#### AUSTRAL OIL COMPANY

INCORPORATED

#### WELL HISTORY

WELL:

Austral Oil Company Incorporated, Huerfanito (6213) #1

FIELD:

Basin Dakota

DRILLING BLOCK: 62-13

AFE NO:

1530' South of North line and 1190' West of East line of LOCATION:

Section 33, T-27-N, R-9-W, San Juan County, New Mexico.

ELEVATION:

6658.001 GL

KDB 6669.50'

CONTRACTOR:

Cactus Drilling Co., Midland, Texas

DRILLING SUMMARY:

11-30-62	Well Spudded 2:45 A.M.	Set 10 joints	of 8-5/8"	su <b>rfa</b> ce
	casing at 331.63'.			

12-2-62 2249'. Stuck bit at 1850' while pulling out of hole with water in hole. Pulled bit free and drilled ahead with

12-4-62 2790'. Began drilling with Caustic-Quebracho mud.

12-24-62 Reached TD 7105'. Ran logs.

Set 219 joints of 5-1/2" production casing at 7089.43'. 12-26-62

12-28-62 Displaced mud with salt water. Spotted 500 gals. acid. Ran cement Bond log and found that primary cement job was no good.

Perforated 4 holes at 7037' and squeezed with 290 sacks of 12-29-62 cement in 3 stages.

12-30-62 Perforated 4 holes at 6956' and squeezed with 190 sacks of cement in 2 stages.

12-31-62 Perforated 4 holes at 6910' but unable to break down with 4000#. Re-perforated 4 holes at 6910' but unable to break down with Perforated 4 holes at 6828° but unable to break down 4000#. with 400<del>0</del>#.

1-1-63 Drilled out cement and found perforations to be leaking. Squeezed 6910' with 90 sacks cement. Squeezed 6828' with 190 sacks of cement in 2 stages.

Drilled out cement to PBTD 7015.5'. Displaced hole with 1-2-63 salt water.

Ran McCullough Cement Bond Log. Perforated 6832-6844' and 1-3-63 6860-6865' and 6922-6945' and 6990-7014' (ES) w/4 jets/foot. Acidized perforations 6990-7014' with 370 Gals. 10% MCA injected at rate of 6 BPM with 2800#. Acidized perforations 6922-6945' with 355 Gals. 10% MCA injected at rate of 5.2 BPM with 2450#. Acidized perforations 6860-6865' with 85 Gals. 10% MCA acid injected at rate of 5 BPM with 2900#. Acidized perforations 6832-6844' with 90 Gals. 10% MCA acid injected

at rate of 4.6 BPM with 2400#.

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### Drilling Summary (Continued):

1-4-63	Fraced well with 72,300 gals. of water, 7900 gals. of CO and 75,000# of 20-40 Ottawa Sand injected at an average
	rate of 45.6 BPM with final injection rate being 10 BPM
	with 3800#. Stopped frac job when well began to sand up.
	Five min. SITP 1200#.
1-5-63	Flowed well to pit.
1-6-63	Flowed well at a rate of 1500 MCF/day. Cleaned out well
	to PBTD 7015.5'. Set a Baker Model "D" packer 6790'.
1-7-63	Perforated 4 holes at 6303' and squeezed with 90 sacks cement.
1-1-05	Perforated 4 holes at 6260' and squeezed with 190 sacks of
	cement in 2 stages. Unable to recover cementing tool.
- 0 6-	
1-8-63	Backed off tubing and milled out cementing tool.
1-11-63	Recovered tool and remaining tubing.
1-12-63	Drilled out cement. Perforated 6267-6298' (ES) with 4 shots
-	per foot. Displaced water in casing with oil.
1-13-63	Acidized with 1000 Gals. of 10% MCA acid injected at a rate
	of 4 BPM with 1800#. Swabbed acid water and load oil.
1-14-63	Fraced with 26,500 Gals. of oil and 25,000# of sand injected
5	at rate of 35 BPM with 3500#.
1 <b>-</b> 15-63	Swabbed small amount of oil and gas,
1-20 <b>-</b> 63	Ran 209 joints of 2-1/16", J-55 IJ Tubing for completion and
1-20-03	
	set in packer at 6790'. Flowed well.

Rig Released 00:01 A.M.

## CASING RECORD:

1-21-63

# 8-5/8" surface casing

1	8-5/8"	Davis Lynch Float Shoe,	8R	2.00
10 Jts.	8-5/8"	24#, J-55 Casing, ST&C,	8R	319.63
10 Jts.				321.63
	Top of	casing to KDB		10.00
	Casing	set w/respect to KDB @		331.63'

Set casing in a 12-1/4" hole and cemented w/250 sacks Common Cement plus 2% HA-5 Retarder. Good returns. Job completed 4:30 P.M., 11-30-62. Tested casing to 1500#, held 0.K.

# 5-1/2" production casing

1 5-1/2" Iarkin Float Shoe, 8R	1.49
	5
l Jt. 5-1/2", 15.5#, J-55 Casing, 8R	25.36
1 5-1/2" Larkin Float Collar, 8R	1.34
52 Jts.5-1/2" 15.5#, J-55 Casing, 8R	1626.62
14 Jts.5-1/2", 14#, J-55 Casing, 8R	461.64
1 5-1/2" HOWCO DV Tool, 8R	2.00
74 Jts.5-1/2", 14#, J-55 Casing, 8R	2411.90
1 5-1/2", HOWOO DV Tool, 8R	2.00
76 Jts.5-1/2", 14#, J-55 Casing, 8R	2494.17
2 Jts.5-1/2", 15.5#, J-55 Jasing, 8R	_ 64.46
219 Jts.	7090.98
Less casing above Zero	<u> </u>
Casing set w/Respect to KDB @	7089.43

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### Casing Record (continued):

Set casing in a 7-7/8" hole and cemented in 3 stages.

lst Stage: Cemented around shoe w/250 sacks of Incor cement plus 0.75% HALAD-9. Lost 75% returns.

2nd Stage: Cemented through DV tool at 4971' w/100 sacks Incor cement w/12.5# of Gilsonite/sack plus 0.75% HALAD-9. Good returns.

3rd Stage: Cemented through DV tool at 2557' w/300 sacks 50-50 Pozmix-S w/6% Gel plus 12.5# Gilsonite/sack. Good returns. job completed 8:00 A.M., 12-26-62.

Tested casing to 1500#; held O.K. Primary cement job failed. See Drilling Summary (12-29-62) for details of squeeze operations.

# 2-1/16" tubing Setting

2 2-1/16" Baker Seal Units	1.17
l 2-1/16" Locator sub	0.80
l 2-1/16" Seating Nipple	1.00
208 Jts.2-1/16",3.25#, J-55 Tubing, Int. Jt.	6734.93
3 2-1/16" tubing subs	14.85
<u>l Jt.</u> 2-1/16" 3.25#, J-55 Tubing, Int. Jt.	8.36
209 Jts.	6782.81
Top of tubing hanger to KDB	8.36
Bottom of tubing $ exttt{w/respect}$ to KDB @	6791.17'
Top of Packer w/respect to KDB @	6790.00'

CORING RECORD: There were no cores taken from this well.

DRILL STEM TESTS: There were no drill stem tests run on this well.

LOGGING RECORD:	$\underline{\text{No.}}$	Company	Interval	Date
	1	Schlumberger I-ES	335-7,098	12-24-62
	1	Schlumberger Sonic Log	4,600-7,091'	12-25-62
	l	McCullough Gamma Ray Log	6,600-7,0521	12-29-62
	1	McCullough Cement Bond Log	4,600-7,0521	12-29-62
	2	McCullough Cement Bond Log	6,200-7,026	1-2-63

COMPLETION RECORD: Reached TD 7105'. Set 5-1/2" production casing at 7089'.

Drilled out to PBTD 7015.5'. Perforated 6832-6844' and 6860-6865' and 6922-6945' and 6990-7014' (ES) w/4 jets per foot. Acidized and fraced and flowed well to pit at a rate of 1500 MCF/D. Perforated 6267-6298 (ES) w/4 shots per foot. and acidized. Swabbed small amount of oil and gas with A Model "D" Packer set at 6790', ran 209 joints of 2-1/16" of I.J. Tubing for completion through perforations in the interval 6832-7014'. Rig Released 00:01 A.M., 1-21-63.

Huerfanito (6213) #1-33 Well

A 7 Day SITP of 2030# was recorded on January 29, 1963 A State Potential Test was run with the following results:

> 3872 MCF/D 3/4" Flow Rate:

Choke Size: FTP: 309#

Full Stream Gravity: 0.713

Full Stream Condensate: 51.8 B/MMCF (calculated) Stock Tank Condensate: 41.5 B/MMCF

Calc. Open Flow Potential: 4569 MCF/Day

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