

FORM 6

Rev 02/20

State of Colorado Oil and Gas Conservation Commission

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



DE ET OE ES

Document Number:

402417755

Date Received:

07/01/2020

WELL ABANDONMENT REPORT

This form is to be submitted as an Intent to Abandon whenever an abandonment is planned on a borehole. After the abandonment is complete, this form shall again be submitted as a Subsequent Report of the actual work completed. The approved intent shall be valid for six months after the approval date, after that period, a new intent will be required. Attachments required with the Intent to Abandon are wellbore diagrams of the current configuration and the proposed configuration with plugs set. A Subsequent Report of Abandonment shall indicate the actual work completed. Attachments required with a Subsequent Report are a wellbore diagram showing plugs that were set and casing remaining in the hole, the job summaries from all plugging contractors used, including wireline and cementing (third party verification) and any logs that may have been run during abandonment.

OGCC Operator Number: 1375 Contact Name: Ned Lundvall
Name of Operator: LINDE INC Phone: (303) 5909145
Address: 200 SOMERSET CORP BLVD #7000 Fax:
City: BRIDGEWATER State: NJ Zip: 07083 Email: elundvall@eaest.com

For "Intent" 24 hour notice required, Name: Labowskie, Steve Tel: (970) 946-5073
COGCC contact: Email: steve.labowskie@state.co.us

Type of Well Abandonment Report: [X] Notice of Intent to Abandon [] Subsequent Report of Abandonment

API Number 05-083-06536-00 Well Name: AIRCO FEDERAL Well Number: 2
Location: QtrQtr: NENW Section: 25 Township: 36N Range: 18W Meridian: N
County: MONTEZUMA Federal, Indian or State Lease Number: C-18092
Field Name: MCELMO Field Number: 53674

Only Complete the Following Background Information for Intent to Abandon

Latitude: 37.352876 Longitude: -108.782835
GPS Data: GPS Quality Value: 6.0 Type of GPS Quality Value: PDOP Date of Measurement: 10/22/2018
GPS Instrument Operator's Name: HughesJo
Reason for Abandonment: [] Dry [X] Production Sub-economic [] Mechanical Problems
[] Other
Casing to be pulled: [] Yes [X] No Estimated Depth:
Fish in Hole: [] Yes [X] No If yes, explain details below
Wellbore has Uncemented Casing leaks: [] Yes [] No If yes, explain details below
Details:

Current and Previously Abandoned Zones

Table with 6 columns: Formation, Perf. Top, Perf. Btm, Abandoned Date, Method of Isolation, Plug Depth. Row 1: SHINARUMP, 2180, 2200, Total: 1 zone(s)

Casing History

Table with 9 columns: Casing Type, Size of Hole, Size of Casing, Weight Per Foot, Setting Depth, Sacks Cement, Cement Bot, Cement Top, Status. Rows: SURF, 1ST

Plugging Procedure for Intent and Subsequent Report

CIBP #1: Depth 2150 with 5 sacks cmt on top. CIBP #2: Depth _____ with _____ sacks cmt on top.
CIBP #3: Depth _____ with _____ sacks cmt on top. CIBP #4: Depth _____ with _____ sacks cmt on top.
CIBP #5: Depth _____ with _____ sacks cmt on top.

NOTE: Two(2) sacks cement required on all CIBPs.

Set 10 sks cmt from 512 ft. to 562 ft. Plug Type: STUB PLUG Plug Tagged:
Set 20 sks cmt from 0 ft. to 100 ft. Plug Type: STUB PLUG Plug Tagged:
Set _____ sks cmt from _____ ft. to _____ ft. Plug Type: _____ Plug Tagged:
Set _____ sks cmt from _____ ft. to _____ ft. Plug Type: _____ Plug Tagged:
Set _____ sks cmt from _____ ft. to _____ ft. Plug Type: _____ Plug Tagged:
Perforate and squeeze at _____ ft. with _____ sacks. Leave at least 100 ft. in casing _____ CICR Depth
Perforate and squeeze at _____ ft. with _____ sacks. Leave at least 100 ft. in casing _____ CICR Depth
Perforate and squeeze at _____ ft. with _____ sacks. Leave at least 100 ft. in casing _____ CICR Depth
(Cast Iron Cement Retainer Depth)

Set 10 sacks half in. half out surface casing from 512 ft. to 562 ft. Plug Tagged:
Set 20 sacks at surface
Cut four feet below ground level, weld on plate Above Ground Dry-Hole Marker: Yes No
Set _____ sacks in rat hole Set _____ sacks in mouse hole

Additional Plugging Information for Subsequent Report Only

Casing Recovered: _____ ft. _____ inch casing Cut and Cap Date: _____
of _____
*Wireline Contractor: _____ *Cementing Contractor: _____
Type of Cement and Additives Used: _____
Flowline/Pipeline has been abandoned per Rule 1105 Yes No

Technical Detail/Comments:

Messer would like to plug and abandon the well in late July or early August. The environmental consultant has been in touch with Jim Hughes (COGCC) and Jen Jardine (BLM) regarding a site walk and is targeting mid-late July for the site walk.

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

Signed: _____ Print Name: Ned Lundvall
Title: Environmental Consultant Date: 7/1/2020 Email: elundvall@eaest.com

Based on the information provided herein, this Well Abandonment Report (Form 6) complies with COGCC Rules and applicable orders and is hereby approved.

COGCC Approved: Duran, Alicia Date: 7/31/2020

CONDITIONS OF APPROVAL, IF ANY: _____ Expiration Date: 1/30/2021

COA Type**Description**

1) Provide 48 hour notice of plugging MIRU via electronic Form 42.

2) Operator shall implement measures to control unnecessary and excessive venting and to ensure that vapors and odors from well plugging operations do not constitute a nuisance or hazard to public welfare, health and safety.

3) Properly abandon flowlines as per Rule 1105. Attach flowline abandonment job summary detailing compliance with Rule 1105.c when filing Form 6 (s). File electronic Form 42 once abandonment complete. Within 30 days of an operator completing abandonment requirements for an off-location flowline or crude oil transfer line the operator shall submit a Flowline Report, Form 44.

4) Prior to killing the well, measure the surface casing pressure (Braden Head) and perform a Braden Head test. Report results on a Form 17. If pressure is greater than 25 psi (20 psi if within Ignacio Blanco Field) contact COGCC area engineer.

a. A sample of both the production and bradenhead gas shall be collected and submitted for laboratory analysis of the gas composition and stable isotopes. (only if there is no CICR, Bridge plug etc. downhole. If there is CICR then only Bradenhead) The compositional analysis should include hydrogen, argon, oxygen, carbon dioxide, nitrogen, methane (C1), ethane (C2), ethene, propane (nC3), isobutane (iC4), butane (nC4), isopentane (iC5), pentane (nC5), hexanes +, specific gravity and British Thermal Units (BTU). The stable isotope analysis should include delta DC1, delta 13C1, delta 13C2, delta 13C3, delta 13iC4, delta 13nC4, delta 13iC5 (if possible), delta 13nC5 (if possible), and delta 13C of CO2 (if possible). The analytical results shall be submitted to the COGCC via Form 43 (Analytical Sample Submittal Form).

b. Gas sample containers should be filled in accordance with container manufacturer or laboratory recommendations; purging multiple container volumes may not be feasible due to limited gas volumes.

c. If water is encountered in the bradenhead during testing then samples should be collected and submitted for the laboratory analysis of major anions (chloride, carbonate, bicarbonate, and sulfate), cations (sodium, potassium, calcium, and magnesium) total dissolved solids (TDS), BTEX, DRO, GRO, and dissolved gasses (RSK 175). If there is a limited amount of water available then anions, cations and BTEX should be given first priority. Data from bradenhead water samples shall be submitted to the COGCC via Form 43.

d. Please refer to Appendix A of the COGCC Operator Instructions for Bradenhead Testing and Reporting for more information regarding testing and sampling protocol.

e. The operator shall provide notice to Environmental Supervisor Alex Fischer at alex.fischer@state.co.us or 303-894-2100 X 5138 and Southwest Region Engineer Alicia Duran at alicia.duran@state.co.us or 303-548-7396, a minimum of 72 hours prior to conducting field operations. Bradenhead testing and sample collection (if applicable). If samples are collected, copies of all final laboratory analytical results shall be provided to the COGCC within three (3) months of collecting the samples.

f. Continue to monitor the surface casing pressure throughout the PA

g. Check for gas venting outside the surface casing (use gas monitor or flood the cellar with water and look for bubbles)

5) Pressure test casing.

6) Do not install surface casing shoe plug unless the surface casing pressure is zero. If there is pressure, additional deeper plug(s) will be required to ensure no surface casing pressure.

PA marker

7) Discuss the type of PA marker with the landowner (welded plate or post)

8) The PA marker shall be inscribed with the well's legal location, well name and number, and API Number.

9) Leave a vent hole in casing/marker to avoid trapping any potential residual pressure in the casing(s)

10) This well has federal minerals. Operator shall notify COGCC engineering staff of any plugging changes required by the BLM or unexpected conditions in the field as soon as feasible.

Attachment Check List

<u>Att Doc Num</u>	<u>Name</u>
402417755	FORM 6 INTENT SUBMITTED
402435453	WELLBORE DIAGRAM

Total Attach: 2 Files

General Comments

<u>User Group</u>	<u>Comment</u>	<u>Comment Date</u>
		Stamp Upon Approval

Total: 0 comment(s)