

OCT 18 1969

DRILLERS LOG

WATSON NO. 1

CASING RECORD:	OPERATOR: Madeira Oil Company	DESCRIPTION:
8-5/8" @ 249' w/185 sax cement	CONTRACTOR: Sage Drilling Co.	C N $\frac{1}{2}$ NE Sec. 1-16S-20W Rush County, Kansas
TOTAL DEPTH: 3702'	COMMENCED: August 15, 1969	ELEVATION: 2090KB
	COMPLETED: August 23, 1969	

<u>FORMATION</u>	<u>FROM</u>	<u>TO</u>	<u>REMARKS</u>
Surface Soil	0	251	
Shale	251	716	
Dakota	716	973	
Red Bed	973	1205	
Shale	1205	1291	
Anhydrite	1291	1328	
Shale	1328	1675	
Shale & Lime	1675	2105	
Lime & Shale	2105	2330	
Shale & Lime	2330	2455	
Lime & Shale	2455	2680	
Shale & Lime	2680	3090	
Lime & Shale	3090	3405	
Lime	3405	3578	
Lime & Shale	3578	3655	
Lime, Shale & Chert	3655	3690	
Lime & Sand	3690	3702	D&A



I certify that this is a true and correct copy of the above log to the best of my knowledge.

SAGE DRILLING CO., INC.

By Wayne W. Kahmeyer
Wayne W. Kahmeyer



Subscribed and sworn to before me this 27th day of August, 1969.