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GEOLOGISTS REPORT

for

**GARRETT #2
780'FSL, 1580'FEL, SE 1/4, T9S,R20E**

November, 1994

by

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GEOLOGISTS REPORT**GARRETT #2**

November 3, 1994: Called to well at 10 AM , drlg at 900 ft. On loc. at 11:30 AM, drlg at 940 ft.

November 4, 1994: Released from loc. at 8:00 AM upon completion of logging.

ELEVATION: 1075.7 GL (all measurements from a rounded off ground level elevation of 1076).

FORMATION TOPS SAMPLE DEPTH LOG DEPTH DATUM THICKNESS

FORMATION TOPS	SAMPLE DEPTH	LOG DEPTH	DATUM	THICKNESS
Base KC	772	772	+304	
Marmaton	912	912	+164	93'
Cherokee	1006	1005	+ 71	505'
Coal marker	1418	1420	-344	4'
M McLouth Sd		1468	-392	6'
L McLouth Sd	1480	1474	-398	14'
Miss Lm	1506	1510	-434	
LTD		1538		
RTD		1535		

Sample returns were examined microscopically from a drilled depth of 850 feet to TD for the presence of visible hydrocarbons. Formation tops and thicknesses were picked from the drilling time log , sample returns, and the Neutron/Density Porosity Log. There were no zones of interest above the Cherokee Group in this well.

CHEROKEE GROUP:

There were several clean porous sand intervals observed in the samples and on the logs above the McLouth sand interval. A gas effect was noted on the Neutron/Density Porosity log between 1392 and 1397 and also between 1412 and 1416. The resistivity values from the guard suggest that these zones are very wet; however , these intervals should be examined more closely before eventual abandonment of the well. There was no visible show of hydrocarbons present in the samples from these intervals.

The Mcclouth sands were topped at a log depth of 1468 feet. The sands were divided into a middle and lower sand for this report. The sample returns from the upper portion (1468-73) consisted of a clear, medium to coarse grained sub-rounded quartz sand that had a faint odor and a very slight show of free light brown oil. This interval should not be perforated as the porosity values are low as are the Rt values.

The lower portion of the unit (1474-88) was also a clean, medium to coarse sub-rounded to well rounded quartz sand. There was good visible porosity that was filled with medium to light brown free oil. There was a strong petroleum odor from the samples from this interval.

Log calculations were prepared on location by Mr. Glenn Schmeidler of Log Tech Inc., using the following values: $M=1.8$, $Rw=.2$.

INTERVAL	POROSITY	Rt	Sw%
1476-78	22%	25	34%
78-80	22%	30	30%
80-82	22%	25	34%
82-84	20%	18	43%
84-86	18%	18	50%
86-88	14%	40	61%

The Neutron/Density Porosity Log indicated a strong gas cross over effect thru this lower sand interval between 1476 and 1488. Based on the gas effect, the good show and strong odor, along with the favorable Sw values that were calculated, it appears that this interval has the potential to produce commercial quantities of gas and maybe some oil.

MISSISSIPPI LIME;

The Mississippi Lime was reached at a log depth of 1510 feet. Sample returns contained a medium to dark tan to medium brown, very finely crystalline limestone. There was pin point porosity filled with heavy black oil thru most of the interval along with a moderate petroleum odor. Due to the very heavy nature of the oil, the low porosity and the lack of production from comparable zones in the immediate area there is no potential for production of oil from the drilled Mississippian interval.

CONCLUSIONS AND RECOMMENDATIONS:

The lower Mcclouth sand interval appears to have the potential to produce commercial quantities of gas and possibly some oil . The suggested perforated interval is the top three feet between 1476-79. This will minimize the chances of producing very much water. Based on the production history of wells in the immediate area it is suggested that gas production rates be held to moderate amountes to prolong the life of the well.

As was stated previously in this report the other clean sands in the Cherokee should be re-evaluated before eventual abandonment of this well.

The drilled portion of the Mississippi has nop potential for production of oil in this well.

Should additional information be required , please contact me.

Respectfully submitted,

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Deacon Geology Inc.**