

Air Drilling Specialist
Oil & Gas Wells

THORNTON AIR ROTARY, LLC
Office Phone: 620-879-2073

PO Box 449
Caney, KS 67333

Date Started	4/26/2011
Date Completed	4/27/2011

Well No.	Operator	Lease	A.P.I.#	County	State
4M-2	Layne Energy Operating	Shultz	15-125-32056-00-00	Montgomery	Kansas

1/4	1/4	1/4	Sec.	Twp.	Rge.
			2	31	14 E

Driller	Type/Well	Cement Used	Casing Used	Depth	Size of Hole
Sean	Oil	4	21' 8 5/8	1286	6 3/4

Formation Record

0-2	DIRT	1071-1087	SHALE		
2-12	CLAY	1087-1089	LIME		
12-74	LIME	1089-1091	SHALE		
74-300	SHALE	1091-1092	COAL		
300-406	SAND	1092-1099	SANDY SHALE		
406-412	SHALE	1099-1133	SHALE		
412-538	LIME	1133-1135	COAL		
538-550	SHALE	1135-1148	SHALE		
550-564	LIME	1148-1149	COAL		
564-594	SAND	1149-1184	SHALE		
594-656	LIME	1184-1189	SANDY SHALE		
656-725	SHALE	1189-1206	SAND / LITE ODOR		
725-732	LIME	1206-1209	SANDY SHALE		
732-755	SANDY SHALE	1209-1211	COAL		
755-782	LIME	1211-1226	SHALE		
782-804	SAND	1226-1232	SAND		
804-887	SANDY SHALE	1232-1286	SHALE		
887-888	COAL	1286	TD		
888-916	LIME				
916-921	BLACK SHALE				
921-975	SHALE				
975-1000	LIME				
1000-1010	BLACK SHALE				
1010-1018	LIME				
1018-1021	BLACK SHALE				
1021-1022	COAL				
1022-1026	LIME				
1026-1034	SAND				
1034-1070	SHALE				
1070-1071	COAL				