

**APPLICATION FOR PERMIT TO:**

**Drill**       Deepen       Re-enter       Recomplete and Operate

Date Received:  
01/21/2015

TYPE OF WELL    OIL     GAS     COALBED     OTHER UNPLANNED      Refilling

ZONE TYPE      SINGLE ZONE     MULTIPLE ZONES     COMMINGLE ZONES       Sidetrack

Well Name: Thornton      Well Number: 9

Name of Operator: EXTRACTION OIL & GAS LLC      COGCC Operator Number: 10459

Address: 1888 SHERMAN ST #200

City: DENVER      State: CO      Zip: 80203

Contact Name: Kaleb Roush      Phone: (720)557-8322      Fax: ( )

Email: kroush@extractionog.com

**RECLAMATION FINANCIAL ASSURANCE**

Plugging and Abandonment Bond Surety ID: 20130028

**WELL LOCATION INFORMATION**

QtrQtr: SWSW    Sec: 8    Twp: 7N    Rng: 66W    Meridian: 6

Latitude: 40.585564      Longitude: -104.810371

Footage at Surface: 1241 feet    FNL/FSL    FSL    331 feet    FEL/FWL    FWL

Field Name: WATTENBERG      Field Number: 90750

Ground Elevation: 5036      County: WELD

GPS Data:  
Date of Measurement: 05/02/2014    PDOP Reading: 1.8    Instrument Operator's Name: Alan Hnizdo

If well is  Directional     Horizontal (highly deviated)    **submit deviated drilling plan.**

Footage at Top of Prod Zone:    FNL/FSL    FEL/FWL    Bottom Hole:    FNL/FSL    FEL/FWL

850    FSL    460    FWL    660    FSL    460    FEL

Sec: 8    Twp: 7N    Rng: 66W    Sec: 9    Twp: 7N    Rng: 66W

**LOCATION SURFACE & MINERALS & RIGHT TO CONSTRUCT**

Surface Ownership:  Fee     State     Federal     Indian

The Surface Owner is:     is the mineral owner beneath the location.  
(check all that apply)     is committed to an Oil and Gas Lease.  
    has signed the Oil and Gas Lease.  
    is the applicant.

The Mineral Owner beneath this Oil and Gas Location is:  Fee     State     Federal     Indian

The Minerals beneath this Oil and Gas Location will be developed by this Well: No

The right to construct the Oil and Gas Location is granted by: oil and gas lease

Surface damage assurance if no agreement is in place: \_\_\_\_\_ Surface Surety ID: \_\_\_\_\_

## LEASE INFORMATION

Using standard QtrQtr, Sec, Twp, Rng format, describe one entire mineral lease that will be produced by this well (Describe lease beneath surface location if produced. Attach separate description page or map if necessary.)

T7N. R66W SEction 8: Part of the SW and W2SE, more particularly described in the lease map attached to the original APD (document number 400639416).

Total Acres in Described Lease: 163 Described Mineral Lease is:  Fee  State  Federal  Indian

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

Distance from Completed Portion of Wellbore to Nearest Lease Line of described lease: 0 Feet

## CULTURAL DISTANCE INFORMATION

Distance to nearest:

Building: 992 Feet  
Building Unit: 992 Feet  
High Occupancy Building Unit: 5280 Feet  
Designated Outside Activity Area: 5280 Feet  
Public Road: 325 Feet  
Above Ground Utility: 225 Feet  
Railroad: 5280 Feet  
Property Line: 214 Feet

### INSTRUCTIONS:

- All measurements shall be provided from center of the Proposed Well to nearest of each cultural feature as described in Rule 303.a.(5).  
- 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, High Occupancy Building Unit, and Designated Outside Activity Area - as defined in 100-Series Rules.

## DESIGNATED SETBACK LOCATION INFORMATION

Check all that apply. This location is within a:  Buffer Zone  
 Exception Zone  
 Urban Mitigation Area

- Buffer Zone – as described in Rule 604.a.(2), within 1,000' of a Building Unit  
- Exception Zone - as described in Rule 604.a.(1), within 500' of a Building Unit.  
- Urban Mitigation Area - as defined in 100-Series Rules.

Pre-application Notifications (required if location is within 1,000 feet of a building unit):

Date of Rule 305.a.(1) Urban Mitigation Area Notification to Local Government: \_\_\_\_\_

Date of Rule 305.a.(2) Buffer Zone Notification to Building Unit Owners: 06/04/2014

## SPACING and UNIT INFORMATION

Distance from Completed Portion of Wellbore to Nearest Wellbore Permitted or Completed in the same formation: 660 Feet

Distance from Completed Portion of Wellbore to Nearest Unit Boundary 460 Feet (Enter 5280 for distance greater than 1 mile.)

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

## SPACING & FORMATIONS COMMENTS

Distance from completion portion of wellbore to nearest wellbore permitted or completed in the same formation is Thornton 12.

Codell: Proposed Spacing Unit is described as the S2 of Sections 8 and 9.

## OBJECTIVE FORMATIONS

Objective Formation(s)	Formation Code	Spacing Order Number(s)	Unit Acreage Assigned to Well	Unit Configuration (N/2, SE/4, etc.)
CODELL	CODL		640	GWA

## DRILLING PROGRAM

Proposed Total Measured Depth: 17568 Feet

Distance to nearest permitted or existing wellbore penetrating objective formation: 660 Feet (Including plugged wells)

Will a closed-loop drilling system be used? Yes

Is 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 Operations Plan)

Will salt sections be encountered during drilling? No

Will salt based (>15,000 ppm Cl) drilling fluids be used? No

Will oil based drilling fluids be used? No

BOP Equipment Type:  Annular Preventor  Double Ram  Rotating Head  None

## GROUNDWATER BASELINE SAMPLING AND MONITORING AND WATER WELL SAMPLING

Water well sampling required per Rule 318A

## DRILLING WASTE MANAGEMENT PROGRAM

Drilling Fluids Disposal: OFFSITE Drilling Fluids Disposal Methods: Commercial Disposal

Cuttings Disposal: OFFSITE Cuttings Disposal Method: Other

Other Disposal Description:

Cuttings will be disposed of by land spreading.

Beneficial reuse or land application plan submitted? No

Reuse Facility ID: \_\_\_\_\_ or Document Number: \_\_\_\_\_

## CASING PROGRAM

Casing Type	Size of Hole	Size of Casing	Wt/Ft	Csg/Liner Top	Setting Depth	Sacks Cmt	Cmt Btm	Cmt Top
CONDUCTOR	26	16+1/4	42	0	80	100	80	0
SURF	13+1/2	9+5/8	36	0	819	350	819	0
1ST	8+3/4	7+0/0	26	0	8000	925	8000	0
1ST LINER	6+1/8	4+1/2	13.5	7900	17568			

Conductor Casing is NOT planned

## DESIGNATED SETBACK LOCATION EXCEPTIONS

Check all that apply:

- Rule 604.a.(1)A. Exception Zone (within 500' of Building Unit)
- Rule 604.b.(1)A. Exception Location (existing or approved Oil & Gas Location now within a Designated Setback as a result of Rule 604.a.)
- Rule 604.b.(1)B. Exception Location (existing or approved Oil & Gas Location is within a Designated Setback due to Building Unit construction after Location approval)
- Rule 604.b.(2) Exception Location (SUA or site-specific development plan executed on or before August 1, 2013)
- Rule 604.b.(3) Exception Location (Building Units constructed after August 1, 2013 within setback per an SUA or site-specific development plan)

## GREATER WATTENBERG AREA LOCATION EXCEPTIONS

Check all that apply:

- Rule 318A.a. Exception Location (GWA Windows).
- Rule 318A.c. Exception Location (GWA Twinning).

## RULE 502.b VARIANCE REQUEST

Rule 502.b. Variance Request from COGCC Rule or Spacing Order Number \_\_\_\_\_

## OTHER LOCATION EXCEPTIONS

Check all that apply:

- Rule 318.c. Exception Location from Rule or Spacing Order Number \_\_\_\_\_
- Rule 603.a.(2) Exception Location (Property Line Setback).

ALL exceptions and variances require attached Request Letter(s). Refer to applicable rule for additional required attachments (e.g. waivers, certifications, SUAs).

## OPERATOR COMMENTS AND SUBMITTAL

Comments

The Operator proposes to drill a well in Section 8, Township 7 North, Range 66 West, in Weld County, Colorado, as follows:

SHL: 1241' FSL 331' FWL - falls outside a legal GWA Drilling Window  
Top of Production: 850' FSL 460' FWL  
BHL: 660' FSL 460' FWL

Operator intends to drill the well to the Niobrara formation at 17,568' MD and 7,520' TVD.

Please see the original APD (document number 400639416) for other attached documents and letters to the Director of the COGCC regarding Rule 318A.m, 318A.a, and 318A.e.

This Form 2 is being submitted because an unplanned sidetrack is required. NOTE: the BHL location will remain the same so a revised Well Location Plat and revised Deviated Drilling Plan are NOT required according to the State Wide UNPLANNED Sidetrack Approval Reporting document published 11-6-2013.

Explanation of need to sidetrack:

"We are having an issue on the Thornton 9 (API# - 05-123-40271-00). We are having issues getting build rates, pulled out of the hole 2 different times and put more aggressive motors in the hole until the point of no return. Finally we are needing 44 degrees per 100' to land on target. This bit is basically in the production zone but we are at 45 degrees. This was due to a combination of a localized fault that upshifted 60' and our motor yields being poor.

Total MD drilled to: 7710'  
Surface casing - 9 5/8" 36# set at 819'.  
No fish in hole  
The plan is to pump two 400' plugs (182 sacks each) with Halliburton Cement-17.5#  
Proposed sidetrack point - 6900'  
Objective formation of sidetrack/curve: Codell (same as original APD)  
Proposed BHL: 660 FSL 460 FEL Sec 9, T7N, R66W (Same as original APD)."

We received verbal and email approval from Diana Burn to plug back and sidetrack the well on 1/20/2015.

This application is in a Comprehensive Drilling Plan \_\_\_\_\_ CDP #: \_\_\_\_\_

Location ID: \_\_\_\_\_

Is this application being submitted with an Oil and Gas Location Assessment application? \_\_\_\_\_ No \_\_\_\_\_

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

Signed: \_\_\_\_\_ Print Name: Kaleb Roush \_\_\_\_\_

Title: Drilling Technician Date: 1/21/2015 Email: kroush@extractionog.com

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

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

Expiration Date: \_\_\_\_\_

API NUMBER

05 123 40271 01

### 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.

### Best Management Practices

**No BMP/COA Type**

**Description**

No BMP/COA Type	Description

### Attachment Check List

**Att Doc Num**

**Name**

400776358	FORM 2 SUBMITTED
400776418	CORRESPONDENCE
400776817	WELLBORE DIAGRAM

Total Attach: 3 Files

### General Comments

**User Group**

**Comment**

**Comment Date**

User Group	Comment	Comment Date

Total: 0 comment(s)