

**ANADARKO PETROLEUM CORP - EBUS  
DO NOT MAIL - PO BOX 4995  
THE WOODLANDS, Texas**

Pettinger 28C-18HZ

**Majors 42**

# **Post Job Summary**

## **Cement Surface Casing**

Date Prepared: 12/23/2013  
Version: 1

Service Supervisor: BULINSKI, MATTHEW

Submitted by: TRIER, DEREK

# HALLIBURTON

## Wellbore Geometry

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Job Tubulars					MD		Shoe Joint Length ft
Type	Description	Size in	ID in	Wt lbm/ft	Top ft	Bottom ft	
Casing	9 5/8" Surface Casing	9.63	8.921	36.00	0.00	1,189.00	43.00
Open Hole Section	13 1/2" Open Hole Section		13.500		0.00	1,192.00	0.00

# HALLIBURTON

## ***Pumping Schedule***

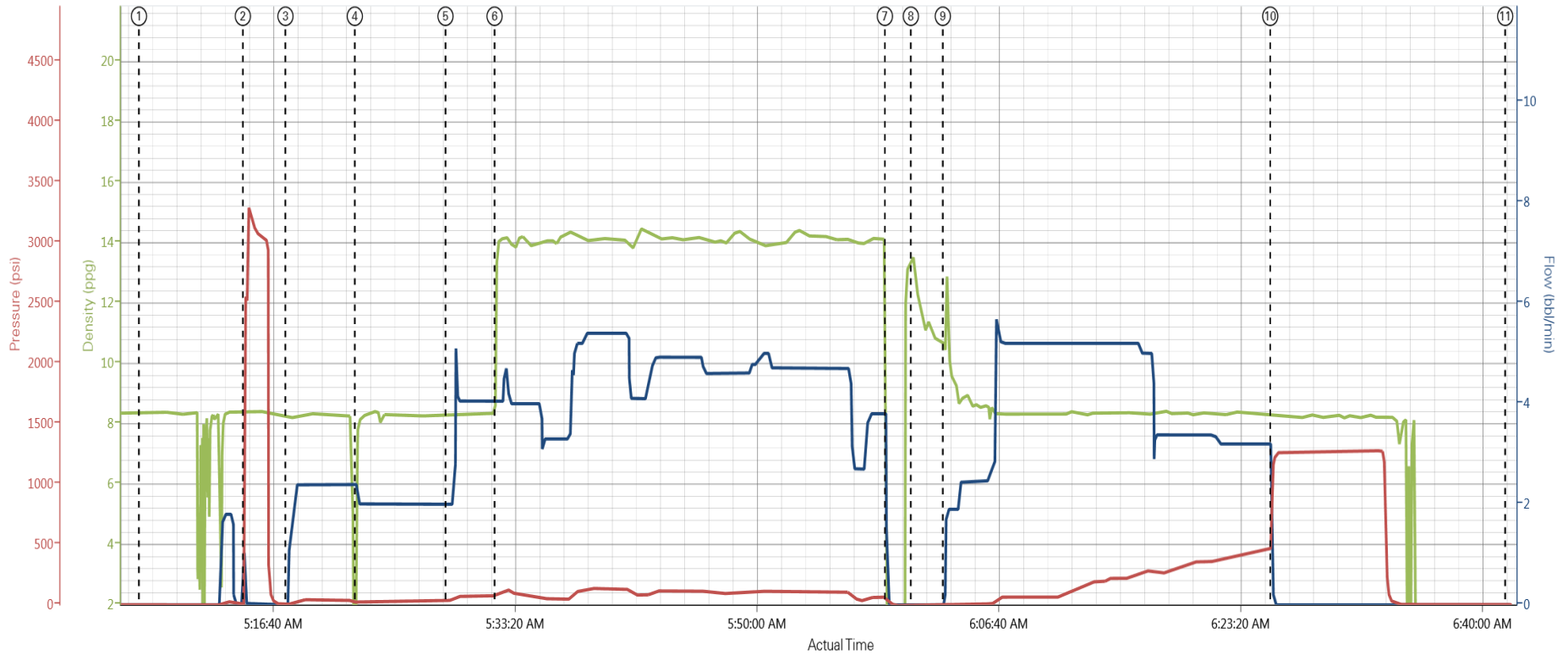
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<b>Stage /Plug #</b>	<b>Fluid #</b>	<b>Fluid Type</b>	<b>Fluid Name</b>	<b>Surface Density lbm/gal</b>	<b>Avg Rate bbl/min</b>	<b>Surface Volume</b>	<b>Downhole Volume</b>
1	1	Spacer	Fresh Water Spacer	8.33	2.50	10.0 bbl	10.0 bbl
1	2	Spacer	Mud Flush	8.40	2.50	12.0 bbl	12.0 bbl
1	1	Spacer	Fresh Water Spacer	8.33	3.00	10.0 bbl	10.0 bbl
1	3	Cement Slurry	SwiftCem B2	14.20	5.00	446.0 sacks	446.0 sacks

# HALLIBURTON

## Data Acquisition

Anadarko Pettinger 28C-18HZ Surface 12-3-13



DH Density (ppg) -0.11    Comb Pump Rate (bbl/min) 0    PS Pump Press (psi) 2

- ① Start Job 8.35;0;1    ④ Pump Spacer 27.32;2.4;23    ⑦ Shutdown 1.05;0;38    ⑩ Bump Plug 8.31;3.2;952
- ② Test Lines 8.38;0;2564    ⑤ Pump Spacer 18.31;2;37    ⑧ Drop Top Plug 13.6;0;-5    ⑪ End Job -0.13;0;2
- ③ Pump Spacer 18.29;0;4    ⑥ Pump Cement 13.62;4.1;84    ⑨ Pump Displacement 10.45;1;-1

# HALLIBURTON

## Service Supervisor Reports

### Job Log

Date/Time	Chart #	Activity Code	Pump Rate	Cum Vol	Pump	Pressure (psig)	Comments
12/02/2013 23:30		Call Out					
12/03/2013 02:00		Depart Yard Safety Meeting					JSA on Job materials, pre-tripping trucks and driving to location
12/03/2013 02:45		Arrive at Location from Service Center					Arrived 2.25hrs early and rig is on schedule almost finished running Csg
12/03/2013 02:50		Assessment Of Location Safety Meeting					
12/03/2013 03:00		Safety Meeting - Pre Rig-Up					JSA on rigging up bulk trucks and iron to rig
12/03/2013 03:10		Rig-Up Equipment					
12/03/2013 03:30		Rig-Up Completed					
12/03/2013 04:55		Safety Meeting - Pre Job					JSA with company man, rig hands, and HES hands on pump schedule
12/03/2013 05:07		Start Job					
12/03/2013 05:14		Test Lines					3000psi Pressure Test Lines to rig floor
12/03/2013 05:17		Pump Spacer 1	2.5	10		38.0	10bbls H2O spacer
12/03/2013 05:22		Pump Spacer 2	2.5	12		40.0	12bbls Mud flush spacer
12/03/2013 05:28		Pump Spacer 1	3	10		35.0	10bbls H2O spacer
12/03/2013 05:32		Pump Cement	4	122.3		38.0	446sks Swiftcem, 14.2ppg, 1.54yield, 7.66gal/sk, Mixed with rig water and # verify 3x's by pressurized mud scales
12/03/2013 05:58		Shutdown					
12/03/2013 06:00		Drop Top Plug					Pre-loaded
12/03/2013 06:02		Pump Displacement	5	89		250.0	H2O displacement, Good returns throughout. 4bbls cmt back to surface
12/03/2013 06:25		Bump Plug	3			480.0	Slowed down last 20bbls to bump. Plug landed at 480psi and brought to 1220psi for 5mins
12/03/2013 06:31		Check Floats					Floats Held
12/03/2013 06:41		End Job					
12/03/2013 06:45		Safety Meeting - Pre Rig-Down					JSA on rigging down bulk trucks and iron from rig
12/03/2013 06:50		Rig-Down Equipment					
12/03/2013 07:45		Rig-Down Completed					
12/03/2013 07:50		Safety Meeting - Departing Location					JSA on location walk around, pre-tripping trucks and driving back to Brighton yard

*The Road to Excellence Starts with Safety*

<b>Sold To #:</b> 300466		<b>Ship To #:</b> 3117347		<b>Quote #:</b>		<b>Sales Order #:</b> 900924037	
<b>Customer:</b> ANADARKO PETROLEUM CORP - EBUS				<b>Customer Rep:</b> Heresh, Larry			
<b>Well Name:</b> Pettinger			<b>Well #:</b> 28C-18HZ		<b>API/UWI #:</b> 05-123-38018		
<b>Field:</b> WATTENBERG		<b>City (SAP):</b> BRIGHTON		<b>County/Parish:</b> Weld		<b>State:</b> Colorado	
<b>Contractor:</b> Majors			<b>Rig/Platform Name/Num:</b> Majors 42				
<b>Job Purpose:</b> Cement Surface Casing							
<b>Well Type:</b> Development Well				<b>Job Type:</b> Cement Surface Casing			
<b>Sales Person:</b> PLIENESS, RYAN			<b>Srvc Supervisor:</b> BULINSKI, MATTHEW		<b>MBU ID Emp #:</b> 483865		

**Job Personnel**

HES Emp Name	Exp Hrs	Emp #	HES Emp Name	Exp Hrs	Emp #	HES Emp Name	Exp Hrs	Emp #
BULINSKI, MATTHEW J	0.0	483865	CARPENTER, JACOB P	0.0	499500	LANGE, TIMOTHY Paul	0.0	520811
Sauceda, Jimmy	0.0	1234456						

**Equipment**

HES Unit #	Distance-1 way	HES Unit #	Distance-1 way	HES Unit #	Distance-1 way	HES Unit #	Distance-1 way
10982754C	5 mile	11036295C	5 mile	11527037	5 mile	11542778	5 mile
11605598	5 mile						

**Job**

**Job Times**

Formation Name	Top	Bottom	Called Out	Date	Time	Time Zone
<b>Formation Depth (MD)</b>				02 - Dec - 2013	23:30	MST
<b>Form Type</b>		BHST	<b>On Location</b>	03 - Dec - 2013	02:45	MST
<b>Job depth MD</b>	1192. ft	<b>Job Depth TVD</b>	1192. ft	<b>Job Started</b>	04 - Dec - 2013	05:07
<b>Water Depth</b>		<b>Wk Ht Above Floor</b>		<b>Job Completed</b>	03 - Dec - 2013	06:41
<b>Perforation Depth (MD)</b>	<i>From</i>	<i>To</i>	<b>Departed Loc</b>	03 - Dec - 2013	08:00	MST

**Well Data**

Description	New / Used	Max pressure psig	Size in	ID in	Weight lbm/ft	Thread	Grade	Top MD ft	Bottom MD ft	Top TVD ft	Bottom TVD ft
13 1/2" Open Hole Section				13.5				.	1192.		
9 5/8" Surface Casing	Unknown		9.625	8.921	36.		J-55	.	1189.		

**Sales/Rental/3<sup>rd</sup> Party (HES)**

Description	Qty	Qty uom	Depth	Supplier
CMT CASING EQUIPMENT BOM	1	JOB		
MILEAGE FOR CEMENTING CREW,ZI	20	MI		
ZI FUEL SURCHG-CARS/PICKUPS<1 1/2TON	20	MI		
KIT,HALL WELD-A	1	EA		
Description	Qty	Qty uom	Depth	Supplier
CNTRLZR, 9 5/8"x13 3/4',#500-0963-1375	9	EA		
BASKET - CEMENT - 9-5/8 CSG X 12-1/4	1	EA		
PLUG,CMTG, TOP,9 5/8,HWE,8.16 MIN/9.06 MA	1	EA		
COLLAR-STOP-9 5/8"-FRICTION-HINGED	2	EA		

**Fluid Data**

Stage/Plug #: 1									
Fluid #	Stage Type	Fluid Name	Qty	Qty uom	Mixing Density lbm/gal	Yield ft <sup>3</sup> /sk	Mix Fluid Gal/sk	Rate bbl/min	Total Mix Fluid Gal/sk
1	Fresh Water Spacer		10.00	bbl	8.33			2.50	
2	Mud Flush		12.00	bbl	8.4			2.50	
	3.5 lbm/bbl	MUD FLUSH III, 40 LB SACK (101633304)							
	42 gal/bbl	MUD FLUSH III - SBM (528788)							
1	Fresh Water Spacer		10.00	bbl	8.33			3.00	
3	SwiftCem B2	SWIFTCEM (TM) SYSTEM (452990)	446.0	sacks	14.2	1.54	7.66	5.00	7.66
	7.66 Gal	FRESH WATER							
Calculated Values		Pressures		Volumes					
Displacement	89.0	Shut In: Instant		Lost Returns		Cement Slurry		Pad	
Top Of Cement		5 Min		Cement Returns	4.0	Actual Displacement	89.0	Treatment	
Frac Gradient		15 Min		Spacers	32.0	Load and Breakdown		Total Job	
Rates									
Circulating		Mixing		Displacement		Avg. Job			
Cement Left In Pipe	Amount	43 ft	Reason	Shoe Joint					
Frac Ring # 1 @	ID	Frac ring # 2 @	ID	Frac Ring # 3 @	ID	Frac Ring # 4 @	ID		
The Information Stated Herein Is Correct				Customer Representative Signature					

