

Air Drilling Specialist
Oil & Gas Wells

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

PO Box 449
Caney, KS 67333

Date Started	10/12/2010
Date Completed	10/14/2010

Well No.	Operator	Lease	A.P.I #	County	State
9L-28	Layne Energy Operating	Hummer	205-27870-00-00	Wilson	Kansas

1/4	1/4	1/4	Sec.	Twp.	Rge.
			28	30	14

Driller	Type/Well	Cement Used	Casing Used	Depth	Size of Hole
Billy	Oil	8	40' 8 5/8	1223	6 3/4

Formation Record

0-4	DIRT	751	GAS TEST - NO GAS	1047-1048	COAL (CROWBERG)
4-22	CLAY	752-760	SANDY SHALE	1048-1053	SHALE
22-36	SHALE	760-773	SAND	1053-1063	SANDY SHALE
36-105	LIME	773-791	SANDY SHALE	1063-1068	LIME
105-174	SHALE	791-800	SHALE	1068-1095	LMY SHALE
174-241	LIME	800-811	SANDY SHALE	1095-1109	SANDY SHALE
241-316	SHALE	811-822	SAND / LIGHT OIL ODOR	1109-1113	SAND / LITE ODOR
316-330	LIME	822-823	COAL	1113-1126	SHALE
330-380	SAND (DAMP)	823-850	SAND	1126-1135	SAND / OIL ODOR
380-381	COAL	850-857	SANDY SHALE	1135-1139	SANDY SHALE
381-431	SANDY SHALE	857-860	LIME	1139-1145	SAND
426	GAS TEST - NO GAS	860-861	COAL (MULBERRY)	1145-1153	SHALE
431-458	SAND	861-889	LIME (PAWNEE)	1153-1155	BLACK SHALE
451	WENT TO WATER	889-893	BLACK SHALE	1155-1158	SHALE
458-540	LIME	893-897	LIME	1158-1167	SAND/1158-1163 OIL ODOR
501	GAS TEST - NO GAS	897-903	BLK SHALE (LEXINGTON)	1167-1172	SHALE
540-545	SHALE	903-939	SHALE	1172-1180	SAND
545-566	LIME	939-961	LIME (OSWEGO)	1180-1184	SHALE
566-582	SAND	961-967	BLK SHALE (SUMMIT)	1184-1185	COAL
582-606	LIME	967-969	LIME	1185-1195	SHALE
606-610	SHALE	969-971	BLACK SHALE	1195-1215	RED SHALE
610-644	LIME	971-982	LIME	1215-1223	SHALE
644-680	SHALE	977	GAS TEST - SAME	1223	TD
651	GAS TEST - NO GAS	982-983	COAL (MULKEY)		
680-706	SANDY SHALE	983-984	SHALE		
706-721	LIME	984-987	LIME		
721-734	SHALE	987-1025	SHALE		
734-739	LIME	1025-1026	COAL		
739-744	SHALE	1025-1045	SHALE		
744-752	LIME	1045-1047	LIME		