Form 5-330
(Rev. 5-63)

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

SUBMIT IN DUPLICATE
(See other instructions on reverse side)

Form approved.
Budget Bureau No. 42-R355.5.

WELL COMPLETION OR RECOMPLETION REPORT AND LOG*

1a. TYPE OF WELL: OIL WELL ☐ GAS WELL ☐ DRY ☒ Other

b. TYPE OF COMPLETION: NEW WELL ☐ WORK OVER ☐ DEEP-EN ☐ PLUG BACK ☐ DIFF. RESVR. ☐ Other P & A

2. NAME OF OPERATOR: Shell Oil Company

3. ADDRESS OF OPERATOR: P. O. Box 1509, Midland, Texas 79701

4. LOCATION OF WELL (*Report location clearly and in accordance with any State requirements*)*
At surface 1980' FNL & 660' FEL, Section 18, T-9-S, R-30-E, NMPM, Chaves County, New Mexico
At top prod. interval reported below: Same
At total depth: Same

5. LEASE DESIGNATION AND SERIAL NO.: NM-0354478
6. IF INDIAN, ALLOTTEE OR TRIBE NAME: --
7. UNIT AGREEMENT NAME: --
8. FARM OR LEASE NAME: Hook Federal
9. WELL NO.: 1
10. FIELD AND POOL, OR WILDCAT: Cato San Andres
11. SEC., T., R., M., OR BLOCK AND SURVEY OR AREA: Section 18, T-9-S, R-30-E, NMPM, Chaves County
12. COUNTY OR PARISH: Chaves
13. STATE: New Mexico

14. PERMIT NO.: -- DATE ISSUED: --

15. DATE SPUDDED: 11-8-68
16. DATE T.D. REACHED: 11-19-68
17. DATE COMPL. (*Ready to prod.*):
18. ELEVATIONS (DF, RKB, RT, GR, ETC.)*: 4001' DF, 3992' GR
19. ELEV. CASINGHEAD: --
20. TOTAL DEPTH, MD & TVD: 3500'
21. PLUG, BACK T.D., MD & TVD:
22. IF MULTIPLE COMPL., HOW MANY*:
23. INTERVALS DRILLED BY: → ROTARY TOOLS: 0 - 3500' CABLE TOOLS: --
24. PRODUCING INTERVAL(S), OF THIS COMPLETION—TOP, BOTTOM, NAME (MD AND TVD)*:
25. WAS DIRECTIONAL SURVEY MADE: No
26. TYPE ELECTRIC AND OTHER LOGS RUN: Schlumberger, GR, SNP, GRS, MLL
27. WAS WELL CORED: Yes

28. CASING RECORD (*Report all strings set in well*)

CASING SIZE	WEIGHT, LB./FT.	DEPTH SET (MD)	HOLE SIZE	CEMENTING RECORD	AMOUNT PULLED
8 5/8"	32# 24#	275'	12 1/4"	200 sacks	50 sacks

29. LINER RECORD

SIZE	TOP (MD)	BOTTOM (MD)	SACKS CEMENT*	SCREEN (MD)

30. TUBING RECORD

SIZE	DEPTH SET (MD)	PACKER SET (MD)

31. PERFORATION RECORD (*Interval, size and number*)

32. ACID, SHOT, FRACTURE, CEMENT SQUEEZE, ETC.

DEPTH INTERVAL (MD)	AMOUNT AND KIND OF MATERIAL USED
3350' - 3250'	Plug #1 - 32 sacks cement
1400' - 1300'	Plug #2 - 75 sacks cement
325' - 225'	Plug #3 - 38 sacks cement
20' - Surface	Plug #4 - 10 sacks cement

33.* PRODUCTION

DATE FIRST PRODUCTION	PRODUCTION METHOD (*Flowing, gas lift, pumping—size and type of pump*)	WELL STATUS (*Producing or shut-in*)
--	--	P & A

DATE OF TEST	HOURS TESTED	CHOKE SIZE	PROD'N. FOR TEST PERIOD	OIL—BBL.	GAS—MCF.	WATER—BBL.	GAS-OIL RATIO
--	--	--	→	--	--	--	--

FLOW. TUBING PRESS.	CASING PRESSURE	CALCULATED 24-HOUR RATE	OIL—BBL.	GAS—MCF.	WATER—BBL.	OIL GRAVITY-API (CORR.)
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34. DISPOSITION OF GAS (*Sold, used for fuel, vented, etc.*)
TEST WITNESSED BY

RECEIVED
NOV 27 1968
U. S. GEOLOGICAL SURVEY
ROSWELL, NEW MEXICO

35. LIST OF ATTACHMENTS: Deviation, logs

36. I hereby certify that the foregoing and attached information is complete and correct as determined from all available records

Original Signed By
SIGNED J. D. DUREN J. D. Duren TITLE Staff Petrophysical Engineer DATE November 26, 1968

ACCEPTED FOR RECORD
J. W. Sutherland
District Engineer

*(See Instructions and Spaces for Additional Data on Reverse Side)

INSTRUCTIONS

General: This form is designed for submitting a complete and correct well completion report and log on all types of lands and leases to either a Federal agency or a State agency, or both, pursuant to applicable Federal and/or State laws and regulations. Any necessary special instructions concerning the use of this form and the number of copies to be submitted, particularly with regard to local, area, or regional procedures and practices, either are shown below or will be issued by, or may be obtained from, the local Federal and/or State office. See instructions on items 22 and 24, and 33, below regarding separate reports for separate completions.
If not filed prior to the time this summary record is submitted, copies of all currently available logs (drillers, geologists, sample and core analysis, all types electric, etc.), formation and pressure tests, and directional surveys, should be attached hereto, to the extent required by applicable Federal and/or State laws and regulations. All attachments should be listed on this form, see item 35.
Item 4: If there are no applicable State requirements, locations on Federal or Indian land should be described in accordance with Federal requirements. Consult local State or Federal office for specific instructions.
Item 18: Indicate which elevation is used as reference (where not otherwise shown) for depth measurements given in other spaces on this form and in any attachments.
Items 22 and 24: If this well is completed for separate production from more than one interval zone (multiple completion), so state in item 22, and in item 24 show the producing interval, or intervals, top(s), bottom(s) and name(s) (if any) for only the interval reported in item 33. Submit a separate report (page) on this form, adequately identified, for each additional interval to be separately produced, showing the additional data pertinent to such interval.
Item 29: *"Sacks Cement":* Attached supplemental records for this well should show the details of any multiple stage cementing and the location of the cementing tool.
Item 33: Submit a separate completion report on this form for each interval to be separately produced. (See instruction for items 22 and 24 above.)

37. SUMMARY OF POROUS ZONES:
SHOW ALL IMPORTANT ZONES OF POROSITY AND CONTENTS THEREOF; CORED INTERVALS; AND ALL DRILL-STEM TESTS, INCLUDING DEPTH INTERVAL TESTED, CUSHION USED, TIME TOOL OPEN, FLOWING AND SHUT-IN PRESSURES, AND RECOVERIES

FORMATION	TOP	BOTTOM	DESCRIPTION, CONTENTS, ETC.
n Andres laughter)	3300'	3358'	Water Bearing

38. GEOLOGIC MARKERS

NAME	TOP MEAS. DEPTH	TOP TRUE VERT. DEPTH
Base Red Beds	793'	3200'
Yates	1379'	2622'
San Andres	2553'	1448'
San Andres Marker	3108'	893'
San Andres "A"	3255'	746'
San Andres "B-C"	3338'	663'

U.S. GOVERNMENT PRINTING OFFICE: 1963—O-683636

NEW MEXICO OIL CONSERVATION COMMISSION

OPERATOR Shell Oil Company ADDRESS P. O. Box 1509, Midland, Texas 79701

FIELD Cato San Andres LEASE Hook Federal WELL NO. 1

LOCATION 1980' FNL & 660' FEL, Section 18, T-9-S, R-30-E, NMPM, Chaves County, New Mexico

DEVIATION RECORD

275' = 1/4°
770' = 1/4°
1714' = 3/4°
2211' = 1°
2731' = 3/4°
2968' = 1°
3073' = 1°
3180' = 1°
3238' = 2

Certification of personal knowledge of Deviation Record:

I hereby certify that I have personal knowledge of the data and facts placed on this form, and that such information is true and complete.

J. A. Wagenhofer
Signature

Division Drilling Superintendent
Company

STATE OF TEXAS
COUNTY OF MIDLAND

Before me, the undersigned authority, on this day personally appeared J. A. Wagenhofer, known to me to be the person whose name is subscribed hereto, who, after being duly sworn, on oath states that he is acting at the direction and on behalf of the operator of the well identified in this instrument and that such well was not intentionally deviated from the vertical.

J. A. Wagenhofer

~~Drilling Supervisor~~
Title

Sworn and Subscribed to before me, this the 26th day of November, 19 68

Notary Public in and for Midland County, Texas.

HOOK FEDERAL NO. 1 CATO (SAN ANDRES)
CHAVES COUNTY, NEW MEXICO

Core No. 1 3259'-3263' Cut 4' Rec. 4' 3259-63 Dol., blk-gy I/III FM A W/2 1/2 anhy. nodules 3259-61 shale stk 3262

Core No. 2 3263'-3314' Cut 51' Rec. 51' 3263-75 Dol. blk-gy I/III FMA W/3/8" anhy nodules thru of bleeding oil from hairline fractures 3269-72 3275-80 Dol., blk gy I/III FMC, few scattered vugs bleeding oil from hairline fractures 3280-82 Dol. A.A. 3/8 anhy. nodules 3282-87 Dol. I/III FMC numerous hairline fractures bleeding oil from fractures and vugs 1/2 - 1 anhy. nodules 3287-95 Dol. I/III FA w/hairline fractures bleeding oil lightly 3393-3395 3295-3305 Dol. tan-gy I/III FB some small vugs 3299-3000 1/2 - 2" anhy. nodules 3305-3309 Dol. A.A. bleeding water from small vugs 3307' small anhy. nodules thruout
3309-3313 Dol. III/I FMB numerous small vugs and pinpoint porosity bleeding sulphur water with some oil from porosity and hairline fractures
3313-14 Dol. I/III F.C. very anhydritic bleeding water from vugs and fractures.

Core No. 3 3314'-3356 Cut 42' Rec. 42' 3314-3317 Dol. I/III FC very anhy. bleeding trace oil from vug 3317-33 Dol. tan-gy I/III FMB bleeding water from hairline fractures 1/2-1' anhy. nodules thruout
3333-41 Dol. I/III FMC bleeding oil and water from vugs and fractures
3341-48 Dol. I/III F-MA bleeding water from hairline fractures 2 1/2 anhy. stk. @ 3344
3348-50 Dol. I FA W/3" shale stk. @ 3349-50

INCLINATION REPORT

OPERATOR Shell Oil Company ADDRESS P. O. Box 1509 Midland, Texas

LEASE Hook Federal WELL NO. 1 FIELD Cato

LOCATION ~~660'~~ 1980' FNL & 660' FEL, S-18, T-9-S, R-30-E, Chaves County

Depth	Angle Inclination 'degrees)	Displacement	Displacement Accumulated
275'	1/4	1.2100	1.2100
770'	1/4	2.1780	3.3880
1250'	1/2	4.1760	7.5640
1714'	3/4	6.0784	13.6424
2211'	1	8.6975	22.3399
2450'	1	4.1825	26.5224
2968'	1	9.0650	35.5874
3073'	1	1.8375	37.4249
3180'	1	1.8725	39.2974
3500'	1	5.6000	44.8974

I hereby certify that the above data as set forth is true and correct to the best of my knowledge and belief.

Cactus Drilling Company

Ronnie Ramsey

Title: Clerk

Affidavit:

Before me, the undersigned authority, appeared Ronnie Ramsey known to me to be the person whose name is subscribed herebelow, who, on making deposition, under oath states that he is acting for and in behalf of the operator of the well identified above, and that to the best of his knowledge and belief such well was not intentionally deviated from the true vertical whatsoever.

Ronnie Ramsey
(Affiant's Signature)

Sworn and subscribed to in my presence on this the 25 day of Nov.

19 68 .

Notary Public in and for the County of Lea, State of New Mexico

Seal

My Commission Expires Feb. 6, 1969