

HSR-McDaniels 4-22

Existing Features	
KB	10

Surface csg shoe at	565
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Bottom of Foxhills (FHM)	769
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TOC (CBL)	3670
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Sussex Top	3974
Not producing Sussex w/in 1 mile	
Sussex Bottom	4231

Shannon Base	4592
Not producing Shannon w/in 1 mile	

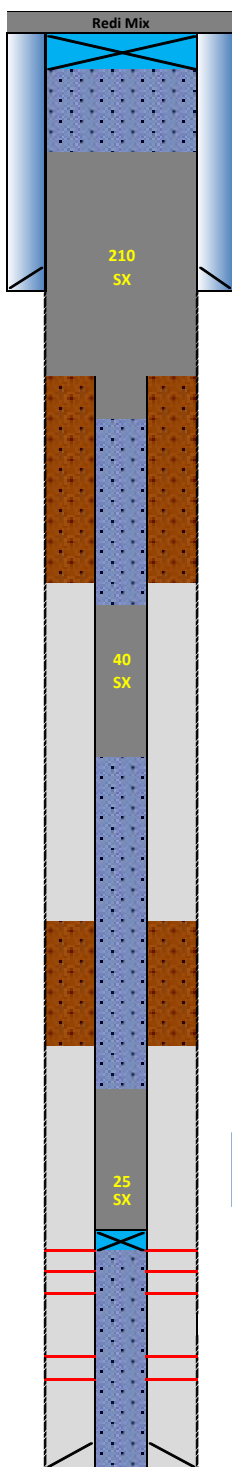
BOC (CBL)	5150
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TOC (CBL)	6020
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Niobrara Top	6784
Perf Top	6789
Perf Bottom	6941

Codell Top	7063
Perf Top	7063
Perf Bottom	7081

PBMD	7201
4 1/2" 11.6# CSG	7245



Proposed Additions for P&A

80	CIBP 8 5/8" 24#
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465	TOC
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Cement Blend: Type III w/ cello flake and CaCl₂ as necessary, mixed at 14.8 ppg and 1.33 cuft/sk yield.

870	Casing Stub
970	BOC

3770	TOC
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Cement Blend: "G" w/ 0.4% CD-32, 0.4% ASA-301, mixed at 15.8 ppg and 1.15 cuft/sk yield.

4300	BOC
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6340	TOC
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Cement Blend: "G" w/ 20% silica flour, 0.4% CD-32, 0.4% ASA-301 and R-3 to achieve 2:30 pump time, mixed at 15.8 ppg and 1.38 cuft/sk yield.

6740	CIBP 4 1/2" 11.6#
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API#	05-123-16638			
WINS:	74101			
Equipment	Specs.	Depth	Capacity (bbl/ft)	Capacity ft ³ /ft
Surface Casing	8 5/8" (24#)	565	0.0637	0.3576
Production Casing	4 1/2" (11.6#)	7245	0.0155	0.0873
Production Tubing	2 3/8" (4.7#)	7030	0.0039	0.0217
Hole Size (TOP)	10	N/A	0.0971	0.5454
Hole Size (SU/SH)	N/A	N/A	N/A	N/A
Hole Size (NB)	N/A	N/A	N/A	N/A

Cement Calculations				
Section	Volume cu-ft	Cement Sacks	Excess	Foxhills Plug 10 in. hole
Open Hole	199.62	150.09	20%	
Surface Casing	35.76	26.89		
Production Casing	8.73	6.56		
FX Total	235.38	183.54	210	
OH X CSG Annulus				
Production Casing	46.269	40.23391		
SU Total	46.27	40.23391	40	
OH X CSG Annulus				
Production Casing	34.92	25.30		
NB/CD Total	34.92	25.30	25	

Cement Yield	1.33	1.15	1.38
	FX	SX/SH	NB

Legend	
	Existing cement with CBL
	New cement
	Assumed cement w/ no CBL
	Cast Iron Cement Retainer
	Cast Iron Bridge Plug
	Mud
	Water + Biocide