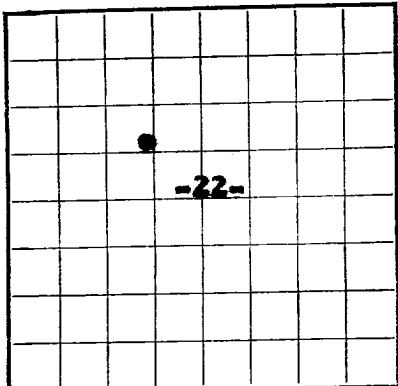


U. S. LAND OFFICE Santa Fe, N. M.
SERIAL NUMBER N. M. 04983
LEASE OR PERMIT TO PROSPECT _____



LOCATE WELL CORRECTLY

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

LOG OF OIL OR GAS WELL

Company San Juan Gas Corporation Address 1716 1st National Bldg., Tulsa, Okla.
Lessor or Tract _____ Field Cavilar State New Mexico
Well No. 22-C Sec. 22 T. 25N R. 2W Meridian N.M. Prime County Rio Arriba
Location 1763 ft. S. of N. Line and 1755 ft. E. of W. Line of Section 22 Elevation 7225
(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 Robert C. Larson

Date December 7, 1956 Title Vice President

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

Commenced drilling November 25, 19 56 Finished drilling December 1, 19 56

OIL OR GAS SANDS OR ZONES

(Denote gas by G)

No. 1 from 3370' to 3377' G No. 4 from _____ to _____
No. 2 from 3404' to 3433' G No. 5 from _____ to _____
No. 3 from _____ to _____ No. 6 from _____ to _____
IMPORTANT WATER SANDS
No. 1 from 33 to 142 No. 3 from _____ to _____
No. 2 from 303 to 327 No. 4 from _____ to _____

Size casing	Weight per foot	Thrust per inch	Make	Amount	Kind of shoe	Cut and pulled from	From	Purposes
<u>8-5/8</u>	<u>24</u>	<u>8 rd.</u>	<u>G.F.I.</u>	<u>78</u>	<u>Halliburton</u>	<u>None</u>		
<u>5-1/2</u>	<u>14</u>	<u>3-1/2</u>	<u>Halliburton</u>	<u>150</u>	<u>Halliburton</u>	<u>None</u>		
<u>2</u>	<u>33.50</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>78'</u>	<u>50 sacks</u>	<u>Halliburton</u>		
<u>5-1/2</u>	<u>3404'</u>	<u>150 sacks</u>	<u>"</u>		
<u>2</u>	<u>3350</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 3457 feet, and from _____ feet to _____ feet
Cable tools were used from _____ feet to _____ feet, and from _____ feet to _____ feet

DATES

December 7, 19 56 Put to producing Shut in, 19 56

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

If gas well, cu. ft. per 24 hours 954 mcf Gallons gasoline per 1,000 cu. ft. of gas _____

Rock pressure, lbs. per sq. in. 944 mcf

EMPLOYEES

W. H. Sorrow, Driller _____, Driller
R. E. Pitts, Driller _____, Driller

FORMATION RECORD

FROM—	TO—	TOTAL FEET	FORMATION
<u>Surface</u>	<u>142</u>	<u>142</u>	<u>Broken Sandstone and Shale.</u>
<u>142</u>	<u>220</u>	<u>78</u>	<u>Shale.</u>
<u>220</u>	<u>272</u>	<u>52</u>	<u>Sandstone.</u>
<u>272</u>	<u>308</u>	<u>36</u>	<u>Shale.</u>
<u>308</u>	<u>357</u>	<u>49</u>	<u>Sandstone.</u>
<u>357</u>	<u>392</u>	<u>35</u>	<u>Shale.</u>
<u>392</u>	<u>432</u>	<u>40</u>	<u>Sandstone.</u>
<u>432</u>	<u>452</u>	<u>20</u>	<u>Shale.</u>
<u>452</u>	<u>460</u>	<u>8</u>	<u>Sandstone.</u>
<u>460</u>	<u>492</u>	<u>32</u>	<u>Shale.</u>
<u>492</u>	<u>517</u>	<u>25</u>	<u>Sandstone.</u>
<u>517</u>	<u>597</u>	<u>80</u>	<u>Sandy Shale.</u>
<u>597</u>	<u>1572</u>	<u>975</u>	<u>Sandstone - Base of Wasatch.</u>
<u>1572</u>	<u>1700</u>	<u>228</u>	<u>Shale.</u>
<u>1700</u>	<u>2233</u>	<u>533</u>	<u>Sandstone with some Shale Streaks.</u>
<u>2233</u>	<u>2317</u>	<u>84</u>	<u>Shale.</u>
<u>2317</u>	<u>2353</u>	<u>36</u>	<u>Sandstone.</u>
<u>2353</u>	<u>2442</u>	<u>89</u>	<u>Shale.</u>
<u>2442</u>	<u>2448</u>	<u>6</u>	<u>Sandstone.</u>
<u>2448</u>	<u>2566</u>	<u>118</u>	<u>Shale.</u>
<u>2566</u>	<u>2675</u>	<u>109</u>	<u>Sandstone with Shale partings.</u>
<u>2675</u>	<u>2737</u>	<u>62</u>	<u>Shale.</u>

LEADS TO PERMIT TO PROCEED
FEDERAL NUMBER 100-31022
U.S. LAND OFFICE, SEATTLE, WASH.

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

LOG OF OIL OR GAS WELL

LOCATE SELF ONLY

Company - American Gas Corporation
Date of Transfer -
Title -
Location -
The information given above 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 -
Date -

Oil or Gas Sands or Slates
(Derrick gas per ft)
800 Bbl = 33600 gal
Compressed, filling 1000 gal drums, 1000 gal drums
The quantity on this page is for the condition of the well at above date
7450024 7450024

It is of the greatest importance to have a complete history of the well. Please state in detail the dates of re-drilling, 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.

Set 8-5/8" surface casing to 78 foot on November 25, 1956. Drilled 7-7/8 inch hole to total depth of 3457' on November 30, 1956. Set 5-1/2 inch 14-pound J-55 casing at 3404', float at 3092'. Cemented with 75 sacks of regular cement and 75 sacks of pozzolx with 40 pounds of liquid on December 1, 1956. Run Gamma Ray Log to 3452'. Gamma Ray measurements show 10% oil sand. Shot open hole with bear-gun charges at 3420', 3427' and 3434'. Faced down casing with 35,000 pounds of 20/40 sand and 500 barrels water. 1 finished with 1000 barrels water. Breakdown pressure - 5000; mud weight - 11000; maximum standing pressure - 13000; burst strength - 13000. Shipped with 40 56 barrels per minute. Run 2nd tubing to 3350'. Shipped with 40 56 barrels per minute. Running

HISTORY OF OIL OR GAS WELL

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

[illegible]

FORMATION RECORD—Continued