

ROTARY DRILLERS' LOG

OPERATOR: Graves Drilling Co., Inc.
910 Union Center
Wichita, Kansas 67202

DRILLING COMMENCED: April 12, 1980

CONTRACTOR: Graves Drilling Co., Inc.
910 Union Center
Wichita, Kansas 67202

DRILLING COMPLETED: April 19, 1980

CASING RECORD: 6 Jts. 212' of used 8-5/8"
cemented with 200 sacks.

137 Jts. 4277' of new 4 1/2"
cemented with 75 sacks.

LOCATION: Cline No. 1
E/2 NE SE
Section 29-32S-14W
Barber County, Kansas

0 -	80	Red bed & sand
80 -	212	Red bed
212 -	625	Red bed & shale
625 -	1410	Shale & red bed
1410 -	4279	Shale & lime
4279		Rotary Total Depth

I hereby certify the foregoing statements to be true and correct to the best of my knowledge.

GRAVES DRILLING CO., INC.

By Petty Brandt
Secretary-Treasurer