

FORM
2A

Rev
04/01

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:
400365001

Date Received:
01/16/2013

Oil and Gas Location Assessment

New Location Amend Existing Location Location#: 310877

Submit original plus one copy. This form is to be submitted to the COGCC prior to any ground disturbance activity associated with oil and gas development operations. This Assessment may be approved as a standalone application or submitted as an informational report accompanying an Application for Permit-To-Drill, Form 2. Approval of this 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. This form may serve as notice to land owners and other interested parties, please see the COGCC web site at <http://colorado.gov/cogcc/> for all accompanying information pertinent to this Oil and Gas Location Assessment.

Location ID:
310877
Expiration Date:
03/19/2016

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

1. 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.

2. Operator

Operator Number: 10110
 Name: GREAT WESTERN OIL & GAS COMPANY LLC
 Address: 1700 BROADWAY SUITE 650
 City: DENVER State: CO Zip: 80290

3. Contact Information

Name: Shannon Hartnett
 Phone: (303) 830-9893
 Fax: (866) 522-1673
 email: shartnett@gwogco.com

4. Location Identification:

Name: New Cache FH SESE PAD Number: 8-40D
 County: WELD
 Quarter: SESE Section: 8 Township: 6N Range: 63W Meridian: 6 Ground Elevation: 4700

Define a single point as a location reference for the facility location. This point should be used as the point of measurement in the drawings to be submitted with this application. When the location is to be used as a well site then the point shall be a well location.

Footage at surface: 662 feet FSL, from North or South section line, and 827 feet FEL, from East or West section line.
 Latitude: 40.495739 Longitude: -104.454400 PDOP Reading: 1.6 Date of Measurement: 10/19/2012
 Instrument Operator's Name: Robert Kay

5. Facilities (Indicate the number of each type of oil and gas facility planned on location):

Special Purpose Pits: <input type="checkbox"/>	Drilling Pits: <input type="checkbox"/>	Wells: <input type="text" value="5"/>	Production Pits: <input type="checkbox"/>	Dehydrator Units: <input type="checkbox"/>
Condensate Tanks: <input type="text" value="6"/>	Water Tanks: <input type="text" value="2"/>	Separators: <input type="text" value="5"/>	Electric Motors: <input type="checkbox"/>	Multi-Well Pits: <input type="checkbox"/>
Gas or Diesel Motors: <input type="checkbox"/>	Cavity Pumps: <input type="checkbox"/>	LACT Unit: <input type="checkbox"/>	Pump Jacks: <input type="checkbox"/>	Pigging Station: <input type="checkbox"/>
Electric Generators: <input type="checkbox"/>	Gas Pipeline: <input type="text" value="1"/>	Oil Pipeline: <input type="checkbox"/>	Water Pipeline: <input type="checkbox"/>	Flare: <input type="checkbox"/>
Gas Compressors: <input type="checkbox"/>	VOC Combustor: <input type="checkbox"/>	Oil Tanks: <input type="checkbox"/>	Fuel Tanks: <input type="checkbox"/>	

Other: 1 ECD

6. Construction:

Date planned to commence construction: 02/01/2013 Size of disturbed area during construction in acres: 2.87
 Estimated date that interim reclamation will begin: 12/01/2013 Size of location after interim reclamation in acres: 0.99
 Estimated post-construction ground elevation: 4699 Will a closed loop system be used for drilling fluids: Yes
 Will salt sections be encountered during drilling: Yes No Is H2S anticipated? Yes No
 Will salt (>15,000 ppm TDS Cl) or oil based muds be used: Yes No
 Mud disposal: Offsite Onsite Method: Land Farming Land Spreading Disposal Facility
 Other: _____

7. Surface Owner:

Name: _____ Phone: _____
 Address: _____ Fax: _____
 Address: _____ Email: _____
 City: _____ State: _____ Zip: _____ Date of Rule 306 surface owner consultation: 10/29/2012
 Surface Owner: Fee State Federal Indian
 Mineral Owner: Fee State Federal Indian
 The surface owner is: the mineral owner committed to an oil and gas lease
 is the executer of the oil and gas lease the applicant
 The right to construct the location is granted by: oil and gas lease Surface Use Agreement Right of Way
 applicant is owner
 Surface damage assurance if no agreement is in place: \$2000 \$5000 Blanket Surety ID _____

8. Reclamation Financial Assurance:

Well Surety ID: 20090080 Gas Facility Surety ID: _____ Waste Mgnt. Surety ID: _____

9. Cultural:

Is the location in a high density area (Rule 603.b.): Yes No
 Distance, in feet, to nearest building: 1218, public road: 666, above ground utility: 725,
 railroad: 44352, property line: 588

10. 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

11. 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

12. Soils:

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 used when segregating topsoil.

The required information can be obtained from the NRCS web site at <http://soildatamart.nrcs.usda.gov/> 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: #70 - Valent sand, 3 to 9 percent slopes

NRCS Map Unit Name: _____
NRCS Map Unit Name: _____

13. 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: _____
List individual species: _____

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): _____

14. Water Resources:

Rule 901.e. may require a sensitive area determination be performed. If this determination is performed the data is to be submitted with the Form 2A.

Is this a sensitive area: No Yes Was a Rule 901.e. Sensitive Areas Determination performed: No Yes
Distance (in feet) to nearest surface water: 427, water well: 1154, depth to ground water: 9
Is the location in a riparian area: No Yes Was an Army Corps of Engineers Section 404 permit filed No Yes
Is the location within a Rule 317B Surface Water Suppl Area buffer zone:
 No 0-300 ft. zone 301-500 ft. zone 501-2640 ft. 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: No Yes

15. Comments:

This is an existing well head location for New Cache 8-44 drilled in 2008 with a location ID of 310877 prior to Form 2A requirement. This location is adding 4 wells and equipment to the current location which has one well head, one separator, one water tank, 2 condensate tanks, and one gas pipeline. The facility information includes the totals for current and proposed expansion. Nearest water well is 1154' from the well, shows a depth of 300' and static water level at 26'.

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

Signed: _____ Date: 01/16/2013 Email: shartnett@gwogco.com

Print Name: Shannon Hartnett Title: Permitting Agent

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: 3/20/2013

CONDITIONS OF APPROVAL, IF ANY:

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.

Location is in a sensitive area because of close proximity to surface water, therefore, operator must ensure 110 percent secondary containment for any volume of fluids contained at well site during drilling and completion operations.

The location is in a sensitive area due to the presence of shallow ground water and proximity to surface water. Therefore, the tank battery must be constructed with an impermeable liner.

Attachment Check List

Att Doc Num	Name
2233885	SURFACE AGRMT/SURETY
2614204	CORRESPONDENCE
400365001	FORM 2A SUBMITTED
400370409	ACCESS ROAD MAP
400370411	CONST. LAYOUT DRAWINGS
400370412	HYDROLOGY MAP
400370429	LOCATION DRAWING
400370431	LOCATION PICTURES
400370434	MULTI-WELL PLAN
400370435	CONST. LAYOUT DRAWINGS
400370438	REFERENCE AREA MAP
400370439	REFERENCE AREA PICTURES
400370440	TOPO MAP
400370441	LOCATION DRAWING
400370442	NRCS MAP UNIT DESC
400370444	WASTE MANAGEMENT PLAN

Total Attach: 16 Files

General Comments

<u>User Group</u>	<u>Comment</u>	<u>Comment Date</u>
Permit	Final Review Completed. No LGD or public comment received.	3/19/2013 6:45:46 AM
Permit	Per operator attached SUA. Initial review complete. Form 2A and 2's compared.	3/5/2013 8:07:23 AM
Permit	Form 2 and 2A compared.	3/4/2013 2:13:38 PM
OGLA	Operator acknowledges COAs; OGLA task passed	2/12/2013 11:52:42 AM
OGLA	1. changed the depth to water to 9 feet - see the static water level in water well 19956-F. 2. changed the Sensitive Area Designation to Yes due to shallow ground water and the proximity of the location to several surface water bodies. Waiting on operator response to COAs	1/28/2013 4:27:00 PM

Total: 5 comment(s)

BMP

<u>Type</u>	<u>Comment</u>
Drilling/Completion Operations	<p>Storm water management Plans (SWMP) will be in place to address construction, drilling and operations associated with Oil and Gas development throughout the state of Colorado in accordance with Colorado Department of Public Health (CDPHE). BMP's will be constructed around the perimeter of the site prior to or at the beginning of construction; BMP's used will vary according to the location, and will remain in place until the pad reaches final reclamation.</p> <p>Spill Prevention Control and Counter Measures (SPCC) plans will be in place to address any possible spills associated with Oil and Gas operations throughout the state of Colorado in accordance with CFR 112. In accordance with COGCC Rule 1002.f.(2) A. & B., shall provide a designated storage area for dry bulk chemicals and miscellaneous fluids. The storage area shall be covered to prevent contact of precipitation with chemicals, shall be elevated above storm- or standing water, and shall provide sufficient containment to prevent release of spilled fluids or chemicals from impacting soil, surface water or groundwater and will prevent the co-mingling of spilled fluids or chemicals with other E & P Waste.</p> <p>Housekeeping will consist of neat and orderly storage of materials and fluids. Wastes will be temporarily stored in sealed containers and regularly collected and disposed of at offsite, suitable facilities. If spills occur prompt cleanup is required to minimize any commingling of waste materials with storm water runoff. Routine maintenance will be limited to fueling and lubrication of equipment. Drip pans will be used during routine fueling and maintenance to contain spills or leaks. Any waste product from maintenance will be containerized and transported offsite for disposal or recycling, There will be no major equipment overhauls conducted onsite. Equipment will be transported offsite for major overhauls. Cleanup will consist of patrolling the roadways, access areas, and other work areas to pick up trash, scrap debris, other discarded materials, and any contaminated soil. These materials will be disposed of properly and promptly.</p>

Total: 1 comment(s)