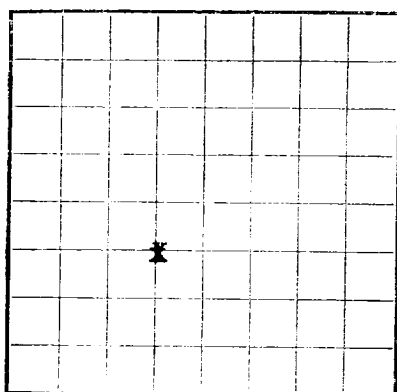


U. S. LAND OFFICE Las Cruces
SERIAL NUMBER LC-061936-A
LEASE OR PERMIT TO PROSPECT

LOCATE WELL CORRECTLY

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

LOG OF OIL OR GAS WELL

Company TEXACO Inc. Address P.O. Box 352, Midland, Texas
Lessor or Tract E.F. Ray Federal NCT-1 Field Paduca-DeLaware State New Mexico
Well No. 2 Sec. 10 T 25-S R. 32-E Meridian NMPM County New Mexico
Location 1980 ft. N of S Line and 1980 ft. E of W Line of Section 10 Elevation 3459' (DF)

The information given herewith is a complete and correct record of the well and all work done thereon so far as can be determined from all available records.

Signed M.B. HollandDate January 26, 1961Title Assistant District Superintendent

The summary on this page is for the condition of the well at above date.

Commenced drilling January 14, 1961 Finished drilling January 20, 1961

OIL OR GAS SANDS OR ZONES

(Denote gas by G)

No. 1, from 4728' to 4734' No. 4, from _____ to _____
No. 2, from _____ to _____ No. 5, from _____ to _____
No. 3, from _____ to _____ No. 6, from _____ to _____
Drilled with rotary tools and no water sands tested.

IMPORTANT WATER SANDS

No. 1, from _____ to _____ No. 3, from _____ to _____
No. 2, from _____ to _____ No. 4, from _____ to _____

CASING RECORD

Size casing	Weight per foot	Threads per inch	Make	Amount	Kind of shoe	Cut and pulled from	Perforated		Purpose
							From—	To—	
<u>7-5/8</u>	<u>24.00</u>	<u>8-R</u>	<u>H-40</u>	<u>311'</u>	<u>Howco</u>	<u>None</u>	<u>None</u>	<u>None</u>	<u>Surface</u>
<u>4-1/2</u>	<u>9.50</u>	<u>8-R</u>	<u>J-55</u>	<u>4777'</u>	<u>Howco</u>	<u>None</u>	<u>4728'</u>	<u>4734'</u>	<u>Production</u>

MUDDING AND CEMENTING RECORD

Size casing	Where set	Number sacks of cement	Method used	Mud gravity	Amount of mud used
<u>7-5/8</u>	<u>323'</u>	<u>250</u>	<u>Howco</u>		
<u>4-1/2</u>	<u>4787'</u>	<u>150</u>	<u>Howco</u>		

PLUGS AND ADAPTERS

Heaving plug—Material _____ Length _____ Depth set _____
Adapters—Material _____ Size _____

SHOOTING RECORD

Size	Shell used	Explosive used	Quantity	Date	Depth shot	Depth cleaned out

TOOLS USED

Rotary tools were used from _____ feet to 4787 feet, and from _____ feet to _____ feet
Cable tools were used from _____ feet to _____ feet, and from _____ feet to _____ feet

DATES

January 26, 1961 Put to producing January 24, 1961

The production for the first 24 hours was 132 barrels of fluid of which 93% was oil; 0% emulsion; 7% water; and 0% sediment. Gravity, °Bé. 39.9

If gas well, cu. ft. per 24 hours _____ Gallons gasoline per 1,000 cu. ft. of gas _____

Rock pressure, lbs. per sq. in. _____

EMPLOYEES

B.E. Thomas, Driller Tom Helms, Driller
M.B. Holland, Driller _____, Driller

FORMATION RECORD

FROM—	TO—	TOTAL FEET	FORMATION
<u>0</u>	<u>260</u>	<u>260</u>	<u>Caliche</u>
<u>260</u>	<u>792</u>	<u>532</u>	<u>Red Bed</u>
<u>792</u>	<u>1075</u>	<u>283</u>	<u>Anhy</u>
<u>1075</u>	<u>1167</u>	<u>92</u>	<u>Anhy & Salt</u>
<u>1167</u>	<u>3570</u>	<u>2403</u>	<u>Top of Salt</u>
<u>3570</u>	<u>4428</u>	<u>858</u>	<u>Anhy & Salt</u>
<u>4428</u>	<u>4697</u>	<u>269</u>	<u>Anhy & Lime</u>
<u>4697</u>	<u>4787</u>	<u>90</u>	<u>Delaware Sand</u>
Total Depth	<u>4787</u>		
PBTD	<u>4756</u>		

All measurements from rotary table or 8' above ground level.

Estimate No. 5390

Formation Tops

4 - USGS Anhy 792'
1 - NMOCC Top of Salt 1167'
1 - Mrs. Rhea Btm of Salt 4428'
1 - Pauley Pet. Co. Delaware Sand 4697'
1 - Division
1 - Field
1 - File

FORMATION RECORD—Continued

FROM—	TO—	TOTAL FEET	FORMATION
			Depth
			Deviation Second
			Degrees Off
			1/2
			950'
			1292'
			1606'
			1895'
			2203'
			2515'
			2858'
			3115'
			3422'
			3521'
			3963'
			4266'
			4537'
			4777'
			4787'
			2-1/2
			2-1/2
			2-3/4
			2-1/4
			2-1/4
			2-1/4
			2-3/4
			2
			2-1/2
			2-1/4
			2-1/4
			3/4
			1/2
			1/2

It is of the greatest importance to have a complete history of the well. Please state in detail the dates of redrilling, together with the reasons for the work and its results. If there were any changes made in the casing, state fully, and if any casing was "sidetracked" or left in the well, give its size and location. If the well has been dynamited, give date, size, position, and number of shots. If plugs or bridges were put in to test for water, state kind of material used, position, and results of pumping or bailing.

L. F. RAY FEDERAL NCT-1 WELL #2

Spudded 9-7/8" hole 1:30 P.M. January 14, 1961. Ran 311' of 7-5/8" O.D. casing and cemented at 323' with 25' of regular cement circulated. Plug at 300'. Tested before and after drilling plug for 30 minutes with 1000 PSI. Tested OK. Job complete 11:00 P.M. January 15, 1961.

Ran gamma Ray and Sonic logs January 19, 1961.
Ran 4777' of 4-1/2" O.D. casing and cemented at 4787' with 150 sx 4-3/4 Gel. Plug at 4756'. Tested 4-1/2" casing before and after drilling plug for 30 minutes with 1500 PSI. Tested OK. Job complete 8:00 P.M. January 21, 1961.

Perforate 4-1/2" O.D. casing with 2 jet shots per ft from 4728' to 4734'. Acidize with 250 gals 15% HST NHA.

On 8 Hr PT ending 7:00 A.M. January 25, 1961, well swabbed 41 BO and 3 BW.

GOR - 131M
Gravity - 39.9
Top of Ray - 4728'
Btm of Ray - 4734'
NMOC date - January 20, 1961
TEXACO Inc. date - January 25, 1961