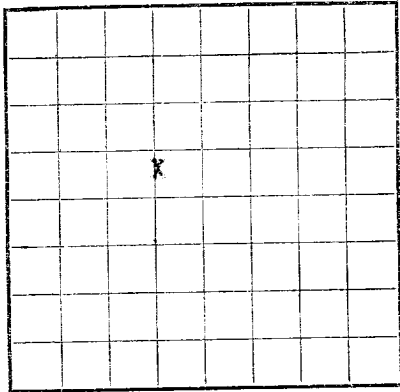
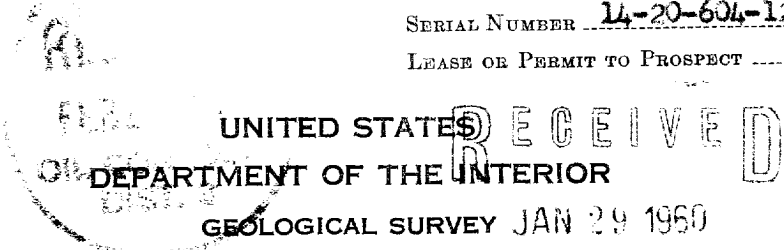


U. S. LAND OFFICE Ute Mountain Tribal
SERIAL NUMBER 14-20-604-121
LEASE OR PERMIT TO PROSPECT _____



LOCATE WELL CORRECTLY



U. S. GEOLOGICAL SURVEY
DURANGO, COLO.
LOG OF OIL OR GAS WELL

Company Pan American Petroleum Corporation Address Box 487, Farmington, New Mexico
Lessor or Tract Ute Mountain Tribal Field Verde Gallup State San Juan
Well No. 3 Sec. 28 T. 31N.R. 14W Meridian N.M.P.M. County San Juan
Location 2310 ft. [N. of S Line and 1940 ft. [E. of W Line of Section 28 Elevation 5533 (WDB)
(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 R. M. Bauer

Date January 26, 1960 Title Area Engineer

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

Commenced drilling November 10, 19 59 Finished drilling December 6, 19 59

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

No. 1, from 3766 to 3840 No. 4, from _____ to _____
No. 2, from _____ to _____ No. 5, from _____ to _____
No. 3, from _____ to _____ No. 6, from _____ to _____

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>8-5/8"</u>	<u>22.7</u>	<u>3110 Joint Amco</u>	<u>205</u>	<u>Guide</u>					<u>Surface</u>
<u>5-1/2"</u>	<u>14</u>	<u>8HT</u>	<u>J-55</u>	<u>3692</u>	<u>Guide</u>				<u>Oil String</u>

MUDDING AND CEMENTING RECORD

Size casing	Where set	Number sacks of cement	Method used	Mud gravity	Amount of mud used
<u>8-5/8"</u>	<u>216</u>	<u>160 sacks of cement</u>	<u>Halliburton 1 plug</u>		
<u>5-1/2"</u>	<u>3682</u>	<u>410 sacks of cement</u>	<u>Baker 2-stage</u>		
<u>Set 4" liner 3593-3826 with Baker Duplex shoe on bottom and reversed Texas pattern guide shoe on top and slotted 3717-3826.</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 3840 feet, and from _____ feet to _____ feet
Cable tools were used from _____ feet to _____ feet, and from _____ feet to _____ feet

DATES

Completed as pumping oil well Verde-Gallup field January 21, 19 60 Date first new oil produced: January 19, 19 60
The production for the first 24 hours was 17 barrels of fluid of which 98.5 % was oil; _____ %
emulsion; _____ % water; and 1.5 % 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

_____, Driller _____, Driller
A. Y. Old _____, Driller V. F. McKee _____, Driller
H. T. Clark _____, Driller Dale E. Petree _____

FORMATION RECORD

FROM—	TO—	TOTAL FEET	FORMATION
<u>0</u>	<u>1228</u>	<u>1228</u>	<u>Surface sands & shales.</u>
<u>1228</u>	<u>2495</u>	<u>1267</u>	<u>Mesaverde sands, shales & coals.</u>
<u>2495</u>	<u>3511</u>	<u>1016</u>	<u>Mancos shales.</u>
<u>3511</u>	<u>3766</u>	<u>255</u>	<u>Gallup sands & shales.</u>
<u>3766</u>	<u>3840</u>	<u>74</u>	<u>Verde Gallup pay sands & shales.</u>
<u>(Toos from 2 log)</u>			

Potential test January 21, 1960 pumped 16 barrels oil per day and 1 barrel water per day with 15-48" strokes per minute with 1-1/2" pump.

[illegible]

10-53084-2 U. S. GOVERNMENT PRINTING OFFICE

Total depth 3687'. 5-1/2" casing was set at 3682', with 2-stage cement collar at 3389'. Cemented first stage with 60 sacks 6 1/2 gal cement containing 2 pounds Tur-Ping per sack. Tested casing with 3000 psi for 30 minutes, which held with no indication of pressure drop. Opened cement to circulate between stages. Circulated trace of cement. Cemented second stage with 30 sacks 6 1/2 gal cement containing 2 pounds Tur-Ping per sack. Tested casing with 3000 psi which held with no indication of pressure drop. Drilled 2 stage collar to 3687'. Displaced mud with oil. Released rotary rig on November 27, 1959. Top of cement by temperature survey 2100'. Drilled well to total depth of 3870'. Set 4" liner 3593-3826 with Baker duplex shoe on bottom and reversed Texas pattern guide shoe on top and slotted 3717-3826. Landed tubing at 3808'. Ran rods and pump. After recovering load oil declined to low rate, mud-oil fracked with 38,300 gallons oil and 40,000 pounds sand. Breakdown pressure 1000 psi to 600 psi, average treating pressure 1300 psi, injection rate 50 barrels per minute. Landed tubing at 1805'. Completed as pumping oil well. Vande Grijp field January 21, 1960. Potential test January 21, 1960 pumped 16 barrels oil per day and 1 barrel water per day with 15-1/8" strokes per minute with 1-1/2" pump.