

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

DEP.  
BUREAU OF LAND MANAGEMENT

11A

SUBMIT IN TRIPLICATE\*

(Other instructions on  
reverse side)

FORM APPROVED

OMB NO. 1004-0136

Expires: February 28, 1995

5. LEASE DESIGNATION AND SERIAL NO.

LC-028936-D

6. IF INDIAN, ALLOTTEE OR TRIBE NAME

7. UNIT AGREEMENT NAME

Pending

8. FARM OR LEASE NAME, WELL NO.

Full Tank 33 Federal Com No. 2

9. API WELL NO.

30-015-

10. FIELD AND POOL, OR WILDCAT

Empire; Morrow, South

11. SEC. T., R., M., BLOCK AND SURVEY

OR AREA

Sec. 33 T17S R30E

12. COUNTY OR PARISH

Eddy

13. STATE

NM

APPLICATION FOR PERMIT TO DRILL OR DEEPEN

1a. TYPE OF WORK

DRILL ☒

DEEPEN ☐

1b. TYPE OF WELL

OIL ☐  
WELL

GAS ☒  
WELL

SINGLE ☒  
OTHER ZONE

MULTIPLE ☐  
ZONE

2. NAME OF OPERATOR

Gruy Petroleum Management Co.

3. ADDRESS AND TELEPHONE NO.

P.O. Box 140907 Irving TX 75014 972-401-3111

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

1650' FNL & 910' FWL

RECEIVED

APR 11 2006

OCU-ANTERIA

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

2 Miles South of Loco Hills

15. DISTANCE FROM PROPOSED\*  
LOCATION TO NEAREST  
PROPERTY OR LEASE LINE, T.O.

(Also to nearest drlg. unit line, if any)

910'

16. NO. OF ACRES IN LEASE

1

17. NO. OF ACRES ASSIGNED  
TO THIS WELL

320

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

2480'

19. PROPOSED DEPTH

12050'

20. ROTARY OR CABLE TOOLS

Rotary

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

3584' GR

Roswell Controlled Water Basin

22. APPROX. DATE WORK WILL START\*

04-01-06

23. PROPOSED CASING AND CEMENTING PROGRAM

SIZE OF HOLE	GRADE, SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT
17-1/2"	H-40 13 3/8"	48 #	500' *	490 sx circulate
12-1/4"	J-55 9 5/8"	40 #	4000'	1200 sx circulate
7-7/8"	P-110 5 1/2"	17 #	12050'	1620 sx TOC 2700'

\*Set surface casing 25' into the top of the Rustler, which is estimated to be between 350' and 500'.

From the base of the surface pipe through the running of production casing, the well will be equipped with a 5000 - psi BOP system. We are requesting a variance for the 13 3/8" surface casing and BOP testing from Onshore Order No. 2, which states all casing strings below the conductor shall be pressure tested to .22 psi per foot or 1500#, whichever is greater, but not to exceed 70% of the manufacturer's stated maximum internal yield. During the running of the surface pipe and the drilling of the intermediate hole we do not anticipate any pressures greater than 1000#, and we are requesting a variance to test the 13 3/8" casing and BOP system to 1000# psi and use rig pumps instead of an independent service company.

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.

24. SIGNED Zeno Farris TITLE Mgr. Ops. Admin DATE 02-15-06

(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:

APPROVED BY /s/ Tony J. Herrell

TITLE FIELD MANAGER

DATE

APR 07 2006

\*See Instructions On Reverse Side

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 United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

APPROVAL FOR 1 YEAR

APPROVAL SUBJECT TO  
GENERAL REQUIREMENTS AND  
SPECIAL STIPULATIONS  
ATTACHED

## DISTRICT I

1625 N. FRENCH DR., BOBBS, NM 88240

## DISTRICT II

1301 W. GRAND AVENUE, ARTESIA, NM 88210

## DISTRICT III

1000 Rio Brazos Rd., Aztec, NM 87410

## DISTRICT IV

1220 S. ST. FRANCIS DR., SANTA FE, NM 87505

## State of New Mexico

Energy, Minerals and Natural Resources Department

## OIL CONSERVATION DIVISION

1220 SOUTH ST. FRANCIS DR.  
Santa Fe, New Mexico 87505

Form C-102

Revised JUNE 10, 2003

Submit to Appropriate District Office

State Lease - 4 Copies

Fee Lease - 3 Copies

## WELL LOCATION AND ACREAGE DEDICATION PLAT

☐ AMENDED REPORT

API Number	Pool Code 76400	Pool Name Empire; Morrow, South
Property Code	Property Name FULL TANK 33 FEDERAL COM	Well Number 2
OGRID No. 162683	Operator Name GRUY PETROLEUM MANAGEMENT COMPANY	Elevation 3584'

## Surface Location

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
E	33	17-S	30-E		1650	NORTH	910	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 Y	Consolidation Code C	Order No.						

NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED  
OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION

	LC-028936-D	NM-0467934	<b>OPERATOR CERTIFICATION</b> I hereby certify the the information contained herein is true and complete to the best of my knowledge and belief. <u>Zeno Farris</u> Signature Zeno Farris Printed Name Mgr Operations Admin Title 03-06-06 Date
	Full Tank 33 Fed Com #2	Full Tank 33 Fed Com #1	
GEODETIC COORDINATES NAD 27 NME Y=652605.5 N X=607946.4 E LAT.=32°47'37.00" N LONG.=103°58'55.40" W			

## Gruy Petroleum Management Co.

5125 North O'Connor Blvd. • Suite 1500 • Irving, TX 75039 • (972) 401-3111 • Fax (972) 443-6489

Mailing Address: P.O. Box 140907 • Irving, TX 75014-0907

A wholly-owned subsidiary of Cimarex Energy Co., a NYSE Listed Company, "XEC"



### STATEMENT ACCEPTING RESPONSIBILITY FOR OPERATIONS

Bureau of Land Management  
620 East Greene Street  
Carlsbad, NM 88220  
Attn: Ms. Betty Hill

Gruy Petroleum Management Co. accepts all applicable terms, conditions, stipulations and restrictions concerning operations conducted on the leased land, or portion thereof, as described below:

Lease No.: NM-0467934 – N/2 NE/4 Sec 33-T17S-R30E, containing 80 acres  
Lease No.: NM-0558581 – S/2 NE/4 Sec 33-T17S-R30E, containing 80 acres  
Lease No.: LC-028936-D – NW/4 Sec 33-T17S-R30E, containing 160 acres

County: Eddy County, New Mexico

Formation (S): Morrow

Bond Coverage: Statewide BLM Bond

BLM Bond File No.: NM 2575

Authorized Signature: Zeno Farris  
Representing Gruy Petroleum Management Co.

Name: Zeno Farris

Title: Manager, Operations Administration

Date: February 15, 2006

## Application to Drill

Gruy Petroleum Management Co.  
Full Tank 33 Federal Com No. 2  
Unit E            Section 33  
T17S - R30E      Eddy County, NM

In response to questions asked under Section II B of Bulletin NTL-6 the following information is provided for your consideration:

1 Location:            1650' FNL & 910' FWL

2 Elevation above sea level:            GR 3584'

3 Geologic name of surface formation:            Quaternary Alluvium Deposits

4 Drilling tools and associated equipment:            Conventional rotary drilling rig using fluid as a circulating medium for solids removal.

5 Proposed drilling depth:            12050'

6 Estimated tops of geological markers:

Yates	1550'
San Andres	3075'
Yeso	4580'
Abo	6400'
Wolfcamp	7770'
Strawn	10530'
Morrow	11300'

7 Possible mineral bearing formation:

Strawn	Gas
Morrow	Gas

8 Casing program:

Hole Size	Interval	Casing OD	Weight	Thread	Collar	Grade
17 1/2"	0-500'	13 3/8"	48#	8-R	ST&C	H-40
12 1/4"	0-4000'	9 5/8"	40#	8-R	LT&C	J-55
7 7/8"	0' - 12050'	5 1/2"	17#	8-R	LT&C	P-110

## Application to Drill

Gruy Petroleum Management Co.  
Full Tank 33 Federal Com No. 2  
Unit E Section 33  
T17S - R30E Eddy County, NM

### 9 Cementing & Setting Depth:

13 3/8"	Surface	Set 500' of 13 3/8" J-55 48# ST&C casing to a depth of 25' into the Rustler. Cement with 490 Sx. Of Class "C" cement + additives, circulate cement to surface.
9 5/8"	Intermediate	Set 4000' of 9 5/8" J-55 40# LT&C casing. Cement lead with 1000 Sx. Of Class POZ/C Cement + additives, tail with 200 Sx. Of Class "C" + additives, circulate cement to surface.
5 1/2"	Production	Set 12050' of 5 1/2" P-110 17# LT&C casing. Cement in two stages, first stage cement with 1020 Sx. of Class POZ/C Cement + additives. Second stage cement with 600 Sx of Class "C" Estimated top of cement 2700'.

### 10 Pressure control Equipment:

Exhibit "E". A 13 3/8" 5000 PSI working pressure B.O.P. consisting of one set of blind rams and one set of pipe rams and a 5000 # annular type preventer. A choke manifold and 120 gallon accumulator with floor and remote operating stations and auxiliary power system. Rotating head below 6000'. A kelly cock will be installed and maintained in operable condition and a drill string safety valve in the open position will be available on the rig floor. BOP unit will be hydraulically operated. BOP will be nipped up on the 9 5/8" casing and will be operated at least once a day while drilling and the blind rams will be operated when out of hole during trips. No abnormal pressure or temperature is expected while drilling.

### 11 Proposed Mud Circulating System:

Depth	Mud Wt	Viscosity	Fluid Loss	Type Mud
0 - 500'	8.4 - 8.6	30 - 32	May lose circ.	Fresh water spud mud add paper to control seepage and high viscosity sweeps to clean hole.
500' - 4000'	9.7 - 10.0	28 - 29	May lose circ	Brine water. Add paper as needed to control seepage and add lime to control pH (9-10). Use high viscosity sweeps to clean hole.
4000' - 8300'	8.4 - 9.9	28 - 29	NC	Brine water. Paper for seepage. Lime for PH (9 - 9.5)
8300' - 10000'	8.45 - 8.9	28 - 29	NC	Cut brine. Caustic for pH control.
10000' - 12050'	8.9 - 9.7	29 - 45	NC	XCD Polymer mud system.

Sufficient mud materials will be kept on location at all times in order to combat lost circulation, or unexpected kicks. In order to run DSTs, open hole logs, and casing, the viscosity and water loss may have to be adjusted in order to meet these needs. Mud system monitoring equipment with derrick floor indicators and visual/audio alarms shall be installed and operative prior to drilling into the Wolfcamp formation. This equipment will remain in use until production casing is run and cemented.

## **Application to Drill**

Gruy Petroleum Management Co.  
Full Tank 33 Federal Com No. 2  
Unit E      Section 33  
T17S - R30E      Eddy County, NM

### **12    Testing, Logging and Coring Program:**

- A. Mud logging program: One-man unit from 8000' to TD
- B. Electric logging program: CNL / LDT / CAL / GR, DLL / CAL / GR
- C. No DSTs or cores are planned at this time.

### **13    Potential Hazards:**

No abnormal pressures or temperatures are expected. The area has a potential H2S hazard. An H2S drilling plan is attached. Adequate flare lines will be installed off the mud / gas separator where gas may be flared safely. All personnel will be familiar with all aspects of safe operation of equipment being used. Estimated BHP 4000 PSI, estimated BHT 175.

### **14    Anticipated Starting Date and Duration of Operations:**

Road and location construction will begin after BLM approval of APD. Anticipated spud date as soon as approved. Drilling expected to take 35 - 45 days. If production casing is run an additional 30 days will be required to complete and construct surface facilities.

### **15    Other Facets of Operations:**

After running casing, cased hole gamma ray neutron collar logs will be run from total depth over possible pay intervals. The Morrow pay will be perforated and stimulated. The well will be tested and potentialized as a gas well.

## Hydrogen Sulfide Drilling Operations Plan

- 1 All Company and Contract personnel admitted on location must be trained by a qualified H<sub>2</sub>S safety instructor to the following:
  - A. Characteristics of H<sub>2</sub>S
  - B. Physical effects and hazards
  - C. Proper use of safety equipment and life support systems.
  - D. Principle and operation of H<sub>2</sub>S detectors, warning system and briefing
  - E. Evacuation procedure, routes and first aid.
  - F. Proper use of 30 minute pressure demand air pack.
- 2 H<sub>2</sub>S Detection and Alarm Systems
  - A. H<sub>2</sub>S detectors and audio alarm system to be located at bell nipple, end of flow line (mud pit) and on derrick floor or doghouse.
- 3 Windsock and/or wind streamers
  - A. Windsock at mudpit area should be high enough to be visible.
  - B. Windsock at briefing area should be high enough to be visible.
- 4 Condition Flags and Signs
  - A. Warning sign on access road to location.
  - B. Flags to be displayed on sign at entrance to location. Green flag, normal safe condition. Yellow flag indicates potential pressure and danger. Red flag, danger, H<sub>2</sub>S present in dangerous concentration. Only emergency personnel admitted to location.
- 5 Well control equipment
  - A. See exhibit "E"
- 6 Communication
  - A. While working under masks chalkboards will be used for communication.
  - B. Hand signals will be used where chalk board is inappropriate.
  - C. Two way radio will be used to communicate off location in case of emergency help is required. In most cases cellular telephones will be available at most drilling foreman's trailer or living quarters.
- 7 Drillstem Testing not anticipated.

## **Hydrogen Sulfide Drilling Operations Plan**

- 8 Drilling contractor supervisor will be required to be familiar with the effects H<sub>2</sub>S has on tubular goods and other mechanical equipment.
  
- 9 If H<sub>2</sub>S is encountered, mud system will be altered if necessary to maintain control of formation. A mud gas separator will be brought into service along with H<sub>2</sub>S scavengers if necessary.



## Surface Use Plan

Gruy Petroleum Management Co.  
Full Tank 33 Federal Com No. 2  
Unit E      Section 33  
T17S - R30E      Eddy County, NM

- 1 Existing Roads: Area maps, Exhibit "B" is a reproduction of Lea Co. General Highway Map. Exhibit "C" is a reproduction of a USGS Topographic Map, showing existing roads and proposed roads. All existing roads will be maintained in a condition equal to or better than current conditions. Any new roads will be constructed to BLM specifications.

A. Exhibit "A" shows the proposed well site as staked.

B. FROM THE INTERSECTION OF US HWY #82 AND CO RD #217 (HAGERMAN CUTOFF) GO SOUTH ON CO RD #217 FOR APPROX 0.4 MILES. TURN LEFT (SE) AND GO APPROX 1.1 MILES. TURN RIGHT (WEST) AND GO APPROX 0.3 MILES. TURN LEFT (SOUTH) AND GO APPROX 0.2 MILES TO AN OLD D.H. FROM THE WEST EDGE OF PAD, FOLLOW A PROPOSED ROAD SURVEY APPROX 1273' TO THIS LOCATION.

- 2 PLANNED ACCESS ROADS: 1273' of proposed road will be constructed on lease.

- 3 LOCATION OF EXISTING WELLS IN A ONE-MILE RADIUS EXHIBIT "A"

A. Water wells -	None known
B. Disposal wells -	None known
C. Drilling wells -	None known
D. Producing wells -	As shown on Exhibit "A"
E. Abandoned wells -	As shown on Exhibit "A"

## **Surface Use Plan**

Gruy Petroleum Management Co.  
Full Tank 33 Federal Corn No. 2  
Unit E      Section 33  
T17S - R30E      Eddy County, NM

- 4 If, on completion this well is a producer Gruy Petroleum Management Co. will furnish maps and/or plats showing on site facilities or off site facilities if needed. This will be accompanied by a Sundry Notice.

5 LOCATION AND TYPE OF WATER SUPPLY:

Water will be purchased locally from a commercial source and trucked over the access roads or piped in flexible lines laid on top of the ground.

6 SOURCE OF CONSTRUCTION MATERIAL:

If possible construction will be obtained from the excavation of drill site, if additional material is needed it will be purchased from a local source and transported over the access route as shown on Exhibit "C".

7 METHODS OF HANDLING WASTE MATERIAL:

- A. Drill cuttings will be disposed of in the reserve pit.
- B. All trash, junk and other waste material will be contained in trash cages or bins to prevent scattering. When the job is completed all contents will be removed and disposed of in a approved sanitary land fill.
- C. Salts remaining after completion of well will be picked up by supplier including broken sacks.
- D. Sewage from living quarters will drain into holding tanks and be cleaned out periodically. A Porta-John will be provided for the rig crews. This equipment will be properly maintained during the drilling operations and removed upon completion of the well.
- E. Remaining drilling fluids will be allowed to evaporate in the reserve pit until the pit is dry enough for breaking out. In the event that drilling fluids do not evaporate in a reasonable time they will be hauled off by transports and be disposed of at a state approved disposal facility. Later pits will be broken out to speed drying. Water produced during testing will be put in reserve pits. Any oil or condensate produced will be stored in test tanks until sold and hauled from the site.

8 ANCILLARY FACILITIES:

- A. No camps or airstrips to be constructed.

## Surface Use Plan

Gruy Petroleum Management Co.  
Full Tank 33 Federal Com No. 2  
Unit E      Section 33  
T17S - R30E      Eddy County, NM

### 9 WELL SITE LAYOUT

- A. Exhibit "D" shows location and rig layout.
- B. This exhibit indicates proposed location of reserve and trash pits; and living facilities.
- C. Mud pits in the active circulating system will be steel pits and the reserve pit is proposed to be unlined, unless subsurface condition encountered during pit construction indicate that lining is needed for lateral containment of fluids.
- D. If needed, the reserve pit is to be lined with PVC or polyethylene line. The pit liner will be 6 mils thick. Pit liner will extend a minimum, 2'00" over the reserve pits dikes where the liner will be anchored down.
- E. The reserve pit will be fenced on three sides with four strands of barbed wire during drilling and completion phases. The fourth side will be fenced after all drilling operations have ceased. 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's pad and surface facilities. After the area has been shaped and contoured, topsoil from the spoil pile 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.

## Surface Use Plan

Gruy Petroleum Management Co.  
Full Tank 33 Federal Com No. 2  
Unit E      Section 33  
T17S - R30E      Eddy County, NM

### 11 OTHER INFORMATION:

- A. Topography consists of a sloping plane with loose tan sands. Vegetation is mainly yucca, mesquite and shin oak.
- B. The wellsite is on surface owned by The United States Department of the Interior, Bureau of Land Management. The land is used mainly for farming, cattle ranching, recreational use, and oil and gas production.
- C. An Archaeological survey will be conducted on the location and proposed roads, and this report will be filed with the Bureau of Land Management in the Carlsbad BLM office.

### 12 OPERATORS REPRESENTATIVE:

Gruy Petroleum Management Company  
P.O. Box 140907  
Irving, TX 75014  
Office Phone: (972) 443-6489  
Zeno Farris

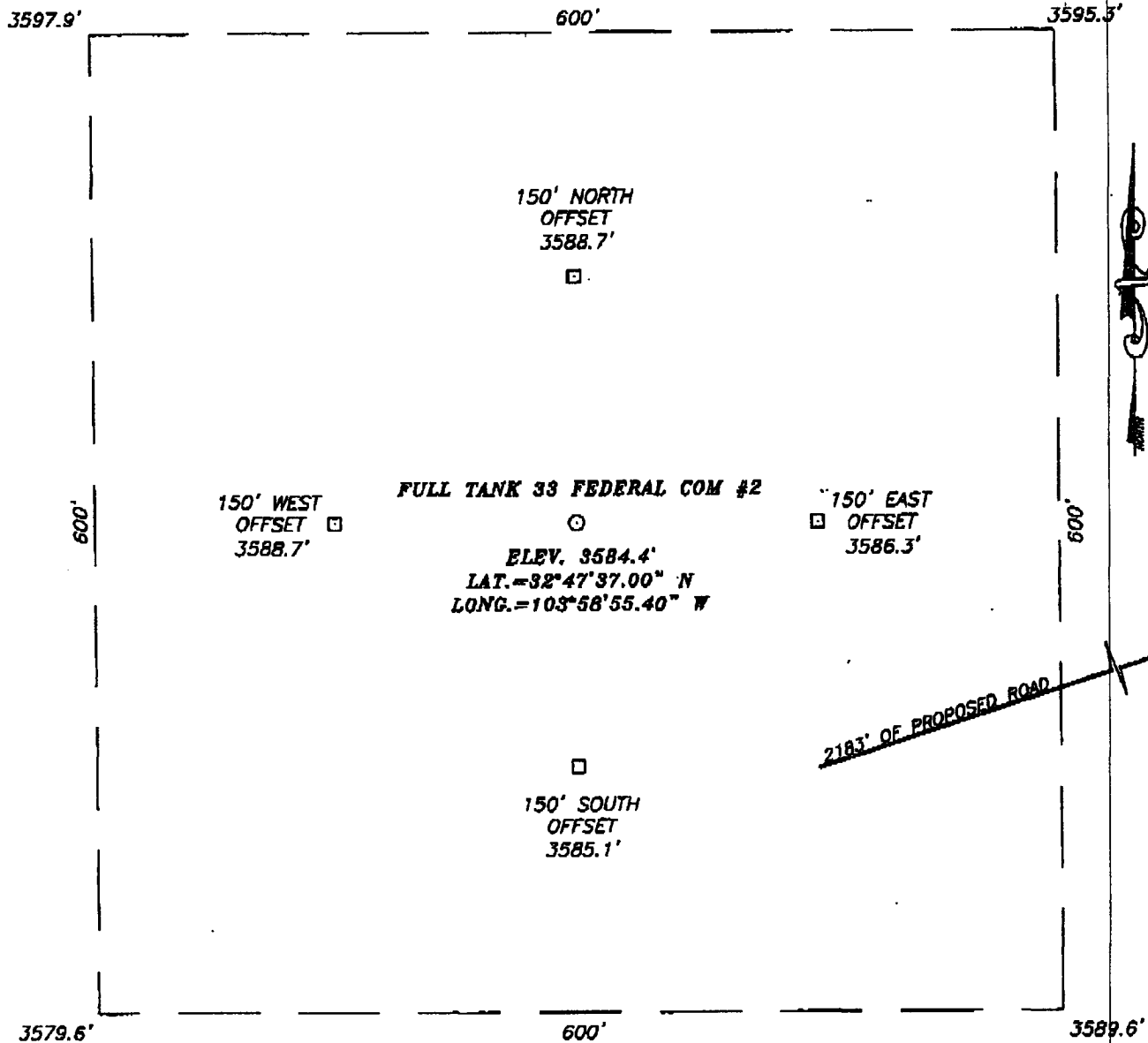
- 13 **CERTIFICATION:** I hereby certify that I, or persons under my direct supervision, have inspected the proposed drill site and access route; that I am familiar with the conditions which currently exist; that the statements made in this plan are to the best of my knowledge, true and correct; and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

NAME: Zeno Farris

DATE: February 15, 2006

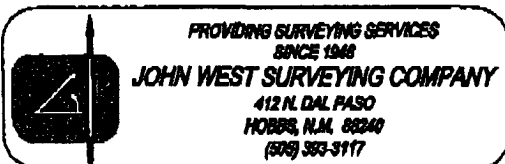
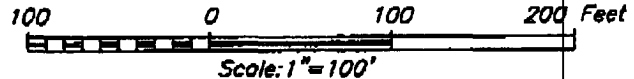
TITLE: Manager, Operations Administration

**SECTION 33, TOWNSHIP 17 SOUTH, RANGE 30 EAST, N.M.P.M.,**  
**EDDY COUNTY, NEW MEXICO**



**DIRECTIONS TO LOCATION**

FROM THE INTERSECTION OF U.S. HWY. #82 AND THE CO. RD. #217 (HAGERMAN CUTOFF) GO SOUTH ON CO. RD. #217 FOR APPROX. 0.4 MILES. TURN RIGHT (SE) AND GO APPROX. 1.3 MILES TO A PROPOSED ROAD SURVEY ON THE RIGHT. FOLLOW PROPOSED ROAD SURVEY WEST/SW APPROX. 757' TO THE PROPOSED NEC OF THE FULL TANK 33 FED. COM #1 WELL PAD. GO SW APPROX. 425' TO THE SW<sub>6</sub> OF THE PROPOSED WELL PAD TO A BEGIN ROAD SURVEY. GO WEST/SW APPROX. 2183' TO THE SEC OF THE PROPOSED FULL TANK 33 FED. COM #2 WELL PAD. THIS LOCATION IS APPROX. 212' NW.

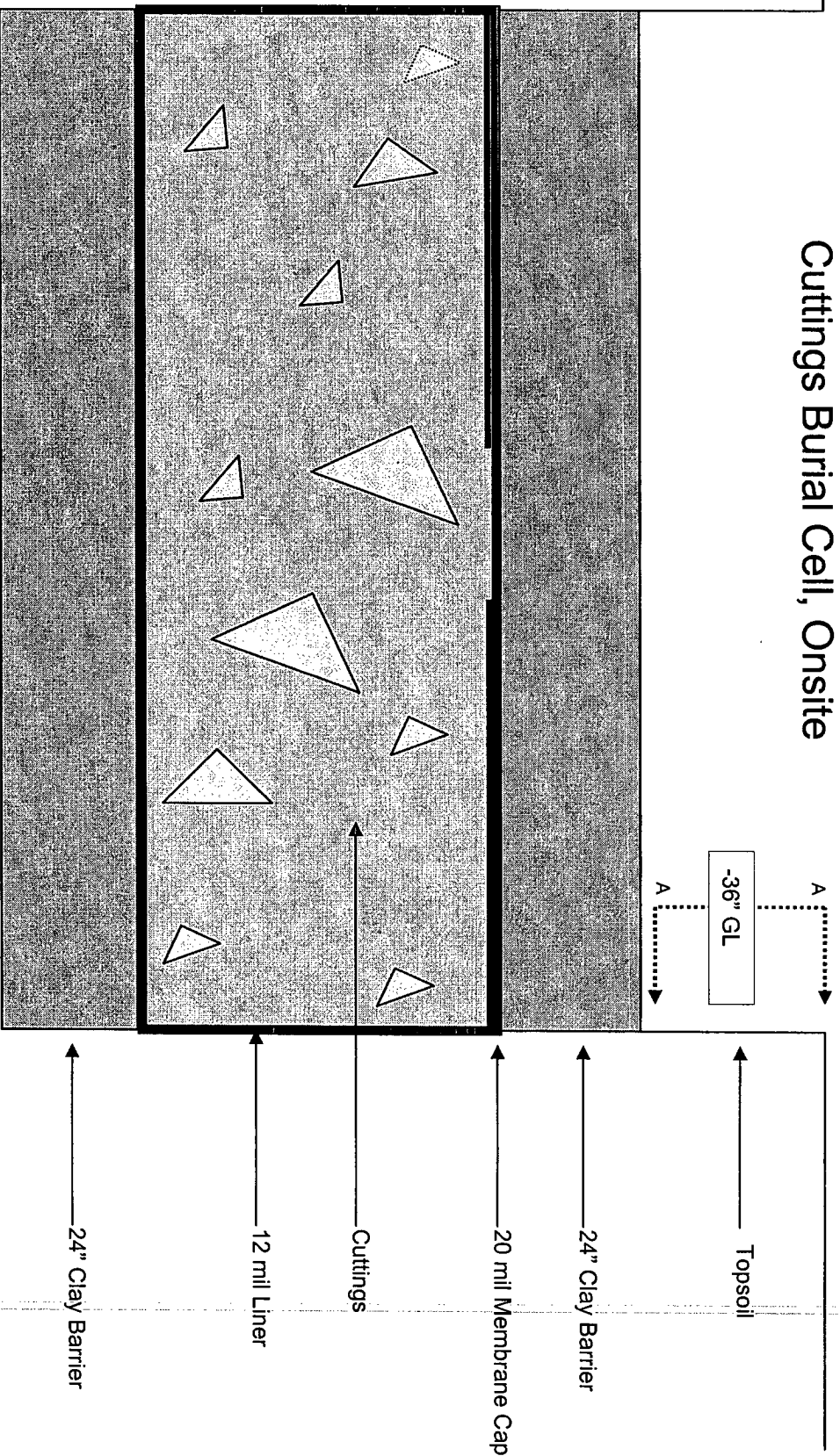


**GRUY PETROLEUM MANAGEMENT COMPANY**

FULL TANK 33 FEDERAL COM #2 WELL  
LOCATED 1650 FEET FROM THE NORTH LINE  
AND 910 FEET FROM THE WEST LINE OF SECTION 33,  
TOWNSHIP 17 SOUTH, RANGE 30 EAST, N.M.P.M.,  
EDDY COUNTY, NEW MEXICO.

Survey Date: 12/03/05	Sheet 1 of 1	Sheets
W.O. Number: 06.13.0555	Dr By: J.R.	Rev 1: 3/27/06
Date: 12/12/05	Disk: CD#6	06130555 Scale: 1"=100'

# Cuttings Burial Cell, Onsite



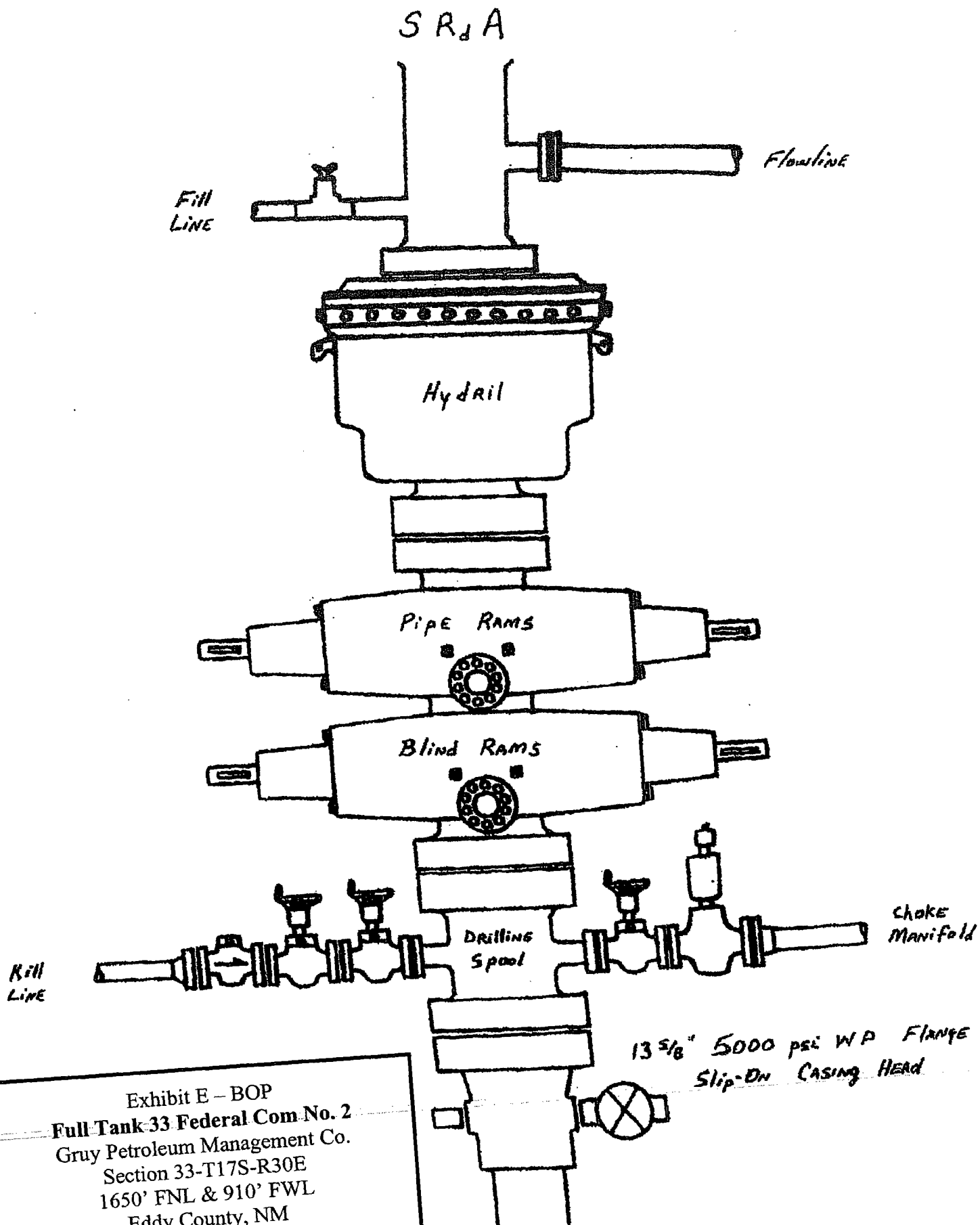


Exhibit E - BOP  
 Full Tank 33 Federal Com No. 2  
 Gruy Petroleum Management Co.  
 Section 33-T17S-R30E  
 1650' FNL & 910' FWL  
 Eddy County, NM

DRILLING OPERATIONS  
CHOKE MANIFOLD  
5M SERVICE

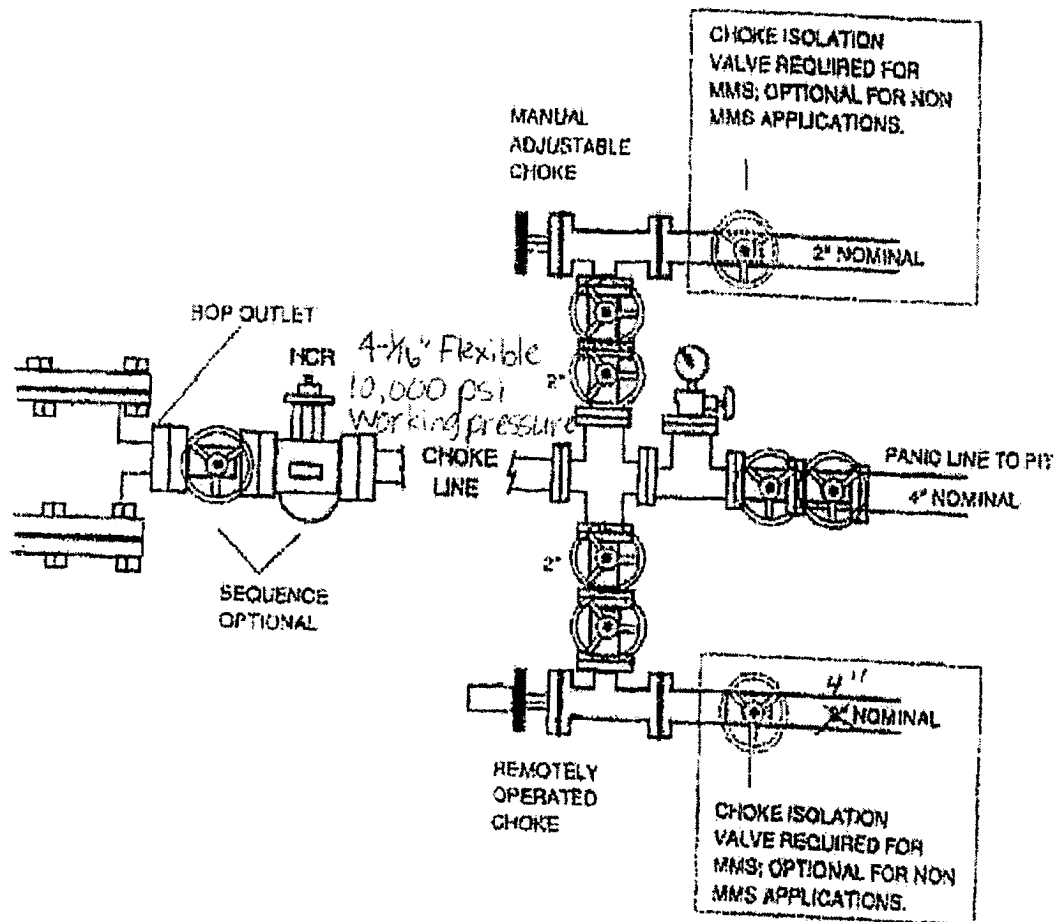


Exhibit E-1 – Choke Manifold Diagram  
Full Tank 33 Federal Com No. 2  
Gruy Petroleum Management Co.  
Section 33-T17S-R30E  
1650' FNL & 910' FWL  
Eddy County, NM



## CONDITIONS OF APPROVAL - DRILLING

Operator's Name: Gruy Petroleum Management Company  
Well Name & No: Full Tank 33 Federal Com No. 02  
Location: Surface 1650' FNL & 910' FEL, Sec.33, T. 17 S. R. 30 E.  
Lease: NMLC 028936-D  
Eddy County, New Mexico

.....

### I. DRILLING OPERATIONS REQUIREMENTS:

1. The Bureau of Land Management (BLM) is to be notified at the Roswell Field Office, 2909 West Second St., Roswell, NM 88201, (505) 627-0272 for wells in Chaves and Roosevelt Counties; the Carlsbad Field Office, 620 East Greene St., Carlsbad, NM 88220, (505) 361-2822 for wells in Eddy County; and the Hobbs Field Station, 414 West Taylor, Hobbs NM 88240, (505) 393-3612 for wells in Lea County, in sufficient time for a representative to witness:
  - A. Spudding
  - B. Cementing casing: 13 3/8 inch; 9 5/8 inch; 5 1/2 inch.
  - C. BOP Tests
2. A Hydrogen Sulfide (H2S) Drilling Plan shall be in operations three days or 500 feet prior to drilling into the Queen estimated to be at 2300 ft.
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.

### II. CASING:

1. The 13 3/8 inch shall be set at 500 Feet or 25 feet into the top of the anhydrite and above the top of the Salt. with 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 circulate to surface.
3. The minimum required fill of cement behind the 5 1/2 inch Production casing is to place TOC at least 200 feet above any potential bearing hydrocarbon formations.

### 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.

**(III Cont):**

2. Minimum working pressure of the blowout preventer and related equipment (BOPE) shall be 5 M psi prior to drilling below the 9 7/8 inch shoe. A variance to test the surface BOPE to 1000 psi. using the rig pumps is approved. Test surface casing to a minimum of 700 psig for at least 20 minutes.

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

- The test 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 safe workman-like manner. Hard line connections shall be required.
- Both low pressure and high pressure testing of BOPE is required.

**G. Gourley RFO**