



# Bison Oil Well Cementing Single Cement Surface Pipe

Date: 8/16/2014  
Invoice #: 25035  
API#: 05-123-39248  
Foreman: Calvin Reimers

Customer: Anadarko Petroleum Corporation

Well Name: Sack 28C-30HZ

County: Weld  
State: Colorado  
Sec: 31  
Twp: 1N  
Range: 67W

Consultant: Bob  
Rig Name & Number: Major 42  
Distance To Location: 30 Miles  
Units On Location: 4034-3104/4024-3203  
Time Requested: 200am  
Time Arrived On Location: 1145pm  
Time Left Location: 430pm

## WELL DATA

Casing Size OD (in) : 9.625  
Casing Weight (lb) : 36.00  
Casing Depth (ft.) : 1,295  
Total Depth (ft) : 1305  
Open Hole Diameter (in.) : 13.50  
Conductor Length (ft) :  
Conductor ID :  
Shoe Joint Length (ft) : 42  
Landing Joint (ft) : 8

Max Rate: 7  
Max Pressure: 2500

## Cement Data

Cement Name: BFN III  
Cement Density (lb/gal) : 14.2  
Cement Yield (cuft) : 1.49  
Gallons Per Sack: 7.48  
% Excess: 21%  
Displacement Fluid lb/gal: 8.3  
BBL to Pit: 11  
Fluid Ahead (bbls): 30.0  
H2O Wash Up (bbls): 20.0

Spacer Ahead Makeup  
30 bbls H2O+Dye in 2nd 10 bbls

Casing ID

8.921

Casing Grade

J-55 only used

## Calculated Results

**cuft of Shoe** 18.40 cuft  
(Casing ID Squared) X (.005454) X (Shoe Joint ft)

**cuft of Conductor** 0.00 cuft  
(Conductor Width Squared) -(Casing Size OD Squared) X (.005454) X (Conductor Length ft)

**cuft of Casing** 763.28 cuft  
(Open Hole Squared)-(Casing Size Squared) X (.005454) X (Casing Depth - Conductor Length )

**Total Slurry Volume** 781.69 cuft  
(cuft of Shoe) + (cuft of Conductor) + (cuft of Casing)

**bbls of Slurry** 139.22 bbls  
(Total Slurry Volume) X (.1781)

**Sacks Needed** 525 sk  
(Total Slurry Volume) ÷ (Cement Yield) X (% Excess Cement)

**Mix Water** 93.43 bbls  
(Sacks Needed) X (Gallons Per Sack) ÷ 42

**Displacement:** 97.45 bbls

(Casing ID Squared) X (.0009714) X (Casing Depth + Landing Joint - Shoe Joint)

## Pressure of cement in annulus

**Hydrostatic Pressure:** 955.32 PSI

## Pressure of the fluids inside casing

**Displacement:** 540.10 psi

**Shoe Joint:** 31.28 psi

**Total** 571.38 psi

**Differential Pressure:** 383.95 psi

**Collapse PSI:** 2020.00 psi

**Burst PSI:** 3520.00 psi

**Total Water Needed:** 240.89 bbls

Authorization To Proceed



**Bison Oil Well Cementing**  
**Single Cement Surface Pipe**

Customer  
Well Name

Anadarko Petroleum Corporation  
Sack 28C-30HZ

INVOICE #  
LOCATION  
FOREMAN  
Date

25035  
Weld  
Calvin Reimers  
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**DESCRIPTION OF JOB EVENTS**

Safety Meeting MIRU CIRCULATE Drop Plug 306am M & P Time 222am 303am % Excess Mixed bbls Total Sacks bbl Returns Water Temp	145am 100am 217am 525 21% 93.43 525 11 66.6	Displace 1			Displace 2			Displace 3			Displace 4			Displace 5		
		BBLs	Time	PSI	BBLs	Time	PSI	BBLs	Time	PSI	BBLs	Time	PSI	BBLs	Time	PSI
		0	307am	90	0			0			0			0		
		10	309am	50	10			10			10			10		
		20	311am	60	20			20			20			20		
		30	313am	140	30			30			30			30		
		40	315am	180	40			40			40			40		
		50	317am	220	50			50			50			50		
		60	319am	300	60			60			60			60		
		70	320am	360	70			70			70			70		
		80	322am	410	80			80			80			80		
		90	324am	420	90			90			90			90		
		100	327am	400	100			100			100			100		
		110	Bump	900	110			110			110			110		
		120			120			120			120			120		
		130			130			130			130			130		
		140			140			140			140			140		
		150			150			150			150			150		

Notes:

The day

1/2 BBL Back on Bleed Off

X

Work Performed

X

Title

X

Date

# SERIES 2000

