



**Pumping
Service Report**

9198020

Client Name Anadarko Petroleum Corporation	Well Name Strear 22-23	Rig Ensign Drilling Inc. 328	Job Date September 05,2014	Call Sheet 1046623
Client Representative Rigo Vierra	Surface Well Location SE NW Sec 23:T2N:R67W	Down Hole Well Location	Job Type Cement Misc.	

Well Profile

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

Casing

Size (in)	Weight (lb/ft)	Grade	Collapse Pressure (psi)	Internal Yield Pressure (psi)	Capacity (bbl)	I.D. (in)	O.D. (in)	Depth From (ft)	Depth To (ft)
4.500	11.600	J-55	4,960.0	5,350.0	109.57	4.000	5.000	0.0	7,050.0

Tubing

Size (in)	Weight (lb/ft)	Grade	Collapse Pressure (psi)	Capacity (bbl)	I.D. (in)	O.D. (in)	Depth From (ft)	Depth To (ft)
2.375	4.700	J-55	8,100.000	26.440	1.995	2.910	0.000	6,840.000

Products

Plug 1

From Depth (ft): 7050
To Depth (ft): 6800
Plug Type : Abandonment

Acids/Blends/Fluids :

Tail: 85 Sacks of 1-1-0 G, Density = 13.5 lb/gal, Volume Pumped = 25 (bbl)
Water Temperature(°F) = 63 , Bulk Temperature(°F) = 65 , Slurry Temperature(°F) = 65
+ 20 % of Silica Flour (Preblend),
+ 3 % of Gel (Preblend),
+ 0.1 % of SMS (Preblend),
+ 0.4 % of CFR-2 (Preblend),
+ 0.4 % of CFL-3 (Preblend)

Plug 2

From Depth (ft): 6825
To Depth (ft): 6393
Plug Type : Abandonment

Acids/Blends/Fluids :

Tail: 25 Sacks of Thermal 35, Density = 15.8 lb/gal, Volume Pumped = 6.7 (bbl)
Water Temperature(°F) = 63 , Bulk Temperature(°F) = 65 , Slurry Temperature(°F) = 65
+ 0.5 % of CFR-2 (Preblend),
+ 0.25 % of FMC (Preblend)

Fluid & Cement Data

Expected Cement Top:	--				
Wellbore Fluid					
Fluid Type	Viscosity (cP)	Density (lbs/gal)	Yield Point (psi)	Temperature (°F)	Recorded@
Water	--	8.400	--	--	Aug 01, 2014 10:36

Attachment & Tools

Down Hole Tools

<u>Tool Type</u>	<u>Depth (ft)</u>	<u>Supplier</u>
Cement Retainer	6,840.000	Third Party

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>
201273	PICKUP	3/4 Ton				09/05/2014 09:00	09/05/2014 15:00
740004	BODY JOB	C & A				09/05/2014 09:00	09/05/2014 15:00
446081	TRAILER	Bulker	746081	TRACTOR	Tandem - Tractor	09/05/2014 09:00	09/05/2014 15:00

Crew and Bonuses

<u>Employee</u>	<u>Start Shift</u>	<u>End Shift</u>	<u>Second Start Shift</u>	<u>Second End Shift</u>
Schneider, Patrick	09/05/2014 09:00	09/05/2014 15:00		
Laeger, Kacey	09/05/2014 09:00	09/05/2014 15:00		
Byczynski, Michael	09/05/2014 09:00	09/05/2014 15:00		

Treatment Reports & Remarks



**Pumping
Service Report**

9198020

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	Sep 05,2014 09:00	Arrive On Location	---	--	--	--	--	0.00
2	Sep 05,2014 09:05	Tailgate Meeting	---	--	--	--	--	0.00
3	Sep 05,2014 09:15	Rig In	---	--	--	--	--	0.00
4	Sep 05,2014 10:00	Wait On Instructions	---	--	--	--	--	0.00
Remarks: waited for rig crew to run in hole with tubing								
5	Sep 05,2014 11:45	Safety Meeting	---	--	--	--	--	0.00
6	Sep 05,2014 12:15	Sign-off on Safety	---	--	--	--	--	0.00
7	Sep 05,2014 12:27	Pressure Test Lines	Water	--	2,500.0	--	--	0.00
Remarks: good pressure test								
8	Sep 05,2014 12:29	Injection Test	Water	1.50	1,200.0	--	5.00	5.00
Remarks: good injection rate								
9	Sep 05,2014 12:32	Mix Cement	1-1-0 G	1.50	1,000.0	--	25.00	30.00
Remarks: tail cement @ 13.5 ppg yield = 1.66 h2o req = 7.92								
10	Sep 05,2014 12:48	Displace Fluid	Water	2.00	900.0	--	26.00	56.00
Remarks: displaced to 6718'								
11	Sep 05,2014 13:01	Finish Displacement	---	--	300.0	--	--	56.00
12	Sep 05,2014 13:03	Pull Out Off Retainer	---	--	0.0	--	--	56.00
13	Sep 05,2014 13:05	Wait On Instructions	---	--	--	--	--	0.00
Remarks: waited for rig crew to pull tubing & circulate the hole								
14	Sep 05,2014 13:42	Pressure Test Lines	Water	--	2,500.0	--	--	0.00
Remarks: good pressure test								
15	Sep 05,2014 13:44	Establish Circulation	Water	1.70	200.0	--	5.00	5.00
16	Sep 05,2014 13:46	Mix Cement	Thermal 35	1.70	300.0	--	6.70	62.70
Remarks: tail cement @ 15.8 ppg yield = 1.51 h2o req = 6.08								
17	Sep 05,2014 13:51	Displace Fluid	Water	2.00	250.0	--	24.40	87.10
Remarks: displaced to balance								
18	Sep 05,2014 14:05	Balance Plug	Water	--	0.0	--	--	87.10
19	Sep 05,2014 14:10	Rig Out	---	--	--	--	--	0.00
20	Sep 05,2014 14:30	Job Complete	---	--	--	--	--	0.00
21	Sep 05,2014 14:45	Pre-Departure Meeting	---	--	--	--	--	0.00
22	Sep 05,2014 15:00	Leave Location	---	--	--	--	--	0.00

Did Float Hold: Not Applicable

Fluid Returns : Not Expected

Type :

Volume (bbl) :

Temperature (°F) : --

FDAS Functioning Correctly : Yes

Was the Program Followed As Per Design? : Yes

Material Transfer Sheet Number

Material Transfer Sheet Number

46987



**Pumping
Service Report**

9188749

Client Name Anadarko Petroleum Corporation	Well Name Strear 22-23	Rig Ensign Drilling Inc. 328	Job Date September 10,2014	Call Sheet 1046866
Client Representative Rigo Vierra	Surface Well Location SE NW Sec 23:T2N:R67W	Down Hole Well Location	Job Type Cement Misc.	

Well Profile

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

Casing

Size (in)	Weight (lb/ft)	Grade	Collapse Pressure (psi)	Internal Yield Pressure (psi)	Capacity (bbl)	I.D. (in)	O.D. (in)	Depth From (ft)	Depth To (ft)
4.500	0.000		--	--	--	--	--	0.0	8,154.0

Tubing

Size (in)	Weight (lb/ft)	Grade	Collapse Pressure (psi)	Capacity (bbl)	I.D. (in)	O.D. (in)	Depth From (ft)	Depth To (ft)
2.375	0.000		--	--	--	--	0.000	7,092.000

Products

Plug 1

From Depth (ft): 6684
 To Depth (ft): 7092
 Plug Type : Abandonment
 Acids/Blends/Fluids :
 Tail: 25 Sacks of 0-1-0 G, Density = 15.8 lb/gal, Volume Pumped = 5.7 (bbl)
 Water Temperature(°F) = 70 , Bulk Temperature(°F) = 70 , Slurry Temperature(°F) = 70

Fluid & Cement Data

Expected Cement Top: Depth (ft): 6684

Wellbore Fluid

Fluid Type	Viscosity (cP)	Density (lbs/gal)	Yield Point (psi)	Temperature (°F)	Recorded@
Water	--	8.400	--	--	Aug 01, 2014 10:36



**Pumping
Service Report**

9188749

Units & Personnel

Units							
Truck Unit No.	Main Type	Sub Type	Tractor Unit No.	Main Type	Sub Type	Time On Location	Time Off Location
201025	PICKUP	1 Ton	449086	TRAILER	Utility Trailer	09/10/2014 07:00	09/10/2014 10:00
445070	TRAILER	SCM Twin	745070	TRACTOR	Tandem - Tractor	09/10/2014 07:00	09/10/2014 10:00
746506	BODY JOB	Baby Bulker				09/10/2014 07:00	09/10/2014 10:00

Crew and Bonuses				
Employee	Start Shift	End Shift	Second Start Shift	Second End Shift
Price, Ryan	09/10/2014 07:00	09/10/2014 10:00		
Hansen, Kevin	09/10/2014 07:00	09/10/2014 10:00		
Svoboda, Miloslav	09/10/2014 07:00	09/10/2014 10:00		
Davila, Israel	09/10/2014 07:00	09/10/2014 10:00		

Treatment Reports & Remarks

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	Sep 10, 2014 07:00	Arrive On Location		--	--	--	--	0.00
2	Sep 10, 2014 07:05	Tailgate Meeting		--	--	--	--	0.00
3	Sep 10, 2014 07:10	Rig In		--	--	--	--	0.00
4	Sep 10, 2014 07:20	Safety Meeting		--	--	--	--	0.00
5	Sep 10, 2014 07:25	Sign-off on Safety		--	--	--	--	0.00
6	Sep 10, 2014 07:30	Pump	Water	2.00	500.0	--	1.00	0.00
		Remarks: filled lines for pressure test						
7	Sep 10, 2014 07:40	Pressure Test		--	2,500.0	--	--	0.00
8	Sep 10, 2014 07:50	Establish Circulation	Water	1.00	100.0	--	8.00	0.00
9	Sep 10, 2014 08:00	Mix Cement	Thermal 35	2.00	350.0	--	5.70	0.00
10	Sep 10, 2014 08:10	Displace Fluid	Water	2.00	165.0	--	25.00	0.00
11	Sep 10, 2014 08:20	Stop		--	--	--	--	0.00
12	Sep 10, 2014 08:22	Pull Pipe		--	--	--	--	0.00
		Remarks: rig pulled 8 stands of tubing to role hole						
13	Sep 10, 2014 08:35	Pump	Water	3.00	--	900.0	45.00	0.00
		Remarks: rigged into back side and rolled hole						
14	Sep 10, 2014 08:54	Stop		--	--	--	--	0.00
15	Sep 10, 2014 09:00	N/A		--	--	500.0	--	0.00
		Remarks: pressured up back side to 500						
16	Sep 10, 2014 09:10	Wash		--	--	--	--	0.00
17	Sep 10, 2014 09:30	Rig Out		--	--	--	--	0.00
18	Sep 10, 2014 09:50	Job Complete		--	--	--	--	0.00
19	Sep 10, 2014 09:55	Pre-Departure Meeting		--	--	--	--	0.00
20	Sep 10, 2014 10:00	Leave Location		--	--	--	--	0.00



**Pumping
Service Report**

9198078

Client Name Anadarko Petroleum Corporation	Well Name Strear 22-23	Rig Ensign Drilling Inc. 328	Job Date September 12,2014	Call Sheet 1046977
Client Representative Rigo Vierra	Surface Well Location SE NW Sec 23:T2N:R67W	Down Hole Well Location	Job Type Cement Misc.	

Well Profile

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

Casing

Size	Weight	Grade	Collapse Pressure	Internal Yield Pressure	Capacity	I.D.	O.D.	Depth From	Depth To
(in)	(lb/ft)		(psi)	(psi)	(bbl)	(in)	(in)	(ft)	(ft)
4.500	11.600	J-55	4,960.0	5,350.0	110.20	4.000	5.000	0.0	7,090.0

Tubing

Size	Weight	Grade	Collapse Pressure	Capacity	I.D.	O.D.	Depth From	Depth To
(in)	(lb/ft)		(psi)	(bbl)	(in)	(in)	(ft)	(ft)
2.375	4.700	J-55	8,100.000	27.410	1.995	2.910	0.000	7,090.000

Products

Plug 1

From Depth (ft): 6574
 To Depth (ft): 7090
 Plug Type : Abandonment

Acids/Blends/Fluids :

Tail: 30 Sacks of Thermal 35, Density = 15.8 lb/gal, Volume Pumped = 8 (bbl)
 Water Temperature(°F) = 60 , Bulk Temperature(°F) = 50 , Slurry Temperature(°F) = 60
 + 0.5 % of CFR-2 (Preblend),
 + 0.25 % of FMC (Preblend)

Fluid & Cement Data

Expected Cement Top: Depth (ft): 6574

Wellbore Fluid

Fluid Type	Viscosity (cP)	Density (lbs/gal)	Yield Point (psi)	Temperature (°F)	Recorded@
Water	--	8.400	--	--	Aug 01, 2014 10:36



**Pumping
Service Report**

9198078

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>
201273	PICKUP	3/4 Ton				09/12/2014 11:30	09/12/2014 15:00
740018	BODY JOB	C & A				09/12/2014 11:30	09/12/2014 15:00
446081	TRAILER	Bulker	746081	TRACTOR	Tandem - Tractor	09/12/2014 11:30	09/12/2014 15:00

Crew and Bonuses				
<u>Employee</u>	<u>Start Shift</u>	<u>End Shift</u>	<u>Second Start Shift</u>	<u>Second End Shift</u>
Schneider, Patrick	09/12/2014 11:30	09/12/2014 15:00		
Curtner, Jerry	09/12/2014 11:30	09/12/2014 15:00		
Byczynski, Michael	09/12/2014 11:30	09/12/2014 15:00		

Treatment Reports & Remarks

Treatment Report									
<u>Event #</u>	<u>Event Time</u>	<u>Event Description</u>	<u>Fluid Type</u>	<u>Rate</u> (bbl/min)	<u>Tubular Pressure</u> (psi)	<u>Annular Pressure</u> (psi)	<u>Stage Volume</u> (bbl)	<u>Total Volume</u> (bbl)	
1	Sep 12,2014 11:30	Arrive On Location	---	--	--	--	--	0.00	
2	Sep 12,2014 11:35	Tailgate Meeting	---	--	--	--	--	0.00	
3	Sep 12,2014 11:45	Rig In	---	--	--	--	--	0.00	
4	Sep 12,2014 12:15	Safety Meeting	---	--	--	--	--	0.00	
5	Sep 12,2014 12:35	Sign-off on Safety	---	--	--	--	--	0.00	
6	Sep 12,2014 12:41	Pressure Test Lines	Water	--	2,500.0	--	--	0.00	
		Remarks: good pressure test							
7	Sep 12,2014 12:43	Establish Circulation	Water	2.00	500.0	--	5.00	5.00	
8	Sep 12,2014 12:46	Batch Mix	Thermal 35	--	0.0	--	--	5.00	
		Remarks: batched up 30 sks @ 15.8 ppg							
9	Sep 12,2014 13:05	Pump	Thermal 35	1.50	1,200.0	--	8.00	13.00	
		Remarks: tail cement @ 15.8 ppg yield = 1.51 h2o req = 6.08							
10	Sep 12,2014 13:10	Displace Fluid	Water	2.00	1,300.0	--	25.00	38.00	
		Remarks: displaced to balance							
11	Sep 12,2014 13:25	Balance Plug	---	--	0.0	--	--	38.00	
12	Sep 12,2014 13:30	Pull Pipe	---	--	--	--	--	38.00	
		Remarks: rig pulled tubing							
13	Sep 12,2014 13:45	Reverse Circulate	Water	3.00	900.0	--	50.00	88.00	
		Remarks: reversed tubing clean							
14	Sep 12,2014 14:10	Rig Out	---	--	--	--	--	0.00	
15	Sep 12,2014 14:30	Job Complete	---	--	--	--	--	0.00	
16	Sep 12,2014 14:45	Pre-Departure Meeting	---	--	--	--	--	0.00	
17	Sep 12,2014 15:00	Leave Location	---	--	--	--	--	0.00	