

FORM  
2  
Rev  
12/20

# State of Colorado Oil and Gas Conservation Commission

1120 Lincoln Street, Suite 801, Denver, Colorado 80203  
Phone: (303) 894-2100 Fax: (303) 894-2109



Document Number:

402976196

**(SUBMITTED)**

Date Received:

04/25/2022

## APPLICATION FOR PERMIT TO:

Drill       Deepen       Re-enter       Recomplete and Operate

Amend

TYPE OF WELL OIL  GAS  COALBED  OTHER: \_\_\_\_\_

Refile

ZONE TYPE SINGLE ZONE  MULTIPLE ZONES  COMMINGLE ZONES

Sidetrack

Well Name: Mutual 0780 Well Number: 6-8H

Name of Operator: D90 ENERGY LLC COGCC Operator Number: 10706

Address: 952 ECHO LANE SUITE 480

City: HOUSTON State: TX Zip: 77024

Contact Name: Doug Sandridge Phone: (713)227 0391 Fax: ( )

Email: doug@fulcrumef.com

## RECLAMATION FINANCIAL ASSURANCE

Plugging and Abandonment Bond Surety ID: 20180090

## WELL LOCATION INFORMATION

### Surface Location

QtrQtr: SWSW Sec: 9 Twp: 7N Rng: 80W Meridian: 6

Footage at Surface: 489 Feet FSL 194 Feet FWL

Latitude: 40.586054 Longitude: -106.387311

GPS Data: GPS Quality Value: 1.3 Type of GPS Quality Value: PDOP Date of Measurement: 02/19/2016

Ground Elevation: 8118

Field Name: WILDCAT Field Number: 99999

Well Plan: is  Directional  Horizontal (highly deviated)  Vertical

If Well plan is Directional or Horizontal attach Deviated Drilling Plan and Directional Data.

### Subsurface Locations

Top of Productive Zone (TPZ)

Sec: 8 Twp: 7N Rng: 80W Footage at TPZ: 1189 FSL 1650 FEL

Measured Depth of TPZ: 8805 True Vertical Depth of TPZ: 7973 FNL/FSL FEL/FWL

Base of Productive Zone (BPZ)

Sec: 8 Twp: 7N Rng: 80W Footage at BPZ: 300 FNL 1650 FEL

Measured Depth of BPZ: 13159 True Vertical Depth of BPZ: 7973 FNL/FSL FEL/FWL

Bottom Hole Location (BHL)

Sec: 8 Twp: 7N Rng: 80W Footage at BHL: 300 FNL 1650 FEL

FNL/FSL FEL/FWL

## LOCAL GOVERNMENT PERMITTING INFORMATION

County: JACKSON

Municipality: N/A

Is the Surface Location of this Well in an area designated as one of State interest and subject to the requirements of § 24-65.1-108 C.R.S.? No

Per § 34-60-106(1)(f)(I)(A) C.R.S., the following questions pertain to the Relevant Local Government approval of the siting of the proposed Oil and Gas Location.

SB 19-181 provides that when "applying for a permit to drill," operators must include proof that they sought a local government siting permit and the disposition of that permit application, or that the local government does not have siting regulations. § 34-60-106(1)(f)(I)(A) C.R.S.

Does the Relevant Local Government regulate the siting of Oil and Gas Locations, with respect to this Location?  Yes  No

If yes, in checking this box, I hereby certify that an application has been filed with the local government with jurisdiction to approve the siting of the proposed oil and gas location.

The disposition of the application filed with the Relevant Local Government is: Waived Date of Final Disposition: \_\_\_\_\_

Comments: Jackson County does not regulate oil & gas

## SURFACE AND MINERAL OWNERSHIP AT WELL'S OIL & GAS LOCATION

Surface Owner of the land at this Well's Oil and Gas Location:  Fee  State  Federal  Indian

Mineral Owner beneath this Well's Oil and Gas Location:  Fee  State  Federal  Indian

Surface Owner Protection Financial Assurance (if applicable): \_\_\_\_\_ Surety ID Number (if applicable): \_\_\_\_\_

### MINERALS DEVELOPED BY WELL

The ownership of all the minerals that will be developed by this Well is (check all that apply):

- Fee  
 State  
 Federal  
 Indian  
 N/A

### LEASE INFORMATION

Using standard QtrQtr, Section, Township, Range format describe one entire mineral lease as follows:

\* If this Well is within a unit, describe a lease that will be developed by the Well.

\* If this Well is not subject to a unit, describe the lease that will be produced by the Well.

(Attach a Lease Map or Lease Description or Lease if necessary.)

Township 7 North, Range 80 West of the 6th PM:  
Section 4: Lot 2(41.06), Lot 3(40.80), Lot 4(40.53), SWNE, W/2SE, SESE, SW/4, S/2NW Section 5: Lot 1(40.38), Lot 2(40.35), Lot 3(40.32), S/2NE, SE/4, E/2SW, SENW Section 8: E/2, SW/4, E/2NW, SWNW  
Section 9: All  
Section 16: All  
Section 17: N/2  
Township 8 North, Range 80 West of the 6th PM:  
Section 32: E/2SE, SWSE, SESW  
Section 33: S/2 less ROW

Total Acres in Described Lease: 3664 Described Mineral Lease is:  Fee  State  Federal  Indian

Federal or State Lease # \_\_\_\_\_

### SAFETY SETBACK INFORMATION

INSTRUCTIONS:

Distance from Well to nearest:

Building: 735 Feet  
 Building Unit: 3766 Feet  
 Public Road: 5280 Feet  
 Above Ground Utility: 482 Feet  
 Railroad: 5280 Feet  
 Property Line: 3130 Feet

- Specify all distances per Rule 308.b.(1).  
 - Enter 5280 for distance greater than 1 mile.  
 - Building - nearest building of any type. If nearest Building is a Building Unit, enter same distance for both.  
 - Building Unit – as defined in 100 Series Rules.

### OBJECTIVE FORMATIONS

Objective Formation(s)	Formation Code	Spacing Order Number(s)	Unit Acreage Assigned to Well	Unit Configuration (N/2, SE/4, etc.)
NIOBRARA	NBRR	531-36	640	Sec. 8: All

Federal or State Unit Name (if appl): \_\_\_\_\_ Unit Number: \_\_\_\_\_

### SUBSURFACE MINERAL SETBACKS

Enter 5280 for distance greater than 1 mile.

Is this Well within a unit? Yes

If YES:

Enter the minimum distance from the Completed Zone of this Well to the Unit Boundary: 300 Feet

Enter the minimum distance from the Completed Zone of this Well to the Completed Zone of an offset Well within the same unit permitted or completed in the same formation: 660 Feet

If NO:

Enter the minimum distance from the Completed Zone of this Well to the Lease Line of the described lease: \_\_\_\_\_ Feet

Enter the minimum distance from the Completed Zone of this Well to the Completed Zone of an offset Well producing from the same lease and permitted or completed in the same formation: \_\_\_\_\_ Feet

### Exception Location

If this Well requires the approval of a Rule 401.c Exception Location, enter the Rule or spacing order number and attach the Exception Location Request and Waivers. \_\_\_\_\_

### SPACING & FORMATIONS COMMENTS

**DRILLING PROGRAM**Proposed Total Measured Depth: 13159 Feet TVD at Proposed Total Measured Depth 7973 Feet

Distance from the proposed wellbore to nearest existing or proposed wellbore belonging to another operator, including plugged wells:

Enter distance if less than or equal to 1,500 feet: \_\_\_\_\_ Feet  No well belonging to another operator within 1,500 feetWill a closed-loop drilling system be used? YesIs H<sub>2</sub>S gas reasonably expected to be encountered during drilling operations at concentrations greater than or equal to 100 ppm? No If yes, attach an H<sub>2</sub>S Drilling Plan unless a plan was already submitted with the Form 2A per Rule 304.c.(10).Will there be hydraulic fracture treatment at a depth less than 2,000 feet in this well? NoWill salt sections be encountered during drilling? NoWill salt based (>15,000 ppm Cl) drilling fluids be used? NoWill oil based drilling fluids be used? YesBOP Equipment Type:  Annular Preventor  Double Ram  Rotating Head  NoneBeneficial reuse or land application plan submitted? YesReuse Facility ID: \_\_\_\_\_ or Document Number: 401062567**CASING PROGRAM**

Casing Type	Size of Hole	Size of Casing	Grade	Wt/Ft	Csg/Liner Top	Setting Depth	Sacks Cmt	Cmt Btm	Cmt Top
CONDUCTOR	24	16	J55	65	0	90	8	90	0
SURF	12+1/4	9+5/8	J55	36	0	2400	605	2400	0
1ST	8+3/4	5+1/2	P110HC	20	0	13159	2118	13159	

 Conductor Casing is NOT planned**POTENTIAL FLOW AND CONFINING FORMATIONS**

Zone Type	Formation /Hazard	Top M.D.	Top T.V.D.	Bottom M.D.	Bottom T.V.D.	TDS (mg/L)	Data Source	Comment
Groundwater	North Park FM	0	0	500	500	1001-10000	USGS	Site Name: SB00708019BCD1 TD@500' TDS@1240 30' Water Depth
Confining Layer	Coalmont FM	500	500	3178	3172			
Confining Layer	Upper Pierre	3178	3172	5000	4945			
Hydrocarbon	Sussex	5000	4945	5450	5383			
Confining Layer	Pierre Lower (Shale)	5450	5383	5500	5430			
Hydrocarbon	Shannon	5500	5430	5550	5479			
Confining Layer	Pierre Lower (Shale)	5550	5479	6992	6879			
Hydrocarbon	Niobrara	6992	6879	13159	7973			Bottom TVD is bottom of the well and not bottom of the formation; The formation was not exited.

**OPERATOR COMMENTS AND SUBMITTAL**

Comments

This Form 2 is being submitted as a refile of API # 05-057-06570.

There have been no new buildings constructed and no changes to the surrounding land use, Surface & Minerals, Formations, or mineral lease description. The well site has been constructed. SHL/TPZ/BPZ/BHL are being restored to the previously approved laterals across section 8 per directional plan Doc #401056274 and plat Doc # 401056278 within COGCC Scout Card. All previously submitted notices, Surface Use Agreements, and letters are also still valid.

The nearest well in unit per 2-D calculation is updated to the Mutual 0780 7-8H @ 660'.  
No well belonging to another operator within 1,500 feet.

PFZ Comment: The upper shallow section of the North Park is not well defined. We used the depth and lithology components to define two separate sections; one being sand (as North Park FM) which is most likely a possible source of groundwater and the second being a shale (as Coalmont FM) which should not be a source of groundwater. The shale should not be a source of groundwater and has not been found to be a source of groundwater in the USGS dataset.

This application is in a Comprehensive Area Plan       No       CAP #: \_\_\_\_\_  
Oil and Gas Development Plan Name \_\_\_\_\_ OGDID #: \_\_\_\_\_  
Location ID:       439603      

I hereby certify all statements made in this form are, to the best of my knowledge, true, correct, and complete.

Signed: \_\_\_\_\_ Print Name:       Justin Garrett      

Title:       Sr. Regulatory Analyst       Date:       4/25/2022       Email:       regulatory@ascentgeomatics.c      

Based on the information provided herein, this Application for Permit-to-Drill complies with COGCC Rules, applicable orders, and SB 19-181 and is hereby approved.

COGCC Approved: \_\_\_\_\_ Director of COGCC \_\_\_\_\_ Date: \_\_\_\_\_  
Expiration Date: \_\_\_\_\_

<b>API NUMBER</b>
05 057 06570 00

### Conditions Of Approval

**All representations, stipulations and conditions of approval stated in the Form 2A for this location shall constitute representations, stipulations and conditions of approval for this Form 2 Permit-to-Drill and are enforceable to the same extent as all other representations, stipulations and conditions of approval stated in this Permit-to-Drill.**

<u>COA Type</u>	<u>Description</u>
	Return to draft. Update PFZ table with Coalmont groundwater details. Submit OWE with all wells within 1500'.

## Best Management Practices

<b>No</b>	<b>BMP/COA Type</b>	<b>Description</b>
1	Drilling/Completion Operations	Multi Well Open-Hole Logging - Rule 317.p: Alternative Logging Program: One of the first wells drilled on the pad – Gregory 0780 1-9H (API 05-057-06539) the first well drilled on this pad has been logged with open-hole Resistivity Log and Gamma Ray Log from the kick-off point into the surface casing. That info is attached to form 5 Doc# 401009756. All proposed wells related to this permit will have a cement bond log with gamma-ray run on production casing (or on intermediate casing if production liner is run) into the surface casing. The horizontal portion of every well will be logged with a measured while-drilling gamma-ray log. The Form 5, Completion Report, for each well on the pad will list all logs run and have those logs attached. The Form 5 for a well without open hole logs shall clearly state “No open-hole logs were run” and shall clearly identify (Gregory 0780 1-9H – API #05-057-06539) the well in which open-hole logs were run.
2	Drilling/Completion Operations	Blowout Prevention Equipment ("BOPE"): A double ram annular preventer will be used during drilling.

Total: 2 comment(s)

### Attachment List

<b>Att Doc Num</b>	<b>Name</b>
403024229	OffsetWellEvaluations Data
403026182	DIRECTIONAL DATA

Total Attach: 2 Files

### General Comments

<b>User Group</b>	<b>Comment</b>	<b>Comment Date</b>
		Stamp Upon Approval

Total: 0 comment(s)

**Public Comments**

No public comments were received on this application during the comment period.

