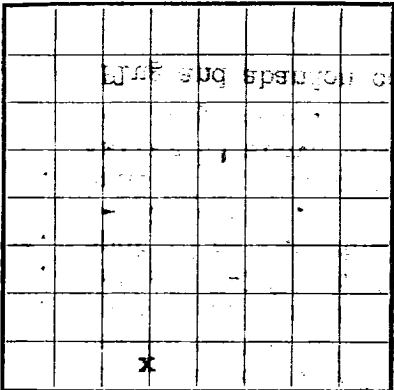




U. S. LAND OFFICE **Artesia**
SERIAL NUMBER **NM-01171**
LEASE OR PERMIT TO PROSPECT

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY
LOG OF OIL OR GAS WELL

Company **TEXACO Inc.** Address **P. O. Box 728 - Hobbs, New Mexico**
Lessor or Tract **K. McIntosh Federal** Field **Undesignated** State **New Mexico**
Well No. **2** Sec. **34** T. **15-S** R. **30-E** Meridian **NMPM** County **Chaves**
Location **330 ft. (N) of S Line and 1989 ft. (E) of W Line of Section 34** Elevation **4008' (DF)**
(Derrick floor relative to sea level)
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 _____ Title **Assistant District Superintendent**
Date **July 25, 1961**

The summary on this page is for the condition of the well at above date:
Commenced drilling **May 1**, 19 **61** Finished drilling **May 10**, 19 **61**

OIL OR GAS SANDS OR ZONES
(Denote gas by G)

No. 1, from **3167'** to **3175'** No. 4, from _____ to _____
No. 2, from **2665'** to **2675'** No. 5, from _____ to _____
No. 3, from **2713'** to **2719'** 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—	
7-5/8"	24.00	8-R	H-10	629'	Howco	None	None	None	Surface
4-1/2"	9.50	8-R	H-10	3205'	Baker	None	See	Above	Production

MUDDING AND CEMENTING RECORD

Size casing	Where set	Number sacks of cement	Method used	Mud gravity	Amount of mud used
7-5/8"	620'	500	Howco		
4-1/2"	3215'	200	Howco		

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 **3215'** feet, and from _____ feet to _____ feet
Cable tools were used from _____ feet to _____ feet, and from _____ feet to _____ feet

DATES

July 25, 19 **61** Put to producing **Dry**, 19 _____
The production for the first 24 hours was **None** barrels of fluid of which _____% was oil; _____% emulsion; _____% water; and _____% sediment. Gravity, °Bé. _____
If gas well, cu. ft. per 24 hours _____ Gallons gasoline per 1,000 cu. ft. of gas _____
Rock pressure, lbs. per sq. in. _____

EMPLOYEES

J. D. Funk, Driller **J. H. Dukeminier**, Driller
B. G. Campbell, Driller _____, Driller

FORMATION RECORD

FROM—	TO—	TOTAL FEET	FORMATION
0	285	285	Caliche
285	738	453	Redbed
738	1528	790	Top of Salt
1528	1696	168	Anhy
1696	2488	792	Top of Yates
2488	2848	360	Top of Queen
2848	3176	328	Top of San Andres
3176	3215	39	Lime & Sand
Total Depth	3215		
PBTD	3213		

All measurements from rotary table or 10' above ground level.

Formation Tops

Top of Anhy - **620'**
Top of Salt - **738'**
Top of Salt - **1528'**
Top of Yates - **1696'**
Top of Queen - **2488'**
Top of Grayburg - **2848'**
Top of San Andres - **3176'**

- 1 - USGS
- 1 - NMOCC
- 1 - U.S. Smelting
- 1 - L.T. Hinkle
- 1 - Ray Jacob
- 1 - C. P. Crawford
- 1 - C. E. Hinkle
- 1 - Division
- 1 - Field
- 1 - File

FORMATION RECORD—Continued

FROM—	TO—	TOTAL FEET	FORMATION
			Deviation Record
			Depth
			1/4 298
			1/2 590
			1/4 871
			1/2 1132
			1/4 1797
			1 1582
			1 2050
			1 2380
			1 2690
			1 2908
			3/4 3215

HISTORY OF OIL OR GAS WELL

16-43094-2 U. S. GOVERNMENT PRINTING OFFICE

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 balling.

K. McIntosh Federal Well No. 2

Spudded 11" hole 10:30 A.M., May 1, 1961. Ran 629' of 7-5/8" O.D. casing and cemented at 600' with 400 sx Inconel 62 gel and 100 sx regular. Plug at 625'. Cement circulated. Test before and after drilling plug for 30 minutes with 600 PSI. Tested 0.K. Job complete 5:45 A.M., May 2, 1961.

Core No. 1, 2445' to 2495', Recovered 50%, 100%, No show, May 2, 1961.
Core No. 2, 2495' to 2545', Recovered 50%, 100%, No show, May 6, 1961.
Core No. 3, 3135' to 3172', Recovered 31%, 84%, No show, May 9, 1961.
Core No. 4, 3172' to 3192', Recovered 20%, 100%, No show, May 9, 1961.
Core No. 5, 3195' to 3215', Recovered 20%, 100%, No show, May 10, 1961.

Ran 3205' of 4-1/2" O.D. casing and cemented at 3215' with 200 sx Inconel 62 gel. Plug at 3182'. Tested before and after drilling plug for 30 minutes with 1000 PSI. Tested 0.K. Job complete 10:30 P.M., May 12, 1961.

Perforate 4-1/2" O.D. casing with 2 jet shots per ft. 3167' to 3175'. Acidize with 500 gals 15% LST NHA. Frac with 10,000 gals Refined oil and 15,000 lbs. sand at 12.6 BPM. Swap well. Re-frac with 20,000 gals Refined oil and 20,000 lbs. sand at 9.5 BPM. Swap well. Perforate 4-1/2" O.D. casing with 2 jet shots per ft. 2665' to 2675' and 2713' to 2719'. Acidize with 500 gals LST NHA, Frac with 10,000 gals Refined oil and 15,000 lbs. sand at 17 BPM.

Install test pump equipment. Recover lost oil, prepare to test. Dry, prepare to perforate. Perforate 4-1/2" O.D. casing with 2 jet shots per ft. 2665' to 2675' and 2713' to 2719'. Frac with 10,000 gals Refined oil and 15,000 lbs. sand at 17 BPM. Could not complete. Prepare to plug and abandon.

1. Bottom of 4-1/2" casing was cemented with 200 sx, cement was drilled out to plug back depth of 3215', cast iron bridge plug was set at 2750', spot 2 sx cement on top of bridge plug, hole to be filled with heavy mud between plugs.
 2. Spot 25 sx plug at perforations, 2665' to 2675', and 2713' to 2719'.
 3. Cut off 4-1/2" casing at approximately 1650', recover same.
 4. Spot 15 sx cement plug from 50' below to 50' above top of non-recoverable 4-1/2" casing.
 5. Spot 15 sx cement plug at the surface, install 7-5/8" O.D. casing, install marker 4' above ground level as per U.S.O.S. regulations and clean location for inspection.
- Plug and abandon complete 4:00 P.M., July 23, 1961.