

FORM
6Rev
05/18State 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: 401829946			
Date Received: 11/07/2018			

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: 69175	Contact Name: Jenifer Hakkarinen
Name of Operator: PDC ENERGY INC	Phone: (303) 8605800
Address: 1775 SHERMAN STREET - STE 3000	Fax:
City: DENVER State: CO Zip: 80203	Email: Jenifer.Hakkarinen@pdce.com
For "Intent" 24 hour notice required, Name: Montoya, John Tel: (970) 397-4124	
COGCC contact: Email: john.montoya@state.co.us	

API Number 05-123-19475-00	Well Number: 41-17
Well Name: HOSHIKO	
Location: QtrQtr: NENE Section: 17 Township: 5N Range: 64W Meridian: 6	
County: WELD	Federal, Indian or State Lease Number: 59398
Field Name: WATTENBERG	Field Number: 90750

☒ Notice of Intent to Abandon ☐ Subsequent Report of Abandonment

Only Complete the Following Background Information for Intent to Abandon

Latitude: 40.404440	Longitude: -104.567170
GPS Data:	
Date of Measurement: 08/22/2010	PDOP Reading: 1.8
GPS Instrument Operator's Name: Holly L. Tracy	
Reason for Abandonment: <input type="checkbox"/> Dry <input checked="" type="checkbox"/> Production Sub-economic <input type="checkbox"/> Mechanical Problems	
<input type="checkbox"/> Other	
Casing to be pulled: <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Estimated Depth: 1500
Fish in Hole: <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If yes, explain details below
Wellbore has Uncemented Casing leaks: <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If yes, explain details below
Details:	

Current and Previously Abandoned Zones

Formation	Perf. Top	Perf. Btm	Abandoned Date	Method of Isolation	Plug Depth
CODELL	6846	6856			
NIOBRARA	6544	6674			

Total: 2 zone(s)

Casing History

Casing Type	Size of Hole	Size of Casing	Weight Per Foot	Setting Depth	Sacks Cement	Cement Bot	Cement Top	Status
SURF	12+1/4	8+5/8	24	355	318	355	0	VISU
1ST	7+7/8	4+1/2	9.3	7,074	174	7,074	6,125	CBL
S.C. 1.1				3,940	153	3,940	3,286	CBL

Plugging Procedure for Intent and Subsequent Report

CIBP #1: Depth 6494 with 2 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 250 sks cmt from 1615 ft. to 1200 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: ☐
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 390 sacks half in. half out surface casing from 600 ft. to 0 ft. Plug Tagged: ☒

Set _____ 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 Plugging Date: _____
of _____

*Wireline Contractor: _____ *Cementing Contractor: _____

Type of Cement and Additives Used: _____

Flowline/Pipeline has been abandoned per Rule 1105 ☐ Yes ☐ No *ATTACH JOB SUMMARY

Technical Detail/Comments:

Hoshiko 41-17 (05-123-19475)/Plugging Procedure (Intent)
Producing Formation: Codell: 6846'-6856' Niobrara: 6544'-6674'
Upper Pierre Aquifer: 330'-1320'
TD: 7097' PBD: 7017'

Surface Casing: 8 5/8" 24# @ 355' w/ 318 sxs cmt
Production Casing: 3 1/2" 9.3# @ 7074' w/ 174 sxs cmt (TOC @ 6125' - CBL).
2nd stage cement @ 3940' w/ 153 sxs (TOC @ 3286' - CBL).

Tubing: 1 1/2" tubing set @ 6832.3' (1/12/2018).

Proposed Procedure:

1. MIRU pulling unit. Pull 1 1/2" tubing.
2. RU wireline company.
3. TIH with CIBP. Set BP at 6494'. Top with 2 sxs 15.8#/gal CI G cement.
4. TIH with casing cutter. Cut 3 1/2" casing at 1500'. Pull cut casing.
5. TIH with tubing to 1615'. RU cementing company. Mix and pump 250 sxs 15.8#/gal CI G cement w/ 2% CaCl down tubing (Pierre coverage from 1615'-1200').
6. Pickup tubing to 600'. Mix and pump 390 sxs 15.8#/gal CI G cement down tubing. Cement should circulate to surface.
7. Cut surface casing 6' below ground level and weld on cap.

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

Signed: _____ Print Name: Jenifer Hakkarinen

Title: Reg Tech Date: 11/7/2018 Email: Jenifer.Hakkarinen@pdce.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: Wolfe, Stephen

Date: 11/18/2018

CONDITIONS OF APPROVAL, IF ANY:

Expiration Date: 5/17/2019

COA Type

Description

	<p>Venting</p> <p>Operator shall implement measures to control unnecessary and excessive venting, to protect the health and safety of the public, and to ensure that vapors and odors from well plugging operations do not constitute a nuisance or hazard to public welfare.</p>
	<p>Bradenhead Testing</p> <ul style="list-style-type: none">• Prior to the start of plugging operations, a bradenhead test shall be performed and reported if there has not been a reported bradenhead test within the 60 days immediately preceding the start of plugging operations.• If any of the following conditions exist then sampling of all fluids is required and sampling methods shall comply with Operator Guidance – Bradenhead Testing and Reporting Instructions, Appendix A: Liquid and Gas Sampling as found on the COGCC website, cogcc.state.co.us. <p>1) The initial pressure measurement on the bradenhead is greater than 25 psi, prior to blowing down any liquid or gas from the bradenhead valve, or</p> <p>2) Pressure remains at the conclusion of the test, or</p> <p>3) Any liquids are present anytime during the test. If so, then stop the test as soon as liquids are present and sample before resuming the test.</p> <ul style="list-style-type: none">• Form 17 Bradenhead Test Report shall be submitted within 10 days of the test.• 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.
	<p>Plugging</p> <ul style="list-style-type: none">• Provide 48 hour notice of plugging MIRU via electronic Form 42.• Plugs and squeezes will be placed as stated in the plugging procedure of the approved NOI unless revised by COA or prior approval from COGCC is obtained.• Check for fluid migration or shut-in pressure on the well prior to pumping any plug (open hole, annular or casing) that isolates deepest aquifer or the surface casing shoe (whichever is deeper). Contact COGCC Engineer for revised plugging orders if well is not static at this time, prior to continuing with plugging operations.• Tag required if the shoe plug, or combined stub/shoe plug, is not circulated to the surface. Shoe plug shall be placed as specified herein and the top of cement must be a minimum 50' into the shoe, or 50' above the stub (if not cut below the shoe), whichever is shallower.• Place a 50' plug (minimum) at the surface, inside the inner most casing and in all annular spaces. All other cement plugs, without mechanical isolation, shall have at least 100' of cement left in the casing.• Properly abandon on-location flowlines as per Rule 1105. 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 must submit a Flowline Report, Form 44.

Attachment Check List

Att Doc Num

Name

401829946	FORM 6 INTENT SUBMITTED
401829968	WELLBORE DIAGRAM
401829970	WELLBORE DIAGRAM
401829972	GYRO SURVEY

Total Attach: 4 Files

General Comments

<u>User Group</u>	<u>Comment</u>	<u>Comment Date</u>
Engineer	SB5 124-24' L-FH WW 400' 66(1) Log L-FH BP, Base UPA 1319' e	11/18/2018
Well File Verification	Pass	11/13/2018
Permit	Pass	11/08/2018

Total: 3 comment(s)