

AS P1

State Geological Survey  
WICHITA BRANCH

WELL COMPLETION REPORT AND  
DRILLER'S LOG

S. 19 T. 20 R. 13 <sup>XX</sup><sub>W</sub>  
Loc. SE NW NE  
County Barton

API No. 15 — 009 — 22441  
County Number

Operator  
National Oil Company

Address  
200 West Douglas, Suite 800, Wichita, Ks.

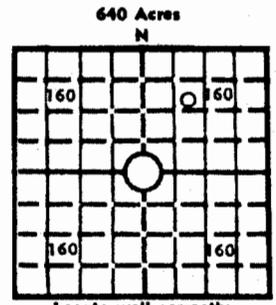
Well No. 31-19 Lease Name Mitchell

Footage Location  
990 feet from (N) (X) line 990 feet from (E) (W) line

Principal Contractor DaMac Drilling Geologist Tom Wesselowski

Spud Date 8-24-81 Date Completed 9-23-81 Total Depth RTD 3575' P.B.T.D. 3557'  
LTB 3576'

Directional Deviation Oil and/or Gas Purchaser Koch Oil Company



Elev.: Gr. 1883  
DF 1892 KB 1892

CASING RECORD

Report of all strings set — surface, intermediate, production, etc.

Purpose of string	Size hole drilled	Size casing set (in O.D.)	Weight lbs/ft.	Setting depth	Type cement	Sacks	Type and percent additives
surface	12-1/4	8-5/8	24#	368'	com.	250	2% gel 3% cc
prod.	7-7/8	5-1/2	14#	3574	60/40 Pozmix	150	10% salt, 7 1/2# / sx Gilsonite-3/4-1% CFR-2

LINER RECORD

PERFORATION RECORD

Top, ft.	Bottom, ft.	Sacks cement	Shots per ft.	Size & type	Depth interval
			2	jet shot	3410-3414
TUBING RECORD			1	jet shot	3255, 3273, 3297
Size <u>2-3/8"</u>	Setting depth <u>3438'</u>	Pecker set at	2	jet shot	3296-98, 3272-74, 3254-56

ACID, FRACTURE, SHOT, CEMENT SQUEEZE RECORD

Amount and kind of material used	Depth interval treated
250 gal. 15% mud acid	3410-3414
1000 gal 58% NE Acid	3387'
1500 gal. 15% MCA	3254-3297

INITIAL PRODUCTION

Date of first production <u>9-23-81</u>	Producing method (flowing, pumping, gas lift, etc.) <u>Pumping</u>
RATE OF PRODUCTION PER 24 HOURS	Oil <u>2.2 BOPH</u> bbls. Gas <u>MCF</u> bbls. Water <u>CFPB</u> Gas-oil ratio
Disposition of gas (vented, used on lease or sold)	Producing interval (s) <u>3255 - 3414</u>

INSTRUCTIONS: As provided in KCC Rule 82-2-125, within 90 days after completion of a well, one completed copy of this Drillers Log shall be transmitted to the State Geological Survey of Kansas, 4150 Monroe Street, Wichita, Kansas 67209. Copies of this form are available from the Conservation Division, State Corporation Commission, 245 No. Water, Wichita, Kansas 67202. Phone AC 316-522-2206. If confidential custody is desired, please note Rule 82-2-125. Drillers Logs will be on open file in the Oil and Gas Division, State Geological Survey of Kansas, Lawrence, Kansas 66044.

Operator **National Oil Company** DESIGNATE TYPE OF COMP.: OIL, GAS, DRY HOLE, SWDW, ETC.:

Well No. **31-19** Lease Name **Mitchell** oil

S 19 T 20 R 13 <sup>X</sup> W

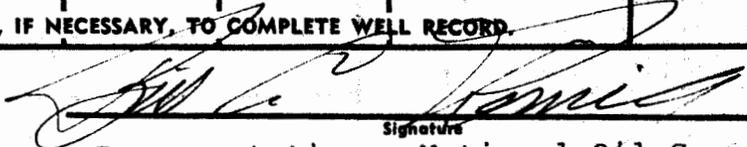
**WELL LOG**

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.

SHOW GEOLOGICAL MARKERS, LOGS RUN, OR OTHER DESCRIPTIVE INFORMATION.

FORMATION DESCRIPTION, CONTENTS, ETC.	TOP	BOTTOM	NAME	DEPTH
D.S.T. #1 3240-3285' good blow, Times: 30,30,60,45, GTS 40", Rec. 300' G&OCM, 480' GMO, 37 gravity, 100' MW. ISIP 1096, FSIP 1057, IFP 133, FFP 277.				
D.S.T. #2 3289-3325 Times: 30,45,60,45, GTS 30" Rec. 190' VHO&GCM, 300 GMO, ISIP 672, FSIP 622, IFP 125, FFP 168				
D.S.T. #3 3388-3420, Times; 30,40,60,45, strong blow dec to good blow, GTS 90", Rec 160' MGO, 20' OCW, ISIP 971, FSIP 825, IFP 75, FFP 96.				
D.S.T. #4 3472-3518 Times: 30,45,60,45. GTS 35" Rec. 65' GCM w/SSO, ISIP did not shut in FSIP 788, IFP 52, FFP 62				
DST #5 3518-3532 Times: 30,45,60,45, GTS 30", Rec. 12' GCM, ISIP 962#, FSIP 960, IFP 59, FFP 69#				
Ran Radiation Guard Log				
E Log Tops:				
Heebner	3126'	(-1234')		
Brown Lime	3238'	(-1346')		
Lansing	3253'	(-1361')		
Arbuckle	3508'	(-1616')		
RTD	3575'	(-1863')		
LTD	3576'	(-1864')		

USE ADDITIONAL SHEETS, IF NECESSARY, TO COMPLETE WELL RECORD.

Date Received	 Signature Representative - National Oil Company
	Title
	Date 9-28-81

104603

State Geological Survey

WELL LOG WICHITA BRANCH

COMPANY National Oil Company

SEC. 19 T. 20 R. 13W

FARM Mitchell NO. 31-19

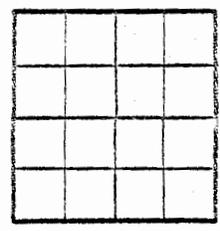
LOC. SE NW NE

TOTAL DEPTH 3575 RTD

COUNTY Barton, Ks. SEP

COMM. 8-24-81 COMP. 9-1-81

CONTRACTOR DaMac Drilling Inc.



CASING 8 5/8 set @ 368'

ELEVATION

PRODUCTION 5 1/2 set @ 3574'

FIGURES INDICATE BOTTOM OF FORMATIONS

Surface Sand	0	358
RedBed	358	780
RedBed, Shale	780	1670
Shale	1670	1867
Lime, Shale	1867	3575

19-20-13w

Physical Productivity Report to THE STATE CORPORATION  
National Lease Co Mitchell 31-19

COMMIS N, Conservation Division, 212 N I ket, Wi  
W.C. Barton KC

19-20-13w

P1

Taken 17-8-1911 Effective 19-20-13w  
Well No. 3410-14

Tank No.	Size	Opening Gauge		Closing Gauge		Barrels
		Time on:	Oil Level	B. S. & W.	Time off:	
119832	20	25	25	21	58.56	58.56
					48.52	48.52
					10.	10.

Top Prod. Horizon..... Ft. Total Depth PBTD 3557 Ft.

Perforations 3410-14 to 3296-98 - 3272-74 - 3254-52

Size of Casing..... 5 1/2 Set at 3574 Ft.

Size of Tubing..... 2 3/8 Set at 3438 Ft.

Size of Pump..... 1 1/4 Type 200

Gravity of Oil..... 28 Temp. 60

Percentage of Water..... 50 Acid 2500 gal. Date

Test Data

Temporary Permanent Field Special

Flowing Swabbing Pumping

Length of Stroke..... 48 In. S. P. M. 8

Pretest Information: AE-KW-ME.

Hours pumped..... 244

Bbls. Produced..... 67

Tank Tables Used..... 67 (Bbls. per In.)

Checked by: \_\_\_\_\_

SEALS and USFS:

WITNESSING: We, the undersigned, personally witnessed the gauging periods as indicated by our signatures, and certify that they were taken according to the Commission's Rules.

Gauge Witnesses

For Producer..... Don Kimble

For Offset Owner..... Arthur P. Lanier

For State.....


Well Location

Ft. From W. Line

Ft. From N. Line