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31 - 19 - 15W

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Boger Brothers Drilling, Inc.
P. O. Box 723
Great Bend, Kansas

June 28. 1985

RE: WERHAHN #1
NW-NE-SW
31-19S-15W
Barton County, Kansas

Gentlemen:

The above captioned well was drilled via rotary tools commencing on 6-17-85 to a rotary depth of 3900' (-1928' subsea datum) and completed drilling operations on 6-25-85. The following is the Geological Report for this well.

OPERATOR:	Boger Brothers Drilling, Inc.
CONTRACTOR:	Boger Brothers Drilling Rig #1
ELEVATIONS:	1972' K.B. 1970' D.F. 1967' G.L.
DEPTH MEASURED FROM:	1972' K.B.
GEOLOGIC SUPERVISION FROM:	3300' to L.T.D.
DRILLING TIME KEPT FROM:	3200' to R.T.D.
SAMPLES KEPT FROM:	3200' to R.T.D.
DRILL STEM TESTS:	4 - Western Testing
ELECTRIC LOGS RUN:	Welex: R-GRD, LNDPL, CAL
PRODUCTION CASING:	D & A

STRUCTURAL COMPARISONS TO NEARBY TESTS

FORMATION	INLAND OIL, INC. #2 WERHAHN SE-NE-SW 31-19-15W	BOGER BROTHERS DRILLING WERHAHN #1 NW-NE-SW 31-19-15W
HEEBNER	-1313	-1297
TORONTO	NC	-1316
DOUGLAS	NC	-1327
IATAN	NC	-1376
LANSING	-1402	-1385
BASE K.C.	NC	-1611
ARBUCKLE	-1663	-1654

31-19-15W

DRILL STEM TESTS

	FORMATION	DEPTH	TIMES
DST #1	Lansing	3356'-3426'	45"-45"-45"-45"

BLOW: Fair blow throughout both flow periods

RECOVERY: 120' Mud
60' Watery mud
180' Gas cut muddy water Chlorides: 80,000 ppm

PRESSURES: IHP: 1755# FHP: 1755# IFP: 96-104# FFP: 193-715#
ISIP: 1037# FSIP: 1006# T: 106° F

DST #2	Arbuckle	3683'-3703'	30"-30"-30"-30"

BLOW: Strong blow throughout both flow periods

RECOVERY: 55' Mud with trace of oil
Show of free oil on top of tool

PRESSURES: IHP: 1913# FHP: 1902# IFP: 32-32# FFP: 43-53#
ISIP: 409# FSIP: 301# T: 116° F

DST #3	Arbuckle	3709'-3729'	30"-30"-30"-30"

BLOW: Strong blow throughout both flow periods

RECOVERY: 600' Gas in pipe
80' Oil & gas cut mud (10% oil, 70% mud, 20% gas)
120' Very slightly oil & gas cut muddy water
200' Total Fluid Chlorides: 36,000 ppm

PRESSURES: IHP: 1913# FHP: 1913# IFP: 64-75# FFP: 96-96#
ISIP: 740# FSIP: 634# T: 118° F

ZONES OF INTEREST

FORMATION	DEPTH	DESCRIPTION
Lansing "A"	3359'-3365'	Limestone-white, crystalline, oolitic with a trace of oolites in place, fair oomoldic porosity, fair odor, fair saturated staining, good show of free oil (bleeding), questionable poor permeability. COVERED BY DST #1.

 32-19-15W

ZONES OF INTEREST

FORMATION	DEPTH	DESCRIPTION
Arbuckle	3626'-3628'	Dolomite-tan, white, fine-medium crystalline, fair intercrystalline porosity, sucrosic, light brown staining, no show of free oil, good odor and fluorescence.
Arbuckle	3692-3702'	Dolomite-tan, rose, fine crystalline, sucrosic texture, fair intercrystalline porosity, good odor & fluorescence, fair show of free oil after acid cut. COVERED BY DST #2.
Arbuckle	3702-3709'	Dolomite-tan, brown, fine crystalline, sandy, fair intercrystalline porosity, good odor, good fluorescence, fair show free oil after acid cut, fair saturated staining, slight show of gas with rainbow appearance. COVERED BY DST #3.
Arbuckle	3709-3728'	Dolomite-white, sandy, poor intercrystalline porosity, faint odor, poor show of free oil, fair fluorescence. COVERED BY DST #4.

SUMMARY

Structurally, the WERHAHN #1, ran within an apparent producing datum, with the producing zones having fair sample shows. But due to the poor drill stem tests, it was recommended by the operator, that the WERHAHN #1, be plugged as dry and abandonded.

Respectfully submitted,

Steven R. Mitchell

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Petrolem Geologist