

# Charlie Sturdavant Consulting

## WELL COMPARISON SHEET

DRILLING WELL					COMPARISON WELL				COMPARISON WELL			
Pioneer Resources #3 Railroad 2240' FSL & 1690' FEL Sec. 7 T14S R31W					Pioneer Resources #2 Railroad 1538' FSL & 1594' FEL Sec. 7 T14S R31W				Pioneer Resources #1 Railroad 1365' FSL & 581' FWL Sec. 7 T14S R31W			
2896 KB					2853 KB		Structural Relationship		2633 KB		Structural Relationship	
Formation	Sample	Sub-Sea	Log	Sub-Sea	Log	Sub-Sea	Sample	Log	Log	Sub-Sea	Sample	Log
Anhydrite	2365	531	2365	531	2323	530	1	1	2305	528	3	3
Topeka	3672	-776	3666	-772	3630	-777	1	5	3610	-777	1	5
Heebner	3695	999	3692	-996	3652	-999	0	3	3637	-1004	5	8
Toronto	3915	-1019	3913	-1017	3872	-1019	0	2	3856	-1023	4	6
Lansing	3934	-1036	3931	-1035	3891	-1036	0	3	3876	-1043	5	8
Muncie Creek	4092	-1196	4088	-1192	4048	-1195	-1	3	4036	-1203	7	11
Stark Shale	4160	-1264	4179	-1263	4133	-1260	-4	-3	4124	-1291	7	8
Base KC	4249	-1353	4249	-1353	4204	-1351	-2	-2	4194	-1361	8	8
Pawnee	4381	-1465	4380	-1484	4333	-1480	-5	-4	4332	-1499	14	15
Cherokee	4470	-1574	4468	-1572	4419	-1566	-6	-6	4363	-1550	-24	-22
Johnson	4512	-1616	4513	-1617	4462	-1609	-7	-8	4460	-1627	11	10
Morrow Shale	4541	-1645	4541	-1645	4485	-1632	-13	-13	4498	-1665	20	20
Morrow Sand	4570	-1674	4566	-1672	4506	-1653	-21	-19	4492	-1659	-15	-13
Mississippian	4580	-1664	4580	-1664	4532	-1679	-5	-5	4544	-1711	27	27
Total Depth	4750	-1854	4750	-1854	4571	-1718	-136	-136	4700	-1867	13	13

33575

### Daily Drilling Report

# Charlie Sturdavant Consulting

## DAILY DRILLING REPORT

Company: Charlie Sturdavant Consulting  
920 12th Street  
Golden, CO 80401

Well: Railroad # 3  
Location: 2240' FNL & 1690' FEL  
Sec. 7 T14S R31W  
Gove County, KS

Pioneer Resources Cell: 785-543-7527  
Rodger Wells H: 785-543-5556

Wellsite Geologist: Charlie Sturdavant  
Cell: (303) 907-2295  
Office: (303) 384-9481

Elevation: 2896' KB 2891' GL  
Field: Wildcat  
API No.: 15-063-22013-00-00  
Surface Casing: 8 5/8" set @ 220' KB

Drilling Contractor: WW Drilling Rig #2 785-259-4388 Tool Pusher: Lonnie Lang, cell: 785-259-3864

DATE	7:00 AM DEPTH	REMARKS
7/9/2012	0 ft.	Moving onto location. Drill to 220' and set 5 joints of 23# 8-5/8" csg. W/ 160 sx of common, 3% cc, 2% gell. Plug down at 1700 hrs.
7/10/2012	1065 ft.	Drilled plug @ 0100 hrs. Drilling ahead.
7/11/2012	2975 ft.	Drilling ahead.
7/12/2012	3720 ft.	Drilling ahead. Geologist on location @ 0200 hrs.
7/13/2012	3991 ft.	Circ. to clean hole, commenced drilling @ 0723. DST #1: 3954-3991', rec. 5' mud. SIP: 1098-1058#. DST #2: 4004-4027', rec. 372' gip, 124' go (70% oil), 186' mcw (70% water), SIP: 1109-1061#.
7/14/2012	4150 ft.	CFS. Prep to run DST # 3, 4098-4150', rec. 60' ocm (5% oil), SIP: 1085-979#.
7/15/2012	4346 ft.	Drilling ahead.
7/16/2012	4526 ft.	Drilling ahead. Conducted DST #5: 4534-4581', rec. 372' gip, 62' free oil, 62' om (50% oil), 124' om, (40% oil). SIP: 892-544#.
7/17/2012	4678 ft.	Drilling ahead. Reached RTD @ 1044 hrs. Superior Well Services logging operations completed @ 1830 hrs. Geologist off location @ 2000 hrs.