

FORM 2A Rev 04/01

State of Colorado Oil and Gas Conservation Commission 1120 Lincoln Street, Suite 801, Denver, Colorado 80205 Phone: (303) 894-2100 Fax: (303) 894-2109



Table with 4 columns: DE, ET, OE, ES

Document Number: 1635037

Oil and Gas Location Assessment

New Location Amend Existing Location Location#: 320919

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...

Location ID: 320919 Expiration Date: 06/22/2014

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: 69805 Name: PETROX RESOURCES INC Address: P O BOX 2600 City: MEEKER State: CO Zip: 81641

3. Contact Information

Name: MIKE CLARK Phone: (970) 878-5594 Fax: (970) 878-4489 email: MIKE.PETROXCBM@GMAIL.COM

4. Location Identification:

Name: TIERRA PIEDRA 33-5 Number: #15-1 SWD County: ARCHULETA Quarter: NWNW Section: 15 Township: 33N Range: 5W Meridian: N Ground Elevation: 6226 Define a single point as a location reference for the facility location... Footage at surface: 338 feet FNL, from North or South section line, and 912 feet FWL, from East or West section line. Latitude: 37.110200 Longitude: -107.385480 PDOP Reading: 3.0 Date of Measurement: 04/06/2011 Instrument Operator's Name: SCOTT WEIBE

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

Special Purpose Pits: 0 Drilling Pits: 0 Wells: 2 Production Pits: 0 Dehydrator Units: 0 Condensate Tanks: 0 Water Tanks: 2 Separators: 0 Electric Motors: 2 Multi-Well Pits: 0 Gas or Diesel Motors: 0 Cavity Pumps: 0 LACT Unit: 0 Pump Jacks: 0 Pigging Station: 0 Electric Generators: 0 Gas Pipeline: 0 Oil Pipeline: 0 Water Pipeline: 1 Flare: 0 Gas Compressors: 0 VOC Combustor: 0 Oil Tanks: 0 Fuel Tanks: 0 Other: 1 TRIPLEX PUMP HOUSE

6. Construction:

Date planned to commence construction: 06/01/2011 Size of disturbed area during construction in acres: 1.30  
Estimated date that interim reclamation will begin: 12/01/2011 Size of location after interim reclamation in acres: 1.30  
Estimated post-construction ground elevation: 6226 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: BURIED IF MEETS TABLE  
910

7. Surface Owner:

Name: \_\_\_\_\_ Phone: \_\_\_\_\_  
Address: \_\_\_\_\_ Fax: \_\_\_\_\_  
Address: \_\_\_\_\_ Email: \_\_\_\_\_  
City: \_\_\_\_\_ State: \_\_\_\_\_ Zip: \_\_\_\_\_ Date of Rule 306 surface owner consultation: 02/01/2011  
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: 20090113  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: 775, public road: 187, above ground utilit: 187  
, railroad: 5280, property line: 360

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): EXISTING WELL PAD  
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): AGRICULTURAL STORAGE PAD  
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.

**IMPORTANT: SOME DATA FIELDS HAVE BEEN MODIFIED.**

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: VO-CD. CATDRAW LOAM, 3 TO 12% 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: 04/11/2011

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: 425, water well: 722, depth to ground water: 35

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:**

NO NEW SURFACE DITRURBANCE IS PROPOSED FOR THIS WELL. IT WILL BE LOCATED ON AN EXISTING WELL PAD. NO NEW ACCESS RAOD, WILL USE EXISTING ACCESS RAOD. PETROX RESOURCES, OPERATOR AND TIERRA PIEDRA RANCH, LLC SURFACE OWNER, ARE OWNED BY THE SANE ENTITIES. EPA WILL BE FORWARDED AS SOON AS RECEIVED.

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

Signed: \_\_\_\_\_ Date: 04/12/2011 Email: TIM@FINNEYLAND.COM

Print Name: TIM G KELLEY Title: AGENT

**IMPORTANT: SOME DATA FIELDS HAVE BEEN MODIFIED.**

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: \_\_\_\_\_

*David G. Neslin*

Director of COGCC

Date: 6/23/2011

**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.**

**GENERAL SITE COAs:**

Operator must submit an as-built drawing (plan view and cross-sections) of the SWD injection well pad and associated equipment within 14 calendar days of construction.

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; including, but not limited to, construction of a berm (12-inch earthen should be sufficient) 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.

Operator must implement best management practices to contain any unintentional release of fluids, including any fluids conveyed via temporary surface pipelines or permanent buried pipelines.

Location is in a sensitive area due to close proximity to a water well and shallow groundwater; therefore any pit used to contain/hold fluids, if constructed, must be lined or a closed loop system (which operator has indicated on the Form 2A – Section 6. Construction) must be implemented during drilling. If a drilling pit is constructed and is not closed (either drained and/or backfilled) immediately after well completion, then operator must appropriately fence and net the drilling pit, in a timely manner, and maintain the fencing and netting until pit is closed.

Notify 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 Southern Colorado (Mike Leonard; email mike.leonard@state.co.us) 48 hours prior to start of construction/move in of rig.

The moisture content of any drill 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, the drill cuttings must also meet the applicable standards of table 910-1.

If the injection requires hydraulic fracturing, flowback and stimulation fluids must be sent to tanks to allow the sand to settle out before the fluids can be placed into any pipeline or pit located on the well pad. The flowback and stimulation fluid tanks 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 (per Rule 604.a.(4)).

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 Southern Colorado (Mike Leonard; email mike.leonard@state.co.us) 48 hours prior to start of fracing operations.

Operator will use qualified containment devices for all appropriate chemicals/hazardous materials used onsite during the operation of the injection well.

Operator shall equip and maintain on all tanks an electronic level monitoring device that will immediately shut in pipelines from wells.

Operator shall install a steel containment ring around tank batteries to provide secondary containment and install a synthetic liner that underlies the entire battery and is keyed into the top of the containment ring.

Operator must submit a list of all Conditions of Approval (COAs) along with the Frderal EPA UIC Final/Approved Permit package to the COGCC Oil and Gas Location Assessment (OGLA) Specialist for Western Colorado (Dave Kubeczko; email dave.kubeczko@state.co.us) and the COGCC UIC Engineer (Denise Onyskiw; email denise.onyskiw@state.co.us) prior to COGCC being able to pass the Form 2 and Form 2A permits for this SWD injection well. All federal COAs will be incorporated into the COGCC's Form 2 and/or Form 2A.

**Attachment Check List**

Att Doc Num	Name
1635037	FORM 2A
1635038	LOCATION PICTURES
1635039	LOCATION DRAWING
1635040	HYDROLOGY MAP
1635041	ACCESS ROAD MAP
1635042	REFERENCE AREA MAP
1635043	NRCS MAP UNIT DESC
1635044	CONST. LAYOUT DRAWINGS
1635045	CORRESPONDENCE
2033708	CORRESPONDENCE

Total Attach: 10 Files

**General Comments**

<b><u>User Group</u></b>	<b><u>Comment</u></b>	<b><u>Comment Date</u></b>
Permit	Permitting has been notified that because the location is within the Reservation boundary, even though it is fee minerals and fee surface, any UIC program will have to be handled by EPA. BY	6/17/2011 9:47:09 AM
OGLA	Placed ON HOLD until Petrox provides COGCC with the approved UIC Permit from EPA!!!!!!!!!!!!	5/6/2011 10:37:21 AM
DOW	The CDOW appreciates that the operator has elected to move this location further from the Piedra River than originally proposed. If the operator plans on utilizing a reserve pit or drill cutting pit the CDOW recommends fencing and netting the pit to exclude wildlife. Any small standing body of water in Colorado is an extreme attractant to wildlife, including those provided by oil and gas field pits containing fluids. This is because Colorado is an arid state, and water is the primary source of biological productivity, species diversity and abundance in arid biological systems. Therefore we request that Petrox, in your plan of operations include a provision to fence and net the pit to exclude wildlife within 14 days after completion operations have ceased; alternatively, operator may remove the fluids from open pits and maintain dry pits until the pits are reclaimed (Rule 902.d.).	4/28/2011 3:13:14 PM
OGLA	Initiated/Completed OGLA Form 2A review on 04-18-11 by Dave Kubeczko; requested acknowledgement of fluid containment, spill/release BMPs, lined pits/closed loop, moisture content cuttings, flowback to tanks, and tank berming COAs from operator on 04-18-11; received acknowledgement of COAs from operator on 04-19-10; passed by CDOW on 04-28-11 with recommendation that if a drilling pit is constructed, it should be fenced and netted if not closed after completion; passed OGLA Form 2A review on 06-20-11 by Dave Kubeczko; fluid containment, spill/release BMPs, lined pits/closed loop, moisture content cuttings, flowback to tanks, and tank berming COAs.	4/18/2011 1:20:03 PM
Permit	Permission from Opr-Tim Kelly to correct to amending a location and add location ID. sf	4/18/2011 10:17:54 AM

Total: 5 comment(s)

**BMP**

<b><u>Type</u></b>	<b><u>Comment</u></b>

Total: 0 comment(s)