

PROPERTY NO. 9331

UNITED

POOL CODE 39366

DATE
OR

FORM APPROVED

OMB NO. 1004-0136

Expires: February 28, 1995

DEPARTMENT OF THE INTERIOR

BUREAU OF LANDS

APPLICATION FOR PERM

1a. TYPE OF WORK

DRILL ☒

DEEPEN ☐

b. TYPE OF WELL

OIL
WELL ☒

GAS
WELL ☐

OTHER

SINGLE
ZONE ☒

MULTIPLE
ZONE ☐

2. NAME OF OPERATOR

POGO PRODUCING COMPANY

3. ADDRESS AND TELEPHONE NO.

P.O. BOX 10340 MIDLAND, TEXAS 79702 915-682-6822

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

660' FSL & 1650' FEL SEC. 7 T22S-R32E LEA CO. NEW MEXICO

At proposed prod. zone SAME

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

Approximate 30 miles East of Carlsbad New Mexico

15. DISTANCE FROM PROPOSED*

LOCATION TO NEAREST
PROPERTY OR LEASE LINE, FT.
(Also to nearest drlg. unit line, if any)

660'

16. NO. OF ACRES IN LEASE

703.55

17. NO. OF ACRES ASSIGNED
TO THIS WELL

40

18. DISTANCE FROM PROPOSED LOCATION*

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

1320'

19. PROPOSED DEPTH

7400'

20. ROTARY OR CABLE TOOLS

Rotary

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

3696.3' GL.

22. APPROX. DATE WORK WILL START*

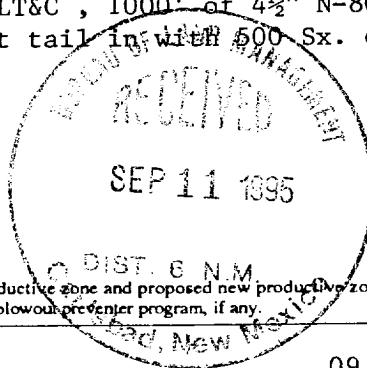
As soon as approved

23. PROPOSED CASING AND CEMENTING PROGRAM

Secretary's Potash

SIZE OF HOLE	GRADE, SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT
12 1/4"	J-55 8 5/8"	24 #	650'	500 Sx. Circulate to surface
7 7/8"	J-55, N-80 4 1/2"	11.6 #	7400'	1500 Sx Circulate to surface

1. Drill 12 1/4" hole to 650'. Run and set 650' of 8 5/8" J-55 24# ST&C casing. Cement with 300 Sx of light cement tail in with 200 Sx. Class "C" + 2% CaCl. Circulate cement to surface.
2. Drill 7 7/8" hole to 7400'. Run and set 7400' of 4 1/2" casing as follows: 500' of 4 1/2" N-80 11.6 # LT&C, 5900' of 4 1/2" J-55 11.6 # LT&C, 1000' of 4 1/2" N-80 11.6 # LT&C casing. Cement with 1000 Sx. of light cement tail in with 500 Sx. of premium cement. Circulate cement to surface.



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 prevention program, if any.

24.

SIGNED

Joel Janice

TITLE

Agent

DATE

09/09/95

(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 develop the lease thereon. CONDITIONS OF APPROVAL, IF ANY:

APPROVED BY

/s/ G. Heath J. Lucero

TITLE

Acting State Director

DATE

10-17-95

*See Instructions On Reverse Side

APPLICATION TO DRILL

POGO PRODUCING COMPANY
EAST LIVINGSTON RIDGE UNIT # 5
660' FSL & 1650' FEL SEC. 7
T22S-R32E LEA CO. NM

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

1. Location: 660' FSL & 1650' FEL SEC. 7 T22S-R32E LEA CO. NM
2. Elevation above sea level: 3696.3 GL.
3. Geologic name of surface formation: Quaternary Aeolian Deposits.
4. Drilling tools and associated equipment: Conventional rotary drilling rig using fluid as a circulating medium for solids removal.
5. Proposed drilling depth: 7400'
6. Estimated tops of geological markers:
Rustler Anhydrite 800'
Delaware Lime 4600'
Cherry Canyon 5600'
Brushy Canyon 7300'
7. Possible mineral bearing formations:
Delaware OIL
8. Casing program:

HOLE SIZE	INTERVAL	OD CSG	WEIGHT	THREAD	COLLAR	GRADE	COND.
12 $\frac{1}{4}$ "	0-650'	8 5/8"	24#	8-R	ST&C	J-55	New
7 7/8"	0-7400'	4 $\frac{1}{2}$ "	11.6#	8-R	LT&C	J-55 N-80	New

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9. Cementing and setting depth:

8 5/8" Surface Set 650' of 8 5/8" J-55 24# ST&C casing cement with 300 Sx. of light cement tail in with 200 Sx. Class "C" + 2% CaCl. Circulate cement to surface.

4 1/2" Production. Set 7400' of 4 1/2" J-55 & N-80 11.6# LT&C casing. Cement with 1000 Sx. light cement tail in with 500 Sx. of Premium cement. Circulate cement to surface.

10. Pressure Control Equipment: Exhibit "E". A Blow-out Preventer (no less than 900 series 3000 psi working pressure) consisting of double ram type preventer with bag type preventer. Units will be hydraulically operated. Exhibit "E-1" Choke Manifold and Closing Unit. Blind rams on top, pipe rams on bottom to correspond with size of drill pipe in use. BOP will be nipped up on 8 5/8" casing and remain on well until casing is run and cemented. BOP will be tested as well as choke manifold. BOP will be worked at least once each day while drilling and blind ram will be worked on trips when no drill pipe is in hole. Flow sensor PVT, full opening stabbing valve and upper kelley cock will be utilized. Anticipated BHP 3200 PSI and BHT 125°.

11. Proposed Mud Circulating System:

DEPTH	MUD. WT.	MUD VISC.	FLUID LOSS	TYPE MUD
0-650'	8.6-8.8	30-35	NC	Fresh water Spud mud add paper for seepage.
650-7400'	10.-10.2	29-35	NC*	Brine water add paper for seepage control lime pH control Gel to control viscosity.

* Water loss maybe lowered before the pay zone is drilled. In order to run logs and casing viscosity and water loss may have to be adjusted.

Sufficient mud materials to maintain mud properties, meet lost circulation and weight increase requirments will be kept at wellsite at all times. In order to run casing and log well viscosity may have to be raised and water loss may have to be lowered.

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660' FSL & 1650' FEL SEC. 7
T22S-R32E LEA CO. NM

12. Testing, Logging, and Coring Program:

- A. DST'S may be run if shows dictate.
- B. Mud logger will be employed from 4500' to TD.
- C. Open hole electric logs will be run. Gamma Ray, Caliper, CNL-DENSITY, Dual -Laterlog.
- D. No cores are planned.

13. Potential Hazards:

No abnormal pressures or temperature zones are expected in this well. (nothing abnormal encountered in offset well at this depth) Hydrogen Sulfide gas is not anticipated, however all precautions will be observed and detection equipment will be installed. No lost circulation is expected (none reported in this area). Estimated BHP 3200 PSI estimated BHT 125°. H₂S contingency plan is included in this APD.

14. Anticipated spud date and duration of operation:

Road and location will begin after the BUREAU OF LAND MANAGEMENT has approved this APD. Anticipated spud date is 10/25/95 . Drilling is expected to take 10-15 days. If production casing is run an additional 30 days will be required to complete and construct surface facilities in order to place well on production.

15. Other facets of operation:

After running casing cased hole correlation logs will be run from TD over the pay intervals. The Delaware pay will be perforated and stimulated. The well will be stimulated, swab tested and completed as an oil well

Submit to Appropriate
District Office
State Lease - 4 copies
Fee Lease - 3 copies

State of New Mexico
Energy, Minerals and Natural Resources Department

RECEIVED Form C-102
Revised 1-1-89

OIL CONSERVATION DIVISION

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

JUL 26 10 40 AM '93

DISTRICT I
P.O. Box 1980, Hobbs, NM 88240

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

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

WELL LOCATION AND ACREAGE DEDICATION PLAT

All Distances must be from the outer boundaries of the section

Operator POGO PRODUCING CO.			Lease EAST LIVINGSTON RIDGE UNIT		Well No. 5
Unit Letter 0	Section 7	Township 22 SOUTH	Range 32 EAST	NMPM	County LEA

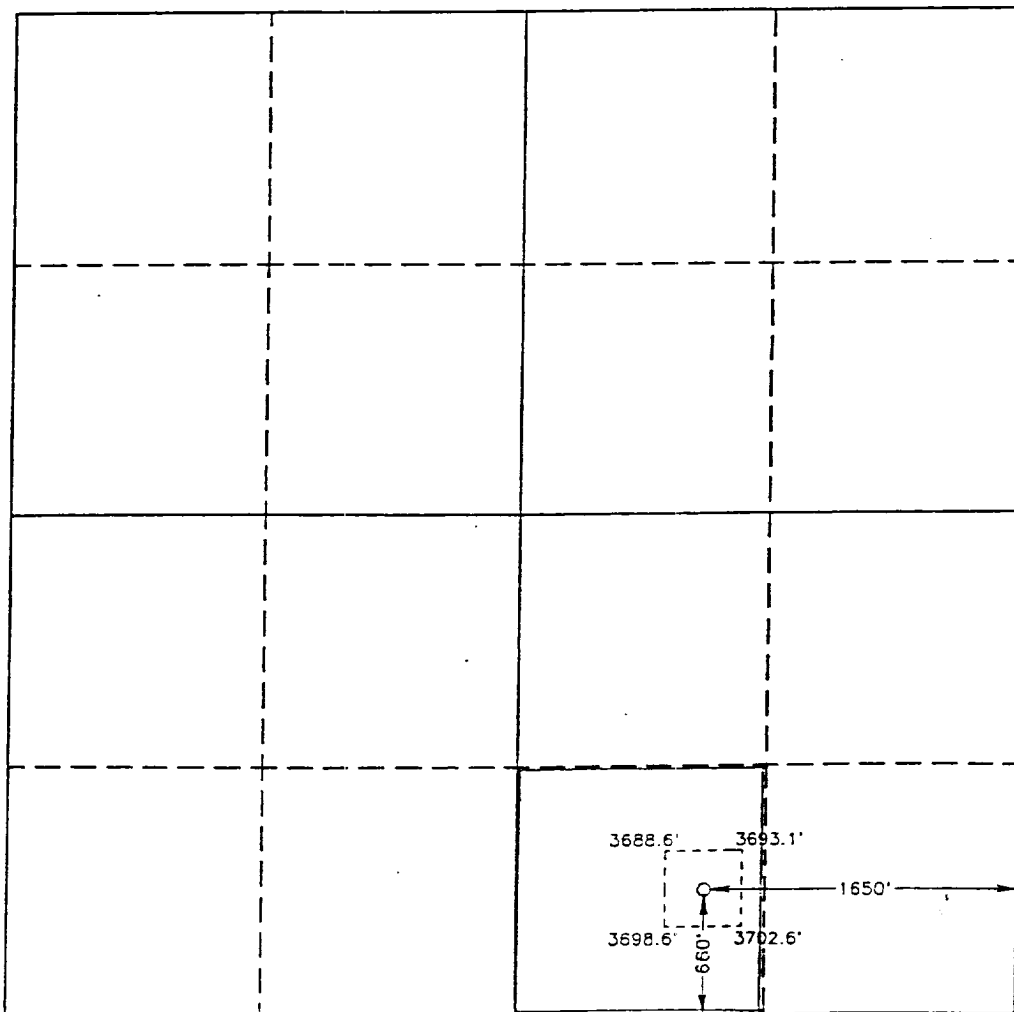
Actual Footage Location of Well:

660 feet from the SOUTH line and		1650 feet from the EAST line	
Ground Level Elev. 3696.3'	Producing Formation Delaware	Pool EAST Livingston Ridge Delaware UNDEVELOPED	Dedicated Acreage: 40 Acres

- Outline the acreage dedicated to the subject well by colored pencil or hatchure marks on the plat below.
- If more than one lease is dedicated to the well, outline each and identify the ownership thereof (both as to working interest and royalty).
- If more than one lease of different ownership is dedicated to the well, have the interest of all owners been consolidated by communization, unitization, force-pooling, etc.?
☐ Yes ☐ No If answer is "yes" type of consolidation _____

If answer is "no" list of owners and tract descriptions which have actually been consolidated. (Use reverse side of this form necessary.)

No allowable will be assigned to the well unit all interests have been consolidated (by communization, unitization, forced-pooling, otherwise) or until a non-standard unit, eliminating such interest, has been approved by the Division.



OPERATOR CERTIFICATION

I hereby certify the information contained herein is true and complete to the best of my knowledge and belief.

James M. C. Ritchie, Jr.

Signature
JAMES M. C. Ritchie, Jr.

Printed Name
AGENT

Position
Pogo Producing Company

Company
July 23, 1993

Date

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 knowledge and belief.

Date Surveyed
MAY 20, 1993

Signature & Seal of
Professional Surveyor
NEW MEXICO

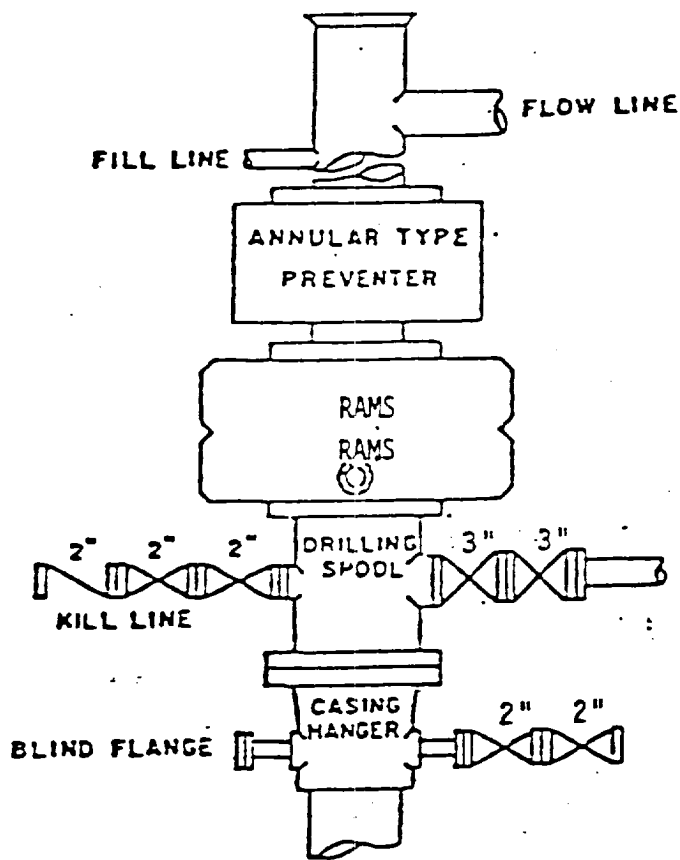
7977

Gary L. Jones

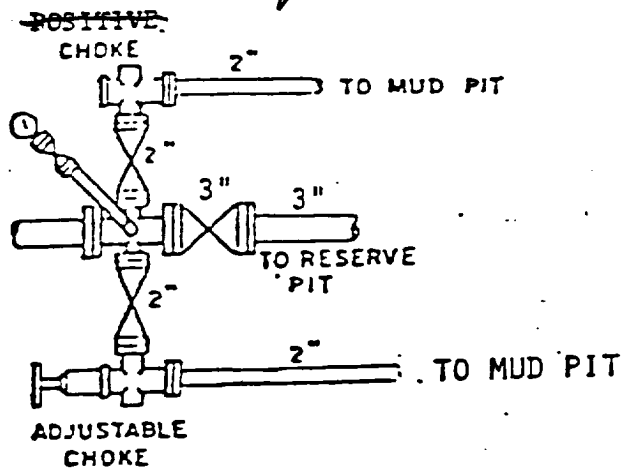
Certificate No. 7977

OSW. W. WEST, 675
RONALD J. EIDSON, 3239
GARY L. JONES, 7977

93-11-0918



Adjustable Only



BOP STACK

3000 PSI WORKING PRESSURE

BOP ARRANGEMENT