

Expires: December 31, 1991

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENTN.M. OIL & GAS COMMISSION  
P.O. BOX 1980  
HOBBS, NEW MEXICO 88240

## APPLICATION FOR PERMIT TO DRILL OR DEEPEN

1a. TYPE OF WORK

DRILL



DEEPEN



b. TYPE OF WELL

OIL  
WELLGAS  
WELL

OTHER

SINGLE  
ZONEMULTIPLE  
ZONE

2. NAME OF OPERATOR

CHEVRON U.S.A. INC. ATTN: J. K. Ripley

3. ADDRESS AND TELEPHONE NO.

P. O. BOX 1150, MIDLAND, TX 79702 915-687-7826

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

At surface 1980' FSL &amp; 800' FEL UNIT I

At proposed prod. zone

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

15 miles South of MALJAMAR, NM

15. DISTANCE FROM PROPOSED\*

LOCATION TO NEAREST  
PROPERTY OR LEASE LINE, FT.

(Also to nearest drg. unit line, if any) 660'

18. DISTANCE FROM PROPOSED LOCATION\*

TO NEAREST WELL, DRILLING, COMPLETED,  
OR APPLIED FOR, ON THIS LEASE, FT.

660'

16. NO. OF ACRES IN LEASE

160

19. PROPOSED DEPTH

6000'

17. NO. OF ACRES ASSIGNED  
TO THIS WELL

40

20. ROTARY OR CABLE TOOLS

ROTARY

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

3688'

22. APPROX. DATE WORK WILL START\*

06/1/96 \*\*\*\*

## PROPOSED CASING AND CEMENTING PROGRAM

SIZE OF HOLE	GRADE, SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT
12-1/4"	8-5/8"	23	1400'	SURFACE
7-7/8"	5-1/2"	15.5	6000'	CIRCULATED

CHEVRON USA PROPOSES TO DRILL TO APPROXIMATELY 6000'. IF WELL IS DEEMED TO BE NON-COMMERCIAL, THE WELLBORE WILL BE PLUGGED AND ABANDONED AS PER FEDERAL REGULATIONS. PROGRAMS TO ADHERE TO ONSHORE OIL AND GAS REGULATIONS ARE OUTLINED IN THE ATTACHMENTS.

APPROVAL SUBJECT TO  
GENERAL REQUIREMENTS AND  
SPECIAL STIPULATIONS  
ATTACHED

\*\*\*\*\* PLEASE EXPEDITE \*\*\*\*\*

IN ABOVE SPACE DESCRIBE PROPOSED PROGRAM: If proposal is to deepen, give data on present productive zone and proposed new production 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 J. K. Ripley TITLE TECHNICAL ASSISTANT

DATE 05/20/96

(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 Is TIMOTHY J. BURKETITLE Area ManagerDATE JUN 2 1996

\*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.

OPER. ORGID NO. 4323PROPERTY NO. 18733POOL CODE ✓EFF. DATE 7-2-96API NO. 30-025-33499

DISTRICT I  
P.O. Box 1220, Hobbs, NM 88241-1220

DISTRICT II  
P.O. Drawer DD, Artesia, NM 88211-0719

DISTRICT III  
1000 Rio Brazos Rd., Artesia, NM 87410

DISTRICT IV  
P.O. Box 2088, Santa Fe, NM 87504-2088

State of New Mexico  
Energy, Minerals and Natural Resources Department

Form C-102  
Revised February 10, 1994  
Submit to Appropriate District Office  
State Lease - 4 Copies  
Fee Lease - 3 Copies

OIL CONSERVATION DIVISION

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

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

API Number <b>30-025-33499</b>	Pool Code	Pool Name <b>Wildcat</b> LUSK SAN ANDRES
Property Code <b>18133</b>	Property Name <b>KEEL</b> FEDERAL	Well Number <b>4</b>
OGRID No. <b>4323</b>	Operator Name <b>CHEVRON U.S.A. INC.</b>	Elevation <b>3688</b>

Surface Location

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
<b>1</b>	<b>33</b>	<b>18 S</b>	<b>32 E</b>		<b>1980</b>	<b>SOUTH</b>	<b>800</b>	<b>EAST</b>	<b>LEA</b>

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 <b>40</b>	Joint or Infill	Consolidation Code	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

	<b>OPERATOR CERTIFICATION</b>	
	<i>I hereby certify the the information contained herein is true and complete to the best of my knowledge and belief.</i>	
	Signature <u>J. K. Ripley</u> J. K. RIPLEY	
	Printed Name T.A.	
	Title 5/20/96	
	Date	
	<b>SURVEYOR CERTIFICATION</b>	
	<i>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.</i>	
	MAY 2, 1996	
	Date Surveyed JLP	
	Signature <u>J. Eidson</u> Professional Surveyor	
	NEW MEXICO 3239 5-03-96	
	P.O. Num 96-10527	
	Certificate No. July 31, WEST, 676 J. EIDSON, 3239 G. EIDSON, 12641	

## DRILLING PROGRAM

Attached to Form 3160-3  
Chevron U.S.A. Inc.  
Keel "A" Federal #4  
1980' FSL & 800' FEL  
Section 33, T18S, R32E  
Lea County, New Mexico

1. Geological Name of Surface Formation:

Aeolian

2. Estimated Tops Of Important Geological Markers:

Yates	3160'
Seven Rivers	3670'
San Andres	4910'
TD	6000'

3. Protection of Zones:

The fresh water sands will be protected by setting 8 5/8" casing at 1400' and circulating cement to surface. The oil and gas zones will be protected with 5 1/2" casing to total depth and circulating cement to surface.

4. Casing Program:

<u>Hole Size</u>	<u>Interval</u>	<u>Csg OD</u>	<u>Weight, Grade, Type</u>
12 1/4"	0-800'	8 5/8"	23#, WC-50, ST&C
7 7/8"	0-6000'	5 1/2"	15.5#, K-55, LT&C

Cement Program:

8 5/8" Surface Casing:  
(12 1/4" open hole)

Cemented to surface using Class "C"  
+ 4% Gel + additives, followed by Class  
"C" neat.

5 1/2" Production Casing  
(7 7/8" open hole)

Cemented to surface using Class "C" +  
16% Gel + Additives, followed by Class "C"  
neat.

The above cement slurries will be designed using caliper logs to circulate cement to surface.

5. Minimum Specifications for Pressure Control:

The blowout preventor equipment (BOP) shown in attachment will consist of a (2M system) double ram type (2000 psi WP) preventor. The unit will be hydraulically operated and equipped with blind and pipe type rams. BOP's will be installed on the 8 5/8" surface casing and will be utilized continuously until total depth is reached and production casing is in place and cemented. All BOP's and associated equipment will be tested before drilling out 8 5/8" casing shoe.

Pipe rams will be operated and checked each 24 hour period and each time the drill pipe is out of the hole. These function tests will be documented on the daily drillers log. A 2" kill line and 2" choke line will be incorporated in the drilling spool below the ram-type BOP. Other BOP equipment will include a kelly cock, floor safety valve, choke lines and choke manifold having 2000 psi WP rating.

6. Types and Characteristics of Proposed Mud System:

The well will be drilled to a total depth using fresh water, brine and polymer mud systems.

<u>DEPTH</u>	<u>TYPE</u>	<u>WEIGHT</u>	<u>VISCOSITY</u>	<u>WATER LOSS</u>
0'-800'	Fresh Water	8.8	34-36	No control
800'-6000'	Brine Water	10.0	28	No Control

7. A. A kelly cock will be in the drill string at all times.
- B. A full opening drill pipe stabbing valve having the appropriate connections will be on the rig floor at all times.
- C. No H<sub>2</sub>S will be encountered in this well.

8. Logging, Testing and Coring Program:

- A. Drill stem test will be based on geological sample shows (none planned).
- B. The open hole logging program will be:

Comp. Neutron / Spectral Lithodensity/ GR/ CAL/ DLL/ MSFL/ BHC  
SONIC

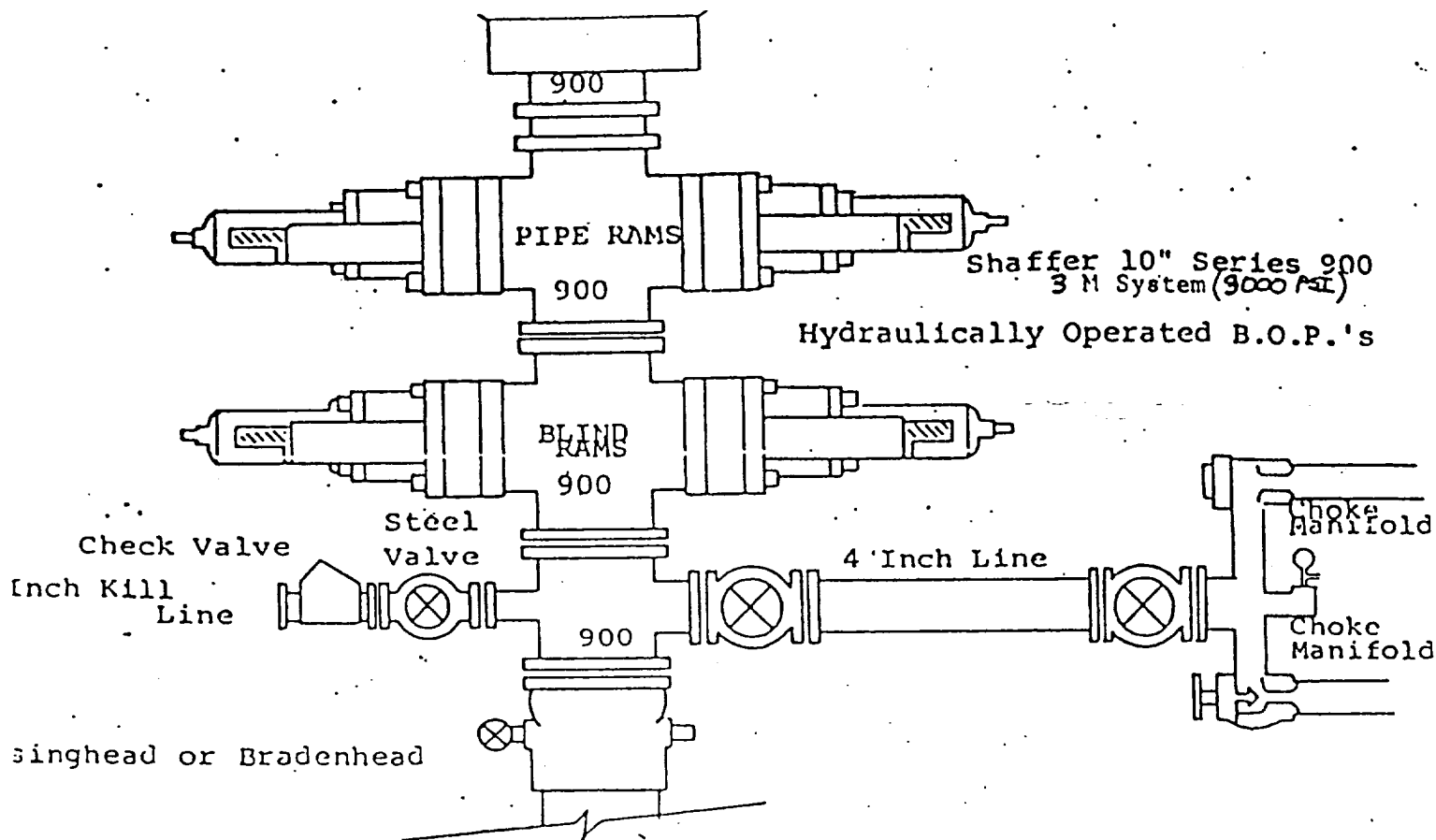
C. No coring is planned.

9. Abnormal Pressures, Temperature and Potential Hazards:

No abnormal pressures or temperatures are foreseen. The anticipated bottom hole temperature at total depth is 100 degrees and maximum bottom hole pressure is 2300 psig. No hydrogen sulfide gas has been reported or is known to exist at these depths in this area. No major loss circulation intervals have been encountered in adjacent wells.

10. Anticipated Starting Date and Duration of Operations:

Road and location preparation will not be undertaken until approval has been received from the BLM. The anticipated spud date is approximately June 1, 1996. The drilling operations should require approximately 12 days. If the well is deemed productive, completion operations will require, at minimum, an additional 30 days of testing to ascertain whether permanent production facilities will be constructed.



#### THE FOLLOWING CONSTITUTE MINIMUM BLOWOUT PREVENTER REQUIREMENTS

- All preventers to be hydraulically operated with secondary manual controls installed prior to drilling out from under casing.
- Choke outlet to be a minimum of 4" diameter.
- Kill line to be of all steel construction of 2" minimum diameter.
- All connections from operating manifolds to preventers to be all steel.
- hole or tube a minimum of one inch in diameter.
- The available closing pressure shall be at least 15% in excess of that required with sufficient volume to operate the B.O.P.'s.
- All connections to and from preventer to have a pressure rating equivalent to that of the B.O.P.'s.
- Inside blowout preventer to be available on rig floor.
- Operating controls located a safe distance from the rig floor.
- Hole must be kept filled on trips below intermediate casing. Operator not responsible for blowouts resulting from not keeping hole full.
- D. P. float must be installed and used below zone of first gas intrusion.