

FORM

2

Rev
12/05

State of Colorado

Oil and Gas Conservation Commission

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Document Number:

400254533

Date Received:

03/02/2012

PluggingBond SuretyID

20030028

APPLICATION FOR PERMIT TO:

1. ☒ Drill, ☐ Deepen, ☐ Re-enter, ☐ Recomplete and Operate

2. TYPE OF WELL

OIL ☒ GAS ☐ COALBED ☐ OTHER pilot
SINGLE ZONE ☒ MULTIPLE ☐ COMMINGLE ☐Refiling ☐Sidetrack ☐3. Name of Operator: SWEPI LP4. COGCC Operator Number: 781105. Address: 4582 S ULSTER ST PKWY #1400City: DENVER State: CO Zip: 802376. Contact Name: Michael L. Bergstrom Phone: (303)222-6347 Fax: (303)2226258Email: Michael.Bergstrom@shell.com7. Well Name: North Castor Gulch Well Number: 1-168. Unit Name (if appl): Williams Fork Unit Number: COC74956X9. Proposed Total Measured Depth: 5500

WELL LOCATION INFORMATION

10. QtrQtr: TR 66 Sec: 16 Twp: 5N Rng: 91W Meridian: 6Latitude: 40.392189 Longitude: -107.605392Footage at Surface: 1294 feet FNL/FSL FNL 925 feet FEL/FWL FEL11. Field Name: wildcat Field Number: 9999912. Ground Elevation: 6992 13. County: MOFFAT

14. GPS Data:

Date of Measurement: 10/24/2011 PDOP Reading: 1.5 Instrument Operator's Name: B. Hunting15. If well is ☐ Directional ☐ Horizontal (highly deviated) **submit deviated drilling plan.**Footage at Top of Prod Zone: FNL/FSL FNL FEL/FWL FEL Bottom Hole: FNL/FSL FSL FEL/FWL FWL
Sec: 16 Twp: 5N Rng: 91W Sec: 16 Twp: 5N Rng: 91W16. Is location in a high density area? (Rule 603b)? ☐ Yes ☒ No17. Distance to the nearest building, public road, above ground utility or railroad: 3702 ft18. Distance to nearest property line: 925 ft 19. Distance to nearest well permitted/completed in the same formation(BHL): 3500 ft

20. LEASE, SPACING AND POOLING INFORMATION

Objective Formation(s)	Formation Code	Spacing Order Number(s)	Unit Acreage Assigned to Well	Unit Configuration (N/2, SE/4, etc.)
Niobrara Shale	NBRR			

21. Mineral Ownership: ☐ Fee ☒ State ☐ Federal ☐ Indian Lease #: CO 8473.522. Surface Ownership: ☐ Fee ☒ State ☐ Federal ☐ Indian23. Is the Surface Owner also the Mineral Owner? ☒ Yes ☐ No Surface Surety ID#:23a. If 23 is Yes: Is the Surface Owner(s) signature on the lease? ☒ Yes ☐ No23b. If 23 is No: ☐ Surface Owners Agreement Attached or ☐ \$25,000 Blanket Surface Bond ☐ \$2,000 Surface Bond ☐ \$5,000 Surface Bond

24. Using standard QtrQtr, Sec, Twp, Rng format enter entire mineral lease description upon which this proposed wellsite is located (attach separate sheet/map if you prefer):

T5N, R91W, 6thPM; Section 16 all

25. Distance to Nearest Mineral Lease Line: 925 ft

26. Total Acres in Lease: 680

DRILLING PLANS AND PROCEDURES

27. Is H2S anticipated? ☐ Yes ☒ No If Yes, attach contingency plan.

28. Will salt sections be encountered during drilling? ☐ Yes ☒ No

29. Will salt (>15,000 ppm TDS CL) or oil based muds be used during drilling? ☐ Yes ☒ No

30. If questions 28 or 29 are yes, is this location in a sensitive area (Rule 901.e)? ☐ Yes ☒ No

31. Mud disposal: ☒ Offsite ☐ Onsite

If 28, 29, or 30 are "Yes" a pit permit may be required.

Method: ☐ Land Farming ☐ Land Spreading ☒ Disposal Facility Other: _____

Note: The use of an earthen pit for Recompletion fluids requires a pit permit (Rule 905b). If air/gas drilling, notify local fire officials.

Casing Type	Size of Hole	Size of Casing	Wt/Ft	Csg/Liner Top	Setting Depth	Sacks Cmt	Cmt Btm	Cmt Top
CONDUCTOR	30	20		0	80	156	80	0
SURF	13+1/2	10+3/4	40.5	0	800	408	800	0
1ST	9+7/8	7+5/8	29.7	0	4,000	301	4,000	1,500
OPEN HOLE	6+3/4			0	5,500	379	5,500	4,200

32. BOP Equipment Type: ☐ Annular Preventer ☒ Double Ram ☐ Rotating Head ☐ None

33. Comments Two APDs are being submitted for North Castor Gulch 1-16; one for the pilot hole and one for the lateral hole. This APD is for the pilot hole. Attachments include a drilling and completion plan. North Castor Gulch is a part of the Williams Fork Federal Unit COC74956X.

34. Location ID: _____

35. Is this application in a Comprehensive Drilling Plan ? ☐ Yes ☒ No

36. Is this application part of submitted Oil and Gas Location Assessment ? ☒ Yes ☐ No

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

Signed: _____

Print Name: Michael Bergstrom

Title: Senior Regulatory Advisor

Date: 3/2/2012

Email: Michael.Bergstrom@shell.com

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: _____

Director of COGCC

Date: 4/13/2012

API NUMBER

05 081 07720 00

Permit Number: _____

Expiration Date: 4/12/2014

CONDITIONS OF APPROVAL, IF ANY:

All representations, stipulations and conditions of approval stated in the Form 2A for this location shall constitute representations, stipulations and conditions of approval for this Form 2 Permit-to-Drill and are enforceable to the same extent as all other representations, stipulations and conditions of approval stated in this Permit-to-Drill.

(1) COMPLIANCE WITH THE MOST CURRENT REVISION OF THE NORTHWEST COLORADO NOTIFICATION POLICY IS REQUIRED.

(2) OPERATOR MUST ENSURE 110 PERCENT SECONDARY CONTAINMENT FOR ANY VOLUME OF FLUIDS CONTAINED AT WELL-SITE DURING DRILLING AND COMPLETION OPERATIONS. IF FLUIDS ARE CONVEYED VIA PIPELINE, OPERATOR MUST IMPLEMENT BEST-MANAGEMENT-PRACTICES TO CONTAIN ANY UNINTENTIONAL RELEASE OF FLUIDS.

(3) NO PORTION OF ANY PIT THAT WILL BE USED TO HOLD LIQUIDS SHALL BE CONSTRUCTED ON FILL MATERIAL, UNLESS THE PIT AND FILL SLOPE ARE DESIGNED AND CERTIFIED BY A PROFESSIONAL ENGINEER, SUBJECT TO REVIEW AND APPROVAL BY THE DIRECTOR PRIOR TO CONSTRUCTION OF THE PIT. THE CONSTRUCTION AND LINING OF THE PIT SHALL BE SUPERVISED BY A PROFESSIONAL ENGINEER OR THEIR AGENT. THE ENTIRE BASE OF THE PIT MUST BE IN CUT.

(4) THE PROPOSED SURFACE CASING IS MORE THAN 50' BELOW THE DEPTH OF THE DEEPEST WATER WELL WITHIN 1-MILE OF THE SURFACE LOCATION WHEN CORRECTED FOR ELEVATION DIFFERENCES. THE DEEPEST WATER WELL WITHIN 1-MILE IS 040 FEET DEEP.

(5) CEMENT ON PRODUCTION CASING MUST BE AT LEAST 200' ABOVE TOP OF FT. UNION AND COMPLY WITH RULES 209 AND 317.I. SEGREGATE OIL, GAS, AND FRESH-WATER-BEARING ZONES AND PROTECT COAL SEAMS. VERIFY TOP WITH CBL.

Attachment Check List

Att Doc Num	Name
400254533	FORM 2 SUBMITTED
400254566	TOPO MAP
400257498	WELL LOCATION PLAT
400257633	WELLBORE DIAGRAM

Total Attach: 4 Files

General Comments

<u>User Group</u>	<u>Comment</u>	<u>Comment Date</u>
Permit	T. Kelly, State Land Board, confirmed oper. has satisfied lease stips and has surface bond in order. LGD/pub. comments waived. Final Comprehensive Review Status--passed.	4/13/2012 10:14:13 AM
Permit	State Land Board advised that surface restoration bond in place but needs to confirm lease stips with operator regarding wildlife.	4/6/2012 2:37:54 PM
Permit	changed dist. to nearest min. lease on pilot to 925' per oper.'s email.	4/5/2012 7:52:15 AM
Permit	notified TIm Kelly with State Land Board	3/23/2012 11:15:25 AM
Permit	Operator corrected plugging bond. This form has passed completeness.	3/6/2012 11:00:13 AM
Permit	Returned to draft. Invalid plugging bond.	3/6/2012 7:20:04 AM

Total: 6 comment(s)

BMP

<u>Type</u>	<u>Comment</u>
Material Handling and Spill Prevention	Spill Prevention Control & Countermeasure Plans (SPCC) are in place to address material releases and to prescribe materials handling BMPs for the facility. "Good house-keeping" measures will be taken to ensure proper waste disposal.
Storm Water/Erosion Control	<p>Stormwater Management Plans (SWMP) are in place to comply with both Colorado Department of Public Health and Environment (CDPHE) and Colorado Oil and Gas Conservation Commission (COGCC) stormwater discharge permits. The construction layout for North Castor Gulch 1-16 details Best Management Practices (BMP) to be installed during initial construction. Note that BMPs may be removed, altered, or replaced with changing conditions in the field and the SWMP will be updated accordingly. The BMPs prescribed for the initial construction phase include, but are not limited to:</p> <ul style="list-style-type: none">• Construction diversion ditch• Sediment reservoirs• Check dams• Level spreaders• Stabilized construction entrance• Slash• Sediment trap• Wattle• Terrace• Secondary containment berms• Detention ponds

Total: 2 comment(s)