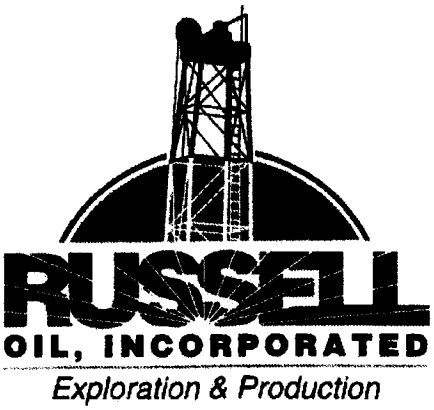
REPORT COPY

7-21-13W

GEOLOGICAL REPORT



No. 1 Hall Unit
130' FSL & 1890' FWL
Section 7-21S-13W
Stafford County, Kansas

15-185-23416-00-00

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OPERATOR:	Russell Oil, Inc.
WELL:	No. 1 Hall Unit API # 15-185-23,416-00-00
LOCATION:	130' from the South Line 1890' from the West Line Section 7-21S-13W Stafford County, Kansas
FIELD:	Leo
CONTRACTOR:	Southwind Drilling, Inc.
DRILLING COMMENCED:	01-04-2007
DRILLING COMPLETED:	01-14-2007
DRILLING TIME:	One (1) foot drilling time was recorded from 3150' to 3708' RTD.
SAMPLES:	Samples were saved and examined from 3200' to 3708' RTD.
ELEVATIONS:	1914' Ground Level 1922' Kelly Bushing
MEASUREMENTS:	All depths are measured from **1922' K.B.**
CASING RECORD:	8 5/8" Surface Casing set @ 332' with 275 sxs. 60/40 poz
FORMATION TESTING:	Three (3) tests were run by Trilobite Testing Inc. Leal Cason, Tester
MUD:	Mud-Co. (Chemical Mud)
OPEN HOLE LOGS:	CNL/CDL, DIL, MEL
PRODUCTION:	OIL

FORMATION TOPS:

FORMATION	SAMPLE	DATUM
ANHYDRITE	804'	**+1118'**
BASE ANHYDRITE	824'	**+1098'**
HEEBNER SHALE	3212'	**-1290'**
TORONTO	3233'	**-1311'**
DOUGLAS	3250'	**-1328'**
BROWN LIME	3330'	**-1408'**
LANSING	3344'	**-1422'**
BASE KANSAS CITY	3552'	**-1630'**
CONGLOMERATE	3568'	**-1646'**
SIMPSON	3583'	**-1661'**
ARBUCKLE	3639'	**-1717'**
ROTARY TOTAL DEPTH	3708'	**-1786'**
LOG TOTAL DEPTH	3710'	**-1788'**

SAMPLE DESCRIPTIONS AND TEST DATA:

TORONTO:

3233-3244 Limestone, gray and brown, finely crystalline, dense, very poor intercrystaline porosity, no shows of oil were noted

LANSING:

3344-3351 Limestone, white and buff, finely crystalline, chalky, oolitic in part with poor intercrystaline porosity, no shows of oil were noted

3366-3373 Limestone, cream, finely crystalline, mostly dense with poor visible intercrystaline porosity, now shows of oil were noted

3365-3372 Limestone, gray and brown, finely crystalline, slightly oolitic and oolicastic with poor visible porosity, slightly chalky, rare spotted staining

3386-3392 Limestone, white and tan, with poor intercrystaline porosity, slightly chalky with no shows of oil were noted

3410-3416 Limestone, tan and buff, finely crystalline, oolitic in part with trace of interoolitic and slight oolicastic porosity, rare spotted staining

3425-3435 Limestone, tan and white, oolitic, slightly oolicastic, with poor visible porosity, trace of spotted staining, no show of free oil

3473-3480 Limestone, cream and tan, oolitic and oolicastic with fair interparticle and oolicastic porosity, fair spotted staining and saturation, fair show of free oil, good odor

FORMATION TEST NO. 1
Lansing-K.C "H"
Tested from 3451'-3476'

		I.H.P.	1716#
Weak building to 1" blow	45 min.	I.F.P.	15# -16#
No blow-back	45 min.	I.S.I.P.	61#
Weak blow building to 2 ½"	45 min.	F.F.P.	15# -17#
No blow-back	45 min.	F.S.I.P.	52#
		F.H.P.	1680#

(SEE PRESSURE CHARTS AT END OF REPORT)

RECOVERY: 15' slightly oil cut mud

TEMPERATURE: 100*

CHLORIDES: N/A ppm (Recovery) 6,000 ppm (System)

3481-3488 Limestone, white, cream and tan, finely crystalline, slightly chalky, with fair interparticle porosity, fair spotted staining, slight show of free oil on break, light odor

FORMATION TEST NO. 2
Lansing-K.C
Tested from 3471'-3496'

		I.H.P.	1758#
B.O.B. in 20 min.	45 min.	I.F.P.	17# -30#
No blow-back	45 min.	I.S.I.P.	268#
Weak blow building to 3!/2"	45 min.	F.F.P.	31# -42#
No blow-back	60 min.	F.S.I.P.	249#
		F.H.P.	1656#

(SEE PRESSURE CHARTS AT END OF REPORT)

RECOVERY: 240' gas in pipe
65' oil mud cut water

TEMPERATURE: 104*

CHLORIDES: N/A ppm (Recovery) 7,500 ppm (System)

3501-3508 Limestone, tan, gray and brown, finely crystalline, fossiliferous, with fair interfossiliferous porosity, rare spotted staining, questionable odor

CONGLOMERATE
3518-3532 Chert, white, bone and orange, fractured with slight show of free oil, no odor

SIMPSON SAND
3608-3612 Sandstone, tan, fine to medium grain, sub rounded, poorly sorted, dirty with poor intergranular porosity, slight show of oil on break, no odor

ARBUCKLE

3639-3644 Dolomite, tan and brown, fine to medium crystalline, with fair intercrystaline and pinpoint porosity, fair to good show of free oil, strong odor

FORMATION TEST NO. 3

Arbuckle

Tested from 3580'-3644'

		I.H.P.	1875#
B.O.B. in 3 min.	45 min.	I.F.P.	58# -452#
No blow-back	45 min.	I.S.I.P.	1148#
B.O.B. in 10 min.	60 min.	F.F.P.	452# -728#
No blow-back	90 min.	F.S.I.P.	1154#
		F.H.P.	1756#

(SEE PRESSURE CHARTS AT END OF REPORT)

RECOVERY: 945' Gassy Muddy Water Cut Oil
120' Gassy Muddy Oil Cut Water
360' Oil Mud Cut Water
120' Water

TEMPERATURE: 108*

CHLORIDES: 29,000 ppm (Recovery) 7,500 ppm (System)

3645-3652 Dolomite, as above

3653-3658 Dolomite, as above, less shows

STRUCTURAL COMPARISION:

	Russell Oil, Inc. No. 1 Hall Unit **130' FSL & 1890' FWL** Sec. 7-21S-13W	Petroleum, Inc. No. 1 Hall "A" SE-SE-SW Sec. 7-21S-13W OIL
ANHYDRITE	**NA'**	NA
BASE ANHYDRITE	**NA'**	NA
TOPEKA	**NA'**	NA
HEEBNER SHALE	**-1290**	-1287'
LANSING	**-1422'**	-1418'
ARBUCKLE	**-1717**	-1718'

SUMMARY:

The No. 1 Hall Unit was under geological supervision from 3100' to 3708' RTD. With the positive structural position results of drill stem test No.3 it was decided to run 5 ½" production casing and complete this well through perforations.

Respectfully submitted,

Todd E. Morgenstern