Form 3160-3
(December 1990)

SUBMIT IN TRIPLICATE

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

FORM APPROVED
Budget Bureau No. 1004-0136
Expires: December 31, 1991

APPLICATION FOR PERMIT TO DRILL OR DEEPEN

5. Lease Designation and Serial No.: NM-18848

6. If Indian, Alottee or Tribe Name:

7. If Unit or CA, Agreement Designation:

1a. Type of Work: DRILL ☒ DEEPEN ☐

1b. Type of Well: OIL WELL ☒ GAS WELL ☐ OTHER — SINGLE ZONE ☒ MULTIPLE ZONE ☐

8. Well Name and Number: SDE '31' FEDERAL 10

2. Name of Operator: TEXACO EXPLORATION & PRODUCTION INC.

3. Address and Telephone No.: P.O. Box 3109, Midland Texas 79702 — 688-4606

9. API Well No.:

4. Location of Well (Report location clearly and in accordance with any State requirements.*)
At Surface
Unit Letter A : 660 Feet From The NORTH Line and 660 Feet From The EAST Line
At proposed prod. zone
SAME

10. Field and Pool, Explortory Area: TRISTE DRAW WEST & SAND DUNES SOUTH BONE SPRING

11. SEC., T., R., M., or BLK. and Survey or Area: Sec. 31, Township 23-S, Range 32-E

14. Distance in Miles and Direction from Nearest Town or Post Office*: 23 MILES EAST OF LOVING, NM

12. County or Parish: LEA — 13. State: NM

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: 1994.13

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: 9200'

20. Rotary or Cable Tools: ROTARY

21. Elevations (Show whether DF,RT, GR, etc.): GR-3612'

Carlsbad Controlled Water Basin

22. Approx. Date Work Will Start*: 5/15/95

23. PROPOSED CASING AND CEMENT PROGRAM

SIZE OF HOLE	GRADE, SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT
11	WC50, 8 5/8	24#	950'	325 SACKS - CIRCULATE
7 7/8	J55/L80, 5 1/2	17#	9200'	1600 SACKS - CIRCULATE

CEMENTING PROGRAM:

SURFACE CASING - 175 SACKS CLASS C W/ 4% GEL, 2% CACL2 (13.5 PPG, 1.74 CF/S, 9.11 GW/S). F/B 150 SACKS CLASS C W/ 2% CACL2 (14.8 PPG, 1.34 CF/S, 6.3 GW/S).

PRODUCTION CASING - 1ST STAGE - 750 SACKS 50/50 POZ CLASS H W/ 2% GEL, 5% SALT, 1/4# FLOCELE (14.2 PPG, 1.35 CF/S, 6.3 GW/S). DV TOOL @ 5300'. 2ND STAGE - 750 SACKS 35/65 POZ CLASS H W/ 6% GEL, 5% SALT, 1/4# FLOCELE (12.8 PPG, 1.94 CF/S, 10.4 GW/S). F/B 100 SACKS CLASS H (15.6 PPG, 1.18 CF/S, 5.2 GW/S).

THERE ARE NO OTHER OPERATORS IN THIS QUARTER QUARTER SECTION.

ESTIMATED DRILLING DAYS TO T.D.: 20 DAYS.

OPER. OGRID NO. 22351
PROPERTY NO. 15704
POOL CODE 53805
EFF. DATE 5/9/95
API NO. 30-025-32950

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 true verticle depths. Give blowout preventer program, if any.

24. I hereby certify that the foregoing is true and correct

SIGNATURE C. Wade Howard TITLE Eng. Assistant DATE 3/31/95

TYPE OR PRINT NAME C. Wade Howard

(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.

APPROVED BY _____ TITLE _____ DATE MAY - 8 1995

CONDITIONS OF APPROVAL, IF ANY: Okay MAY - 8 1995

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.

DeSoto/Nichols 10-94 ver 2.0

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

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

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

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

State of New Mexico
Energy, Minerals and Natural Resources Department

OIL CONSERVATION DIVISION
PO Box 2088
Santa Fe, NM 87504-2088

Form C-102
Revised February 10, 1994

Instructions on back

Submit to Appropriate District Office

State Lease-4 copies
Fee Lease-3 copies

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

[1] API Number	[2] Pool Code	[3] Pool Name
30-025-32950	53805	(59945) Delaware TRISTE DRAW WEST; SAND DUNES SOUTH BONE SPRINGS

[4] Property Code	[5] Property Name	[6] Well Number
15704	SDE "31" FEDERAL	10

[7] OGRID No.	[8] Operator Name	[9] Elevation
22351	TEXACO EXPLORATION & PRODUCTION, INC.	3612'

[10] Surface Location

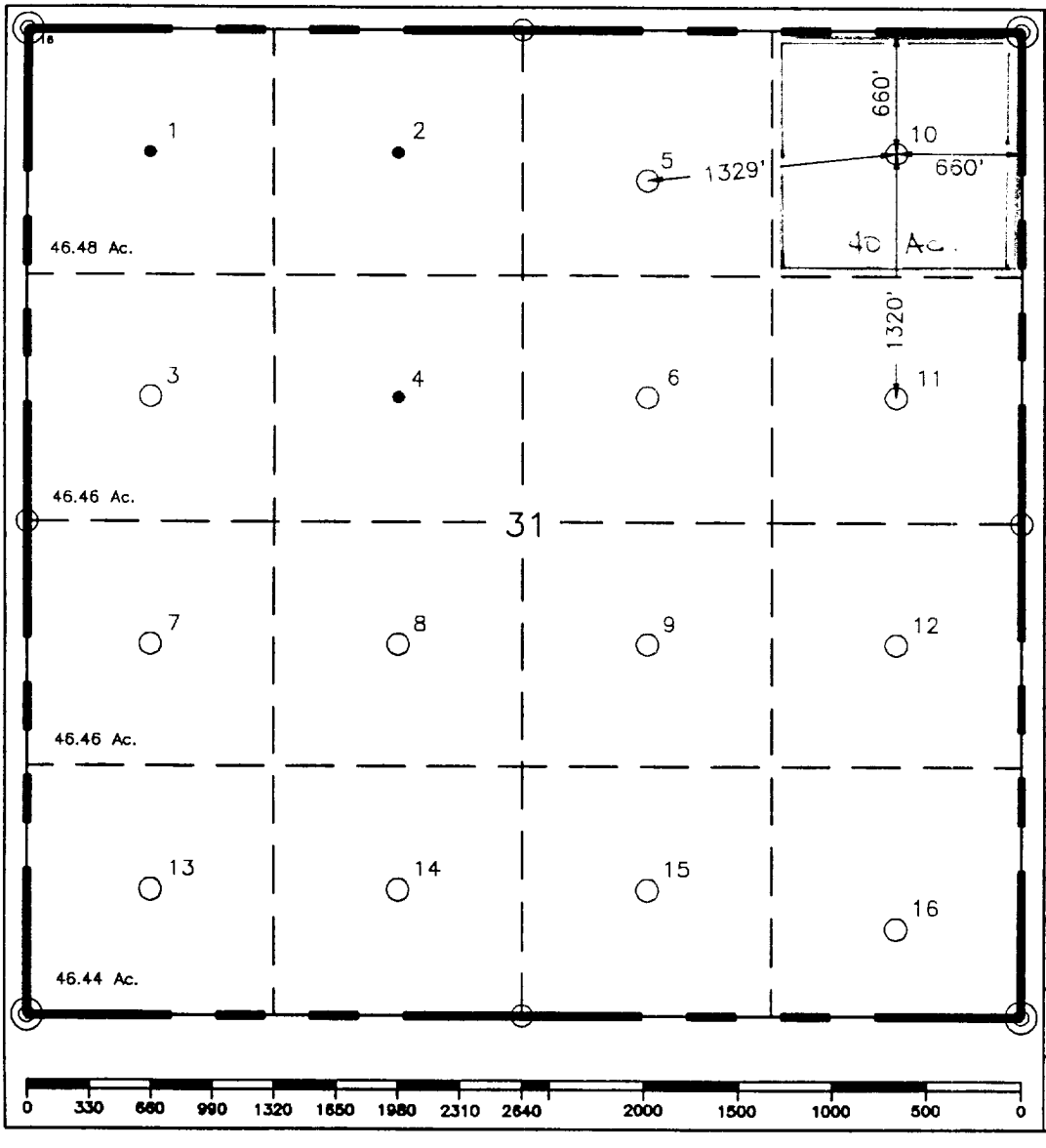
UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	[7] County
A	31	23-S	32-E		660'	North	660'	East	Lea

[11] 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	[7] County

[12] Dedicated Acres	[13] Joint or Infill	[14] Consolidation Code	[15] Order No.
40			

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.



[17] OPERATOR CERTIFICATION

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

Signature: C. Wade Howard

Printed Name: C. Wade Howard

Position: Engineering Assistant

Company: Texaco Expl. & Prod. Inc.

Date: March 24, 1995

[18] 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: February 22, 1995

Signature & Seal of Professional Surveyor

Certificate No. 7254 John S. Piper

Sheet 8 of 8

○ = Staked Location ● = Producing Well

DRILLING PROGRAM

SDE `31' FEDERAL WELL NO. 10

SURFACE DESCRIPTION:

The land surface in this area is relatively level with moderate sand dunes. Regionally, the land slopes to the Southwest. Vegetation consists mainly of scrub oak, mesquite, and range grasses.

FORMATION TOPS: Estimated KB Elevation: 3622'

Formation	Depth	Lithology	Fluid Content
Rustler	930'	Anhydrite, Salt	----
Salado	1245'	Salt	----
Delaware Mtn Group	4620'	Sandstone, Shale	Oil/Gas
Cherry Canyon	5550'	Sandstone, Shale	Oil/Gas
Brushy Canyon- Pay	7100'	Sandstone, Shale	Oil/Gas
Lower Brushy Canyon- Pay	8150'	Sandstone, Shale	Oil/Gas
Bone Spring- Pay	8570'	Limestone	Oil/Gas

The base of the salt section is found around 4390'. No abnormal pressures, temperatures, or hazardous gases are anticipated to be encountered in this well. Texaco recently drilled wells in this area and no H2S was encountered.

PRESSURE CONTROL EQUIPMENT:

A 3000 psi Dual Ram type preventer with rotating head will be used. (See Exhibit C). We do not plan to have an annular preventer. We will be able to achieve full closure of the well with the double ram preventer. It will be installed after surface casing is set. BOP will be tested each time it is installed on a casing string and at least every 29 days, and operated at least once each 24-hour period during drilling.

A PVT system will not be installed. We will be drilling thru the reserve pit and will circulate the steel pits one hour each tour to check for gains and losses and will be noted on the driller's log, which is Texaco's policy.

We do not plan to run an automatic remote-controlled choke. We will have installed and tested two manual, H2S trimmed, chokes.

CASING AND CEMENT PROGRAM:

The casing and cementing programs are detailed on Form 3160-3. All casing will be new.

Centralizer Program:

Surface Casing - Centralize the bottom 3 joints and every 4th to surface.

Production Casing - Centralize bottom 500' every other cplg. and above and below the DV tool.

MUD PROGRAM:

Depth	Type	Weight	Viscosity
0'-950'	Fresh Water	8.4	28
950'-7000'	Brine Water	10.0	29
7000'-9200'	Fresh Water Gel	8.4-8.8	45

Bottom Hole Pressure at T.D. estimated to be 8.4 PPG EMW.

LOGGING, TESTING:

GR-CAL-DSN-SDL and GR-CAL-DISFL surveys will be run.

A two-man Mud Logging Unit will be used from 4400' to 9200'.

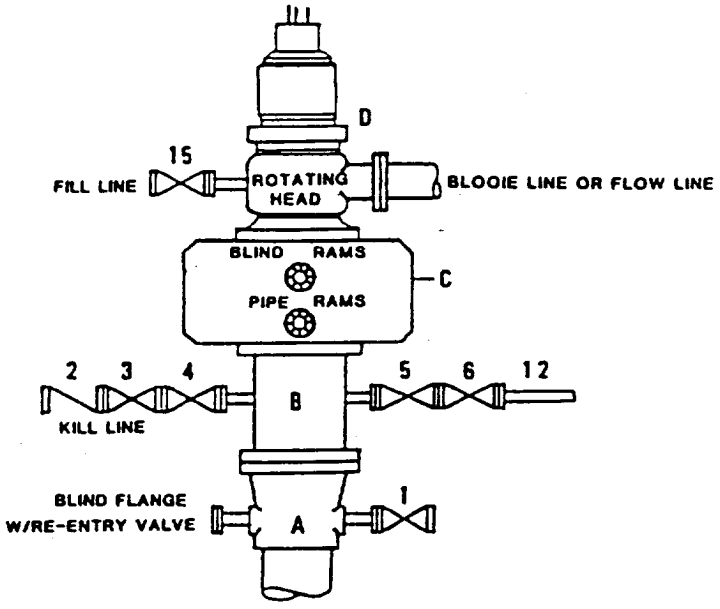
No drill stem tests will be conducted.

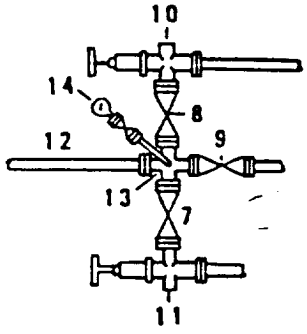
No cores will be taken.

DRILLING CONTROL
CONDITION II-B 3000 WP

FOR AIR DRILLING OR
WHERE NITROGEN OR AIR BLOWS ARE EXPECTED

H_2S TRIM REQUIRED
YES_____ NO X





DRILLING CONTROL

MATERIAL LIST - CONDITION II - B

A	Texaco Wellhead
B	3000# W.P. drilling spool with a 2" minimum flanged outlet for kill line and 3" minimum flanged outlet for choke line.
C	3000# W.P. Dual ram type preventer, hydraulic operated with 1" steel, 3000# W.P. control lines (where sub-structure height is adequate, 2 - 3000# W.P. single ram type preventers may be utilized).
D	Rotating Head with fill up outlet and extended Blooie Line.
1,3,4, 7,8,	2" minimum 3000# W.P. flanged full opening steel gate valve, or Halliburton Lo Torc Plug valve.
2	2" minimum 3000# W.P. back pressure valve.
5,6,9	3" minimum 3000# W.P. flanged full opening steel gate valve, or Halliburton Lo Torc Plug valve.
12	3" minimum schedule 80, Grade "B", seamless line pipe.
13	2" minimum x 3" minimum 3000# W.P. flanged cross.
10,11	2" minimum 3000# W.P. adjustable choke bodies.
14	Cameron Mud Gauge or equivalent (location optional in choke line).
15	2" minimum 3000# W.P. flanged or threaded full opening steel gate valve, or Halliburton Lo Torc Plug valve.

TEXACO, INC.
MIDLAND DIVISION
MIDLAND, TEXAS

SCALE	DATE	EST. NO.	DRG. NO.
DRAWN BY			
CHECKED BY			
APPROVED BY			

EXHIBIT C