



Pumping Service Report

9188077

Client Name Whiting Petroleum Corp.	Well Name Razor 26K-3507A	Job Date March 23, 2014	Call Sheet 1040391
Client Representative Kenny Wilkerson	Location Sec 26:T10N:R58W	Job Type Surface Casing	Rig Frontier Drilling 26

Well Profile

Well Type:	Oil
Maximum Treating Pressure (psi):	---
Predicted Bottom Hole Static Temperature (°F):	100.00 @ --
Bottom Hole Circulating Temperature (°F):	80.00 @ --
Bottom Hole Logged Temperature (°F):	--- @ --

Open Hole					
<u>Size (in)</u>	<u>Excess (%)</u>	<u>TMD From (ft)</u>	<u>TMD To (ft)</u>	<u>TVD From (ft)</u>	<u>TVD To (ft)</u>
13.500	25.000	0.000	1,586.000	--	--

Casing									
<u>Size</u>	<u>Weight</u>	<u>Grade</u>	<u>Collapse Pressure</u>	<u>Internal Yield Pressure</u>	<u>Capacity</u>	<u>I.D.</u>	<u>O.D.</u>	<u>Depth From</u>	<u>Depth To</u>
(in)	(lb/ft)		(psi)	(psi)	(bbl)	(in)	(in)	(ft)	(ft)
9.625	36.000	J-55	2,020.0	3,520.0	121.01	8.921	10.625	0.0	1,565.3

Products

Stage 1	
From Depth (ft):	0
To Depth (ft):	1500
Acids/Blends/Fluids :	
Tail: 635 Sacks of 0:1:0 Type III, Density = 14.2 lb/gal, Volume Pumped = 166.2 (bbl)	
Water Temperature(°F) = 60 , Bulk Temperature(°F) = 60 , Slurry Temperature(°F) = 60	
+ 1 % of CaCl2 (Preblend),	
+ 0.25 lb/sack of Polyflake (Preblend)	

Fluid & Cement Data

Expected Cement Top:	--				
Wellbore Fluid					
<u>Fluid Type</u>	<u>Viscosity (cP)</u>	<u>Density (lbs/gal)</u>	<u>Yield Point (psi)</u>	<u>Temperature (°F)</u>	<u>Recorded@</u>
Water	--	--	--	--	Mar 23, 2014 10:52

Attachment & Tools

Tubular Plugs		
<u>Tubular Plug Type</u>	<u>Size (in)</u>	<u>Supplier</u>
Rubber Top	9.625	Client



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Units & Personnel

Units							
<u>Truck Unit No.</u>	<u>Main Type</u>	<u>Sub Type</u>	<u>Tractor Unit No.</u>	<u>Main Type</u>	<u>Sub Type</u>	<u>Time On Location</u>	<u>Time Off Location</u>
449086	TRAILER	Utility Trailer	201173	PICKUP	1 Ton	03/23/2014 17:30	03/24/2014 01:30
445047	TRAILER	SCM Twin	745047	TRACTOR	Tandem - Tractor	03/23/2014 17:30	03/24/2014 01:30
446173	TRAILER	Bulker	746173	TRACTOR	Tandem - Tractor	03/23/2014 17:30	03/24/2014 01:30
746508	BODY JOB	Baby Bulker				03/23/2014 17:30	03/24/2014 01:30

Crew and Bonuses				
<u>Employee</u>	<u>Start Shift</u>	<u>End Shift</u>	<u>Second Start Shift</u>	<u>Second End Shift</u>
Johnson, Quintin	03/23/2014 17:30	03/24/2014 01:30		
Cox, Brandon	03/23/2014 17:30	03/24/2014 01:30		
Meisner, Jeremy	03/23/2014 17:30	03/24/2014 01:30		
Coronado, Sebastian	03/23/2014 17:30	03/24/2014 01:30		
Young, Craig	03/23/2014 17:30	03/24/2014 01:30		

Treatment Reports & Remarks



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Treatment Report

Event #	Event Time	Event Description	Fluid Type	Rate (bbl/min)	Tubular Pressure (psi)	Annular Pressure (psi)	Stage Volume (bbl)	Total Volume (bbl)
1	Mar 23,2014 17:30	Arrive On Location Remarks: arrived on time		--	--	--	--	0.00
2	Mar 23,2014 17:40	Tailgate Meeting Remarks: talked about spotting trucks and rigging in		--	--	--	--	0.00
3	Mar 23,2014 20:45	Rig In Remarks: rig in iron and to mud and water		--	--	--	--	0.00
4	Mar 23,2014 22:10	Sign-off on Safety Remarks: signed their and our JSA		--	--	--	--	0.00
5	Mar 23,2014 22:11	Safety Meeting Remarks: talked about job scope and safety concerns		--	--	--	--	0.00
6	Mar 23,2014 22:24	Start - Fluid Remarks: filled lines for pressure test	Water	2.00	50.0	--	2.00	2.00
7	Mar 23,2014 22:28	Pressure Test Remarks: pressure tested lines held	Water	0.00	3,200.0	--	0.00	2.00
8	Mar 23,2014 22:30	Pump Spacer Remarks: pumped 20 fresh ahead	Water	2.00	100.0	--	20.00	22.00
9	Mar 23,2014 22:42	Mix Cement Remarks: pump @ 14.2	0:1:0 Type III	4.00	161.0	--	166.20	188.20
10	Mar 23,2014 23:30	Drop Plug Remarks: drop plug		--	--	--	--	188.20
11	Mar 23,2014 23:32	Pump Displacement Remarks: displaced and bump plug		3.00	450.0	--	119.10	307.30
12	Mar 24,2014 00:32	Stop Remarks: stop rig off for wash up		--	--	--	--	307.30
13	Mar 24,2014 01:15	Wash Remarks: wash pump truck up	Water	2.00	150.0	--	20.00	307.30
14	Mar 24,2014 01:58	Rig Out Remarks: rig out		--	--	--	--	307.30
15	Mar 24,2014 02:10	Pre-Departure Meeting Remarks: journey mangement		--	--	--	--	307.30
16	Mar 24,2014 02:20	Job Complete Remarks: covey down and do walk around		--	--	--	--	307.30
17	Mar 24,2014 02:30	Leave Location Remarks: leave for the yard		--	--	--	--	307.30

Did Float Hold: Yes
 Fluid Returns : Yes
 Type : Cement
 Volume (bbl) : 50
 Temperature (°F) : 60
 FDAS Functioning Correctly : Yes
 Was the Program Followed As Per Design? : Yes



Treatment Reports & Remarks

Material Transfer Sheet Number

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37132

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