

FORM
2A

Rev
08/13

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:

400499470

Date Received:

10/25/2013

Oil and Gas Location Assessment

☒ New Location ☐ Refile ☐ Amend Existing Location Location#: _____

Submit signed original form. This Oil and Gas Location Assessment is to be submitted to the COGCC for approval prior to any ground disturbance activity associated with oil and gas operations. Approval of this Oil and Gas Location Assessment will allow for the construction of the below specified Location; however, it does not supersede any land use rules applied by the local land use authority. Please see the COGCC website at <http://cogcc.state.co.us/> for all accompanying information pertinent this Oil and Gas Location Assessment.

Location ID:

435806

Expiration Date:

01/09/2017

☒ This location assessment is included as part of a permit application.

CONSULTATION

- ☐ This location is included in a Comprehensive Drilling Plan. CDP # _____
- ☒ This location is in a sensitive wildlife habitat area.
- ☐ This location is in a wildlife restricted surface occupancy area.
- ☐ This location includes a Rule 306.d.(1)A.ii. variance request.

Operator

Operator Number: 10456

Name: CAERUS PICEANCE LLC

Address: 600 17TH STREET #1600N

City: DENVER State: CO Zip: 80202

Contact Information

Name: Ed Winters

Phone: (970) 285-9606

Fax: (970) 285-9619

email: ewinters@caerusoilandgas.com

RECLAMATION FINANCIAL ASSURANCE

☒ Plugging and Abandonment Bond Surety ID: 20130021 ☐ Gas Facility Surety ID: _____

☐ Waste Management Surety ID: _____

LOCATION IDENTIFICATION

Name: Nolte Number: 14-796

County: GARFIELD

QuarterQuarter: SESE Section: 14 Township: 7S Range: 96W Meridian: 6 Ground Elevation: 5091

Define a single point as a location reference for the facility location. When the location is to be used as a well site then the point shall be a well location.

Footage at surface: 755 feet FSL from North or South section line

366 feet FEL from East or West section line

Latitude: 39.432299 Longitude: -108.069267

PDOP Reading: 2.1 Date of Measurement: 06/13/2013

Instrument Operator's Name: Uintah

RELATED REMOTE LOCATIONS

(Enter as many Related Locations as necessary. Enter the Form 2A document # only if there is no established COGCC Location ID#)

This proposed Oil and Gas Location is:

LOCATION ID # FORM 2A DOC #

FACILITIES

Indicate the number of each type of oil and gas facility planned on location

Wells	18	Oil Tanks		Condensate Tanks	2	Water Tanks	4	Buried Produced Water Vaults	
Drilling Pits		Production Pits		Special Purpose Pits		Multi-Well Pits		Temporary Large Volume Above Ground Tanks	
Pump Jacks		Separators	20	Injection Pumps		Cavity Pumps			
Gas or Diesel Motors		Electric Motors		Electric Generators		Fuel Tanks		Gas Compressors	
Dehydrator Units		Vapor Recovery Unit		VOC Combustor	1	Flare		LACT Unit	
								Pigging Station	1

OTHER FACILITIES

Other Facility Type

Number

Heaters	10
---------	----

Per Rule 303.b.(3)C, description of all oil, gas, and/or water pipelines:

subsurface flowline from well head to separators and from separators to water and oil tanks; 1 as pipeline; 1 oil pipeline; 1 water pipeline with water meter; produced water transporting manifold and water lines.

CONSTRUCTION

Date planned to commence construction: 01/01/2014 Size of disturbed area during construction in acres: 5.17
Estimated date that interim reclamation will begin: 03/31/2014 Size of location after interim reclamation in acres: 1.78
Estimated post-construction ground elevation: 5088

DRILLING PROGRAM

Will a closed loop system be used for drilling fluids: Yes

Is H₂S anticipated? No

Will salt sections be encountered during drilling: No

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

Will oil based drilling fluids be used? No

DRILLING WASTE MANAGEMENT PROGRAM

Drilling Fluids Disposal: OFFSITE Drilling Fluids Disposal Method: Other

Cutting Disposal: OFFSITE Cuttings Disposal Method: Other

Other Disposal Description:

Cuttings for reclamation; please see the attached Waste Management Plan

Beneficial reuse or land application plan submitted? Yes

Reuse Facility ID: _____ or Document Number: 400475679

Centralized E&P Waste Management Facility ID, if applicable: _____

SURFACE & MINERALS & RIGHT TO CONSTRUCT

Name: Puckett Land Company

Phone: 303-773-1094

Address: 5460 S Quebec St, Ste 250

Fax: 303-773-1157

Address: _____

Email: _____

City: Greenwood State: CO Zip: 80111-
Village 1917

Surface Owner: ☒ Fee ☐ State ☐ Federal ☐ Indian

Check all that apply. The Surface Owner: ☒ is the mineral owner

☒ 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 from or produced to this Oil and Gas Location: Yes

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

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

Date of Rule 306 surface owner consultation 09/13/2013

CURRENT AND FUTURE LAND USE

Current Land Use (Check all that apply):

Crop Land: ☐ Irrigated ☐ Dry land ☐ Improved Pasture ☐ Hay Meadow ☐ CRP

Non-Crop Land: ☒ Rangeland ☐ Timber ☐ Recreational ☐ Other (describe): _____

Subdivided: ☐ Industrial ☐ Commercial ☐ Residential

Future Land Use (Check all that apply):

Crop Land: ☐ Irrigated ☐ Dry land ☐ Improved Pasture ☐ Hay Meadow ☐ CRP

Non-Crop Land: ☒ Rangeland ☐ Timber ☐ Recreational ☐ Other (describe): _____

Subdivided: ☐ Industrial ☐ Commercial ☐ Residential

CULTURAL DISTANCE INFORMATION

Distance to nearest:

Building: 2010 Feet
Building Unit: 4236 Feet
High Occupancy Building Unit: 4452 Feet
Designated Outside Activity Area: 3808 Feet
Public Road: 431 Feet
Above Ground Utility: 465 Feet
Railroad: 209 Feet
Property Line: 158 Feet

INSTRUCTIONS:

- All measurements shall be provided from center of nearest Well or edge of nearest Production Facility to nearest of each cultural feature as described in Rule 303.b.(3)A.
- 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: _____

SOIL

List all soil map units that occur within the proposed location. attach the National Resource Conservation Service (NRCS) report showing the "Map Unit Description" report listing the soil typical vertical profile. This data is to be used when segregating topsoil.

The required information can be obtained from the NRCS web site at <http://soildatamart.nrcs.usda.org/> or from the COGCC web site GIS Online map page found at <http://colorado.gov/cogcc>. Instructions are provided within the COGCC web site help section.

NRCS Map Unit Name: 3. Arvada loam, 1 to 6 percent slopes

NRCS Map Unit Name: 4. Arvada loam, 6 to 20 percent slopes

NRCS Map Unit Name: 72. Wann sandy loam, 1 to 3 percent slopes

PLANT COMMUNITY:

Complete this section only if any portion of the disturbed area of the location's current land use is on non-crop land.

Are noxious weeds present: Yes ☐ No ☒

Plant species from: ☐ NRCS or, ☒ field observation Date of observation: 09/12/2013

List individual species: salt bush, mallow, black greasewood, sagebrush, cheatgrass, Halogeton glomeratus, wheat grass

Check all plant communities that exist in the disturbed area.

- ☐ Disturbed Grassland (Cactus, Yucca, Cheatgrass, Rye)
☐ Native Grassland (Bluestem, Grama, Wheatgrass, Buffalograss, Fescue, Oatgrass, Brome)
☒ Shrub Land (Mahogany, Oak, Sage, Serviceberry, Chokecherry)
☐ Plains Riparian (Cottonwood, Willow, Aspen, Maple, Poplar, Russian Olive, Tamarisk)
☐ Mountain Riparian (Cottonwood, Willow, Blue Spruce)
☐ Forest Land (Spruce, Fir, Ponderosa Pine, Lodgepole Pine, Juniper, Pinyon, Aspen)
☐ Wetlands Aquatic (Bullrush, Sedge, Cattail, Arrowhead)
☐ Alpine (above timberline)
☐ Other (describe): _____

WATER RESOURCES

Is this a sensitive area: ☐ No ☒ Yes

Distance to nearest

downgradient surface water feature: 1487 Feet

water well: 2381 Feet

Estimated depth to ground water at Oil and Gas Location 14 Feet

Basis for depth to groundwater and sensitive area determination:

Static depth of nearby wells; distance to Colorado River; soil types

Is the location in a riparian area: ☒ No ☐ Yes

Was an Army Corps of Engineers Section 404 permit filed ☒ No ☐ Yes If yes attach permit.

Is the location within a Rule 317B Surface Water Supply Area buffer No zone:

If the location is within a Rule 317B Surface Water Supply Area buffer have all public water supply systems within 15 miles been notified: _____

GROUNDWATER BASELINE SAMPLING AND MONITORING AND WATER WELL SAMPLING

Water well sampling required per Rule 609

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)

RULE 502.b VARIANCE REQUEST

- ☐ Rule 502.b. Variance Request from COGCC Rule or Spacing Order Number _____

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 project is part of an area-wide Wildlife Mitigation Plan with CPW.

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

Signed: _____ Date: 10/25/2013 Email: matt@caerusoilandgas.com

Print Name: Matthew A Wurtzbacher Title: President

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: 1/10/2014

Conditions Of Approval

All representations, stipulations and conditions of approval stated in this Form 2A for this location shall constitute representations, stipulations and conditions of approval for any and all subsequent operations on the location unless this Form 2A is modified by Sundry Notice, Form 4 or an Amended Form 2A.

COA Type

Description

	<p>The moisture content of any cuttings in a cuttings pit, trench, or pile shall be as low as practicable to prevent accumulation of liquids greater than de minimis amounts. At the time of closure, if the drill cuttings are to be left onsite, they must also meet the applicable standards of table 910-1.</p> <p>Flowback and stimulation fluids must be sent to tanks, separators, or other containment/filtering equipment before the fluids can be placed into any pipeline, storage vessel, or lined pit (only if an amended Form 2A has been submitted/approved and a Form 15 Earthen Pit Permitted has been submitted/approved) located on the well pad; or into tanker trucks for offsite disposal. The flowback and stimulation fluid tanks, separators, or other containment/filtering equipment must be placed on the well pad in an area with additional downgradient perimeter berming. The area where flowback fluids will be stored/reused must be constructed to be sufficiently impervious to contain any spilled or released material.</p>
	<p>Notify the COGCC 48 hours prior to start of pad construction, rig mobilization, spud, and start of hydraulic stimulation operations using Form 42 (the appropriate COGCC individuals will automatically be email notified, including the LGD for hydraulic stimulation operations).</p> <p>As required for Groundwater Baseline Sampling; Operator shall comply with Rule 609. STATEWIDE GROUNDWATER BASELINE SAMPLING AND MONITORING:</p>

	<p>Operator shall pressure test pipelines in accordance with Rule 1101.e.(1) prior to putting into initial service any temporary surface or permanent buried pipelines and following any reconfiguration of the pipeline network. Operator shall notify the COGCC Oil and Gas Location Assessment (OGLA) Specialist for Western Colorado (Dave Kubeczko; email dave.kubeczko@state.co.us) and the COGCC Field Inspection Supervisor for Northwest Colorado (Shaun Kellerby; email shaun.kellerby@state.co.us) 48 hours prior to testing surface poly/steel or buried poly/steel pipelines.</p> <p>Operator must implement best management practices to contain any unintentional release of fluids along all portions of the surface pipeline route where temporary pumps and other necessary equipment are located.</p> <p>Operator must routinely inspect the entire length of the surface pipeline to ensure integrity. Operator shall conduct daily inspections of surface poly pipeline routes for leaks during active transfer of fluids. Inspections shall be conducted by viewing the length of the pipeline; operator will endeavor to minimize surface disturbance during pipeline monitoring. The operator shall maintain records of inspections, findings and repairs, if necessary, for the life of the pits.</p> <p>Operator must ensure 110 percent secondary containment for any potential volume of fluids that may be released from the surface pipeline at all sensitive area crossings, including, but not limited to stream, intermittent stream, ditch, and drainage crossings.</p> <p>Operator will utilize, to the extent practical, all existing access and other public roads, and/or existing pipeline right-of-ways, when placing/routing the surface pipelines. This will reduce surface disturbance and fragmentation of wildlife habitat in the area.</p>
	<p>Operator must implement best management practices to contain any unintentional release of fluids, including any fluids conveyed via temporary surface pipelines or buried permanent pipelines.</p> <p>Operator must ensure secondary containment for any volume of fluids contained at well site during drilling and completion operations; including, but not limited to, construction of a berm or diversion dike, diversion/collection trenches within and/or outside of berms/dikes, site grading, or other comparable measures (i.e., best management practices (BMPs) associated with stormwater management) sufficiently protective of nearby surface water. Any berm constructed at the well pad location will be stabilized, inspected at regular intervals (at least every 14 days), and maintained in good condition.</p> <p>The access road will be constructed and maintained as to not allow any sediment to migrate from the access road to nearby surface water or any drainages leading to surface water.</p> <p>Strategically apply fugitive dust control measures, including enforcing established speed limits on private roads, to reduce fugitive dust and coating of vegetation and deposition in water sources.</p> <p>The location is in an area of moderate to high run-on/run-off potential; therefore standard stormwater BMPs must be implemented at this location to insure compliance with CDPHE and COGCC requirements and to prevent any stormwater run-on and /or stormwater run-off.</p> <p>Berms or other containment devices shall be constructed to be sufficiently impervious (preferably corrugated steel with poly liner) to contain any spilled or released material around crude oil, condensate, and produced water storage tanks.</p>

Best Management Practices

No	BMP/COA Type	Description
1	Pre-Construction	<ul style="list-style-type: none"> • A stabilized staging area will be prepared. • Vehicle tracking pads, geotextiles, or mud mats will be installed where applicable to provide designated access into the ROW. • Perimeter control BMPs will be installed. • Access to areas that are not to be disturbed will be limited to protect the existing vegetation. • Dust mitigation practices will be utilized.
2	Wildlife	<ul style="list-style-type: none"> • All garbage and any food items will be placed in bear proof trash containers. Personnel will not feed bears at any time. Bears will not be approached if encountered in the project area. • Seed mix used for interim and final reclamation is prescribed by the landowner. • Other considerations as described in the Wildlife Mitigation Plan with Colorado Division of Parks and Wildlife.
3	Storm Water/Erosion Control	<ul style="list-style-type: none"> • Run-on protection and run-off controls will be installed prior to the beginning of construction activities, as practicable, with consideration given to worker safety and site access. Additional structural and non-structural Best Management Practices (BMPs) will likely need to be installed during and following construction. • No stormwater run-off will be discharged to the Colorado River.
4	Construction	<ul style="list-style-type: none"> • Stockpiles for topsoil, excess cut material, and drill cuttings will be located in work areas within perimeter BMPs. • Stormwater BMPs will be installed per details in the Stormwater BMP manual. • Disturbed area of site will be left in a surface roughened condition when feasible. • BMPs will be protected, inspected and repaired as necessary. • Dust mitigation practices will be utilized.
5	Drilling/Completion Operations	<ul style="list-style-type: none"> • Topsoil will be stockpiled as appropriate to maintain microbial viability. • Run-off from the facility will be controlled per Stormwater Management Plan. • Pooled water will be treated for mosquitoes to minimize the spread of the West Nile virus.
6	Interim Reclamation	<ul style="list-style-type: none"> • Top soil, where present, will be segregated from deeper soils and replaced as top soil on the final grade, a process known as live topsoil handling. • In all cases, temporary disturbance will be kept to an absolute minimum. • Equipment and materials handling will be done on established sites to reduce area and extent of soil compaction. • Disturbances will be reseeded as soon as practical with the recommended mix in the re-vegetation section. • Topsoil stockpiles will be seeded with non-invasive sterile hybrid grasses, if stored longer than one growing season. • Prior to delivery to the site, equipment will be cleaned of soils remaining from previous construction sites which may be contaminated with noxious weeds. • If working in sites with weed-seed contaminated soil, equipment will be cleaned of potentially seed-bearing soils and vegetative debris prior to moving to uncontaminated terrain.
7	Final Reclamation	<ul style="list-style-type: none"> • BMPs installed during previous phases will be maintained and repaired as necessary. • Surface will be stabilized with gravel when feasible • BMPs will be inspected. • Seeding and mulching or the installation of erosion control blankets will take place where applicable. • All non-biodegradable temporary BMPs will be removed when applicable. • Dust mitigation practices will be utilized.

Total: 7 comment(s)

Attachment Check List

<u>Att Doc Num</u>	<u>Name</u>
2106819	CORRESPONDENCE
400499470	FORM 2A SUBMITTED
400499504	LOCATION PICTURES
400499505	LOCATION DRAWING
400499508	TOPO MAP
400499510	ACCESS ROAD MAP
400499512	REFERENCE AREA PICTURES
400499513	WASTE MANAGEMENT PLAN
400499514	CONST. LAYOUT DRAWINGS
400499516	MULTI-WELL PLAN
400499520	CONST. LAYOUT DRAWINGS
400502650	CONSULT NOTICE
400503075	NRCS MAP UNIT DESC
400503230	HYDROLOGY MAP A, TOPO

Total Attach: 14 Files

General Comments

<u>User Group</u>	<u>Comment</u>	<u>Comment Date</u>
Permit	Final review completed. No LGD comments.	1/7/2014 11:04:38 AM
OGLA	Initiated/Completed OGLA Form 2A review on 11-27-13 by Dave Kubeczko, requested acknowledgement of notification, GW monitoring, fluid containment, spill/release BMPs, tank berming, flowback to tanks, cuttings low moisture content, and pipeline COAs from operator on 11-27-13; received acknowledgement of COAs from operator on 12-03-13; passed by CPW on 10-30-13 with operator BMPs in WMP acceptable; corrected pad size at construction from 4.53 acres to 5.17 acres based on Construction Layout Drawings; passed OGLA Form 2A review on 12-11-13 by Dave Kubeczko; notification, GW monitoring, fluid containment, spill/release BMPs, tank berming, flowback to tanks, cuttings low moisture content, and pipeline COAs.	11/27/2013 11:27:27 AM
LGD	pass, gdb	11/13/2013 2:43:43 PM
DOW	This location is within the boundary of the PDC-Caerus Piceance Wildlife Mitigation Plan. The BMPs and conditions of approval agreed upon in the development of the Wildlife Mitigation Plan suffice to address wildlife concerns. Approved:Jim Komatinsky10-30-2013	10/30/2013 1:16:55 PM
Permit	Returned to draft. Missing Hydrology Map. Missing NRCS Map Unit Description attachment. Number of wells planned does not match Mulit-well Plan. BMP attachment should be removed.	10/28/2013 8:10:37 AM

Total: 5 comment(s)