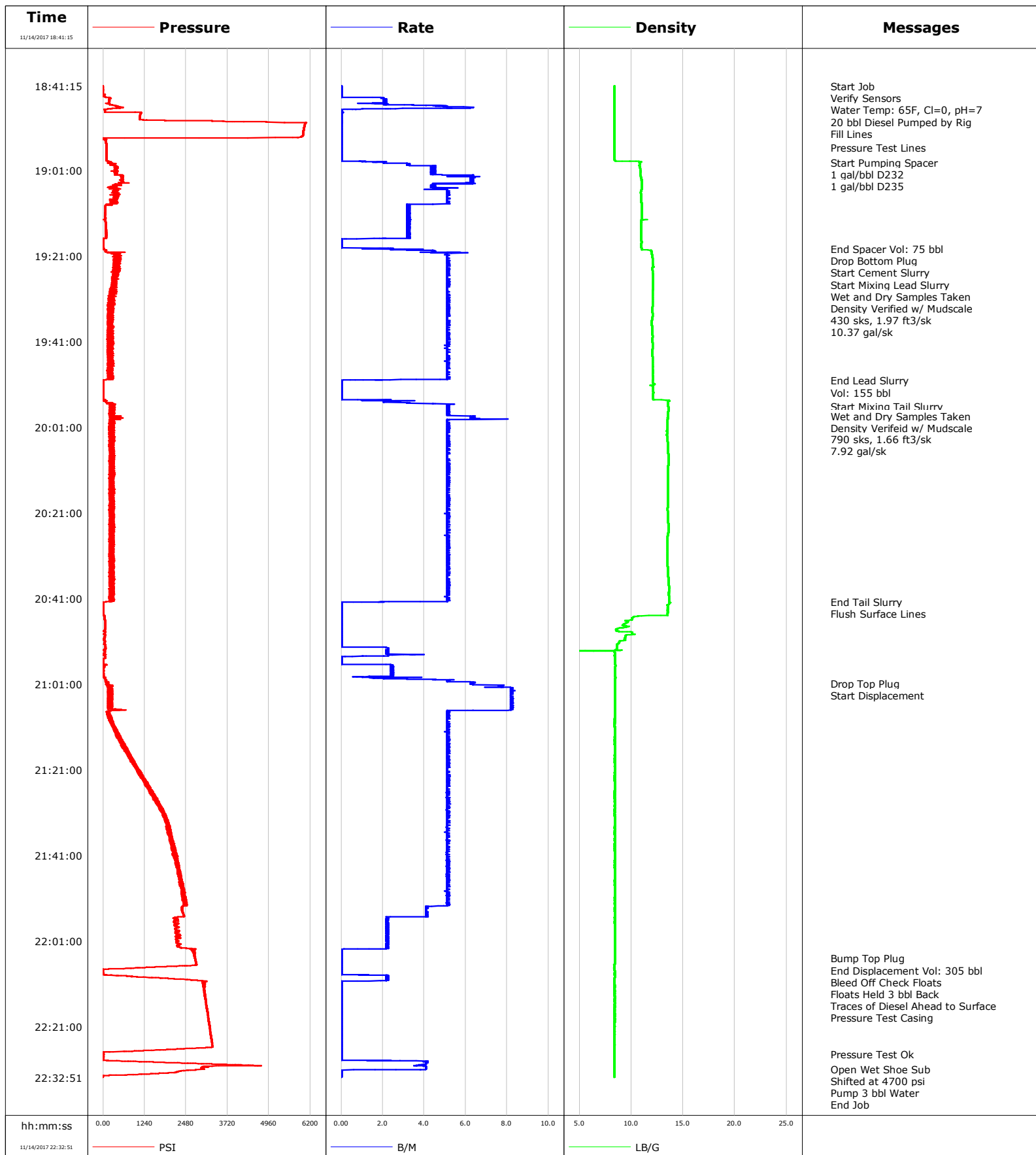


**Well** Burough 26C-17HZ  
**Field** Wattenberg  
**Engineer** Billy Barg  
**Country** United States

**Client** ANADARKO PETROLEUM COMPANY  
**SIR No.** DXVN-00027  
**Job Type** Production  
**Job Date** 11-14-2017



# Cementing Service Report

				Customer ANADARKO PETROLEUM COMPANY				Job Number DXVN-00027									
Well Burough 26C-17HZ 0631732373			Location (legal)			Schlumberger Location Cheyenne, WY			Job Start Nov/14/2017								
Field Wattenberg		Formation Name/Type			Deviation deg		Bit Size 7.9 in		Well MD 13163.0 ft		Well TVD 7522.0 ft						
County Weld		State/Province Colorado			BHP psi		BHST 233 degF		BHCT 213 degF		Pore Press. Gradient lb/gal						
Well Master 0631732373		API/UWI 05123452310000															
Rig Name PD 564		Drilled For Gas		Service Via Land		Casing/ Liner											
						Depth, ft		Size, in		Weight, lb/ft		Grade		Thread			
Offshore Zone		Well Class New		Well Type Development		1874.0		9.6		36.0							
						13151.5		5.5		26.0							
Drilling Fluid Type OBM		Max. Density 9.50 lb/gal		Plastic Viscosity cP		Tubing/Drill Pipe											
						T/D		Depth, ft		Size, in		Weight, lb/ft		Grade		Thread	
Service Line Cementing		Job Type Production															
Max. Allowed Tub. Press psi		Max. Allowed Ann. Press psi		WH Connection 5.5' LTC		Perforations/Open Hole											
						Top, ft		Bottom, ft		shot/ft		No. of Shots		Total Interval ft			
<b>Service Instructions</b> 9 5/8" 36# Previous Casing: 1,874' 7 7/8" to TD // OH Excess: 4% Top of Lead Cement: 1,500' Top of Tail Cement: 6,000' TD: 13,163' (7,522')						ft		ft									
						ft		ft						Diameter in			
						ft		ft									
		Treat Down Casing		Displacement 305.0 bbl		Packer Type		Packer Depth ft									
		Tubing Vol. bbl		Casing Vol. bbl		Annular Vol. 438.0 bbl		Openhole Vol. bbl									
Casing/Tubing Secured <input checked="" type="checkbox"/>		1 Hole Vol. Circulated prior to Cement <input checked="" type="checkbox"/>		Casing Tools				Squeeze Job									
Lift Pressure 9410 psi				Shoe Type Float				Squeeze Type									
Pipe Rotated <input type="checkbox"/>		Pipe Reciprocated <input type="checkbox"/>		Shoe Depth 13151.3 ft				Tool Type									
No. Centralizers		Top Plugs 1		Bottom Plugs 1		Stage Tool Type				Tool Depth ft							
Cement Head Type Double				Stage Tool Depth ft				Tail Pipe Size in									
Job Scheduled For Nov/14/2017 15:00		Arrived on Location Nov/15/2017 00:00		Leave Location Nov/14/2017 02:00		Collar Type Float				Tail Pipe Depth ft							
						Collar Depth 13149.9 ft				Sqz. Total Vol. bbl							
Date	Time 24-hr clock	Treating Pressure PSI		Flow Rate B/M		Density LB/G		Message									
11/14/2017	18:41:15	-6		0.0		8.38		Started Acquisition									
11/14/2017	18:41:19	-4		0.0		8.38		Start Job									
11/14/2017	18:41:29	-4		0.0		8.38		Verify Sensors									
11/14/2017	18:41:37	-5		0.0		8.38		Water Temp: 65F, Cl=0, pH=7									
11/14/2017	18:41:40	-4		0.0		8.38		20 bbl Diesel Pumped by Rig									
11/14/2017	18:41:43	-4		0.0		8.38		Fill Lines									
11/14/2017	18:42:55	-6		0.0		8.38											
11/14/2017	18:44:35	192		2.2		8.39											
11/14/2017	18:46:15	580		6.4		8.36											
11/14/2017	18:47:55	1110		0.0		8.39											
11/14/2017	18:49:35	3687		0.0		8.39											
11/14/2017	18:51:15	6001		0.0		8.39											
11/14/2017	18:52:55	5974		0.0		8.39											
11/14/2017	18:54:35	87		0.0		8.39											
11/14/2017	18:55:35	100		0.0		8.39		Pressure Test Lines									
11/14/2017	18:56:15	100		0.0		8.39											
11/14/2017	18:57:55	100		0.0		8.39											
11/14/2017	18:59:05	206		1.7		10.89		Start Pumping Spacer									
11/14/2017	18:59:15	139		2.0		10.81		1 gal/bbl D232									
11/14/2017	18:59:23	276		3.2		10.82		1 gal/bbl D235									
11/14/2017	18:59:35	292		3.3		10.80											

Well Borough 26C-17HZ 0631732373			Field Wattenberg		Job Start Nov/14/2017	Customer ANADARKO PETROLEUM COMPANY	Job Number DXVN-00027
Date	Time 24-hr clock	Treating Pressure PSI	Flow Rate B/M	Density LB/G	Message		
11/14/2017	19:02:55	589	6.4	10.97			
11/14/2017	19:04:35	371	4.3	11.01			
11/14/2017	19:06:15	421	5.1	10.93			
11/14/2017	19:07:55	380	5.1	10.97			
11/14/2017	19:09:35	68	3.2	10.99			
11/14/2017	19:11:15	60	3.3	10.99			
11/14/2017	19:12:55	72	3.3	10.98			
11/14/2017	19:14:35	78	3.3	10.98			
11/14/2017	19:16:15	90	3.3	10.98			
11/14/2017	19:17:55	14	0.0	10.98			
11/14/2017	19:19:20	17	2.2	11.01	End Spacer Vol: 75 bbl		
11/14/2017	19:19:35	78	3.3	11.14	Drop Bottom Plug		
11/14/2017	19:19:51	72	4.5	11.93	Start Cement Slurry		
11/14/2017	19:19:57	73	4.4	11.96	Start Mixing Lead Slurry		
11/14/2017	19:20:31	527	5.1	11.98	Wet and Dry Samples Taken		
11/14/2017	19:21:15	366	5.1	12.02			
11/14/2017	19:22:55	400	5.1	12.08			
11/14/2017	19:24:31	417	5.1	12.05	Density Verified w/ Mudscale		
11/14/2017	19:24:35	403	5.1	12.06			
11/14/2017	19:26:15	428	5.1	12.10			
11/14/2017	19:27:55	356	5.1	12.10			
11/14/2017	19:29:35	286	5.1	12.07			
11/14/2017	19:30:37	192	5.2	12.06	430 sks, 1.97 ft3/sk		
11/14/2017	19:31:09	179	5.1	12.04	10.37 gal/sk		
11/14/2017	19:31:15	169	5.1	12.04			
11/14/2017	19:32:55	157	5.2	12.03			
11/14/2017	19:34:35	309	5.2	12.05			
11/14/2017	19:36:15	176	5.2	11.98			
11/14/2017	19:37:55	290	5.1	12.01			
11/14/2017	19:39:35	219	5.1	12.04			
11/14/2017	19:41:15	197	5.1	12.04			
11/14/2017	19:42:55	133	5.2	12.03			
11/14/2017	19:44:35	269	5.2	12.04			
11/14/2017	19:46:15	220	5.1	12.07			
11/14/2017	19:47:55	166	5.1	12.08			
11/14/2017	19:49:35	239	5.1	12.10			
11/14/2017	19:50:02	8	0.0	12.08	End Lead Slurry		
11/14/2017	19:50:04	8	0.0	12.08	Vol: 155 bbl		
11/14/2017	19:51:15	7	0.0	11.81			
11/14/2017	19:52:55	8	0.0	12.17			
11/14/2017	19:54:35	82	2.4	12.15			
11/14/2017	19:56:03	332	5.1	13.54	Start Mixing Tail Slurry		
11/14/2017	19:56:15	219	5.1	13.58			
11/14/2017	19:57:55	322	5.1	13.55			
11/14/2017	19:58:24	421	6.5	13.54	Wet and Dry Samples Taken		
11/14/2017	19:58:26	347	6.4	13.54	Density Verifeid w/ Mudscale		
11/14/2017	19:59:35	324	5.1	13.50			
11/14/2017	20:01:15	245	5.1	13.48			
11/14/2017	20:02:55	258	5.1	13.43			
11/14/2017	20:03:43	281	5.1	13.49	790 sks, 1.66 ft3/sk		
11/14/2017	20:03:49	196	5.1	13.50	7.92 gal/sk		
11/14/2017	20:04:35	231	5.2	13.52			
11/14/2017	20:06:15	317	5.2	13.55			
11/14/2017	20:07:55	312	5.1	13.59			

Well Borough 26C-17HZ 0631732373			Field Wattenberg		Job Start Nov/14/2017	Customer ANADARKO PETROLEUM COMPANY	Job Number DXVN-00027
Date	Time 24-hr clock	Treating Pressure PSI	Flow Rate B/M	Density LB/G	Message		
11/14/2017	20:11:15	291	5.1	13.54			
11/14/2017	20:12:55	264	5.1	13.52			
11/14/2017	20:14:35	264	5.1	13.53			
11/14/2017	20:16:15	194	5.1	13.54			
11/14/2017	20:17:55	288	5.1	13.56			
11/14/2017	20:19:35	290	5.1	13.52			
11/14/2017	20:21:15	231	5.1	13.55			
11/14/2017	20:22:55	298	5.1	13.55			
11/14/2017	20:24:35	209	5.1	13.59			
11/14/2017	20:26:15	275	5.1	13.53			
11/14/2017	20:27:55	331	5.1	13.51			
11/14/2017	20:29:35	192	5.1	13.49			
11/14/2017	20:31:15	272	5.1	13.49			
11/14/2017	20:32:55	293	5.1	13.50			
11/14/2017	20:34:35	255	5.1	13.54			
11/14/2017	20:36:15	291	5.1	13.58			
11/14/2017	20:37:55	297	5.1	13.61			
11/14/2017	20:39:35	228	5.2	13.59			
11/14/2017	20:41:15	263	5.1	13.62			
11/14/2017	20:41:45	203	3.8	13.62	End Tail Slurry		
11/14/2017	20:41:51	-1	0.6	13.62	Flush Surface Lines		
11/14/2017	20:42:55	1	0.0	13.52			
11/14/2017	20:44:35	10	0.0	13.51			
11/14/2017	20:46:15	72	0.0	9.63			
11/14/2017	20:47:55	63	0.0	8.79			
11/14/2017	20:49:35	61	0.0	9.48			
11/14/2017	20:51:15	43	0.0	8.82			
11/14/2017	20:52:55	45	2.3	8.59			
11/14/2017	20:54:35	59	0.0	8.42			
11/14/2017	20:56:15	1	0.0	8.40			
11/14/2017	20:57:55	11	2.4	8.44			
11/14/2017	20:59:35	39	1.4	8.46			
11/14/2017	21:00:51	151	6.4	8.40	Drop Top Plug		
11/14/2017	21:00:52	99	6.4	8.40	Start Displacement		
11/14/2017	21:01:15	118	7.8	8.40			
11/14/2017	21:02:55	166	8.2	8.40			
11/14/2017	21:04:35	175	8.2	8.40			
11/14/2017	21:06:15	175	8.2	8.40			
11/14/2017	21:07:55	110	5.1	8.40			
11/14/2017	21:09:35	288	5.1	8.40			
11/14/2017	21:11:15	394	5.1	8.40			
11/14/2017	21:12:55	374	5.1	8.40			
11/14/2017	21:14:35	622	5.1	8.40			
11/14/2017	21:16:15	719	5.1	8.40			
11/14/2017	21:17:55	758	5.2	8.40			
11/14/2017	21:19:35	959	5.1	8.40			
11/14/2017	21:21:15	1012	5.1	8.40			
11/14/2017	21:22:55	1164	5.1	8.40			
11/14/2017	21:24:35	1365	5.1	8.40			
11/14/2017	21:26:15	1482	5.2	8.40			
11/14/2017	21:27:55	1548	5.1	8.40			
11/14/2017	21:29:35	1728	5.1	8.40			
11/14/2017	21:31:15	1849	5.1	8.40			
11/14/2017	21:32:55	1899	5.1	8.40			

Well Borough 26C-17HZ 0631732373			Field Wattenberg		Job Start Nov/14/2017	Customer ANADARKO PETROLEUM COMPANY	Job Number DXVN-00027
Date	Time 24-hr clock	Treating Pressure PSI	Flow Rate B/M	Density LB/G	Message		
11/14/2017	21:36:15	2039	5.1	8.40			
11/14/2017	21:37:55	2074	5.1	8.40			
11/14/2017	21:39:35	2087	5.1	8.40			
11/14/2017	21:41:15	2095	5.2	8.40			
11/14/2017	21:42:55	2166	5.1	8.40			
11/14/2017	21:44:35	2218	5.1	8.40			
11/14/2017	21:46:15	2311	5.1	8.40			
11/14/2017	21:47:55	2385	5.1	8.39			
11/14/2017	21:49:35	2393	5.1	8.40			
11/14/2017	21:51:15	2404	5.1	8.40			
11/14/2017	21:52:55	2370	4.2	8.40			
11/14/2017	21:54:35	2393	4.1	8.40			
11/14/2017	21:56:15	2209	2.2	8.40			
11/14/2017	21:57:55	2213	2.3	8.40			
11/14/2017	21:59:35	2251	2.2	8.40			
11/14/2017	22:01:15	2202	2.3	8.40			
11/14/2017	22:02:55	2608	0.1	8.40			
11/14/2017	22:04:35	2728	0.0	8.40			
11/14/2017	22:05:05	2759	0.0	8.40	Bump Top Plug		
11/14/2017	22:05:06	2760	0.0	8.40	End Displacement Vol: 305 bbl		
11/14/2017	22:06:15	2777	0.0	8.40			
11/14/2017	22:07:12	1248	0.0	8.34	Bleed Off Check Floats		
11/14/2017	22:07:55	-10	0.0	8.40			
11/14/2017	22:08:38	-0	0.0	8.40	Floats Held 3 bbl Back		
11/14/2017	22:09:35	1489	2.3	8.40			
11/14/2017	22:10:28	2957	0.0	8.40	Traces of Diesel Ahead to Surface		
11/14/2017	22:10:34	2968	0.0	8.40	Pressure Test Casing		
11/14/2017	22:11:15	3038	0.0	8.40			
11/14/2017	22:12:55	3034	0.0	8.40			
11/14/2017	22:14:35	3058	0.0	8.40			
11/14/2017	22:16:15	3089	0.0	8.40			
11/14/2017	22:17:55	3122	0.0	8.40			
11/14/2017	22:19:35	3154	0.0	8.40			
11/14/2017	22:21:15	3186	0.0	8.40			
11/14/2017	22:22:55	3217	0.0	8.40			
11/14/2017	22:24:35	3248	0.0	8.40			
11/14/2017	22:26:15	2217	0.0	8.40			
11/14/2017	22:27:19	-10	0.0	8.40	Pressure Test Ok		
11/14/2017	22:27:55	12	0.0	8.40			
11/14/2017	22:29:35	2692	4.1	8.39			
11/14/2017	22:30:56	3012	4.1	8.39	Open Wet Shoe Sub		
11/14/2017	22:31:15	2416	0.0	8.40			
11/14/2017	22:31:28	2249	0.0	8.39	Shifted at 4700 psi		
11/14/2017	22:31:37	2198	0.0	8.40	Pump 3 bbl Water		

<b>Well</b> Borough 26C-17HZ 0631732373	<b>Field</b> Wattenberg	<b>Job Start</b> Nov/14/2017	<b>Customer</b> ANADARKO PETROLEUM COMPANY	<b>Job Number</b> DXVN-00027
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Post Job Summary

Average Pump Rates, bbl/min					Volume of Fluid Injected, bbl			
Slurry 4.8	N2	Mud	Maximum Rate 8.4		Total Slurry 385.0	Mud 0.0	Spacer 75.0	N2
Treating Pressure Summary, psi					Breakdown Fluid			
Maximum 6070	Final -2	Average 965	Bump Plug to 2750	Breakdown	Type	Volume bbl		Density lb/gal
Avg. N2 Percent %	Designed Slurry Volume 385.0 bbl	Displacement 308.0 bbl	Mix Water Temp 70 degF	Cement Circulated to Surface? <input type="checkbox"/>		Volume bbl		
				Washed Thru Perfs <input type="checkbox"/>		To ft		
Customer or Authorized Representative Burke Hibbert			Schlumberger Supervisor Billy Barg			Circulation Lost <input type="checkbox"/>		Job Completed <input checked="" type="checkbox"/>
						-		-