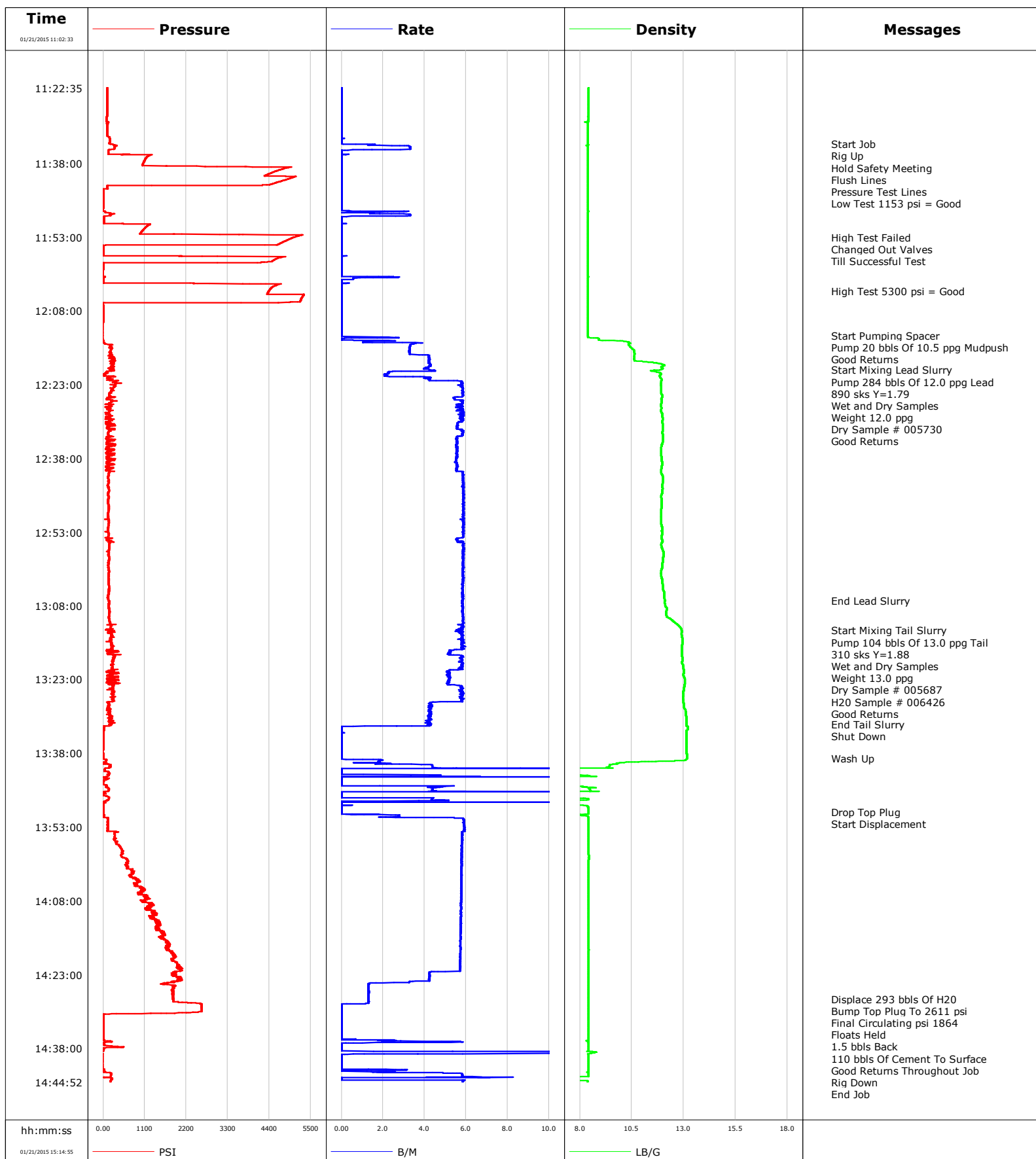


**Well** Mary Jane 8-5  
**Field** Arikaree Creek  
**Engineer** Christine Matlock/Leiker  
**Country** United States

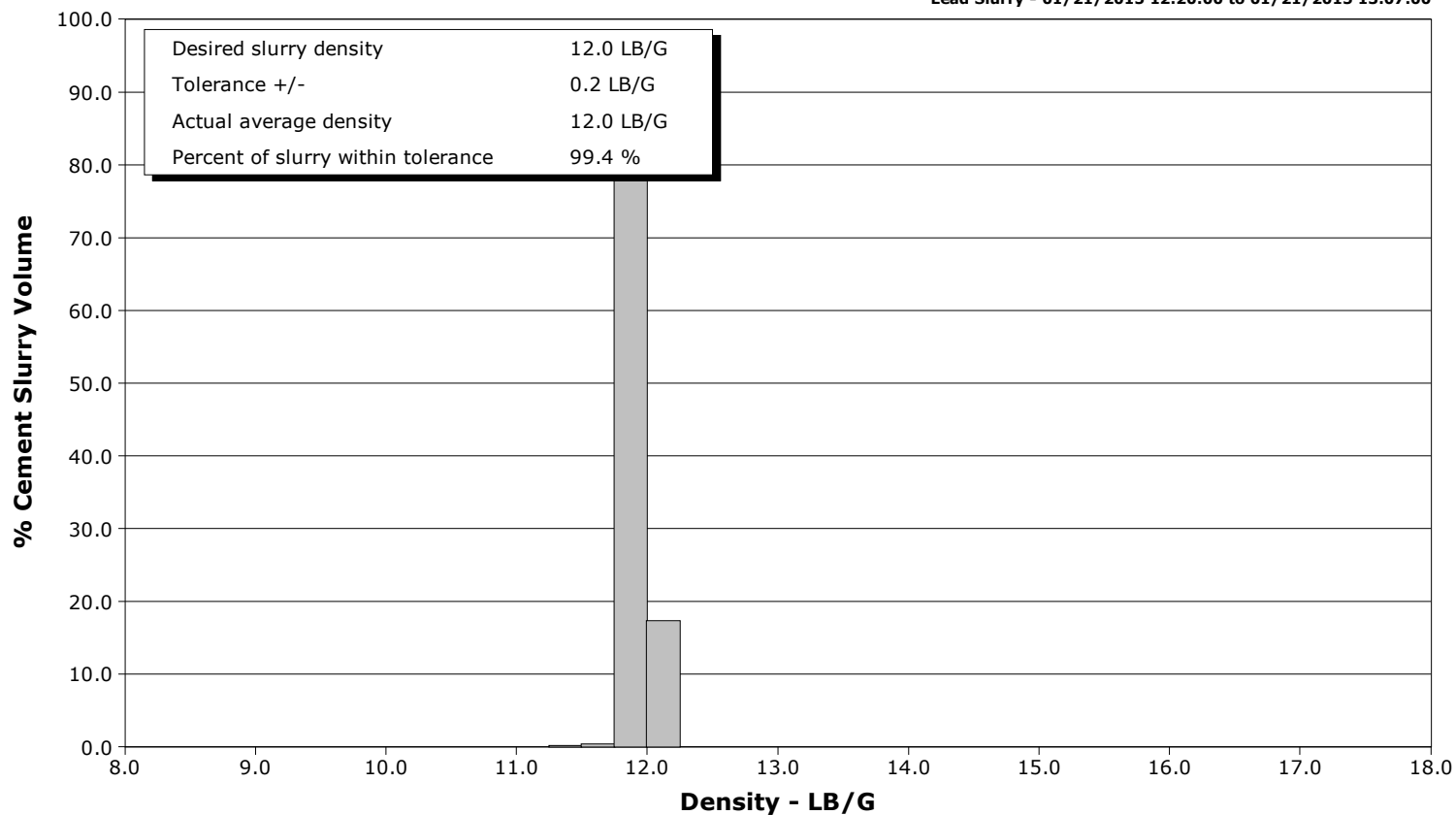
**Client** Nighthawk Productions  
**SIR No.** 2085507  
**Job Type** Production  
**Job Date** 01-21-2015



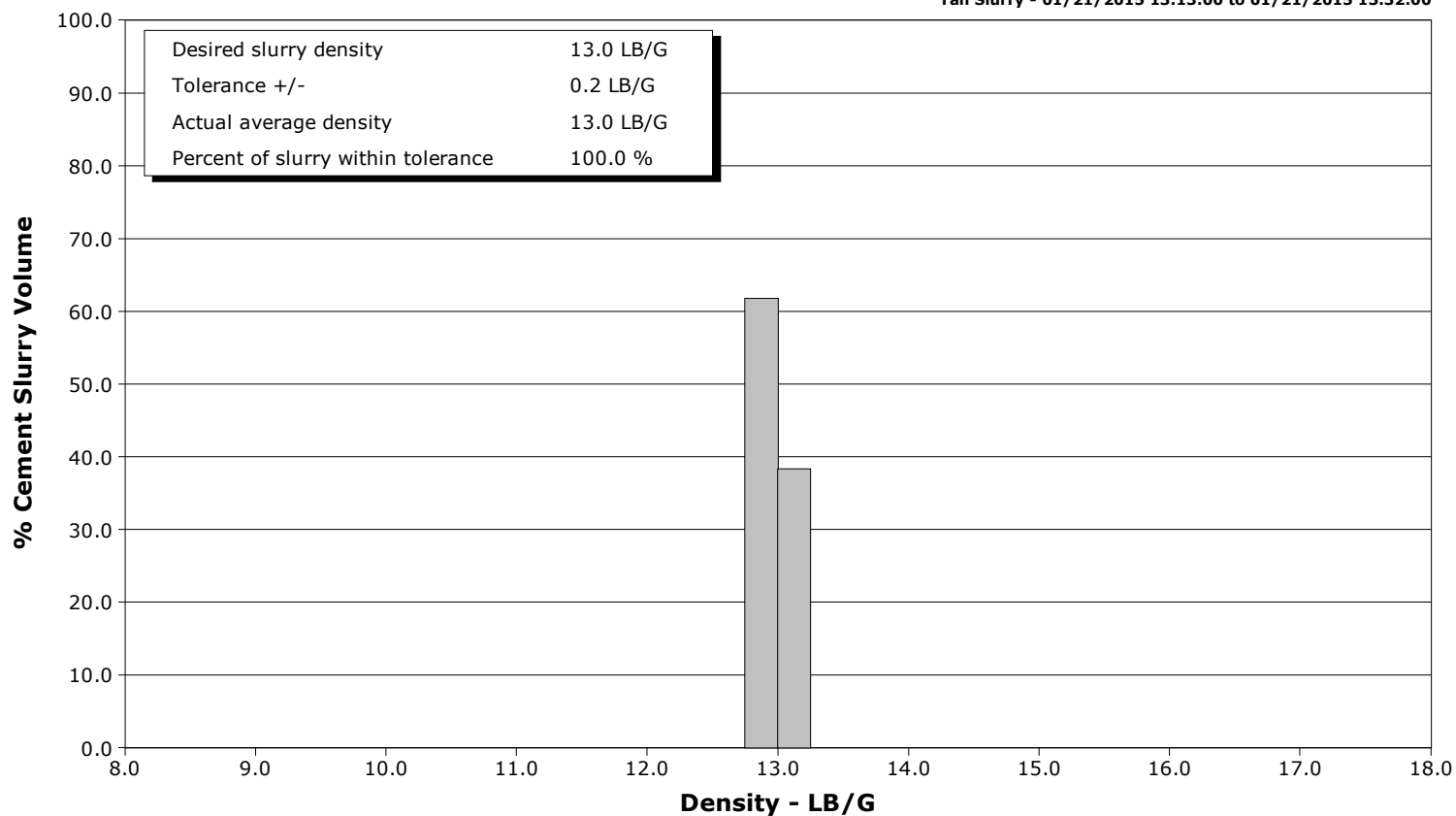
**Well** Mary Jane 8-5  
**Field** Arikaree Creek  
**Engineer** Christine Matlock/Leiker  
**Country** United States

**Client** Nighthawk Productions  
**SIR No.** 2085507  
**Job Type** Production  
**Job Date** 01-21-2015

Lead Slurry - 01/21/2015 12:20:00 to 01/21/2015 13:07:00



Tail Slurry - 01/21/2015 13:13:00 to 01/21/2015 13:32:00



Page 1 of 4

Well			Field		Job Start		Customer		Job Number	
Mary Jane 8-5 8-5			Arikaree Creek		Jan/21/2015		Nighthawk Productions		2085507	
Date	Time 24-hr clock	Treating Pressure PSI	Flow Rate B/M	Density LB/G	Volume BBL	Message				
01/21/2015	11:36:00	133	0.0	8.40	3.2	Pressure Test Lines				
01/21/2015	11:37:33	1088	0.0	8.40	3.2					
01/21/2015	11:39:13	4721	0.0	8.40	3.2					
01/21/2015	11:40:53	5018	0.0	8.40	3.2					
01/21/2015	11:42:33	116	0.0	8.40	3.2					
01/21/2015	11:44:13	0	0.0	8.40	3.2					
01/21/2015	11:45:53	1	0.0	8.40	3.2					
01/21/2015	11:47:33	-2	0.0	8.40	3.2					
01/21/2015	11:49:13	25	0.0	8.40	5.7					
01/21/2015	11:50:53	1146	0.0	8.40	5.7					
01/21/2015	11:52:33	5290	0.0	8.40	5.7					
01/21/2015	11:53:00	5072	0.0	8.40	5.7	High Test Failed				
01/21/2015	11:54:13	4712	0.0	8.40	5.7					
01/21/2015	11:55:53	1	0.0	8.40	5.7					
01/21/2015	11:57:33	4550	0.0	8.40	5.8					
01/21/2015	11:59:13	2	0.0	8.40	5.8					
01/21/2015	12:00:53	-1	0.0	8.40	5.8					
01/21/2015	12:02:33	4177	0.0	8.40	6.5					
01/21/2015	12:04:00	4387	0.0	8.40	6.5	High Test 5300 psi = Good				
01/21/2015	12:04:13	4371	0.0	8.40	6.5					
01/21/2015	12:05:53	5229	0.0	8.40	6.5					
01/21/2015	12:07:33	0	0.0	8.40	6.5					
01/21/2015	12:09:13	0	0.0	8.40	6.5					
01/21/2015	12:10:53	-21	0.0	8.40	0.0					
01/21/2015	12:12:33	-26	0.0	8.40	0.0					
01/21/2015	12:13:00	-25	0.0	8.40	0.0	Start Pumping Spacer				
01/21/2015	12:14:13	-12	1.2	10.15	1.0					
01/21/2015	12:15:53	213	3.3	10.57	6.1					
01/21/2015	12:17:33	175	4.2	10.62	12.1					
01/21/2015	12:19:13	244	4.3	12.03	0.7					
01/21/2015	12:20:00	252	4.2	11.88	3.9	Start Mixing Lead Slurry				
01/21/2015	12:20:53	21	2.0	11.91	6.6					
01/21/2015	12:22:33	253	5.8	11.90	13.1					
01/21/2015	12:24:13	227	5.8	11.92	22.8					
01/21/2015	12:25:53	82	5.4	11.93	32.4					
01/21/2015	12:27:33	173	5.7	11.92	41.9					
01/21/2015	12:29:13	157	5.9	11.96	51.6					
01/21/2015	12:30:53	80	5.6	11.98	61.2					
01/21/2015	12:32:33	147	5.9	11.98	70.6					
01/21/2015	12:34:13	267	5.6	12.02	80.1					
01/21/2015	12:35:53	86	5.6	11.92	89.4					
01/21/2015	12:37:33	134	5.6	11.92	98.7					
01/21/2015	12:39:13	299	5.6	11.96	107.9					
01/21/2015	12:40:53	153	5.9	11.91	117.2					
01/21/2015	12:42:33	151	5.9	12.01	126.9					
01/21/2015	12:44:13	140	5.9	11.98	136.7					
01/21/2015	12:45:53	143	5.9	11.92	146.5					
01/21/2015	12:47:33	146	5.9	11.94	156.3					
01/21/2015	12:49:13	131	5.9	11.92	166.1					
01/21/2015	12:50:53	149	5.9	11.91	175.9					
01/21/2015	12:52:33	136	5.9	11.96	185.6					
01/21/2015	12:54:13	194	5.7	11.94	195.4					
01/21/2015	12:55:53	167	5.9	11.93	205.0					
01/21/2015	12:57:33	135	5.9	12.04	214.8					

Well			Field	Job Start		Customer	Job Number
Mary Jane 8-5 8-5			Arikaree Creek	Jan/21/2015		Nighthawk Productions	2085507
Date	Time 24-hr clock	Treating Pressure PSI	Flow Rate B/M	Density LB/G	Volume BBL	Message	
01/21/2015	13:00:53	157	5.8	11.92	234.3		
01/21/2015	13:02:33	135	5.9	11.95	244.0		
01/21/2015	13:04:13	150	5.8	12.00	253.8		
01/21/2015	13:05:53	128	5.8	12.05	263.5		
01/21/2015	13:07:00	143	5.8	12.10	270.0	End Lead Slurry	
01/21/2015	13:07:33	148	5.8	12.10	273.3		
01/21/2015	13:09:13	182	5.8	12.16	283.0		
01/21/2015	13:10:53	168	5.9	12.43	8.5		
01/21/2015	13:12:33	202	5.8	12.86	18.2		
01/21/2015	13:13:00	197	5.8	12.90	20.8	Start Mixing Tail Slurry	
01/21/2015	13:14:13	224	5.8	12.91	27.8		
01/21/2015	13:15:53	238	5.8	12.93	37.5		
01/21/2015	13:17:33	218	5.2	12.91	46.9		
01/21/2015	13:19:13	281	5.7	12.93	56.3		
01/21/2015	13:20:53	250	5.8	13.00	65.9		
01/21/2015	13:22:33	205	5.2	13.02	74.6		
01/21/2015	13:24:13	281	5.7	13.04	83.3		
01/21/2015	13:25:53	248	5.9	12.98	92.9		
01/21/2015	13:27:33	150	4.7	12.99	102.6		
01/21/2015	13:29:13	138	4.3	13.08	109.7		
01/21/2015	13:30:53	218	4.2	13.12	116.8		
01/21/2015	13:32:00	196	4.3	13.12	121.5	End Tail Slurry	
01/21/2015	13:32:33	31	0.2	13.21	123.6		
01/21/2015	13:34:13	9	0.0	13.13	0.0		
01/21/2015	13:35:53	8	0.0	13.13	0.0		
01/21/2015	13:37:33	-14	0.0	13.13	0.0		
01/21/2015	13:39:00	8	0.0	13.15	0.0	Wash Up	
01/21/2015	13:39:13	21	0.0	13.14	0.0		
01/21/2015	13:40:53	163	4.4	9.31	4.5		
01/21/2015	13:42:33	146	4.4	8.38	7.4		
01/21/2015	13:44:13	-5	0.0	0.01	8.7		
01/21/2015	13:45:53	48	23.9	0.70	15.5		
01/21/2015	13:47:33	136	4.5	8.18	17.8		
01/21/2015	13:49:13	5	0.0	8.41	19.2		
01/21/2015	13:50:00	6	0.0	8.42	0.0	Drop Top Plug	
01/21/2015	13:50:53	21	2.8	8.39	1.1		
01/21/2015	13:52:33	120	5.9	8.42	10.1		
01/21/2015	13:54:13	295	5.8	8.42	20.0		
01/21/2015	13:55:53	345	5.8	8.42	29.6		
01/21/2015	13:59:13	527	5.8	8.43	48.9		
01/21/2015	14:00:53	607	5.8	8.43	58.6		
01/21/2015	14:02:33	768	5.8	8.42	68.2		
01/21/2015	14:04:13	934	5.8	8.42	77.8		
01/21/2015	14:05:53	1113	5.8	8.43	87.5		
01/21/2015	14:07:33	1108	5.8	8.43	97.1		
01/21/2015	14:09:13	1263	5.8	8.43	106.7		
01/21/2015	14:10:53	1346	5.8	8.43	116.3		
01/21/2015	14:12:33	1505	5.7	8.42	125.8		
01/21/2015	14:14:13	1525	5.8	8.42	135.4		
01/21/2015	14:15:53	1621	5.7	8.42	145.0		
01/21/2015	14:17:33	1670	5.7	8.43	154.5		
01/21/2015	14:19:13	1930	5.7	8.43	164.1		
01/21/2015	14:20:53	1978	5.7	8.42	173.6		
01/21/2015	14:22:33	1851	4.2	8.42	182.9		

Well			Field		Job Start	Customer		Job Number
Mary Jane 8-5 8-5			Arikaree Creek		Jan/21/2015	Nighthawk Productions		2085507
Date	Time 24-hr clock	Treating Pressure PSI	Flow Rate B/M	Density LB/G	Volume BBL	Message		
01/21/2015	14:25:53	1868	1.3	8.42	193.3			
01/21/2015	14:27:33	1841	1.3	8.42	195.5			
01/21/2015	14:28:00	1846	1.3	8.42	196.1	Displace 293 bbls Of H2O		
01/21/2015	14:29:13	2622	0.0	8.42	197.4			
01/21/2015	14:30:53	1886	0.0	8.42	197.4			
01/21/2015	14:32:33	3	0.0	8.42	197.4			
01/21/2015	14:34:13	3	0.0	8.42	197.4			
01/21/2015	14:35:53	1	0.0	8.42	197.4			
01/21/2015	14:37:33	235	0.0	8.42	0.9			
01/21/2015	14:39:13	-18	0.6	8.41	8.6			
01/21/2015	14:40:53	-26	0.0	8.42	8.6			
01/21/2015	14:42:33	-13	0.2	8.41	9.1			
01/21/2015	14:44:13	225	0.0	0.02	15.3			
01/21/2015	14:45:53	3	0.0	0.02	23.3			
01/21/2015	14:47:33	36	0.0	0.01	23.7			
01/21/2015	14:49:13	-0	0.0	0.01	26.9			
01/21/2015	14:50:53	-1	0.0	8.32	26.9			
01/21/2015	14:52:33	1	0.0	7.98	28.2			
01/21/2015	14:54:13	-2	0.0	8.42	28.2			
01/21/2015	14:55:53	-1	0.0	8.42	28.2			
01/21/2015	14:57:33	-2	0.0	8.42	28.2			
01/21/2015	14:59:13	-1	0.0	8.42	28.2			
01/21/2015	15:00:53	-0	0.0	8.42	28.2			
01/21/2015	15:02:33	-1	0.0	8.42	28.2			
01/21/2015	15:04:13	-1	0.0	8.42	28.2			
01/21/2015	15:05:53	-1	0.0	8.42	28.2			
01/21/2015	15:07:33	-1	0.0	8.42	28.2			
01/21/2015	15:09:13	-1	0.0	8.42	28.2			
01/21/2015	15:10:53	-1	0.0	6.80	28.2			
01/21/2015	15:12:33	-1	0.0	0.04	28.2			

### Post Job Summary

Average Pump Rates, bbl/min					Volume of Fluid Injected, bbl					
Slurry 5.1	N2	Mud	Maximum Rate 25.0		Total Slurry 380.0	Mud 0.0	Spacer 20.0	N2		
Treating Pressure Summary, psi					Breakdown Fluid					
Maximum 5314	Final 1864	Average 604	Bump Plug to 2611	Breakdown	Type	Volume bbl		Density lb/gal		
Avg. N2 Percent %		Designed Slurry Volume 380.0 bbl		Displacement 193.0 bbl	Mix Water Temp 60 degF	Cement Circulated to Surface? <input checked="" type="checkbox"/>		Volume 110.0 bbl		
						Washed Thru Perfs <input type="checkbox"/>		To ft		
Customer or Authorized Representative Jim Weir			Schlumberger Supervisor Christine Matlock/Leiker			Circulation Lost <input type="checkbox"/>		Job Completed <input checked="" type="checkbox"/>		
						-		-		