

HALLIBURTON

iCem[®] Service

SYNERGY OIL & GAS LP

For:

Date: Saturday, January 24, 2015

SRC Cannon K-16 CHZ Surface

Case 1

Sincerely,
Derek Trier

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1.1 Executive Summary

Halliburton appreciates the opportunity to perform the cementing services on the **SRC Cannon K-16CHZ** cement **Surface** casing job. A pre-job safety meeting was held before the job where details of the job were discussed, potential safety hazards were reviewed, and environmental compliance procedures were outlined.

Halliburton maintains a continuous quality improvement process and appreciates any comments or suggestions that you may have. Halliburton again thanks you for the opportunity to perform service work on this well. We hope to be your solutions provider for future projects.

Respectfully,

Halliburton [Brighton]

Job Times

	Date	Time	Time Zone
Called Out	1/29/2015	1500	MTN
On Location		2100	
Job Started		2206	
Job Completed		2311	
Departed Location	1/30/2015	0000	

1.2 Cementing Job Summary

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Cementing Job Summary

The Road to Excellence Starts with Safety

Sold To #: 359915	Ship To #: 3630452	Quote #:	Sales Order #: 0902057088
Customer: SYNERGY RESOURCES CORPORATION		Customer Rep:	
Well Name: SRC CANNON	Well #: K-18CHZ	API/UWI #: 05-123-40786-00	
Field: WATTENBERG	City (SAP): BERTHOUD	County/Parish: WELD	State: COLORADO
Legal Description: SE SE-16-4N-68W-1241FSL-280FEL			
Contractor: ENSIGN DRLG		Rig/Platform Name/Num: ENSIGN 131	
Job BOM: 7521			
Well Type: HORIZONTAL OIL			
Sales Person: HALAMERICA\HB21661		Srcv Supervisor:	
Job			

Formation Name			
Formation Depth (MD)	Top		Bottom
Form Type			BHST
Job depth MD	600ft		Job Depth TVD
Water Depth			Wk Ht Above Floor
Perforation Depth (MD)	From		To

Well Data

Description	New / Used	Size in	ID in	Weight lbm/ft	Thread	Grade	Top MD ft	Bottom MD ft	Top TVD ft	Bottom TVD ft
Open Hole Section			13.5				0	600		
Casing		9.625	8.921	36			0	600		

Tools and Accessories

Type	Size in	Qty	Make	Depth ft	Type	Size in	Qty	Make
Guide Shoe	4.5	1		12268	Top Plug	4.5	1	HES
Float Shoe	4.5	1			Bottom Plug	4.5	1	HES
Float Collar	4.5	1			SSR plug set	4.5	1	HES
Insert Float	4.5	1			Plug Container	4.5	1	HES
Stage Tool	4.5	1			Centralizers	4.5	1	HES

Miscellaneous Materials

Gelling Agt	Conc	Surfactant	Conc	Acid Type	Qty	Conc
Treatment Fld	Conc	Inhibitor	Conc	Sand Type	Size	Qty

Fluid Data

Stage/Plug #: 1									
Fluid #	Stage Type	Fluid Name	Qty	Qty UoM	Mixing Density lbm/gal	Yield ft ³ /sack	Mix Fluid Gal	Rate bbl/min	Total Mix Fluid Gal
1	Mud Flush III (Powder)	Mud Flush III	12	bbl	8.4				
42 gal/bbl			FRESH WATER						
Fluid #	Stage Type	Fluid Name	Qty	Qty UoM	Mixing Density lbm/gal	Yield ft ³ /sack	Mix Fluid Gal	Rate bbl/min	Total Mix Fluid Gal

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Cementing Job Summary

2	SwiftCem B2	SWIFTCEM (TM) SYSTEM	210	sack	13.4	1.79		4	9.5
9.50 Gal		FRESH WATER							
Fluid #	Stage Type	Fluid Name	Qty	Qty UoM	Mixing Density lbm/gal	Yield ft ³ /sack	Mix Fluid Gal	Rate bbl/mi n	Total Mix Fluid Gal
3	Displacement	Displacement	0	bbl	8.33				
Cement Left in Pipe		Amount	ft	Reason			Shoe Joint		
Comment									

1.3 Job Overview

		Units	Description
1	Surface temperature at time of job	°F	45
2	Mud type (OBM, WBM, SBM, Water, Brine)	-	WBM
3	Actual mud density	lb/gal	9.0
4	Time circulated before job	HH:MM	
5	Mud volume circulated	Bbls	
6	Rate at which well was circulated	Bpm	
7	Pipe movement during hole circulation	Y/N	N
8	Rig pressure while circulating	Psi	
9	Time from end mud circulation to start of job	HH:MM	
10	Pipe movement during cementing	Y/N	N
11	Calculated displacement	Bbls	42
12	Job displaced by	Rig/HES	HES
13	Annular before job)?	Y/N	N
14	Annular flow after job	Y/N	N
15	Length of rat hole	Ft	
16	Units of gas detected while circulating	Units	
17	Was lost circulation experienced at any time ?	Y/N	N

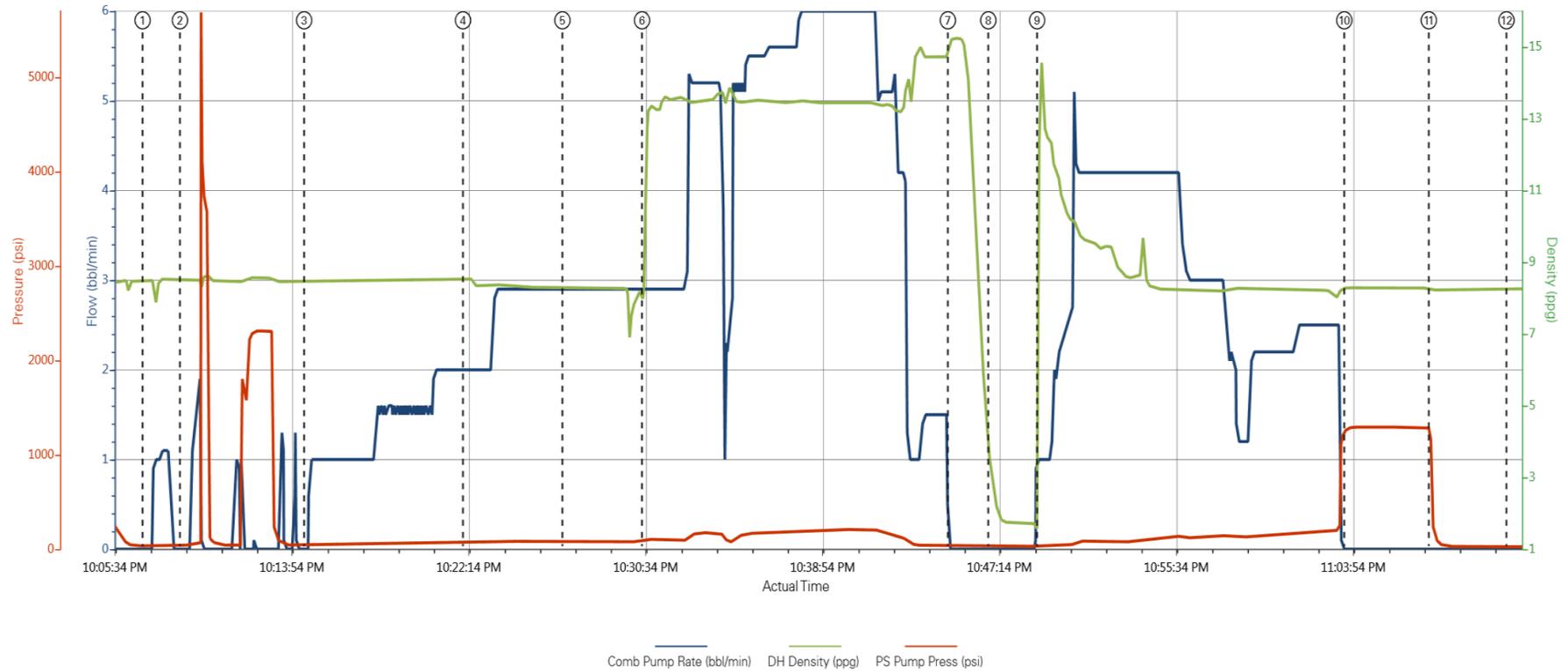
1.4 Job Event Log

Type	Seq. No.	Activity	Graph Label	Date	Time	Source	Comb Pump Rate <i>(bbl/min)</i>	DH Density <i>(ppg)</i>	PS Pump Press <i>(psi)</i>	Comments
Event	1	Call Out	Call Out	1/29/2015	15:00:00	USER				CALL OUT FROM ARS OFFICE
Event	2	Arrive At Loc	Arrive At Loc	1/29/2015	21:00:00	USER				ARRIVE ON LOCATION MET WITH COMPANY REP TO DISCUSS JOB PROCESS AND CONCERNS ADVISED THEY ONLY HAD 4JOINTS OF CASING LEFT TO RUN
Event	3	Start Job	Start Job	1/29/2015	22:06:58	COM6	0.00	8.49	35.00	PRELOADED PLUG IN TO CEMENT HEAD WITNESSED BY COMPANY REP HELD PREJOB SAFETY MEETING IN DOG HOUSE TO DISCUSS JOB PROCESS AND HAZARDS
Event	4	Test Lines	Test Lines	1/29/2015	22:08:44	COM6	0.00	8.51	43.00	PRESSURE TESTED PUMPS AND LINES FOUND LEAK IN LINE ON RIG FLOOR RELEASED PRESSURE BACK TO PUMP TRUCK AND TIGHTENED UP HAMMER UNION AND

										RETEST NO LEAKS AND PRESSURE HELD GOOD
Event	5	Pump Spacer 1	Pump Spacer 1	1/29/2015	22:14:35	COM6	0.00	8.48	39.00	PUMP 10BBL OF FRESH WATER 2.0BPM 63PSI
Event	6	Pump Spacer 2	Pump Spacer 2	1/29/2015	22:22:04	COM6	2.00	8.52	65.00	MIXED 12BBL OF MUD FLUSH AT 2.0BPM 65PSI
Event	7	Pump Spacer 1	Pump Spacer 1	1/29/2015	22:26:45	COM6	2.90	8.29	82.00	PUMPED 10BBL OF WATER WITH RED TRACER DYE
Event	8	Pump Cement	Pump Cement	1/29/2015	22:30:30	COM6	2.90	9.32	88.00	MIXED 66BBL OF 13.4PPG SWIFTCEM AT 6.0BPM 135PSI
Event	9	Shutdown	Shutdown	1/29/2015	22:44:55	COM6	0.00	15.23	41.00	
Event	10	Drop Top Plug	Drop Top Plug	1/29/2015	22:46:49	COM6	0.00	3.24	32.00	RELEASED TOP PLUG WITNESSED BY COMPANY REP
Event	11	Pump Displacement	Pump Displacement	1/29/2015	22:49:07	COM6	1.00	13.20	43.00	PUMPED 41BBL OF FRESH WATER TO DISPLACE CEMENT
Event	12	Bump Plug	Bump Plug	1/29/2015	23:03:35	COM6	0.00	8.28	1272.00	BUMPED PLUG 500PSI OVER FINAL PRESSURE
Event	13	Other	Other	1/29/2015	23:07:34	COM6	0.00	8.26	894.00	RELEASED PRESSURE BACK TO PUMP TRUCK TO CHECK FLOATS, FLOATS HELD GOOD
Event	14	End Job	End Job	1/29/2015	23:11:13	USER	0.00	8.23	27.00	12BBL OF CEMENT BACK TO SURFACE

2.0 Attachments

2.1 Synergy SRC Cannon K-16 CHZ Surface.png



- ① Start Job 0;8:49;35 ④ Pump Spacer 2.2;8:52;65 ⑦ Shutdown 0;15:23;40 ⑩ Bump Plug 0;8:28;1274
- ② Test Lines 0;8:51;43 ⑤ Pump Spacer 1.2.9;8:29;82 ⑧ Drop Top Plug 0;3:15;32 ⑪ Other 0;8:27;630
- ③ Pump Spacer 1.0;8:48;39 ⑥ Pump Cement 2.9;9:32;88 ⑨ Pump Displacement 1;13:78;44 ⑫ End Job 0;8:23;27

3.0 Appendix
