

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.)

S2/SW in Sect. 3; SE/NE, SE/SW, NE/SE in Sect.6; Lots 1-3 and 5-7 in Sect. 6; NE/NE in Sect. 8; NE/NE, W2, SE in Sect. 9 ; N2/NW, NW/SW, S2/SW in Sect. 10; T8S R98W

Total Acres in Described Lease: 1198 Described Mineral Lease is: Fee State Federal Indian

Federal or State Lease # COC01733A

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

CULTURAL DISTANCE INFORMATION

Distance to nearest:

Building: 2455 Feet
 Building Unit: 5280 Feet
 High Occupancy Building Unit: 5280 Feet
 Designated Outside Activity Area: 5280 Feet
 Public Road: 369 Feet
 Above Ground Utility: 400 Feet
 Railroad: 5280 Feet
 Property Line: 1740 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: _____

SPACING and UNIT INFORMATION

Distance from Completed Portion of Wellbore to Nearest Wellbore Permitted or Completed in the same formation: 1360 Feet

Distance from Completed Portion of Wellbore to Nearest Unit Boundary 660 Feet (Enter 5280 for distance greater than 1 mile.)

Federal or State Unit Name (if appl): Homer Deep Unit Unit Number: COC72921X

SPACING & FORMATIONS COMMENTS

OBJECTIVE FORMATIONS

Objective Formation(s)	Formation Code	Spacing Order Number(s)	Unit Acreage Assigned to Well	Unit Configuration (N/2, SE/4, etc.)
MANCOS	MNCS			

DRILLING PROGRAM

Proposed Total Measured Depth: 18724 Feet

Distance to nearest permitted or existing wellbore penetrating objective formation: 525 Feet (Including plugged wells)

Will a closed-loop drilling system be used? Yes

Is H₂S gas reasonably expected to be encountered during drilling operations at concentrations greater than or equal to 100 ppm? No (If Yes, attach an H₂S 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 609

DRILLING WASTE MANAGEMENT PROGRAM

Drilling Fluids Disposal: OFFSITE Drilling Fluids Disposal Methods: Commercial Disposal
 Cuttings Disposal: OFFSITE Cuttings Disposal Method: Commercial Disposal
 Other Disposal Description:

Beneficial reuse or land application plan submitted?
 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	30	20		0	120	320	120	0
SURF	14+3/4	10+3/4	40.5	0	1000	469	1000	0
1ST	9+7/8	7+5/8	29.7	0	6410	905	6410	0
2ND	6+3/4	5+1/2	17	0	6200			
TAPER	6+3/4	4+1/2	11.6	6200	18724	1503	18724	6200

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

This application is in a Comprehensive Drilling Plan _____ CDP #: _____

Location ID: 432255

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: Jessica Donahue

Title: Regulatory Technician Date: 5/15/2014 Email: Jessica.Donahue@blackhillscor

Operator must have a valid water right or permit allowing for industrial use or purchased water from a seller that has a valid water right or permit allowing for industrial use, otherwise an application for a change in type of use is required under Colorado law. Operator must also use the water in the location set forth in the water right decree or well permit, otherwise an application for a change in place of use is required under Colorado law. Section 37-92-103(5), C.R.S. (2011).

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: *Matthew Lee* Director of COGCC Date: 8/10/2014

Expiration Date: 08/09/2016

API NUMBER
05 045 22489 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>
	Open hole resistivity and gamma logs shall be run to describe the stratigraphy of the entire well bore and to adequately verify the setting depth of surface casing and aquifer coverage. On a multi-well pad, these open hole logs are only required on one of the first wells drilled on the pad and the Drilling Completion Report - Form 5 for every well on the pad shall identify which well was logged.
	OFFSET WELL MITIGATION PRESSURE MONITORING OF BLACK HILL'S WELL HOMER DEEP U 15-23 (API 077-09438) SHALL BE CONTINUOUS DURING THE PROPOSED WELL STIMULATION OPERATIONS. OPERATOR SHALL ALSO MONITOR THE HOMER DEEP U 15-23 BRADENHEAD PRESSURE DURING THE SAME MONITORING PERIOD. OPERATOR SHALL NOTIFY COGCC ENGINEERING STAFF IF ANOMALOUS PRESSURES ARE OBSERVED IN THE HOMER DEEP U 15-23 WELL DURING THE MONITORING PERIOD.
	(1) COMPLIANCE WITH THE MOST CURRENT REVISION OF THE NORTHWEST COLORADO NOTIFICATION POLICY IS REQUIRED. SEE ATTACHED NOTICE. (2) COMPLIANCE WITH THE MOST CURRENT REVISION OF THE GARFIELD COUNTY RULISON FIELD NOTICE TO OPERATORS IS REQUIRED, WITH THE FOLLOWING EXCEPTION: ALL FIELD NOTICE REQUIREMENTS SPECIFIED IN THIS NOTICE TO OPERATORS ARE SUPERSEDED BY THE REQUIREMENTS OF THE MOST CURRENT REVISION OF THE NORTHWEST COLORADO NOTIFICATION POLICY (SEE CONDITION OF APPROVAL #1). SEE ATTACHED NOTICE. (3) Provide cement coverage from the intermediate casing shoe to a minimum of 200' above Mancos Formation. Verify cement with a cement bond log.

Best Management Practices

<u>No</u>	<u>BMP/COA Type</u>	<u>Description</u>

Applicable Policies and Notices to Operators

Piceance Rulison Field - Notice to Operators.
NW Colorado Notification Policy.
Notice Concerning Operating Requirements for Wildlife Protection.

Attachment Check List

<u>Att Doc Num</u>	<u>Name</u>
400583648	FORM 2 SUBMITTED
400586009	OffsetWellEvaluations Data
400609174	DRILLING PLAN
400609179	WELL LOCATION PLAT
400609192	DEVIATED DRILLING PLAN
400609214	DIRECTIONAL DATA

Total Attach: 6 Files

General Comments

<u>User Group</u>	<u>Comment</u>	<u>Comment Date</u>
Permit	Oper. corrected cultural distances & dist. to nearest well permitted & penetrated. Oper. corrected dist. to lease. Oper. submitted wellbore integrity contact. No LGD or public comments. Final Review--passed.	7/24/2014 7:43:14 AM
LGD	pass, gdb	6/6/2014 10:28:48 AM
Engineer	<p>THE PROPOSED SURFACE CASING IS MORE THAN 50' BELOW THE DEPTH OF THE DEEPEST WATER WELL WITHIN 1-MILE OF THE SURFACE LOCATION WHEN CORRECTED FOR ELEVATION DIFFERENCES. THE DEEPEST WATER WELL WITHIN 1-MILE IS 110 FEET DEEP.</p> <p>Evaluated existing offset wells within 1,500 feet of this wellbore. Mitigation required will be to monitor pressure of Homer Deep U 15-23 well during proposed well stimulation operations.</p> <p>Emailed operator representative about pressure-monitoring Homer Deep U 15-23. Operator representative responded 8/5/2014 acknowledging that "Black Hills can monitor pressures. That's fine with us. Jessica Donahue, Regulatory Technician, Black Hills Exploration and Production"</p>	5/23/2014 11:13:45 AM
Permit	Passed completeness	5/20/2014 2:31:42 PM
Permit	Return to draft. Distance from Completed Portion of Wellbore to Nearest Lease Line of described lease is blank. Changed Water sampling rule from 318A to 609 since not in GWA.	5/20/2014 1:05:19 PM
Permit	Return to draft. 1. SHL footages do not match well plat 2. Location appears to be in HANCOCK GULCH 33545 3. Distance to nearest permitted or existing wellbore penetrating objective formation is blank 4. Water well sampling required per Rule is blank 5. Cuttings and Fluids disposal section is all blank 6. BOP type is blank 7. Deviated drilling plan has a TD of 18592 ft which conflicts with Proposed TD of 18724 ft	5/16/2014 9:22:27 AM

Total: 6 comment(s)