

FORM  
2  
Rev  
12/05

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



DE ET OE ES

Document Number:  
400139465  
Plugging Bond Surety  
20040071

APPLICATION FOR PERMIT TO:

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

2. TYPE OF WELL

OIL  GAS  COALBED  OTHER \_\_\_\_\_  
SINGLE ZONE  MULTIPLE ZONE  COMMINGLE ZONE

Refiling   
Sidetrack

3. Name of Operator: ANTERO RESOURCES PICEANCE CORPORATION 4. COGCC Operator Number: 10079

5. Address: 1625 17TH ST STE 300  
City: DENVER State: CO Zip: 80202

6. Contact Name: Hannah Knopping Phone: (303)357-6412 Fax: (303)357-7315  
Email: hknopping@anteroresources.com

7. Well Name: Left Hand Federal Well Number: A12

8. Unit Name (if appl): \_\_\_\_\_ Unit Number: \_\_\_\_\_

9. Proposed Total Measured Depth: 7935

WELL LOCATION INFORMATION

10. QtrQtr: SWSW Sec: 16 Twp: 6S Rng: 92W Meridian: 6  
Latitude: 39.521982 Longitude: -107.677936

Footage at Surface: 905 feet FSL 913 feet FWL

11. Field Name: Mamm Creek Field Number: 52500

12. Ground Elevation: 5684 13. County: GARFIELD

14. GPS Data:

Date of Measurement: 01/04/2011 PDOP Reading: 2.5 Instrument Operator's Name: Scott E. Aibner

15. If well is  Directional  Horizontal (highly deviated) **submit deviated drilling plan.**

Footage at Top of Prod Zone: FNL/FSL \_\_\_\_\_ FEL/FWL \_\_\_\_\_ Bottom Hole: FNL/FSL \_\_\_\_\_ FEL/FWL \_\_\_\_\_  
167 FSL 1982 FWL 167 FSL 1982 FWL  
Sec: 16 Twp: 6S Rng: 92W Sec: 16 Twp: 6S Rng: 92W

16. Is location in a high density area? (Rule 603b)?  Yes  No

17. Distance to the nearest building, public road, above ground utility or railroad: 247 ft

18. Distance to nearest property line: 150 ft 19. Distance to nearest well permitted/completed in the same formation: 256 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.)
Iles	ILES	191-25	160	SW/4
Williams Fork	WMFK	191-27	160	SW/4

21. Mineral Ownership:  Fee  State  Federal  Indian Lease #: \_\_\_\_\_

22. Surface Ownership:  Fee  State  Federal  Indian

23. 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  No

23b. If 23 is No  Surface Owners Agreement Attached or  \$25,000 Blanket Surface Bon  \$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):  
Section 16, T6S, R92W: SE/4SW/4

25. Distance to Nearest Mineral Lease Line: 167 ft 26. Total Acres in Lease: 40

### 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: Onsite if app(see comments)

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	24	16	55#	0	60	177	60	0
SURF	12+1/4	8+5/8	24/32#	0	1,000	416	1,000	0
1ST	7+7/8	4+1/2	11.6#	0	7,935	356	7,935	

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

33. Comments TOP OF CEMENT OF 1ST STRING/PRODUCTION CASING WILL BE >500 FEET ABOVE TOP OF GAS. #17 Antero's rig derrick height is 136' and therefore well location does comply with Rule 603a.1 (136'x 1.5=204'). #31 Mud Disposal: Antero will bury onsite if disposal meets Table 910 and if there is a provision in SUA which allows for such operation.

34. Location ID: 335543

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: Hannah Knopping

Title: Permit Representative Date: 3/11/2011 Email: hknopping@anteroresources.co

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 S. Nesline Director of COGCC Date: 4/6/2011

Permit Number: \_\_\_\_\_ Expiration Date: 4/5/2013

**API NUMBER**

05 045 20605 00

**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) GARFIELD COUNTY RULISON-FIELD NOTICE TO OPERATORS. NOTE: ALL NOTICES SHALL BE GIVEN VIA E-MAIL. SEE ATTACHED NOTICE.
- (3) NEW MAMM CREEK FIELD NOTICE TO OPERATORS APPLIES TO THIS WELL. NOTE: ALL NOTICES SHALL BE GIVEN VIA E-MAIL. SEE ATTACHED NOTICE.
- (4) COMPLIANCE WITH THE NOTICE TO OPERATORS DRILLING WELLS IN THE BUZZARD, MAMM CREEK, AND RULISON FIELDS, GARFIELD COUNTY AND MESA COUNTY IS REQUIRED. SEE ATTACHED NOTICE.
- (5) 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.
- (6) 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.
- (7) THE 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 600 FEET DEEP.

**Attachment Check List**

Att Doc Num	Name
400139465	FORM 2 SUBMITTED
400141704	WELL LOCATION PLAT
400141705	DEVIATED DRILLING PLAN
400141708	SURFACE AGRMT/SURETY
400141709	ACCESS ROAD MAP

Total Attach: 5 Files

**General Comments**

<u>User Group</u>	<u>Comment</u>	<u>Comment Date</u>
Permit	Operator is aware of Rule 603a regulations. Setbacks from overhead electric lines meet requirements.	3/14/2011 12:01:00 PM

Total: 1 comment(s)

**BMP**

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

Total: 0 comment(s)