

Form 3160-3
(December 1990)

If earthen pits are used in association with the drilling of this well, an OCD pit permit must be obtained prior to pit construction.

OCD-ARTESIA
SUBMIT IN TRIPLICATE*
(Other instructions on reverse side)

Form approved.
Budget Bureau No. 1004-0136
Expires: December 31, 1991

DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

APPLICATION FOR PERMIT TO DRILL OR DEEPEN

1a. TYPE OF WORK

DRILL ☒

DEEPEN ☐

b. TYPE OF WELL

OIL WELL ☐

GAS WELL ☒

OTHER

SINGLE ZONE ☒

MULTIPLE ZONE ☐

2. NAME OF OPERATOR

Fasken Oil and Ranch, Ltd.

3. ADDRESS AND TELEPHONE NO.

303 W. Wall, Suite 1800, Midland, TX 79701 (432) 687-1777

4. LOCATION OF WELL (Report location clearly and in accordance with any State requirements.)

At surface

710' FNL, 1160' FWL

At proposed prod. zone

14. DISTANCE IN MILES AND DIRECTION FROM NEAREST TOWN OR POST OFFICE*

12 miles Southwest of Lakewood

15. DISTANCE FROM PROPOSED* LOCATION TO NEAREST PROPERTY OR LEASE LINE, FT. (Also to nearest drig. salt line, if any)

18. DISTANCE FROM PROPOSED LOCATION* TO NEAREST WELL, DRILLING, COMPLETED, OR APPLIED FOR, ON THIS LEASE, FT.

21. ELEVATIONS (Show whether DF, RT, GR, etc.)

3844' GR

23.

PROPOSED CASING AND CEMENTING PROGRAM

Controlled Water Basin

SIZE OF HOLE	GRADE, SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT
17 1/2"	13 3/8", H-40	48#	400'	400 sx C
12 1/4"	9 5/8", J-55	36#	3000'	800 sx C
8 3/4"	4 1/2", N-80	11.6#	10,200'	1100 sx C

Fasken Oil and Ranch, Ltd. proposes to drill to a depth sufficient to test the Morrow formation. If productive, 4 1/2" casing will be set at TD and cemented back to approximately 6,000'. If non-commercial, the well will be plugged and abandoned in accordance with Federal regulations.

Drilling Program:

Surface Use and Operating Plan

Exhibit No. 1 - Area Maps

Exhibit No. 2 - One-Mile Radius Map

Exhibit No. 3 - Hydrogen Sulfide Drilling Operations Plan

Exhibit No. 4 - Well Site Layout

Exhibit No. 5 - Blowout Preventer Equipment

APPROVAL SUBJECT TO
GENERAL REQUIREMENTS AND
SPECIAL STIPULATIONS
ATTACHED

IN ABOVE SPACE DESCRIBE PROPOSED 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.

34.

SIGNATURE Jimmy D. Callie TITLE Regulatory Affairs Coordinator DATE 01/10/06

(This space for Federal or State office use)

PERMIT NO. _____ APPROVAL DATE _____

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:

ACTING

/s/ James Stovall

FIELD MANAGER

MAR 2 1 2006

APPROVED BY _____ TITLE _____ DATE _____

*See Instructions On Reverse Side

APPROVAL FOR 1 YEAR

Title 18 U.S.C. Section 1001, makes it a crime for any person knowingly and willfully to make to any department or agency of the

DISTRICT I

1625 N. French Dr., Hobbs, NM 88240

DISTRICT II

811 South First, Artesia, NM 88210

DISTRICT III

1000 Rio Brazos Rd., Artesia, NM 87410

DISTRICT IV

2040 South Pacheco, Santa Fe, NM 87505

State of New Mexico

Energy, Minerals and Natural Resources Department

Form C-102

Revised March 17, 1999

Submit to Appropriate District Office

State Lease - 4 Copies

Fee Lease - 3 Copies

OIL CONSERVATION DIVISION

2040 South Pacheco

Santa Fe, New Mexico 87504-2088

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

API Number	Pool Code 74640	Pool Name Cemetery Morrow
Property Code	Property Name MOBIL "10" FEDERAL	Well Number 2
OGRID No. 151416	Operator Name FASKEN OIL & RANCH, LTD.	Elevation 3844'

Surface Location

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
D	10	21 S	24 E		710	NORTH	1160	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

Dedicated Acres 320	Joint or Infill	Consolidation Code	Order No.
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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

	OPERATOR CERTIFICATION I hereby certify the the information contained herein is true and complete to the best of my knowledge and belief. Signature Jimmy D. Carlile Printed Name Regulatory Affairs Coord. Title 1/6/06 Date jimmye@forl.com	
	SURVEYOR CERTIFICATION I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my belief. OCTOBER 31, 2005 Date Surveyed Signature & Seal of Professional Surveyor Y.O. No. 5901 Certificate No. Gary L. Jones 7977 BASIN SURVEYS	

SURFACE USE PLAN

Fasken Oil and Ranch, Ltd.
Mobil "10" Federal No. 2
710' FNL & 1160' FWL
Sec. 10, T21S, R24E
Eddy County, New Mexico

1. EXISTING ROADS - Area map, Exhibit #1, is a reproduction of the U.S.G.S., Foster Ranch N.M. Quadrangle. Existing and proposed roads are shown on the exhibit. All roads shall be maintained in a condition equal to that which existed prior to start of construction.
 - A. Exhibit #1 shows the proposed development well site as staked.
 - B. From Carlsbad, New Mexico, travel North on U.S. Highway 285 for 15 miles. Turn West on White Pine road and go 7 miles. Turn Southeast on calchie road and go 2 miles to the location.
2. PLANNED ACCESS ROADS – 405' of new access road will be constructed and 5592' of existing ranch road will be improved.
3. LOCATION OF EXISTING WELLS IN A ONE-MILE RADIUS.
 - A. Water wells – Rancher well approximately ½ mile Southwest.
 - B. Disposal wells - None Known.
 - C. Drilling wells - None known.
 - D. Producing wells - As shown on Exhibit #2

Fasken Oil and Ranch, Ltd.:	Ross Federal No. 1
Fasken Oil and Ranch, Ltd.:	Skelly Federal No. 2
Fasken Oil and Ranch, Ltd.	Mobil "10" Federal No. 1
Yates Petroleum Corp.:	Bamboozled "BBX" Federal No. 2
Yates Petroleum Corp.:	Baffled "BCA" Federal No. 1
 - E. Abandoned wells - As shown on Exhibit #2.

Fasken Oil and Ranch, Ltd.:	Skelly Federal No. 3
Mobil	Federal Unit No. 1-V
4. If, upon completion, the well is a producer Fasken Oil and Ranch, Ltd. will furnish maps or plats showing "On Well Pad Facilities" and "Off Well Pad Facilities" (if needed) on a Sundry Notice before construction of these facilities starts.
5. LOCATION AND TYPE OF WATER SUPPLY

Fresh and Brine water will be purchased locally from a private source and trucked over the access roads.
6. SOURCE OF CONSTRUCTION MATERIALS

If needed, construction materials will be obtained from the drill sites excavations or from a local source. These materials will be transported over the access roads as shown on Exhibit #1.

7. METHOD FOR HANDLING WASTE DISPOSAL

- A.
 - 1. Drill cuttings will be disposed of in the reserve pit.
 - 2. Trash, waste paper, and garbage will be contained in a trash trailer and disposed of in an approved public landfill.
 - 3. All mud materials including salts will be picked up by the mud supplier and transported back to their warehouse facilities.
 - 4. Sewage from trailer houses will drain into hole with a minimum depth of 10'. A "Porta John" will be provided for the rig crews. This will be properly maintained and removed after drilling operations are completed.
 - 5. Chemicals remaining after completion of the well will be stored in the manufacturer containers and picked up by the supplier.
- B. Remaining drilling fluids will be allowed to evaporate in the reserve pit until the pit is dry enough for backfilling. In the event drilling fluids will not evaporate in a reasonable period of time, they will be transported by tank truck to a state approved disposal site.

Water produced during testing of the well will be disposed of in the reserve pit. Oil produced during the testing of the well will be stored in test tanks until sold and hauled from the site.

8. ANCILLARY FACILITIES

No camps or airstrips will be constructed.

9. WELL SITE LAYOUT

- A. Exhibit #3 is the H₂S Drilling Operations Plan.
- B. Exhibit #4 (Scale 1" = 50') shows the proposed well site layout.
- C. This exhibit indicates the proposed location of reserve pit, trash trailer and living facilities.
- D. Mud pits in the active circulation system will be steel pits.
- E. The reserve pit will be lined with a polyethylene liner. The pit liner will be a minimum of 2' over the reserve pit walls where the liner will be anchored down.
- F. The reserve pit will be fenced on three sides with four strands of barbed wire during drilling and completion operations. The fourth side will be fenced after drilling has been completed. If the well is a producer, the reserve pit fence will be torn down. The reserve pit and those areas of the location not essential to production facilities will be reclaimed and seeded per BLM requirements.

10. PLANS FOR RESTORATION OF SURFACE

Rehabilitation of the location and reserve pit will start in a timely manner after all drilling operations cease. The type of reclamation will depend on whether the well is a producer or a dry hole.

However, in either event, the reserve pit will be allowed to dry properly, and fluid removed and disposed of in accordance with Article 7.B as previously noted. The pit area will then be leveled and contoured to conform to the original and surrounding area. Drainage systems, if any, will be reshaped to the original configuration with provisions made to alleviate erosion. These may need to be modified in certain circumstances to prevent inundation of the location pad and surface facilities. After the area has been shaped and contoured, top soil from the spoil pile (if any) will be placed over the disturbed area to the extent possible. Revegetation procedures will comply with BLM standards.

If the well is a dry hole, the pad and road area will be recontoured to match the existing terrain. Topsoil will be spread to the extent possible. Revegetation will comply with BLM standards.

Should the well be a producer, the previously noted procedures will apply to those areas which are not required for production facilities.

11. OTHER INFORMATION

- A. The topography is of hilly terrain with vegetation of sagebrush and native grasses. The soils are silty and very shallow.
- B. The surface is used for livestock grazing. The surface is leased by Richard Howell, P.O. Box 94, Lakewood, NM 88256
- C. An archeological study over this location, road and proposed pipeline has been prepared and is attached herewith.
- D. There are no buildings of any kind in the area.

12. OPERATOR'S REPRESENTATIVE - Field representative for contact regarding compliance with the Surface Use Plan is:

Before, during & after Construction:

Tommy E. Taylor
303 W. Wall Ave., Suite 1800
Midland, Texas 79701-5116
(432) 687-1777

13. 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 exists; that the statements made in this plan are to the best of my knowledge, true and correct; and that the work associated with the operations proposed herein will be performed by Fasken Oil and Ranch, Ltd. and its contractors/subcontractors in conformity 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.

NAME: Tommy E. Taylor
DATE: 1/6/06
TITLE: Drilling and Production Engineer
TET
(Mobil10Fed2apd)

APPLICATION FOR PERMIT TO DRILL
FASKEN OIL AND RANCH, LTD.
MOBIL "10" FEDERAL NO. 2
710' FNL AND 1160' FWL
SEC. 10, T21S, R24E
EDDY COUNTY, NM

In conjunction with Form 3160-3, Application for Permit to Drill, Fasken Oil and Ranch, Ltd. submits the following items of pertinent information in accordance with Onshore Oil & Gas Order Nos. 1 & 2, and with all other applicable federal and state regulations.

1. The geologic surface formation is of Permian age.
2. Estimate tops of geologic markers are as follows:

San Andres	750'
Glorietta	2450'
Bone Springs	3400'
3 rd Bone Spring Sand	6400'
Wolfcamp	6500'
Cisco	7300'
Canyon	7600'
Strawn	8100'
Atoka	8900'
Morrow	9300'

3. The estimated depths at which water, oil or gas formation are expected to be encountered:

Cisco	7400'	Oil/Gas
Strawn	8100'	Gas
Atoka	8900'	Gas
Morrow	9300'	Gas

* Groundwater to be protected by 13-3/8" surface casing with cement circulated to the surface.
** Potentially productive horizons to be protected by 4-1/2" production casing with cement tied back to 6000'.

4. Proposed Casing Program:

<u>String</u>	<u>Footage</u>	<u>Size</u>	<u>Weight</u>	<u>Grade</u>	<u>Thread</u>
Surface	400'	13-3/8"	48.00#	H-40	ST&C
Intermediate	3,000'	9-5/8"	36.00#	J-55	ST&C
Production	10,200'	4-1/2"	11.60#	N-80	LT&C
Tubing	9,750'	2-3/8"	4.70#	N-80	EUE 8rd

5. Proposed Cementing Program:

Cement 13-3/8" casing with 400 sx Class "C" cement with 2% CaCl₂ (s.w. 14.8 ppg, yield 1.32 cuft/sx).

Cement 9-5/8" casing with 600 sx Class "C" with 4% gel and 2% CaCl₂ (s.w. 13.51 ppg, yield 1.74 ft³/sx) plus 200 sx Class "C" with 2% CaCl₂ (s.w. 14.8 ppg, yield 1.34 ft³/sx).

Cement 4-1/2" production casing (resin coated and centralized through pay zones) with 1100 sx Super "C" Modified (CSE) with 5% Salt, 0.6% FL-25 and 0.6% FL-52 (s.w. 13.2 ppg, yield 1.58 ft³/sx). Estimate TOC at 6000'.

6. Pressure Control Equipment: See exhibit #5. Operator request variance and proposes to pressure test BOP stack with rig pump to 1500 psig prior to drilling out the 9-5/8" casing shoe. BOP hydrotest will be conducted on first bit trip or prior to drilling the Wolfcamp formation. Operator requests variance and proposes to use only one ram type or annular type preventor to drill the intermediate hole to 3000'.

7. Mud Program:

<u>Depth</u>	<u>Type</u>	<u>Weight</u>	<u>Viscosity</u>	<u>Waterloss</u>
0-400'	Fresh Water	8.5	40	N.C.
400'-5000'	Fresh Water	8.5	28	N.C.
5000'-8400'	Cut Brine	9.0	29	N.C.
8400'-10200'	Gel/Starch/PAC	9.5-10.0	36	10 cc

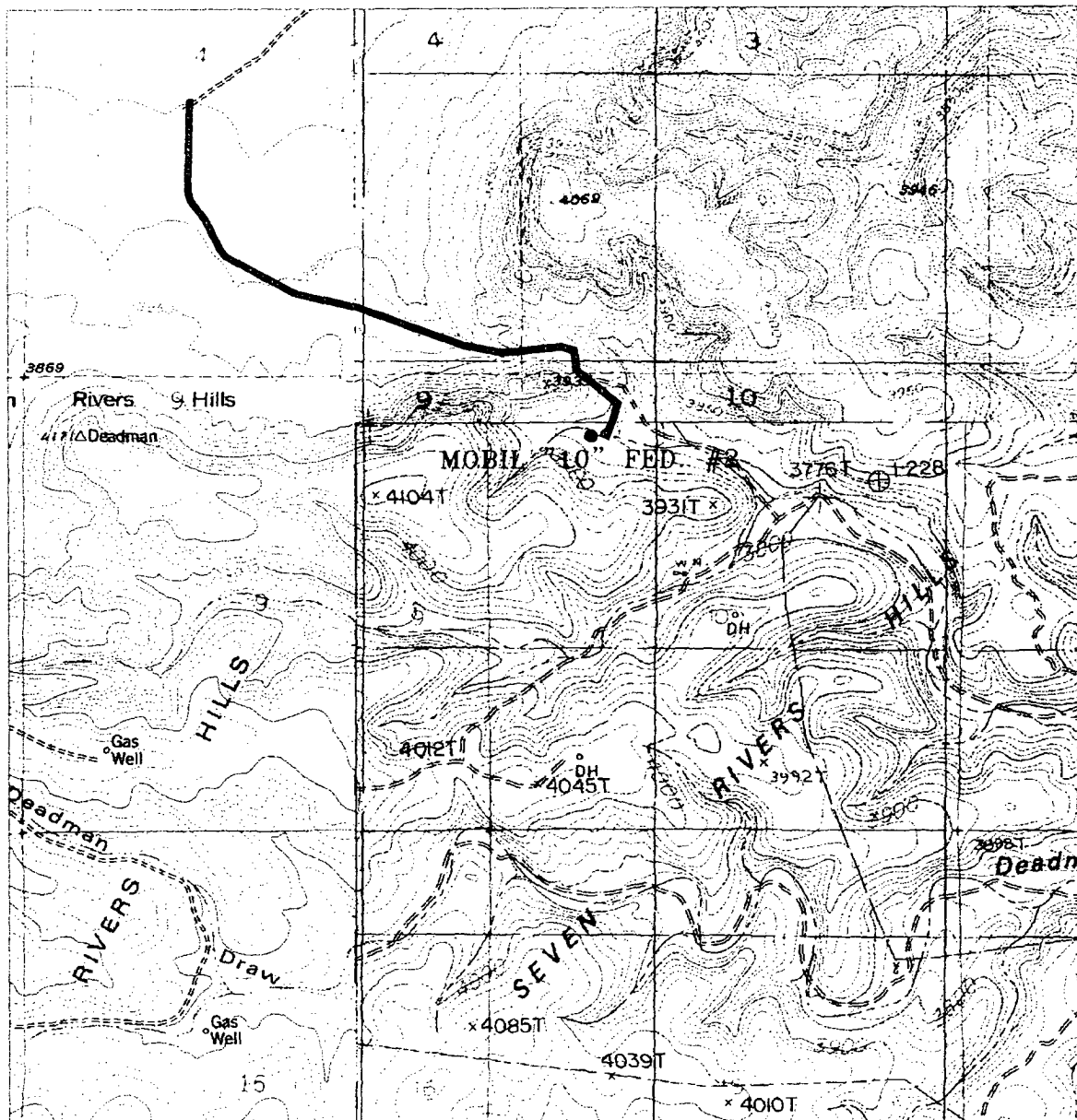
8. Auxiliary Equipment: Upper Kelly Cock, Full Opening Stabbing Valve, PVT.

9. Testing Logging and Coring Programs:

- DST's: DST any mudlog shows.
- Logging: 2-man Mudlogging unit from 5000' to T.D.
- Electric Logs: Platform Express with CNL-LDT, DLL-MSFL, GR and Caliper.
- Coring: None anticipated

10. Abnormal Pressure, Temperatures or Other Hazards: Lost circulation is anticipated in the surface. Maximum bottomhole pressure is estimated to be 4875 psig.

11. Anticipated Starting Date: March 1, 2006.



PROPOSED PIPELINE TO THE MOBIL "10" FEDERAL #2

surveys

**FASKEN OIL &
RANCH, LTD.**

FASKEN OIL AND RANCH, LTD.

303 WEST WALL AVENUE, SUITE 1800
MIDLAND, TEXAS 79701-5116

(432) 687-1777
jimmyc@forl.com

Jimmy D. Carlile
Regulatory Affairs Coordinator

January 5, 2006

Mr. Bryan Arrant
New Mexico Oil Conservation Division
1301 West Grand Avenue
Artesia, NM 88210

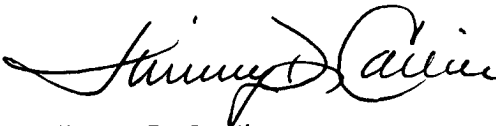
Dear Mr. Arrant,

Re: Fasken Oil and Ranch, Ltd.
Hydrogen Sulfide Contingency Plan, Rul 118
Mobil "10" Federal No. 2
Section 10, T21S, R24E
Eddy County, New Mexico

Please be advised that we do not anticipate encountering a Potentially Hazardous Volume of Hydrogen Sulfide Gas as defined in Rule 118 while drilling the subject well.

However, Fasken will conduct drilling operations with the knowledge that H₂S may be encountered, and will utilize the Hydrogen Sulfide Drilling Operations Plan found in this federal application to drill should any H₂S gas be encountered.

Yours truly,



Jimmy D. Carlile
Regulatory Affairs Coordinator

HYDROGEN SULFIDE DRILLING OPERATIONS PLAN

EXHIBIT #3
FASKEN OIL AND RANCH, LTD.
MOBIL "10" FEDERAL NO. 2
710' FNL AND 1160' FWL
SEC.10, T21S, R24E
EDDY COUNTY, NM

I. Hydrogen sulfide Training.

All personnel, whether regularly assigned, contracted or employed on an unscheduled basis, will receive training from a qualified instructor in the following areas prior to commencing drilling operations on this well:

1. The hazards and characteristics of hydrogen sulfide (H₂S).
2. The proper use and maintenance of personal protective equipment and life support systems.
3. The proper use of H₂S detectors, alarms, warning systems, briefing areas, evacuation procedures, and prevailing winds.
4. The proper techniques of first aid and rescue procedures.

In addition the supervisory personnel will be trained in the following areas:

1. The effects of H₂S on metal components. If high tensile tubulars are to be used, personnel will be trained in their special maintenance requirements.
2. Corrective action and shut-in procedures when drilling or reworking a well and blowout prevention and well control procedures.
3. The contents and requirements of the H₂S Drilling Operations Plan.

There will be an initial training session just prior to encountering a known or probable H₂S zone (within 3 days or 500 feet) and weekly H₂S and well control drills for all personnel in each crew. The initial training session shall include a review of the site specific H₂S Drilling Operations Plan. This plan shall be available at the well site. All personnel will be required to carry documentation that they have received the proper training.

II. H₂S Safety Equipment and Systems.

NOTE: All H₂S safety equipment and systems will be installed, tested, and operational when drilling reaches a depth of 500 feet above or three days prior to penetration the first zone containing or reasonable expected to contain H₂S.

1. Well Control Equipment:

- A. Flare line.
- B. Choke manifold.

C. Blind rams and pipe rams to accommodate all pipe sizes with properly sized closing unit.

D. Auxiliary equipment to include: annular preventer, mud-gas separator (if necessary) and rotating head.

2. Protective equipment for essential personnel:

A. 5-minute escape units located in the dog house and 30-minute air units at briefing areas, as indicated on well site diagram.

3. H2S detection and monitoring equipment:

A. 3 - portable H2S monitors positioned on location for best coverage and response. These units have warning lights and audible sirens when H2S levels of 20 PPM are reached.

B. 1 - portable SO2 monitor positioned near flare line during H2S flaring operations.

4. Visual warning systems:

A. Wind direction indicators as shown on well site diagram.

B. Caution/Danger signs shall be posted on roads providing direct access to location. Signs will be painted a high visibility yellow with black lettering of sufficient size to be a readable distance from the immediate location.

5. Mud program:

A. The mud program has been designed to minimize the volume of H2S circulated to the surface. Proper mud weight safe drilling practices and the use of H2S scavengers when necessary will minimize hazards when penetrating H2S bearing zones.

B. A Mud-gas separator will be utilized.

6. Metallurgy:

A. All drill strings, casings, tubing, wellhead, blowout preventors, drilling spools kill lines, choke manifold and lines valves shall be suitable for H2S service.

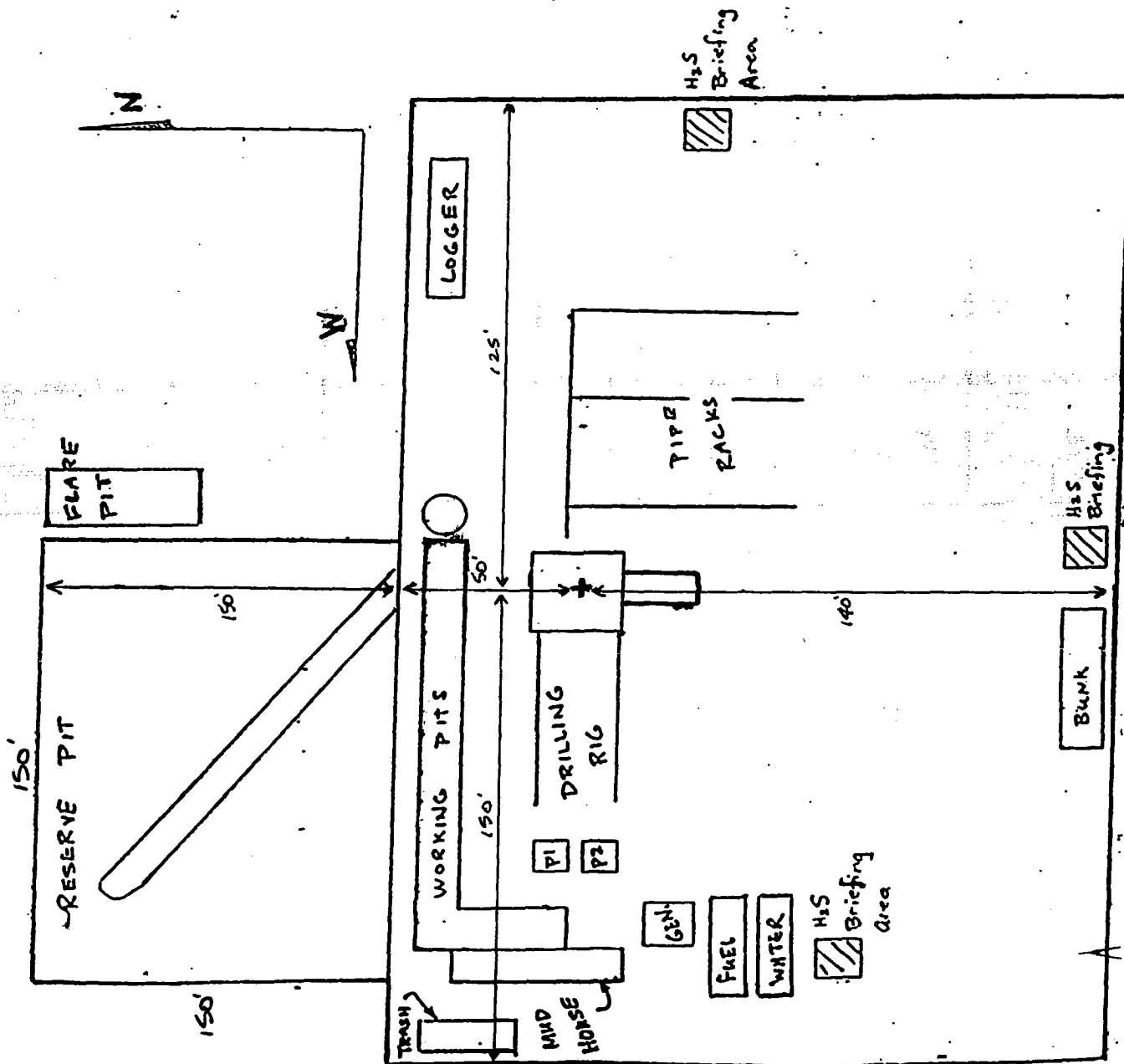
B. All elastomers used for packing and seals shall be H2S trimmed.

7. Communications:

A. Radio communications will be available in company vehicles and rig dog house.

8. Well testing:

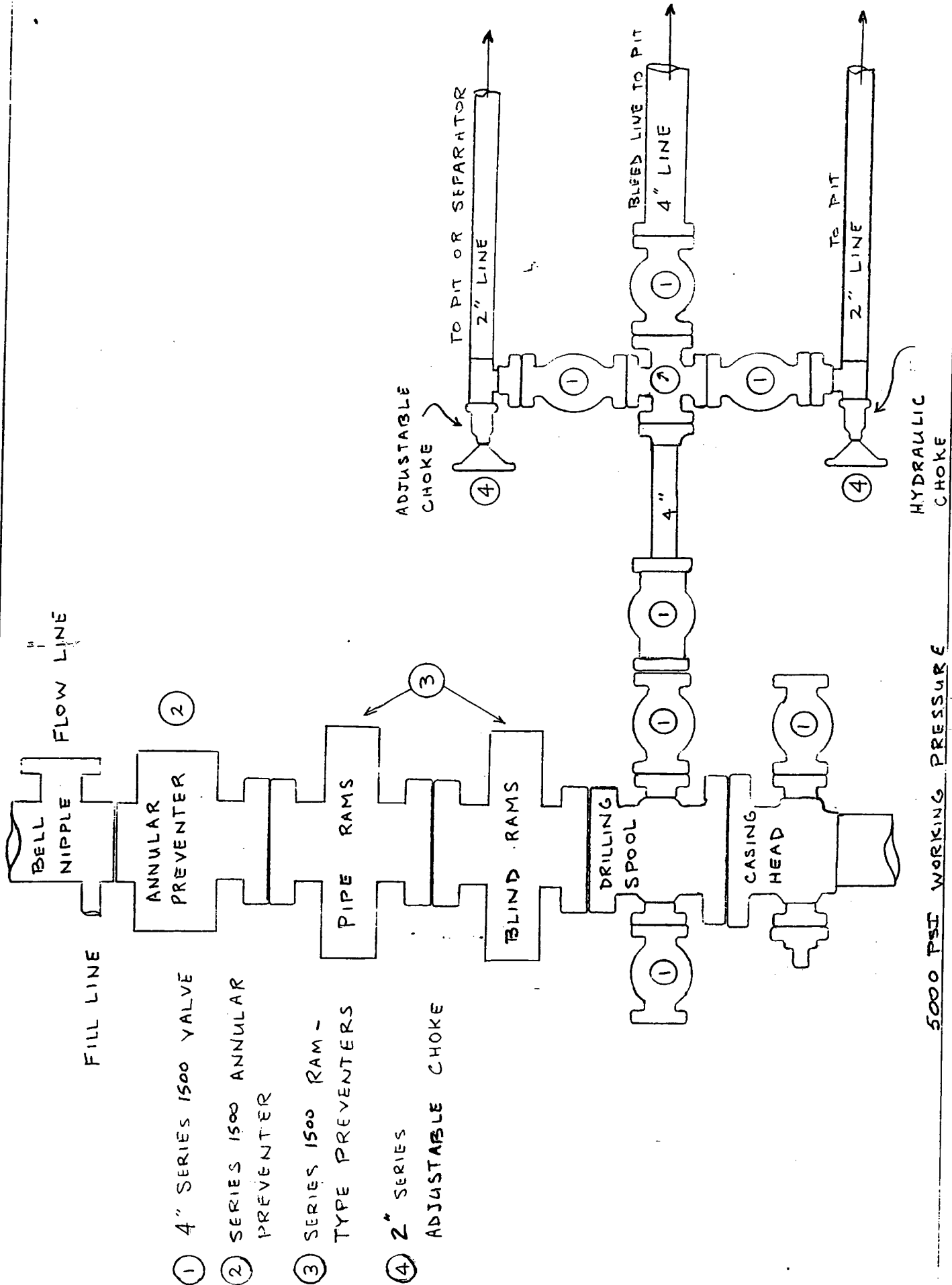
A. Drill stem testing will be performed with a minimum number of personnel in the immediate vicinity which are necessary to safely and adequately conduct the test. The drill stem testing of any known formation that contains H2S will be conducted during daylight hours.



FASKEN OIL & RANCH, LTD.

Exhibit #4

Scale: 1 inch = 50 feet



5000 PSI WORKING PRESSURE

Statement Accepting Responsibility for Operations

Fasken Oil and Ranch, Ltd. accepts all applicable terms, conditions, stipulations and restrictions concerning operations conducted on the land or portion thereof, as described below:

1. NM 96196: NE/4 NE/4 and S/2 N/2 containing 200 acres
2. NM 010567 N/2 NW/4 and NW/4 NE/4 containing 120 acres


All in Section 10, T21S, R24E, Eddy County, New Mexico

Formations: All depths

Bond Coverage: \$25,000

BLM Bond File: NM 2729

Fasken Oil and Ranch, Ltd.



Mark B. Merritt
Oil and Gas Manager



Date

CONDITIONS OF APPROVAL - DRILLING

Operator's Name: Fasken Oil and Ranch, Ltd.
Well Name & No. Mobil 10 Federal #2
Location: 710' FNL, 1160' FWL, Section 10, T. 21 S., R. 24 E., Eddy County, New Mexico
Lease: NM-010567

I. DRILLING OPERATIONS REQUIREMENTS:

1. The Bureau of Land Management (BLM) is to be notified at the Carlsbad Field Office, 620 East Greene St., Carlsbad, NM 88220, (505) 361-2822 for wells in Eddy County in sufficient time for a representative to witness:

A. Well spud

B. Cementing casing: 13-3/8 inch 9-5/8 inch 4-1/2 inch

C. BOP tests

2. A Hydrogen Sulfide (H₂S) Drilling Operation Contingency Plan shall be activated prior to drilling into the Delaware formation. A copy of the plan shall be posted at the drilling site.

3. 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.

4. Submit a Sundry Notice (Form 3160-5, one original and five copies) for each casing string, describing the casing and cementing operations. Include pertinent information such as; spud date, hole size, casing (size, weight, grade and thread type), cement (type, quantity and top), water zones and problems or hazards encountered. The Sundry shall be submitted within 15 days of completion of each casing string. The reports may be combined into the same Sundry if they fall within the same 15-day time frame.

5. The API No. assigned to the well by NMOCD shall be included on the subsequent report of setting the first casing string.

6. A Communitization Agreement covering the acreage dedicated to this well must be filed for approval with the

II. CASING:

1. The 13-3/8 inch surface casing shall be set at approximately 400 feet and cement circulated to the surface. If cement does not circulate to the surface the appropriate BLM office shall be notified and a temperature survey or cement bond log shall be run to verify the top of the cement. Remedial cementing shall be completed prior to drilling out that string.

2. The minimum required fill of cement behind the 9-5/8 inch intermediate casing is to be circulated to the surface.

3. The minimum required fill of cement behind the 4-1/2 inch production casing is to be sufficient to reach at least 500 feet above the top of the uppermost hydrocarbon productive interval.

III. PRESSURE CONTROL:

1. All BOP systems and related equipment shall comply with well control requirements as described in Onshore Oil and Gas Order No. 2. The BOP and related equipment shall be installed and operational before drilling below the 13-3/8 inch casing shoe and shall be tested as described in Onshore Order No. 2. Any equipment failing to test satisfactorily shall be repaired or replaced.

2. Minimum working pressure of the blowout preventer and related equipment (BOPE) required for drilling the

surface and intermediate shall be 2000 psi.

- A variance to test with the rig pumps to 1500 psi is approved.
- A variance to test with third party testers prior to drilling the Wolfcamp formation is approved.

3. Minimum working pressure of the blowout preventer and related equipment (BOPE) required for drilling below the intermediate shall be 5000 psi.

4. The appropriate BLM office shall be notified in sufficient time for a representative to witness the tests.

- The tests shall be done by an independent service company.
- The results of the test shall be reported to the appropriate BLM office.
- Testing fluid must be water or an appropriate clear liquid suitable for sub-freezing temperatures. Use of drilling mud for testing is not permitted since it can mask small leaks.
- Testing must be done in a safe workman-like manner. Hard line connections shall be required.

IV. 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. Monitoring equipment shall consist of the following:

- Recording pit level indicator to indicate volume gains and losses.
- Mud measuring device for accurately determining the mud volumes necessary to fill the hole during trips.
- Flow-sensor on the flow-line to warn of abnormal mud returns from the well.

Approved by BLM-Permian, dated 1/25/2005

1/25/2005

acs