



COG OPERATING LLC Pre-Drill Geological Prognosis
3RD BONE SPRING SAND Extended Lateral
Wolfbone Pool

110220000
AUG 07 2018
RECEIVED

3BS	NO PH
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Coonskin Fee #601H
Enter API#

Rig: Precision 595

Target Zone: 3rd Bone Spring Sand

Select Section Type	FNL	FSL	FEL	FWL	Unit
\$-T-R (SHL) 28-24S-35E	50			1480	C
\$-T-R (BHL) 33-24S-35E	2440			1730	F

GL:	3316	actual
KB:	3341	actual

PROPOSED WELL					REFERENCE WELL		
COG OPERATING LLC			900'			COG OPERATING LLC	
Coonskin Fee #601H			Est. VS:	7391.6	Chicken:	No	COONSKIN FEE 25H (PILOT)
28-24S-35E			Trt. Lat:	7039	Potash:	No	Sec 28-T24S-R35E
Lea Co., NM					Lizard:	No	Lea Co., NM
KB:	3341	Est. MD: 19500			CCA:	No	KB: 3348
			AFE type:	TopHat BSS No-PH			

Formations	TVD	Subsea	Iso to Tgt	Lith	Hazards/Misc	TVD	Subsea	Iso
Rustler	581	2760		Mixed lithologies		566	2782	359
TOS	940	2401		Salt		925	2423	3919
BOS (Fletcher)	4859	1518		Anhydrite		4844	1496	437
LMAR (Top Delaware)	5296	1955		Limestone		5281	1933	61
BLCN	5357	2016		Silt, Sand & Carb		5342	1994	919
CYCN	6276	2935		Silt, Sand & Carb		6261	2913	1485
BYCN	7761	4420		Silt, Sand & Carb		7746	4398	1290
Bone Sprg (BSGL)	9051	5710		Limestone		9036	5688	432
U Avalon Sh	9483	6142	2783	Silt, Shale & Carb		9468	6120	165
L Avalon Sh	9648	6307	2618	Silt, Shale & Carb		9633	6285	505
B Avalon Sh	10153	6812	2113	Silt, Shale & Carb		10138	6790	79
FBSG sand	10232	6891	2034	Fine Sand & Carb		10217	6869	640
SBSG sand	10872	7531	1394	Fine Sand & Carb		10857	7509	527
SBSG sand Base	11371	8030	895	Carb & Fine Sand		11384	8036	503
☆ TBSG sand	11874	8533	392	Fine Sand & Carb		11887	8539	394
WFMP	12281	8940		Silt, Shale & Carb		12281	8933	321
WFMP B	12602	9261		Silt, Shale & Carb		12602	9254	147
WFMP C	12749	9408		Silt, Shale & Carb		12749	9401	-

Lateral Targeting							DATUM: NAD 27			
	X	Y	Dist from	TVD	TVDss	INC	NM State Plane East 3001			
			FTP	12266	-8925	89.8	Dist from FTP	TVD	INC	
FTP	796483.3	435881.6					WP3		-	
WP1						-	WP4		-	
WP2						-	WP5		-	
PBHL	796546.6	428490.2	7392	12296	-8955	-				

Comments

1.5 mile lateral. GR through curve and lateral.

Wireline Evaluation

CH Logs Only

Coring and Testing

None

Mudlogging

Log out from intermediate casing to TD with a 2-man unit keeping 2 sets of 10' samples & capturing 1' drill time.

Land (obligations and deadlines)

Version/Geologist

v1 Cody Bacon

DATE: 6/7/2018

SAVED TO: EWP