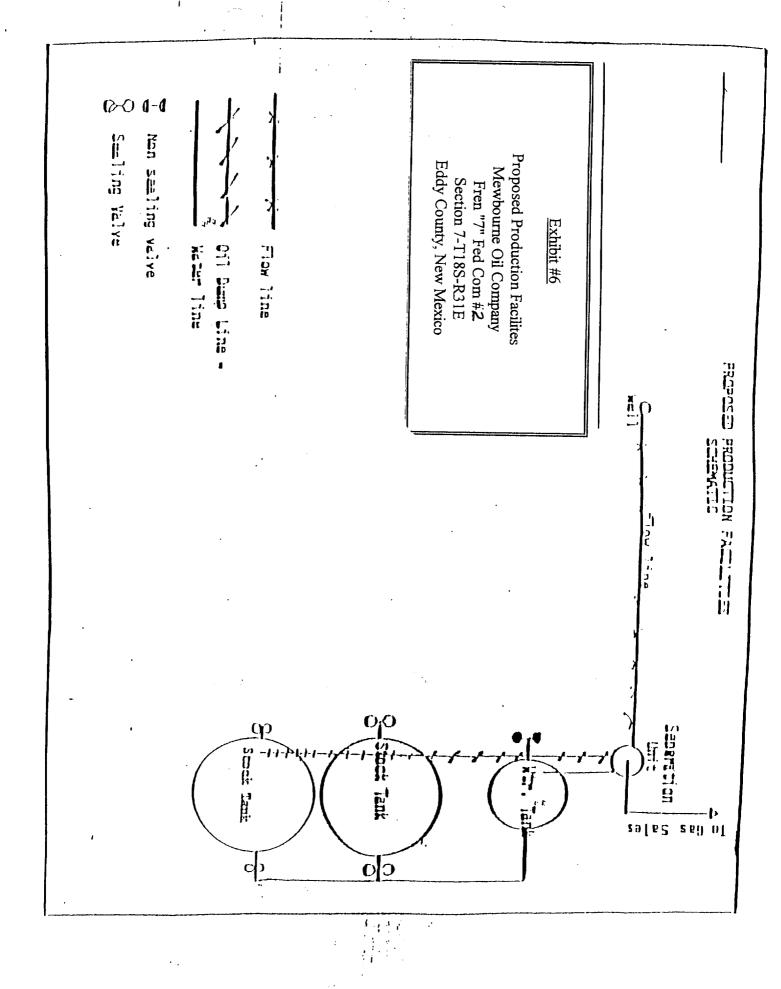
Producing oil well

Field:

North Shugart Bone Spring

Mewbourne Oil Company





Hydrogen Sulfide Drilling Operations Plan

Mewbourne Oil Company

Fren 7 Federal Com #2 990' FNL & 1980' FEL Section 7 T-18S R-31E Eddy County, New Mexico Lease Number NMNM 680393

1. Hydrogen Sulfide Training

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

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

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

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

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

2. Hydrogen Sulfide Safety Equipment and Systems

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

1. Well Control Equipment

- A. Flare line with automatic igniter or continuous ignition source.
- B. Choke manifold with minimum of one adjustable choke.
- C. Blowout preventers equipped with blind rams and pipe rams to accommodate all pipe sizes with properly sized closing unit
- D. Auxiliary equipment including rotating head and annular type blowout preventer..

2. Protective Equipment for Essential Personnel

Thirty minute self contained work unit located at briefing area as indicated on wellsite diagram.

3. Hydrogen Sulfide Protection and Monitoring Equipment

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

4. Visual Warning Systems

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

3. Mud Program

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

4. Metallurgy

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

5. Communications

- Communications in company vehicles and toolpushers are either two way radios or cellular phones.

6. Well Testing

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

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

Statement Accepting Responsibility for Operations

Operator Name:

Mewbourne Oil Company

Street or Box:

P.O. Box 5570

City, State:

Hobbs, New Mexico

Zip Code:

88241

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

Lease Number:

Lease Number NMNM-680393

Legal Description of Land:

Section 7, T18S, R31E, Eddy County, New Mexico. Located

990' FNL & 1980' FEL of Section 7.

Formation (if applicable):

Bond Coverage:

\$150,000

BLM Bond File:

NM1693, Nationwide

Authorized Signature: Name: NM (Micky) Young Title: District Manager

Date: June 18, 2000