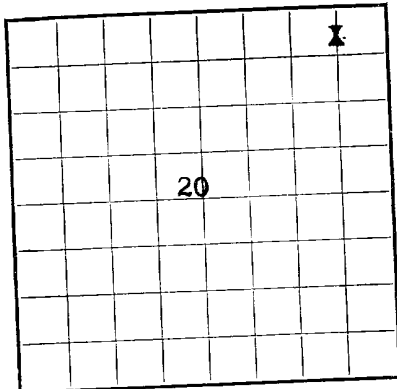
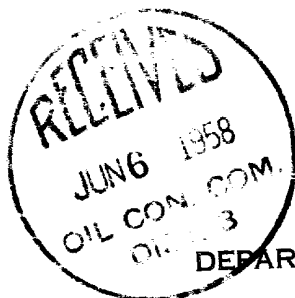


U. S. LAND OFFICE Santa Fe, N. M.
SERIAL NUMBER SF 078061
LEASE OR PERMIT TO PROSPECT _____

LOCATE WELL CORRECTLY

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

LOG OF OIL OR GAS WELL

Company Shell Oil Company Address 101 South Behrend, Farmington, N.M.
Lessor or Tract Federal-Carson Unit Field Bisti State New Mexico
Well No. 41-20 Sec. 20 T. 25N R. 11W Meridian NMPM County San Juan
Location 660 ft. N of N Line and 661.4 ft. E of E Line of Sec. 20 Elevation 6447 KB
(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.

Original signed by
B. W. SHEPARD
Signed _____ Title Exploitation Engineer

Date May 14, 1958

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

Commenced drilling September 4, 1957 Finished drilling September 12, 1957

OIL OR GAS SANDS OR ZONES

(Denote gas by G)

No. 1, from 4909 (gross) to 4945 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—	
8 5/8"	24	8	J&S	173	Baker	—	4909	4945	Surface
4 1/2"	9.5	8	—	5028	"	—			Production

MUDDING AND CEMENTING RECORD

Size casing	Where set	Number sacks of cement	Method used	Mud gravity	Amount of mud used
8 5/8"	183	100	Displacement	—	—
4 1/2"	5038	150	"	—	—

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 0 feet to 5040 feet, and from _____ feet to _____ feet
Cable tools were used from _____ feet to _____ feet, and from _____ feet to _____ feet

DATES

_____ May 14, 1958 Put to producing May 3, 1958
The production for the first 24 hours was 620 barrels of fluid of which 99.7 % was oil; _____ %
emulsion; _____ % water; and 0.3 % sediment. Gravity 88° Bé. Approx. 39° API
If gas well, cu. ft. per 24 hours _____ Gallons gasoline per 1,000 cu. ft. of gas _____
Rock pressure, lbs. per sq. in. _____

EMPLOYEES Brinkerhoff Drilling Company

W. Black, Driller E. Babcock, Driller
J. Speaker, Driller _____, Driller

FORMATION RECORD

FROM—	TO—	TOTAL FEET	FORMATION
1220	1407	187	Pictured Cliffs
1407	1718	204 5	Lewis
1718	2067	455	Cliff House
2067	3737	1670	Allison Menefee
3737	3900	163	Point Lookout
3900	4802	902	Mancos
4 028			Gallup

[OVER]

SHELL OIL COMPANY

Carson Unit

WELL NO. 41-20

DRILLING REPORT

FOR PERIOD ENDING

9-12-57

Bisti

(FIELD)

San Juan, New Mexico

(COUNTY)

20

(SECTION OR LEASE)

T25N R11W

(TOWNSHIP OR RANCHO)

DAY	DEPTHS		REMARKS
	FROM	TO	
9-4 to 9-5	0	1800	Location: 660' S and 661.4' W of NE Corner Sec.20, T25N, R11W, NMPM, San Juan County New Mexico. Elevation: KB 6447.1' DF 6445.8' GR 6438.7' Spudded 5:30 P.M. 9-4-57. Ran and cemented (173') 8 5/8", 24#, J-55, J & S casing at 183' with 100 sacks cement treated with 2% calcium chloride. Good returns to surface. Flanged up and waited on cement. Pressure tested casing and BOP with 700 psi, OK.
9-6 to 9-11	1800	5015	<u>Drilled 3215'</u>: Twisted off at 5015' leaving 10 drill collars in hole, recovered with overshot.
9-12	5015	5040	<u>Drilled 25'</u>: Ran Electrical Survey and Microlog. Ran and cemented (5028') 4 1/2", 9.5# casing at 5038' with 150 sacks cement treated with 4% gel. Displaced with oil. Released rig 9:30 P.M. 9-12-57. Checked BOP daily. Mud Summary Wt. 9 - 9.8#/gal. Vis. 50 - 95 sec WL 7.1 - 10 cc FC 2/32" Contractor: Brinkerhoff Drilling Company Drillers: E. Babcock W. Black J. Speaker

CONDITION AT BEGINNING OF PERIOD				
HOLE			CASING SIZE	DEPTH SET
SIZE	FROM	TO		
DRILL PIPE SIZES				

R. D. Allen

SHELL OIL COMPANY

Carson Unit

WELL NO. 41-20

Bisti

(FIELD)

San Juan, New Mexico

(COUNTY)

DRILLING REPORT

FOR PERIOD ENDING

20

(SECTION OR LEASE)

T25N R11W

(TOWNSHIP OR RANGHO)

DAY	DEPTHS		REMARKS
	FROM	TO	
4-22	5040	TD	Ran Gamma Ray - collar log. Perforated four $\frac{1}{2}$ " bullet holes/ft. 4909-18, 4922-28, 4936-45.
4-26			Spotted 200 gal. mud acid or perforations. Sand oil fracture #1. Broke down formation 2400 psi. Injected 49,000 gal. crude and 50,000 # sand + 55 nylon core ball. - resulting in 3 pressure increases 2850 to 2900 psi, 2900 to 3000 psi and 3000 to 3200 psi breaking to 3000. Maximum pressure 3200 psi, minimum pressure 2800 psi, average rate 34.1 bbl/min. Flushed with 160 bbls crude.
4-27 to 4-28			Cleaned out frac sand from 4950' to 5010'. Landed tubing at 4910'. Swabbed a total of 190 bbls and well started flowing.
4-29 to 5-2			Flowed and recovered all load and frac oil 1400 bbls.
5-3			INITIAL PRODUCTION: 618 Flowing 620 B/D gross, 748 B/D clean, cut 0.3%, Gas 545 MCF/D, GOR 730, 64/64" bean, TP 160 Completed 5-3-58

CONDITION AT BEGINNING OF PERIOD

HOLE			CASING SIZE	DEPTH SET
SIZE	FROM	TO		
12 $\frac{1}{4}$ "	0	190	8 5/8"	183
7 7/8"	190	5040	4 $\frac{1}{2}$ "	5038
DRILL PIPE 4 $\frac{1}{2}$ "				
SIZES				

E. B. Johnstone