



## Peanut Fed 3403

### 304.c. (16): Interim Reclamation Plan

An interim reclamation plan consistent with the requirements of Rule 1003.

#### **Introduction and Site Description:**

The Peanut Fed 3403 NENW & NWN Sec 34 T10N R59W Pad is a Verdad Resources oil and gas production facility that will have 5 horizontal oil and gas wells.

**Surface Land Description:** Fee

**Maximum Disturbance Acreage:** 10 Acres

**Working Pad Surface Acreage:** 10 Acres

**Post Drilling/Completion Acreage:** 4.38 Acres

**Site Elevation:** 5143'

**Proposed Timeframe for Interim Reclamation:** Interim reclamation will take place on disturbed areas affected by drilling and subsequent operations no later than 6 months after they are no longer in use.

**Soils Description and Protection:** The primary soil on this location is NRCS 18, Bushman fine sandy loam, 3 to 9 percent slopes. The drainage class is well drained, water capacity of the most liming layer is 2.0 to 6.0 in/hr and the depth to restrictive feature is 80 inches. At least 6 inches of topsoil will be salvaged from the well pad surface prior to construction. Topsoil will be stockpiled onsite adjacent to the well pad for interim and final reclamation. Stockpiles should be constructed with no greater than 3:1 side slopes and with a height of nine feet max. The topsoil stockpiles will be seeded immediately after placement with a quick-germination grass seed mix, specified by the County, or other means shall be employed so that the topsoil is protected from erosion. Additionally, a continuous berm will be placed around any down slope sides of the topsoil stockpile to prevent runoff and erosion. Placement of topsoil stockpiles should incorporate stormwater/runoff BMPs.

**Oil and Gas Location Pre-Disturbance Vegetation Composition:** The dominant vegetation is categorized at disturbed grassland including blue grama and buffalograss. Less than 5% of the vegetation on location is composed of listed Colorado Noxious weed including Bromus tectorum and Convolvulus arvensis. There are non-stormwater discharges and no receiving waters on this location. The vegetative cover at the time of onsite was approximately 80% coverage composed of grasses, forbs and shrubs.

**Identification of Reference Area and Vegetation Composition (Non-Crop Land):** The reference area is adjacent to the pad location and has the same soil type, Bushman Fine sandy loam and dominant vegetation is also disturbed grassland, with blue grama and buffalograss. The percentage of coverage at the reference area is approximately 80% coverage composed of grasses, forbs and shrubs.



**Known Weed Infestations:** Less than 5% of the vegetation on location is composed of listed Colorado Noxious weed including Bromus techorum and Convolvulus arvensis.

**Gathering Lines:** The pipeline and utility corridors are owned, operated and handled by a 3<sup>rd</sup> party, but will remain through the life of the wells.

**Access Road:** The access roads will remain in use and will not be reclaimed until the wells on the pad are plugged and the entire pad reclaimed.

**Removal of Drilling, Re-entry, Completion Equipment and all Associated Debris and Waste Materials (1003.a.):** Debris and non-exploration and production (E&P) waste materials (concrete, sack bentonite and other drilling mud additives, sand, plastic, pipe and cable) will be removed when no longer needed and cellars, rat holes, and other boreholes unnecessary for further lease operations will be backfilled. Removal of all drilling, completion equipment and all associated debris and waste materials will be confirmed at the facility Prestart-up Safety Review.

**Management of Waste Material:** Drill cuttings will be disposed offsite in adherence to the 900-Series. Drilling pits will not be used. All waste materials will be properly disposed of offsite at permitted commercial waste disposal facilities approved to receive E&P Waste by CDPHE and the Relevant Local Government. No waste materials will be left onsite.

**Identification of Interim Reclamation Areas no Longer in Use (1003.b.):** Approximately 3 acres of the pad will be reclaimed within 6 months after disturbed areas affected by drilling and subsequent operations are no longer in use. 4.38 acres of the working pad surface will remain. The topsoil stockpile area will be reduced when the pad is interim reclaimed. The area around the well heads, tanks and other equipment will not be reclaimed until the wells are plugged and abandoned. The detention area and the stormwater controls on the edge of the pad will remain for the life of the well. Area to be reclaimed is shown on the drawing below.





Seed mixes used previously in this area have been PBSI Native Prairie Mix or PBSI Dryland Aggressive Mix. The selected seed mix will be planted at about 25 pounds of seed/acre. No primary or secondary noxious weeds will be in the seed mix. The reestablishment of vegetative cover as well as watershed stabilization measures will be scheduled during the working season and before the succeeding winter. Re-vegetation will be accomplished as soon as practical following the reclamation of a pad.

Straw mulch will be laid down during re-vegetation. The straw mulch will be applied at 2 tons per acre and crimped into the soil. Crimp mulching uses straw material that is machine crimped into the soil to provide stability. Crimp mulch functions as a soil stabilizer by decreasing the velocity of sheet flow, to help control erosion and dust until seed germinates. Mulch may be hay or cereal grain straw.

Interim reclamation areas shall be free of all undesirable plant species designated to be noxious weeds, as practicable, and weed control shall be conducted in compliance with the Colorado Noxious Weed Act (C.R.S. §35-5.5-115). Additional reseeding shall be necessary if revegetation requirements are not successful.

In the spring and summer, the interim reclamation area will be monitored for revegetation success, weed growth, and presence of noxious weeds until revegetation and site stability is successful. A local weed control company may be contracted for the removal of any weed infestations that cannot be controlled by mowing.

**Fencing:** The maximum disturbance area will be fenced with 4 strand barbwire livestock fencing. It will remain onsite during interim reclaim so it will not get grazed during establishment of the plant community.

**Re-establish and Stabilize Drainage Features:** After the wells are brought on to production, the working pad surface will be reduced to 4.38 acres. Approximately **3** acres of the construction disturbance will be reclaimed. The stormwater detention area has to remain in place for the life of wells per Weld County regulations. These drainage features will be moved in to the new edge of the interim reclamation pad. Berms, ditch, sediment traps and rocks socks will also remain at outside of the interim reclamation disturbance.

**Reclamation Monitoring, Inspection, Maintenance, and Reporting:**

Reclamation Monitoring will be inspected at the following frequencies:

- Once per month until interim reclamation is completely established (approximately 2 years).
- Once per year after interim reclamation completion until facility is decommissioned for final reclamation.
- There are no annual reclamation reports required

Operator will focus to further stabilize soils, preventing erosion and site degradation, and to monitor for and treat invasive species. Additional reseeding shall be necessary if revegetation requirements are not



successful. Locations will remain in the interim reclamation phase until the well is plugged and abandoned, at which time final reclamation will take place.

**Interim Reclamation Completion Notice, Form 4 (1003.e.[3])**: Verdad will submit a Form 4 Sundry Notice once the revegetation reaches 80% pre-disturbance growth. The form will describe reclamation procedures, associated mitigation measures, changes to final land use, and the total cover of live perennial vegetation to evaluate the success of interim reclamation. See the form below.



Page 1  
FORM 4  
Rev 12/05

[Click here to reset form](#)

State of Colorado

Oil and Gas Conservation Commission

1120 Lincoln Street, Suite 801, Denver, Colorado 80203 Phone: (303)894-2100 Fax:(303)894-2109



**SUNDRY NOTICE**

Submit original plus one copy. This form is to be used for general, technical and environmental sundry information. For proposed or completed operations, describe in full on Technical Information Page (Page 2 of this form.) Identify well or other facility by API Number or by OGCC Facility ID. Operator shall send an informational copy of all sundry notices for wells located in High Density Areas to the Local Government Designee (Rule 603b.)

|  |  |  |
|--|--|--|
| 1. OGCC Operator Number:                       | 4. Contact Name                            | Complete the Attachment Checklist<br>OP OGCC |
| 2. Name of Operator:                           | Phone:                                     |  |
| 3. Address:                                    | City: State: Zip:                          |  |
| 5. API Number 05-                              | OGCC Facility ID Number                    | Survey Plat                                  |
| 6. Well/Facility Name:                         | 7. Well/Facility Number                    | Directional Survey                           |
| 8. Location (Qtr/Qt, Sec, Twp, Rng, Meridian): | 10. Field Name:                            | Surface Eqmpt Diagram                        |
| 9. County:                                     | 11. Federal, Indian or State Lease Number: | Technical Info Page                          |
|  |  | Other  |

**General Notice**

**CHANGE OF LOCATION:** Attach New Survey Plat (a change of surface qtr/qtr is substantive and requires a new permit)

|   |                      |                      |                      |  |
|---|----------------------|----------------------|----------------------|--|
| Change of Surface Footage from Exterior Section Lines:    | <input type="text"/> | <input type="text"/> | <input type="text"/> | <input type="text"/>                           |
| Change of Surface Footage to Exterior Section Lines:      | <input type="text"/> | <input type="text"/> | <input type="text"/> | <input type="text"/>                           |
| Change of Bottomhole Footage from Exterior Section Lines: | <input type="text"/> | <input type="text"/> | <input type="text"/> | <input type="text"/>                           |
| Change of Bottomhole Footage to Exterior Section Lines:   | <input type="text"/> | <input type="text"/> | <input type="text"/> | <input type="text"/> attach directional survey |

Bottomhole location Qtr/Qt, Sec, Twp, Rng, Mer

Latitude  Distance to nearest property line  Distance to nearest bldg, public rd, utility or RR

Longitude  Distance to nearest lease line  Is location in a High Density Area (rule 603b)? Yes/No

Ground Elevation  Distance to nearest well same formation  Surface owner consultation date:

**GPS DATA:**

Date of Measurement  PDOP Reading  Instrument Operator's Name

**CHANGE SPACING UNIT**

| Formation            | Formation Code       | Spacing order number | Unit Acreage         | Unit configuration   |
|----------------------|----------------------|----------------------|----------------------|----------------------|
| <input type="text"/> |

Remove from surface bond  
Signed surface use agreement attached

**CHANGE OF OPERATOR (prior to drilling):**

Effective Date:

Plugging Bond:  Blanket  Individual

**CHANGE WELL NAME NUMBER**

From:

To:

Effective Date:

**ABANDONED LOCATION:**

Was location ever built?  Yes  No

Is site ready for inspection?  Yes  No

Date Ready for Inspection:

**NOTICE OF CONTINUED SHUT IN STATUS**

Date well shut in or temporarily abandoned:

Has Production Equipment been removed from site?  Yes  No

MIT required if shut in longer than two years. Date of last MIT:

**SPUD DATE:**

**REQUEST FOR CONFIDENTIAL STATUS** (6 mos from date casing set)

**SUBSEQUENT REPORT OF STAGE, SQUEEZE OR REMEDIAL CEMENT WORK** \*submit cbl and cement job summaries

| Method used          | Cementing tool setting/perf depth | Cement volume        | Cement top           | Cement bottom        | Date                 |
|----------------------|-----------------------------------|----------------------|----------------------|----------------------|----------------------|
| <input type="text"/> | <input type="text"/>              | <input type="text"/> | <input type="text"/> | <input type="text"/> | <input type="text"/> |

**RECLAMATION:** Attach technical page describing final reclamation procedures per Rule 1004.

Final reclamation will commence on approximately   Final reclamation is completed and site is ready for inspection.

**Technical Engineering/Environmental Notice**

Notice of Intent  
Approximate Start Date:

Report of Work Done  
Date Work Completed:

Details of work must be described in full on Technical Information Page (Page 2 must be submitted.)

|   |  |  |
|---|--|--|
| <input type="checkbox"/> Intent to Recomplete (submit form 2) | <input type="checkbox"/> Request to Vent or Flare    | <input type="checkbox"/> E&P Waste Disposal                        |
| <input type="checkbox"/> Change Drilling Plans                | <input type="checkbox"/> Repair Well                 | <input type="checkbox"/> Beneficial Reuse of E&P Waste             |
| <input type="checkbox"/> Gross Interval Changed?              | <input type="checkbox"/> Rule 502 variance requested | <input type="checkbox"/> Status Update/Change of Remediation Plans |
| <input type="checkbox"/> Casing/Cementing Program Change      | <input type="checkbox"/> Other: <input type="text"/> | for Spills and Releases  |

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



**Site-Specific Interim Reclamation BMPs:**

-The Peanut Fed 3403 location has very shallow topsoil. The top 6 inches will be removed from the pad disturbance area surface and located on the east side of the pad on the southern portion of the soil stockpile disturbance area. Any subsoil removed will be placed to the north of the topsoil pile and will be replaced underneath the topsoil when replaced during interim and final reclamation.

- Erosion will be controlled by covering the pad surface with compacted road base, placing rock socks into drainage ditches, seeding disturbed areas not covered in road base and keeping slopes at 3:1 or less.

-Weeds will be controlled with bare ground spraying, mowing and a local weed control company may be contracted for the removal of any weed infestations that cannot be controlled by mowing.

- Seed mix to be used will be PBSI Dryland Aggressive Mix. The selected seed mix will be planted at about 25 pounds of seed/acre. No primary or secondary noxious weeds will be in the seed mix.

-The maximum disturbance area will be fenced with 4 strand barbwire livestock fencing. It will remain onsite during interim reclaim so it will not get grazed during establishment of the plant community.

-Interim reclamation will take place on disturbed areas affected by drilling and subsequent operations no later than 6 months after they are no longer in use.

-The surrounding landscape is rangeland. The downgradient direction is to the south. There a low area drainage to the south west approximately 850 feet and 20 feet lower in elevation.