Form 9-331 C
(May 1963)

SUBMIT IN TRIPLICATE*
(Other instruct reverse side)

Form approved.
Budget Bureau No. 42-R1425.

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

APPLICATION FOR PERMIT TO DRILL, DEEPEN, OR PLUG BACK

1a. TYPE OF WORK
DRILL [X] DEEPEN [ ] PLUG BACK [ ]

b. TYPE OF WELL
OIL WELL [X] GAS WELL [ ] OTHER SINGLE ZONE [X] MULTIPLE ZONE [ ]

2. NAME OF OPERATOR
Tenneco Oil Company

3. ADDRESS OF OPERATOR
Box 1031, Midland, Texas

4. LOCATION OF WELL (Report location clearly and in accordance with any State requirements.*)
At surface 1980' FNL & 1980' FWL of Section 6
At proposed prod. zone

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

5. LEASE DESIGNATION AND SERIAL NO.
LC 071857-B

6. IF INDIAN, ALLOTTEE OR TRIBE NAME

7. UNIT AGREEMENT NAME

8. FARM OR LEASE NAME
USA-Continental "B" Unit

9. WELL NO.
1

10. FIELD AND POOL, OR WILDCAT
Undesignated

11. SEC., T., R., M., OR BLK. AND SURVEY OR AREA
Sec.6, T-19-S, R-32-E

12. COUNTY OR PARISH
Lea

13. STATE
New Mexico

15. DISTANCE FROM PROPOSED* LOCATION TO NEAREST PROPERTY OR LEASE LINE, FT. (Also to nearest drlg. line, if any) 1980

16. NO. OF ACRES IN LEASE 80

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. None

19. PROPOSED DEPTH 11,500'

20. ROTARY OR CABLE TOOLS
Rotary

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

22. APPROX. DATE WORK WILL START*

23. PROPOSED CASING AND CEMENTING PROGRAM

SIZE OF HOLE	SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT

See prognosis and plats attached

IN ABOVE SPACE DESCRIBE PROPOSED PROGRAM: If proposal is to deepen or plug back, 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 A. W. Lang TITLE Dist. Prod. Superintendent DATE 9-18-64

(This space for Federal or State office use)

PERMIT NO. _____ APPROVAL DATE _____

APPROVED BY _____ TITLE _____ DATE _____

CONDITIONS OF APPROVAL, IF ANY:

APPROVED
SEP 21 1964
A. R. BROWN
DISTRICT ENGINEER

*See Instructions On Reverse Side

NEW MEXICO OIL CONSERVATION COMMISSION

HOBBS OFFICE O. C. C.

SEP 22 10 53 AM '64

FORM C-128
Revised 5/1/57

WELL LOCATION AND ACREAGE DEDICATION PLAT

SEE INSTRUCTIONS FOR COMPLETING THIS FORM ON THE REVERSE SIDE

SECTION A

Operator	Lease	Well No.
TENNECO OIL COMPANY	USA CONTINENTAL "B" Unit	1

Unit Letter	Section	Township	Range	County
F	6	19 SOUTH	32 EAST	LEA

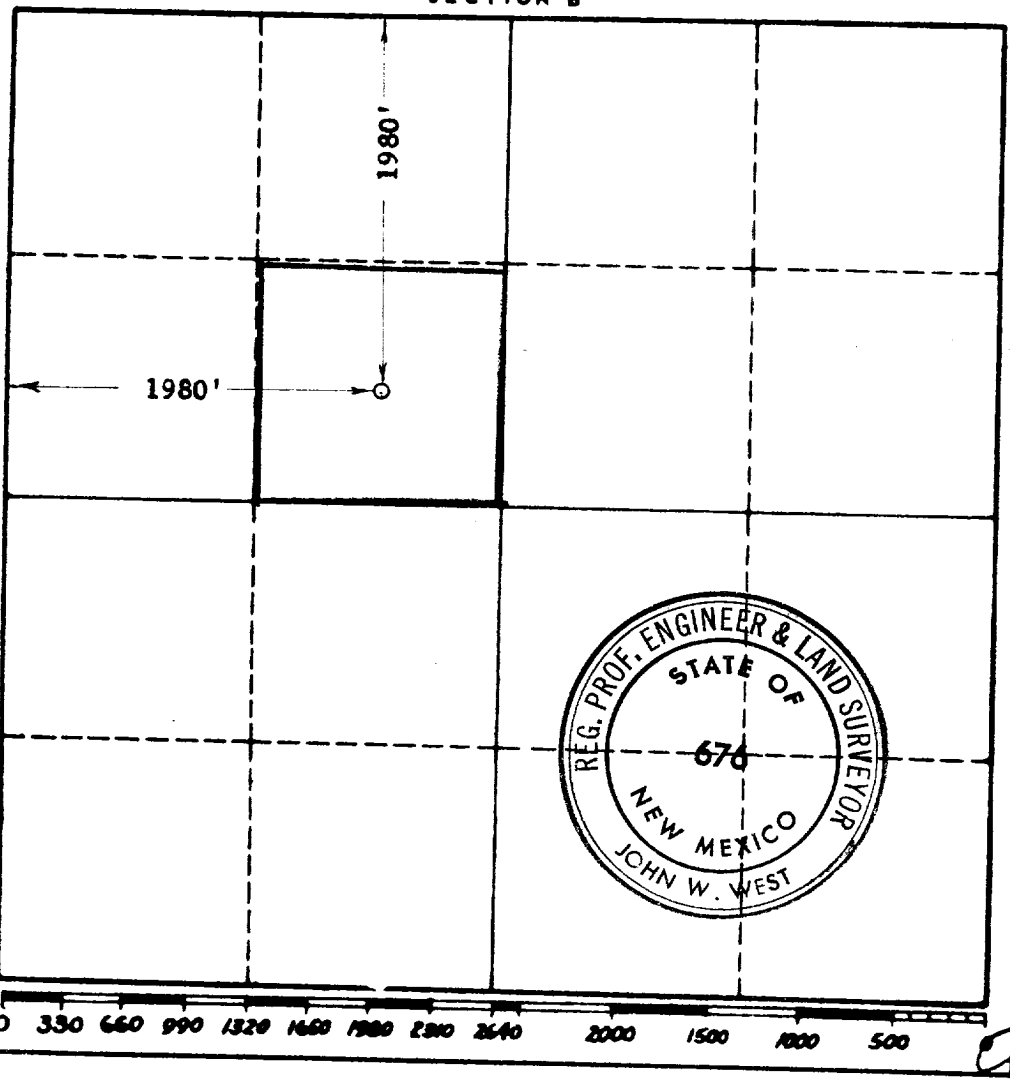
Actual Footage Location of Well:
1980 feet from the NORTH line and 1980 feet from the WEST line

Ground Level Elev.	Producing Formation	Pool	Dedicated Acreage:
3685 Est.	Strawn	Undesignated	40 Acres

1. Is the Operator the only owner in the dedicated acreage outlined on the plat below? YES X NO _____. *("Owner" means the person who has the right to drill into and to produce from any pool and to appropriate the production either for himself or for himself and another. (65-3-29 (e) NMSA 1935 Comp.)*
2. If the answer to question one is "no," have the interests of all the owners been consolidated by communitization agreement or otherwise? YES _____ NO _____. If answer is "yes," Type of Consolidation _____
3. If the answer to question two is "no," list all the owners and their respective interests below:

Owner	Land Description

SECTION B



CERTIFICATION

I hereby certify that the information in *SECTION A* above is true and complete to the best of my knowledge and belief.

Name A. W. Long

Position Dist. Prod. Supt.

Company Tenneco Oil Company

Date 9-18-64

I hereby certify that the well location shown on the plat in *SECTION B* 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
SEPT. 15, 1964

Registered Professional Engineer and/or Land Surveyor, JOHN W. WEST

John W. West

Certificate No.
N. M. - P.E. & L.S. NO. 676

HOBBS OFFICE O. C. C.
SEP 22 10 53 AM '64

DRILLING PROGNOSIS

LEASE: USA Continental "B" WELL NO.: 1

DISTRICT: Midland FIELD: Lusk Strawn

PROJECTED TD: 11500' EST. ELEVATION: 3670' DF

LOCATION: 1980' FNL & ~~2310~~ 1980' FWL of Section 6, T-19-S, R-32-E, Lea County, New Mexico

DRILLING, CASING AND CEMENTING:

1. Drill 17 1/2" hole to approximately 650'.
2. Cement 13 3/8", 48#/ft., H-40, ST&C casing @ 650' w/sufficient 50-50 Incor Pozmix w/2% $CaCl_2$ to circulate. Run bar centralizers on float shoe and bottom 2 joints. A guide shoe and insert float will be run.
3. If float holds, release pressure, WOC 6 hrs., install B.O.P., and nipple up.
4. After WOC 12 hrs., pressure test csg. w/1000 psi for 30 min. and drill out.
5. Drill 11" hole to approximately 3600'.
   NOTE: Loss of circulation may be encountered between 3000' and 3500'. If severe at this location, hole may be "dry drilled" to intermediate point or air equipment may be used. Do not exceed 20,000# bit weight and 60 rpm until 1st three drill collars are below casing shoe. Air equipment, if used, shall be at company expense.
6. At intermediate point, run 8 5/8" OD csg. as follows:
   0 - 3600', 32#/ft., J-55, ST&C
   A guide shoe will be used with insert float in second collar. Weld-on bar centralizers will be run on shoe and first two collars.
7. Cement with approximately 200 sx 50-50 Pozmix-Incor w/6% gel followed by 100 sx Incor containing 2% $CaCl_2$. Exact cement volume will be determined by caliper survey. Cement must fill to base of salt section. Condition mud ahead of cement with 1# Sodium Bichromate and 0.2# caustic soda per bbl.
8. If float holds, land casing as cemented, release pressure and nipple up BOP. WOC 12 hrs., pressure test casing to 1000 psi for 30 min. and drill out cement. Do not exceed 20,000# weight on bit and 60 rpm until 1st three drill collars are below casing shoe.
9. Drill 7 7/8" hole to approximately 11,500'.
10. Run 4 1/2" casing as follows:

    0 - 3300': 11.6 N-80, LT&C
    3300 - 8000': 11.6 J-55, ST&C
    8000 - 11500': 11.6 N-80, LT&C

    5 1/2" casing may be run as follows:

    0 - 1800': 17# N-80, LT&C
    1800 - 2800': 17# J-55, LT&C
    2800 - 5800': 15.5# J-55, LT&C
    5800 - 7600': 17# J-55, LT&C
    7600 - 11500': 17# N-80, LT&C

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(10. Cont'd.)

Casing will be run with float shoe, differential fill-up collar and sufficient reciprocating scratchers and centralizers to cover productive interval.

11. Cement w/sufficient 50-50 Pozmix "S" cement w/0.4% HR-4 to cover all zones of interest. 2 sx of lime in 10 bbls. water ahead of cement. Add 2 sx sodium bichromate to mud system prior to running casing. Tail in with Latex to cover 150' above pay zones. Approximately 60 sx required.
12. If floats hold, land casing as cemented, WOC 8 hrs., run temperature survey. (Well may be completed with rig over hole.)

DRILLING FLUIDS PROGRAM

1. Surface Hole - 0-650': Spud mud. Add gel and lime as needed to clear hole. Use fiber for loss of circulation as needed.
2. Intermediate Hole - 650-3600': Saturated brine water. Add water to maintain minimum viscosity necessary. Pretreat system w/fiber. (6 to 8 lbs./bbl.) at 3000'. If hole gives trouble, lower water loss to 20 cc to run casing.
   NOTE: If severe loss of circulation is encountered below 3000', hole will be "dry drilled" to intermediate point or air equipment may be installed. Drilling should not be stopped to combat loss of circulation.
3. Below Intermediate - 3600-11000': Clear water treated with surfactant, some treatment w/paper may be required to reduce losses. Add lime to keep pH above 10.
   11000 - T.D.: Use low-solids, CMC system with the following properties:

   Weight: 9.5 to 9.8
   Viscosity: 38-42
   Water Loss: 20-25

   Add chemicals and barite as required to maintain good hole conditions to T.D.

DRILLING TIME:

1. A recorder with torque, hook load, pump pressure, and rate of penetration will be required.
2. Record 10' drilling time from Kelly measurements from surface to T.D. on company forms.

DRILL PIPE MEASUREMENTS: Strain strap drill pipe at all casing points, coring points, and T.D.

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DRILLING SAMPLES:

1. Two sets of 10' samples will be caught, washed, sacked and labeled in bundles of 100' from surface to T.D.
2. Circulating and additional samples will be obtained as directed.
3. Quart samples will be obtained of all fluids recovered on DST.

DEVIATION:

1. Deviation surveys shall be taken on every trip or every 500', whichever is first.
2. Maximum deviation shall be allowed as follows:

0 - 2000'	2°	8000 - 10,000'	6°
2000 - 4000'	3°	10,000 - T.D.	7°
4000 - 6000'	4°		
6000 - 8000'	5°		

Deviation in the surface hole shall not exceed 1°.

3. Deviation should not change more than 1 1/2° in any 100' interval. If deviation change exceeds 1 1/2° per 100', string reamer shall be run to wipe out dogleg. If deviation change exceeds 2° per 100', hole shall be plugged back and straightened.

BLOW OUT PREVENTORS:

1. Series 900 or better, double ram, manual and remote control preventors shall be used from base of surface casing to T.D.
2. BOP shall be checked daily and reported on drilling report.
3. A rotating drilling head shall be used during any air or gas drilling.

DAILY DRILLING REPORT:

1. The AAODC drilling form shall be used.
2. This report shall be completely filled out except for crew hours.
3. Morning reports shall be made to the Midland District Office each weekday morning between 8:00 a.m. and 8:30 a.m. CST.

DRILL STEM TESTING: One DST may be taken in the following intervals:

11000 - 11250'

Added tests may be taken at discretion of wellsite geologists.

LOGGING: 1. Gamma-Ray Sonic from T.D. to base intermediate.
2. Induction ES through detailed sections as specified by wellsite engineer.

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FORMATION TOPS (APPROXIMATE):

T/Anhydrite	970'
T/Salt	2050'
B/Salt	2667'
T/Yates	2767'
T/Seven Rivers	3083'
T/Delaware	5240'
T/Bone Springs	6860'
T/1st Sand	8175'
T/2nd Sand	8993'
T/3rd Sand	9770'
T/Wolfcamp	10100'
T/Cisco Shale	10420'
T/Strawn	11000'
T/Strawn Reef	11000'

APPROVED:

A. R. Gibson

B. E. Desadier

A. W. Lang