Form 3160-5 (June 2019)

UNITED STATES DEPARTMENT OF THE INTERIOR

FORM APPROVED
OMB No. 1004-0137
Expires: October 31, 2021

BUREAU OF LAND MANAGEMENT	,	5. Lease Serial No.	NIM 00000 40	
SUNDRY NOTICES AND REPORTS ON V			NMLC0068848	
Do not use this form for proposals to drill or t abandoned well. Use Form 3160-3 (APD) for su	o re-enter an	6. If Indian, Allottee	of Thoe Name	
SUBMIT IN TRIPLICATE - Other instructions on page	ge 2	7. If Unit of CA/Agreement, Name and/or No.		
1. Type of Well Oil Well Gas Well Other		8. Well Name and No	O. MEAT LOVER FEDERAL COM/607	
2. Name of Operator COG OPERATING LLC	9. API Well No.	WEAT EOVERT EDERAL GOW/007		
	. (include area code)	10. Field and Pool or	Exploratory Area	
(432) 683-74			243310P; Upper Wolfcamp	
4. Location of Well (Footage, Sec., T.,R.,M., or Survey Description) SEC 18/T23S/R33E/NMP		11. Country or Parish LEA/NM	n, State	
12. CHECK THE APPROPRIATE BOX(ES) TO IN	DICATE NATURE OF NOT	ICE, REPORT OR OT	HER DATA	
TYPE OF SUBMISSION	TYPE OF AC	TION		
Notice of Intent Acidize Dee Alter Casing Hyd		luction (Start/Resume) amation	Water Shut-Off Well Integrity	
Subsequent Report ====================================		omplete porarily Abandon	✓ Other	
Final Abandonment Notice Convert to Injection Plug	g Back Wate	er Disposal		
COG Operating requests a revision to our approved APD for this well	to reflect a change in casir	ng design as attache	d.	
14. I hereby certify that the foregoing is true and correct. Name (<i>Printed/Typed</i>) STAN WAGNER / Ph: (432) 253-9685	Regulatory Advisor			
Signature	06/02/2	2022		
THE SPACE FOR FED	ERAL OR STATE OF	ICE USE		
Approved by				
CHRISTOPHER WALLS / Ph: (575) 234-2234 / Approved	Petroleum Eng Title	gineer	08/08/2022 Date	
Conditions of approval, if any, are attached. Approval of this notice does not warrancertify that the applicant holds legal or equitable title to those rights in the subject I which would entitle the applicant to conduct operations thereon.				
Title 18 U.S.C Section 1001 and Title 43 U.S.C Section 1212, make it a crime for a any false, fictitious or fraudulent statements or representations as to any matter with		Ifully to make to any c	lepartment or agency of the United States	

(Instructions on page 2)

Additional Information

Location of Well

0. SHL: LOT 1 / 270 FNL / 1310 FWL / TWSP: 23S / RANGE: 33E / SECTION: 18 / LAT: 32.311296 / LONG: -103.61553 (TVD: 0 feet, MD: 0 feet)

PPP: LOT 1 / 1 FNL / 1000 FWL / TWSP: 23S / RANGE: 33E / SECTION: 19 / LAT: 32.297524 / LONG: -103.616527 (TVD: 12480 feet, MD: 17600 feet)

PPP: LOT 1 / 100 FNL / 1000 FWL / TWSP: 23S / RANGE: 33E / SECTION: 18 / LAT: 32.311764 / LONG: -103.616533 (TVD: 12296 feet, MD: 12361 feet)

BHL: LOT 4 / 50 FSL / 1000 FWL / TWSP: 23S / RANGE: 33E / SECTION: 30 / LAT: 32.268628 / LONG: -103.616514 (TVD: 12535 feet, MD: 27937 feet)



1. Geologic Formations

TVD of target	12,455' EOL	Pilot hole depth	NA
MD at TD:	27,937'	Deepest expected fresh water:	345'

Formation	Depth (TVD) from KB	Water/Mineral Bearing/ Target Zone?	Hazards*
Quaternary Fill	Surface	Water	
Rustler	1283	Water	
Top of Salt	1770	Salt	
Base of Salt	4759	Salt	
Lamar	5048	Salt Water	
Bell Canyon	5113	Salt Water	
Cherry Canyon	5917	Oil/Gas	
Brushy Canyon	7323	Oil/Gas	
Bone Spring Lime	8874	Oil/Gas	
1st Bone Spring Sand	10123	Oil/Gas	
2nd Bone Spring Sand	10766	Oil/Gas	
3rd Bone Spring Sand	11990	Oil/Gas	
Wolfcamp A	12535	Target	
Wolfcamp B	0	Not Penetrated	
Wolfcamp D	0	Not Penetrated	

2. Casing Program

Hole Size	Casing	ınterval	Csg. Size	Weight	Grade	Conn.	SF	SF Burst	SF	SF
Tiole Size	From	То	Cag. Cize	(lbs)	Orace	COIIII.	Collapse	or Burst	Body	Joint
14.75"	0	1350	10.75"	45.5	J55	BTC	3.38	1.14	11.64	12.96
9.875"	0	8500	7.625"	29.7	HCL80	BTC	1.56	1.07	2.88	2.90
8.750"	8500	11800	7.625"	29.7	P110 RY	W 513	1.33	1.42	2.68	1.61
6.75"	0	11300	5.5"	23	P110	BTC	1.98	2.34	2.80	2.79
6.75"	11300	27,937	5.5"	23	P110	W441	1.80	2.12	2.54	2.31
				BLM Minimum Safety Factor			1.125	1	1.6 Dry 1.8 Wet	1.6 Dry 1.8 Wet

Intermediate casing will be kept at least 1/3 full while running casing.to mitigate collapse. Surface burst based on 0.7 frac gradient at the shoe with Gas Gradient 0.1 psi/ft to surface and All casing strings will be tested in accordance with Onshore Oil and Gas Order #2 III.B.1.h

The 5 1/2" W441 casing will be run back at least 200' into the intermediate casing to ensure the coupling OD clearance is greater than .422" for the cement bond tie in.

	Y or N
Is casing new? If used, attach certification as required in Onshore Order #1	Υ
Does casing meet API specifications? If no, attach casing specification sheet.	Υ
Is premium or uncommon casing planned? If yes attach casing specification sheet.	Υ
Does the above casing design meet or exceed BLM's minimum standards? If not provide justification (loading assumptions, casing design criteria).	Υ
Will the intermediate pipe be kept at a minimum 1/3 fluid filled to avoid approaching the collapse pressure rating of the casing?	Υ
Is well located within Capitan Reef?	N
If yes, does production casing cement tie back a minimum of 50' above the Reef?	
Is well within the designated 4 string boundary?	
Is well located in SOPA but not in R-111-P?	N
If yes, are the first 2 strings cemented to surface and 3 rd string cement tied back	
500' into previous casing?	
Is well located in R-111-P and SOPA?	N
If yes, are the first three strings cemented to surface?	
Is 2 nd string set 100' to 600' below the base of salt?	
Is well located in high Cave/Karst?	N
If yes, are there two strings cemented to surface?	
(For 2 string wells) If yes, is there a contingency casing if lost circulation occurs?	
Is well located in critical Cave/Karst?	N
If yes, are there three strings cemented to surface?	

3. Cementing Program

Casing	# Sks	Wt. lb/ gal	Yld ft3/	H₂0 gal/sk	500# Comp. Strength (hours)	Slurry Description
Surf.	644	13.5	1.75	9	12	Lead: Class C + 4% Gel + 1% CaCl2
Suii.	250	14.8	1.34	6.34	8	Tail: Class C + 2% CaCl2
Inter.	840	10.3	3.3	22	24	Halliburton tunded light
Stage 1	250	14.8	1.35	6.6	8	Tail: Class H
Prod	524	12.7	2	10.7	72	Lead: 50:50:10 H Blend
FIUU	1569	14.4	1.24	5.7	19	Tail: 50:50:2 Class H Blend

If losses are encountered in the intermediate section a DV/ECP tool will be run ~50' above the Lamar Lime top, cement will be adjusted accordingly if this contingency is necessary.

Volumes Subject to Observed Hole Conditions and/or Fluid Caliper Results Lab reports with the 500 psi compressive strength time for the cement will be onsite for review.

Casing String	TOC	% Excess		
Surface	0'	50%		
1 st Intermediate	0'	50%		
Production	11,300'	35% OH in Lateral (KOP to EOL)		

4. Pressure Control Equipment

A variance is requested for the use of a diverter on the surface casing. See attached for schematic.

BOP installed and tested before drilling which hole?	Size?	Min. Required WP	Ту	pe	x	Tested to:
			Ann	ular	Х	2500psi
			Blind Ram		Х	
9-7/8"	13-5/8"	5M	Pipe	Ram	Х	5000psi
			Double	e Ram	Х	5000psi
			Other*			
			5M Ar	nnular	Х	5000psi
			Blind	Ram	Х	
6-3/4"	13-5/8"	10M	Pipe	Ram	Х	10000psi
			Double	e Ram	Х	Toooopsi
			Other*			

BOP/BOPE will be tested by an independent service company to 250 psi low and the high pressure indicated above per Onshore Order 2 requirements. The System may be upgraded to a higher pressure but still tested to the working pressure listed in the table above. If the system is upgraded all the components installed will be functional and tested.

Pipe rams will be operationally checked each 24 hour period. Blind rams will be operationally checked on each trip out of the hole. These checks will be noted on the daily tour sheets. Other accessories to the BOP equipment will include a Kelly cock and floor safety valve (inside BOP) and choke lines and choke manifold. See attached schematics.

	Formation integrity test will be performed per Onshore Order #2.					
Y	On Exploratory wells or on that portion of any well approved for a 5M BOPE system or greater, a pressure integrity test of each casing shoe shall be performed. Will be tested in accordance with Onshore Oil and Gas Order #2 III.B.1.i.					
Y	A variance is requested for the use of a flexible choke line from the BOP to Choke Manifold. See attached for specs and hydrostatic test chart.					
	N Are anchors required by manufacturer?					
Υ	A multibowl wellhead is being used. The BOP will be tested per Onshore Order #2 after installation on the surface casing which will cover testing requirements for a maximum of 30 days. If any seal subject to test pressure is broken the system must be tested.					

5. Mud Program

Depth		Type	Weight	Viscosity	Water Loss
From	То	Туре	(ppg)	Viscosity	Water Loss
0	Surf. Shoe	FW Gel	8.6 - 8.8	28-34	N/C
Surf csg	7-5/8" Int shoe	Brine Diesel Emulsion	8.4 - 9	28-34	N/C
7-5/8" Int shoe	Lateral TD	OBM	9.6 - 12.5	35-45	<20

Sufficient mud materials to maintain mud properties and meet minimum lost circulation and weight increase requirements will be kept on location at all times.

What will be used to monitor the loss or gain of fluid?	PVT/Pason/Visual Monitoring
What will be used to morntor the loss of gain of hala:	i v i/i ason/ visaai Worldoning

6. Logging and Testing Procedures

Logging, Coring and Testing.	
Y	Will run GR/CNL from TD to surface (horizontal well – vertical portion of hole). Stated logs run will be in the Completion Report and submitted to the BLM.
Υ	No Logs are planned based on well control or offset log information.
N	Drill stem test? If yes, explain.
N	Coring? If yes, explain.

Add	litional logs planned	Interval
N	Resistivity	Pilot Hole TD to ICP
N	Density	Pilot Hole TD to ICP
Y	CBL	Production casing (If cement not circulated to surface)
Υ	Mud log	Intermediate shoe to TD
N	PEX	

7. Drilling Conditions

Condition	Specify what type and where?	
BH Pressure at deepest TVD	8100 psi at 12455' TVD	
Abnormal Temperature	NO 180 Deg. F.	

No abnormal pressure or temperature conditions are anticipated. Sufficient mud materials to maintain mud properties and weight increase requirements will be kept on location at all times.

Sufficient supplies of Paper/LCM for periodic sweeps to control seepage and losses will be maintained on location.

Hydrogen Sulfide (H2S) monitors will be installed prior to drilling out the surface shoe. If H2S is detected in concentrations greater than 100 ppm, the operator will comply with the provisions of Onshore Oil and Gas Order #6. If Hydrogen Sulfide is encountered, measured values and formations will be provided to the BLM.

N	H2S is present
Y	H2S Plan attached

8. Other Facets of Operation

Y	Is it a walking operation?
Y	Is casing pre-set?

х	H2S Plan.
х	BOP & Choke Schematics.
х	Directional Plan

District I
1625 N. French Dr., Hobbs, NM 88240
Phone: (575) 393-6161 Fax: (575) 393-0720

District II 811 S. First St., Artesia, NM 88210 Phone:(575) 748-1283 Fax:(575) 748-9720 District III

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1220 S. St Francis Dr., Santa Fe, NM 87505 Phone:(505) 476-3470 Fax:(505) 476-3462

State of New Mexico Energy, Minerals and Natural Resources Oil Conservation Division 1220 S. St Francis Dr. **Santa Fe, NM 87505**

CONDITIONS

Action 138896

CONDITIONS

Operator:	OGRID:
COG OPERATING LLC	229137
600 W Illinois Ave	Action Number:
Midland, TX 79701	138896
	Action Type:
	[C-103] NOI Change of Plans (C-103A)

CONDITIONS

Created By	Condition	Condition Date
pkaut	previous COA's apply	8/30/2022