west virginia department of environmental protection

Office of Oil and Gas
601 57th Street SE
Charleston, WV 25304
(304) 926-0450
(304) 926-0452 fax

Earl Ray Tomblin, Governor
Randy C. Huffman, Cabinet Secretary
www.dep.wv.gov

May 25, 2016

WELL WORK PLUGGING PERMIT

Plugging

This permit, API Well Number: 47-2300005, issued to CHESAPEAKE APPALACHIA, L.L.C., is evidence of permission granted to perform the specified well work at the location described on the attached pages and located on the attached plat, subject to the provisions of Chapter 22 of the West Virginia Code of 1931, as amended, and all rules and regulations promulgated thereunder, and to all conditions and provisions outlined in the pages attached hereto. Notification shall be given by the operator to the Oil and Gas Inspector at least 24 hours prior to the construction of roads, locations, and/or pits for any permitted work. In addition, the well operator shall notify the same inspector 24 hours before any actual well work is commenced and prior to running and cementing casing. Spills or emergency discharges must be promptly reported by the operator to 1-800-642-3074 and to the Oil and Gas inspector.

Upon completion of the plugging well work, the above named operator will reclaim the site according to the provisions of WV Code 22-6-30. The above named operator will also file, as required in WV Code 22-6-23, an affidavit on form WR-38 by two experienced persons in the operator's employment and the Oil and Gas inspector that the work authorized under this permit was performed and a description given. Failure to abide by all statutory and regulatory provisions governing all duties and operations here under may result in suspensions or revocation of this permit and in addition may result in civil and/or criminal penalities being imposed upon the operator.

This permit will expire in two (2) years from date of issue. If there are any questions, please free to contact me at (304) 926-0499 ext. 1654.

James Martin
Chief

Operator's Well No: 1831
Farm Name: USA NATL FOREST
API Well Number: 47-2300005
Permit Type: Plugging
Date Issued: 05/25/2016

Promoting a healthy environment.

2300005 P

PERMIT CONDITIONS

West Virginia Code §22-6-11 allows the Office of Oil and Gas to place specific conditions upon this permit. Permit conditions have the same effect as law. Failure to adhere to the specified permit conditions may result in enforcement action.

CONDITIONS

1. All pits must be lined with a minimum of 20 mil thickness synthetic liner.
2. In the event of an accident or explosion causing loss of life or serious personal injury in or about the well or while working on the well, the well operator or its contractor shall give notice, stating the particulars of the accident or explosion, to the oil and gas inspector and the Chief within twenty-four (24) hours.
3. Well work activities shall not constitute a hazard to the safety of persons.
4. This well is under a consent order and must be plugged under the terms of that agreement.

2300005 P
$100.00 ck# 6001905

FORM WW-4 (B)
Observe
File Copy
(Rev. 2/01)

1) Date: 4/22/2016
2) Operator's Well No. 821124
3) API Well No. 47-023-00005

STATE OF WEST VIRGINIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION
OFFICE OF OIL AND GAS

APPLICATION FOR A PERMIT TO PLUG AND ABANDON

4) Well Type: Oil ____ Gas X Liquid injection ____ Waste disposal ____
(Is Gas, Production X or Underground storage ____) Deep ____ Shallow X

5) Location: Elevation 2,897' Watershed Laurel Run of Jordan Run
District Union -3 County Grant Quadrangle Blackbird Knob, WV 7.5' -255

6) Well Operator Chesapeake Appalachia, L.L.C.
Address P.O. Box 18496
Oklahoma City, OK 73154-0496

7) Designated Agent Jessica Greathouse
Address P.O. Box 6070
Charleston, WV 25362

8) Oil and Gas Inspector to be notified
Name Bryan Harris
Address P.O. Box 157
Volga, WV 26238

9) Plugging Contractor
Name Chesapeake Appalachia, L.L.C.
Address P.O. Box 18496
Oklahoma City, OK 73154-0496

10) Work Order: The work order for the manner of plugging this well is as follows:

See Attached Sheet

Received
APR 27 2016
Office of Oil and Gas
WV Dept. of Environmental Protection

OK JMM

Notification must be given to the district oil and gas inspector 24 hours before permitted work can commence.

Work Order approved by Inspector _____ Date _____

2300005P

API: 47-023-00005

821124 P&A PROCEDURE

1) Prepare road and location, MIRU service rig
2) Check pressure on tubing and casing
3) Blow well down to tank
4) If needed, kill well with enough fluid to kill the highest pressure, plus 25% safety factor
5) Install BOP if needed, TOH with 2 7/8" tubing
6) Remove cage/seating nipple and inspect tubing. If tubing is in suitable condition, use as work string – if not replace.
7) TIH with W.S. to approximately 8550' or until PBTD is tagged, spot gel
8) Spot 300' cement plug approximately 8550'-8250', pull W.S.
9) RIH with tools to check top of plug. If TOC is below 8365', then add to top plug.
10) Pull or run W.S. to 6100', spot gel
11) Spot 150' cement plug 6100'-5950', pull W.S.
12) Cut 5 ½" casing at free-point (approximately 3150') and pull
13) TIH with W.S. to 3150', spot gel
14) Spot 200' cement plug 3150'-2950'. (NOTE: This may be two individual 100' plugs if 5 ½"" free-point is deeper, one at 5 ½" cut and one at 9 5/8" shoe), pull W.S. to 1000'
15) Spot 150' cement plug 1000'-850', pull W.S. to 150'
16) Spot 150' cement plug 150'-surface, pull W.S.
17) Pull W.S. and top off with cement
18) Erect monument and reclaim as prescribed by law

Received

APR 27 2016

Office of Oil and Gas
WV Dept. of Environmental Protection

Well 821124 2300005P
API 47-023-00005

RECEIVED
AUG - 4 1986
DIVISION OF OIL & GAS
DEPARTMENT OF ENERGY

IV-35
(Rev 8-81)

State of West Virginia
Department of Mines
Oil and Gas Division

Date December 31, 1982
Operator's
Well No. 1 - 1831
Farm U.S.A. #1
API No. 47 - 023 - 0005

WELL OPERATOR'S REPORT
OF
DRILLING, FRACTURING AND/OR STIMULATING, OR PHYSICAL CHANGE

(CONFIDENTIAL WELL)

WELL TYPE: Oil ___ / Gas xx / Liquid Injection ___ / Waste Disposal ___ /
(If "Gas," Production xx / Underground Storage ___ / Deep xx / Shallow ___ /)

LOCATION: Elevation: 2992' Watershed Laurel Run of Jordan Run
District: Union County Grant Quadrangle Blackbird Knob

COMPANY UNION DRILLING, INC.
ADDRESS P. O. Drawer 40, Buckhannon, WV 26201
DESIGNATED AGENT Joseph C. Vanzant, Jr.
ADDRESS P. O. Drawer 40, Buckhannon, WV 26201
SURFACE OWNER U. S. Forest Service
ADDRESS Attn: Jerry Bremer, District Ranger, Petersburg, WV 26847
MINERAL RIGHTS OWNER U. S. Forest Service
ADDRESS Attn: Jerry Bremer, District Ranger, Petersburg, WV 26847
OIL AND GAS INSPECTOR FOR THIS WORK Robert Stewart ADDRESS P. O. Box 345, Jane Lew, WV 26378
PERMIT ISSUED October 13, 1982
DRILLING COMMENCED October 26, 1982
DRILLING COMPLETED December 24, 1982
IF APPLICABLE: PLUGGING OF DRY HOLE ON CONTINUOUS PROGRESSION FROM DRILLING OR REWORKING. VERBAL PERMISSION OBTAINED ON

Casing & Tubing	Used in Drilling	Left in Well	Cement fill up Cu. ft.
Size 20-16 Cond.			
13 3/8" 13-10"	336.25	336.25	271
9 5/8	3069.55	3069.55	1315
8 5/8			
7			
5 1/2		8679.45	1159
4 1/2			
3			
2			
Liners used			

Received
APR 27 2016
Office of Oil and Gas
WV Dept. of Environmental Protection

GEOLOGICAL TARGET FORMATION Oriskany Depth 8510 feet
Depth of completed well 8730 feet Rotary x / Cable Tools
Water strata depth: Fresh 87 feet; Salt -- feet
Coal seam depths: none Is coal being mined in the area? No

OPEN FLOW DATA
Producing formation Oriskany Pay zone depth 8510 feet
Gas: Initial open flow 5,260 Mcf/d Oil: Initial open flow ___ Bbl/d
Final open flow none taken Mcf/d Final open flow ___ Bbl/d
Time of open flow between initial and final tests ? hours
Static rock pressure None Taken psig (surface measurement) after ___ hours shut in
(If applicable due to multiple completion--)
Second producing formation ___ Pay zone depth ___ feet
Gas: Initial open flow ___ Mcf/d Oil: Initial open flow ___ Bbl/d
Final open flow ___ Mcf/d Oil: Final open flow ___ Bbl/d
Time of open flow between initial and final tests ___ hours
Static rock pressure ___ psig (surface measurement) after ___ hours shut in

(Continue on reverse side)

2300005P

FORM [illegible]
(REVERSE)

DETAILS OF PERFORATED INTERVALS, FRACTURING OR STIMULATING, PHYSICAL CHANGE, ETC.
On 12/31/82 perforated 8465/8510 and spot acid (1500 gallon Mod 202 15%).

WELL LOG

FORMATION COLOR HARD OR SOFT	TOP FEET	BOTTOM FEET	REMARKS Including indication of all fresh and salt water, coal, oil and gas
Sand and Shale	0	7724	Hole damp at 87'
Tully?	7724	7734	
Sand and Shale	7734	8023	
Perciel Limestone	8023	8092	
Marcellus	8092	8153	
Needmore Shale	8153	8283	
Oriskany	8283	8602	
Helderberg ?	8602	TD 8730	

Received

APR 27 2016

Office of Oil and Gas
WV Dept. of Environmental Protection

(Attach separate sheets as necessary)

UNION DRILLING, INC.
Well Operator

By: Joseph C. Pettey

Date: 12/31/82 Joseph C. Pettey, Vice President of Production

Note: Regulation 2.02(i) provides as follows:
"The term 'log' or 'well log' shall mean a systematic detailed geological record of all formations, including coal, encountered in the drilling of a well."

23000005P

Well 821124
API 47-023-00005

IV-35
(Rev 8-81)

RECEIVED
JUL 05 1988
DIVISION OF OIL & GAS
DEPARTMENT OF ENERGY

State of West Virginia
Department of Mines
Oil and Gas Division

REVISED WELL RECORD
Date July 1, 1988
Operator's
Well No. 1-1831
Farm U.S.A. #1
API No. 47 - 023 - 0005 - F
(CONFIDENTIAL WELL)

WELL OPERATOR'S REPORT
OF
DRILLING, FRACTURING AND/OR STIMULATING, OR PHYSICAL CHANGE

Received
APR 27 2016
Office of Oil and Gas
WV Dept. of Environmental Protection

WELL TYPE: Oil ___ / Gas x / Liquid Injection ___ / Waste Disposal ___ /
(If "Gas," Production x / Underground Storage ___ / Deep x / Shallow ___ /)

LOCATION: Elevation: 2992' Watershed Laurel Run of Jordan Run
District: Union County Grant Quadrangle Blackbird Knob

COMPANY Equitable Resources Exploration, Inc.
ADDRESS P. O. Drawer 40, Buckhannon, WV 26201
DESIGNATED AGENT Douglas P. Terry
ADDRESS P.O. Drawer 40, Buckhannon, WV 26201
SURFACE OWNER U.S. Forest Service
ADDRESS Petersburg, WV 26847 ATTN: Jerry Bremer, District Ranger
MINERAL RIGHTS OWNER U.S. Forest Service
ADDRESS Petersburg, WV 26847 ATTN: Jerry Bremer, District Ranger
OIL AND GAS INSPECTOR FOR THIS WORK Phillip Tracy ADDRESS P. O. Box 2536, Elkins, WV 26241
PERMIT ISSUED October 13, 1982
DRILLING COMMENCED October 26, 1982
DRILLING COMPLETED December 24, 1982
IF APPLICABLE: PLUGGING OF DRY HOLE ON CONTINUOUS PROGRESSION FROM DRILLING OR REWORKING. VERBAL PERMISSION OBTAINED ON ___

Casing & Tubing	Used in Drilling	Left in Well	Cement fill up Cu. ft.
Size 20-16 Cond.			
13-10" 13 3/8"	336.25'	336.25'	271
9 5/8	3069.55'	3069.55'	1315
8 5/8			
7			
5 1/2		8679.45'	1159
4 1/2			
3			
2 7/8"		8401	
Liners used			

GEOLOGICAL TARGET FORMATION Oriskany Depth 8510 feet
Depth of completed well 8730 feet Rotary x / Cable Tools ___
Water strata depth: Fresh 87 feet; Salt -- feet
Coal seam depths: None Is coal being mined in the area? NO

OPEN FLOW DATA
Producing formation Oriskany Pay zone depth 8510 feet
Gas: Initial open flow 5,260 Mcf/d Oil: Initial open flow ___ Bbl/d
Final open flow None Taken Mcf/d Final open flow ___ Bbl/d
Time of open flow between initial and final tests? ___ hours
Static rock pressure None taken psig (surface measurement) after ___ hours shut in
(If applicable due to multiple completion--)
Second producing formation ___ Pay zone depth ___ feet
Gas: Initial open flow ___ Mcf/d Oil: Initial open flow ___ Bbl/d
Final open flow ___ Mcf/d Oil: Final open flow ___ Bbl/d
Time of open flow between initial and final tests ___ hours
Static rock pressure ___ psig (surface measurement) after ___ hours shut in

GRANT 0005-F

(Continue on reverse side)

FORM IV-35
(REVERSE)

2300005P

DETAILS OF PERFORATED INTERVALS, FRACTURING OR STIMULATING, PHYSICAL CHANGE, ETC.

On 12/31/82 perforated 8465/8510 and spot acid (1500 gallon Mod 202 15%).

On July 22, 1986 received Frac Permit 47-023-0005F.

On 9/25/86 perforated 8465'/8485' and acidized with 1500 gallons 15% Fe Acid with ball sealers.

WELL LOG

FORMATION COLOR HARD OR SOFT	TOP FEET	BOTTOM FEET	REMARKS Including indication of all fresh and salt water, coal, oil and gas
Sand and Shale	0	7724	Hole damp at 87'
Tully?	7724	7734	
Sand and Shale	7734	8023	
Perciel Limestone	8023	8092	
Marcellus	8092	8153	
Needmore Shale	8153	8283	
Oriskany	8283	8602	
Helderberg?	8602	TD 8730	

RECEIVED
JUL 05 1988
DIVISION OF OIL & GAS
DEPARTMENT OF ENERGY

Received
APR 27 2016
Office of Oil and Gas
WV Dept. of Environmental Protection

(Attach separate sheets as necessary)

EQUITABLE RESOURCES EXPLORATION, INC.
Well Operator

By: Douglas P. Terry

Date: July 1, 1988 - DOUGLAS P. TERRY - OPERATIONS MANAGER-NORTH

Note: Regulation 2.02(i) provides as follows:
"The term 'log' or 'well log' shall mean a systematic detailed geological record of all formations, including coal, encountered in the drilling of a well."

2300005P

WW4-A
Revised
2/01

1) Date: 4/22/2015
2) Operator's Well No. 821124
3) API Well No. 47-023-00005

STATE OF WEST VIRGINIA - BUREAU OF ENVIRONMENT
DEPARTMENT OF ENVIRONMENTAL PROTECTION, OFFICE OF OIL AND GAS
NOTICE OF APPLICATION TO PLUG AND ABANDON A WELL

4) Surface Owner(s) to be served:
(a) Name U.S. Department of Agriculture
Address U.S. Forest Service/
Mon. National Forest
200 Sycamore Street
Elkins, WV 26241-3962

(b) Name Access Road only:
Address Wilderness Retreat at Dolly Sods
Forbes Law Office Attn: Bill Forbes
1118 Kanawha Blvd. East
Charleston, WV 25301

(c) Name Access Road only:
Address Waterfront Group Stellar View, LLC
9920 Kincey Avenue, STE 210
Huntersville, NC 28078

5) Inspector Bryan Harris
Address P.O. Box 157
Volga, WV 26238

Telephone 304-553-6087

5) Coal Operator
(a) Name None

Coal Owner(s) with Declaration
(b) Name U.S. Department of Interior
Address Bureau of Land Mgmt - Eastern States
626 E. Wisconsin Ave., Suite 200
Milwaukee, WI 53202-4617

Name
Address

Name
Address

Coal Lessee with Declaration
(c) Name None
Address

TO THE PERSONS NAMED ABOVE: You should have received this Form and the following documents:

(1) The application to Plug and Abandon a Well on Form WW-4B, which sets out the parties involved in the work and describes the well its and the plugging work order; and
(2) The plat (surveyor's map) showing the well location on Form WW-6.

The reason you received these documents is that you have rights regarding the application which are summarized in the instructions on the reverses side. However, you are not required to take any action at all.

Take notice that under Chapter 22-6 of the West Virginia Code, the undersigned well operator proposes to file or has filed the Notice and Application and accompanying documents for a permit to plug and abandon a well with the Chief of the Office of Oil and Gas, West Virginia Department of Environmental Protection, with respect to the well at the location described on the attached Application and depicted on the attached Form WW-6. Copies of the Notice, the Application, and the plat have been mailed by registered or certified mail or delivered by hand to the person(s) named above (or by publication in certain circumstances) on or before the day of mailing or delivery to the Chief.

Received
APR 27 2016
Office of Oil and Gas
WV Dept. of Environmental Protection

Official Seal Notary Public
State of West Virginia
Phyllis A. Copley
144 Willard Circle Hurricane, WV 25526
My Commission Expires
September 16, 2018

Well Operator: Chesapeake Appalachia, L.L.C.
By:
Its: Manager - Operations, Appalachia South
Address: P.O. Box 18496
Oklahoma City, OK 73154-0496
Telephone: 405-935-4073

Subscribed and sworn before me this 25th day of April the year of 2015
Phyllis A. Copley Notary Public
My Commission Expires September 16, 2018
Form WW-9

2300005 P

Rev. 02/01

API Number 47-023-00005
Operator's Well No. 821124

STATE OF WEST VIRGINIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION, OFFICE OF OIL AND GAS
CONSTRUCTION AND RECLAMATION PLAN AND SITE REGISTRATION APPLICATION FORM
GENERAL PERMIT FOR OIL AND GAS PIT WASTE DISCHARGE

Operator Name Chesapeake Appalachia, L.L.C. OP Code 494477557

Watershed Laurel Run of Jordan Run Quadrangle Blackbird Knob, WV 7.5'

Elevation 2,897' County Grant District Union

Description of anticipated Pit Waste: Plugging Returns/Cement

Will a synthetic liner be used in the pit? Yes

Proposed Disposal Method For Treated Pit Wastes:

X ~~Land Application~~ No Land Application
____ Underground Injection (UIC Permit Number_____)
____ Reuse (at API Number_____)
____ Off Site Disposal (Supply form WW-9 for disposal location)
X Other (Explain Company will haul fluids to their tank batteries)

TPW

Proposed Work For Which Pit Will Be Used:

____ Drilling
____ Workover
____ Swabbing
X Plugging
____ Other (Explain_____)

I certify that I understand and agree to the terms and conditions of the GENERAL WATER POLLUTION PERMIT issued on December 31, 1999, by the Office of Oil and Gas of the West Virginia Department of Environmental Protection. I understand that the provisions of the permit are enforceable by law. Violations of any term or condition of the general permit and/or other applicable law or regulation can lead to enforcement action.

I certify under penalty of law that I have personally examined and am familiar with the information submitted on this application form and all attachments thereto and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine or imprisonment.

Received
APR 27 2016
Office of Oil and Gas
WV Dept. of Environmental Protection

Company Official Signature

Company Official (Typed Name) David Gocke

Company Official Title Manager - Operations, Appalachia South

Subscribed and sworn before me this 25th day of April, 2015.

Phyllis A. Copley Notary Public.

My Commission Expires September 16, 2018

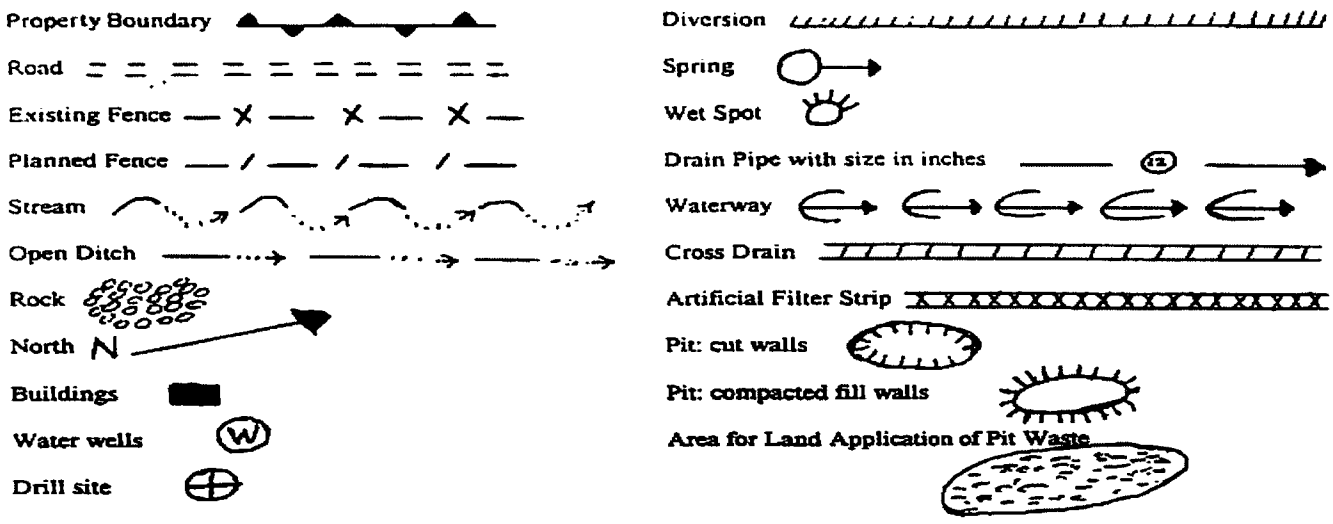
Official Seal Notary Public
State of West Virginia
Phyllis A. Copley
144 Willard Circle Hurricane, WV 25526
My Commission Expires
September 16, 2018

2300005 P

Attachment #1

API #: 47-023-00005
Operator's Well No. 821124

LEGEND



Timothy - 7 lbs./acre
Kentucky Bluegrass - 7 lbs./acre
Winter Wheat (June 15-Nov. 15) or Spring Wheat (Feb. 15-June 15) - 12 lbs./acre
Annual Rye (June 15-Nov. 15) or Oats (Feb. 15-June 15) - 14 lbs/acre
Alfalfa (pre inoculated) - 10 lbs./acre
Durana Clover (pre inoculated) - 3 lbs./acre
Mammoth Red Clover (pre inoculated) - 5 lbs./acre
Chicory - 2 lbs./acre

Total Seeding wil be 60 lbs./acre

Mulch - Weed free straw at 1500 lbs./acre
Fertilizer - 10-20-10 at 500 lbs./acre
Lime - Agriculatural lime or lime pellets at 3 tons/acre

Received
APR 27 2016
Office of Oil and Gas
WV Dept. of Environmental Protection

Attach:
Drawing(s) of road, location, pit and proposed area for land application.

Photocopied section of involved 7.5' topographic sheet.

Plan Approved by: _____

Title: _____

Date: _____

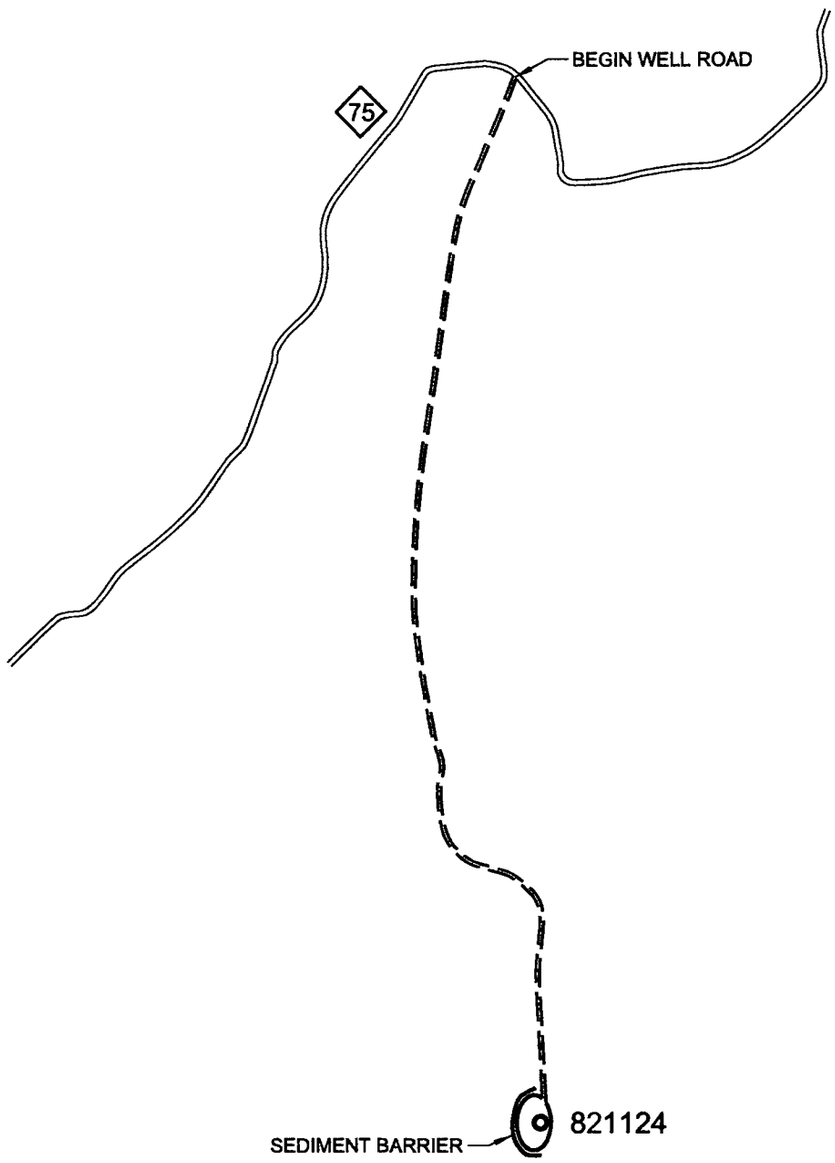
Field Reviewed? (_____) Yes (_____) No

2300005P

CHESAPEAKE APPALACHIA, L.L.C.

RECLAMATION DIAGRAM
WELL LOCATION 821124

API 47-023-00005



Received
APR 27 2016
Office of Oil and Gas
WV Dept. of Environmental Protection

GENERAL NOTES

This drawing is a schematic representation of the well site and access road. Proposed structures such as well site, drilling pit , roadways, culverts, sediment barriers, etc. are show in approximate pre-planning configurations.

All culvert pipes will be a minimum of 15 inches in diameter. all culvert pipes installed will be accomanied by an entrance sump with dimensions no less than 3 feet (width) x 3 feet (length) x 4 feet (deep). Culverts will be installed at an angle to ensure proper flow. The out fall of culverts will be protected from erosion and sedimentation using large roacks of other sediment controls deemed necessary in the prevention of erosion and sedimentation. Storm water from the ditches to the culverts will be directed to stable natural vegetative areas. Where culverts are not practical, operator will have other sediment control in place to minimize erosion sedimentation.

Cross drains, broad based dips, water bars, and diversion ditches, will be employed during the construction phase. These erosion and sediment control structures will be used to control erosion and sedimentation during the contruction phase, where applicable, and in areas that will allow. These structures will be considered permanent and used as such.

Permanent seeding: See Attachment #1.

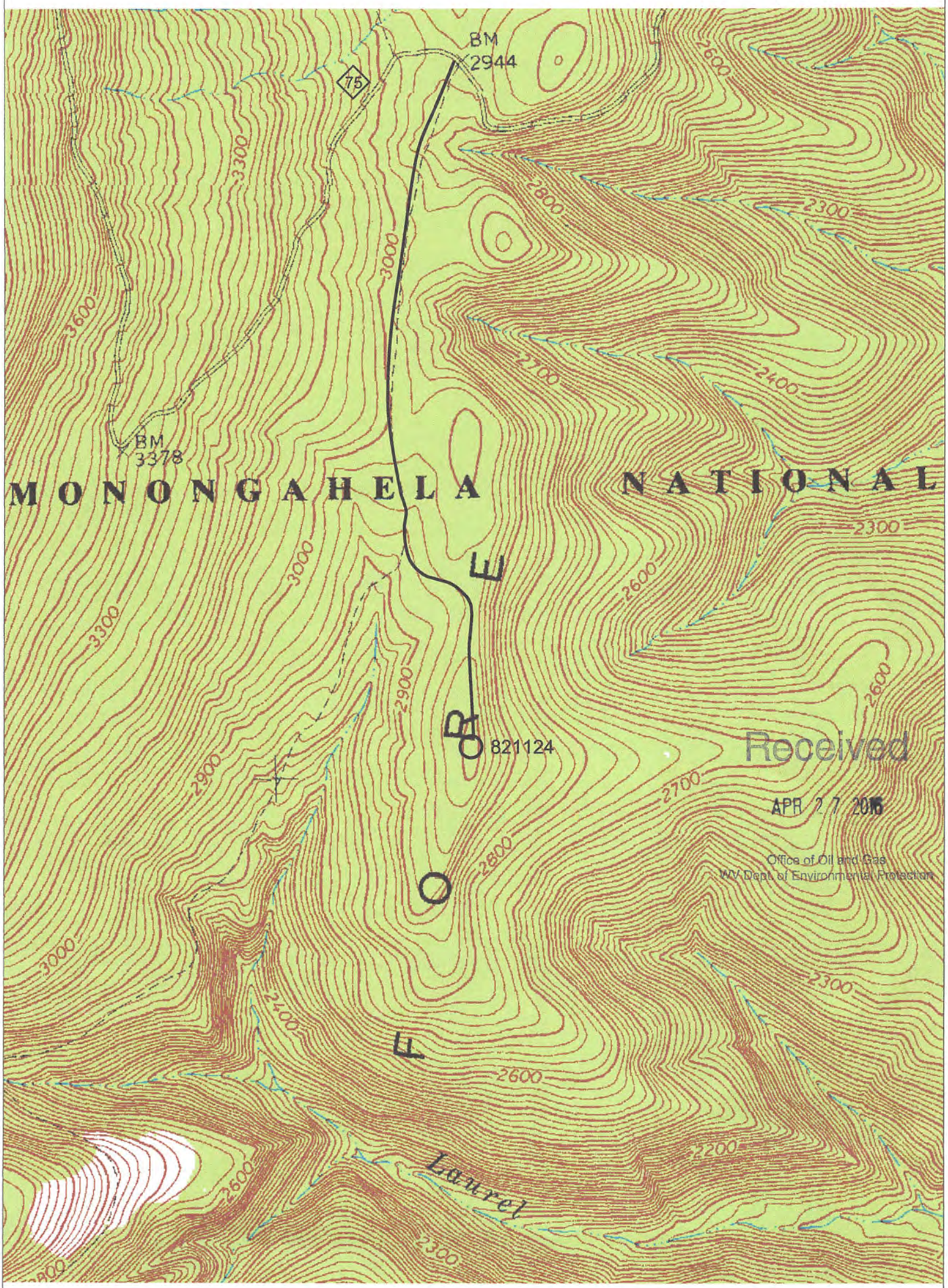
CHESAPEAKE ENERGY CORPORATION - EASTERN DIVISION
P.O. BOX 579 - 8165 COURT AVENUE - HAMLIN, WV 25523
304 824-5141 - FAX 304 824-2247

2300005P

CHESAPEAKE APPALACHIA, L.L.C.

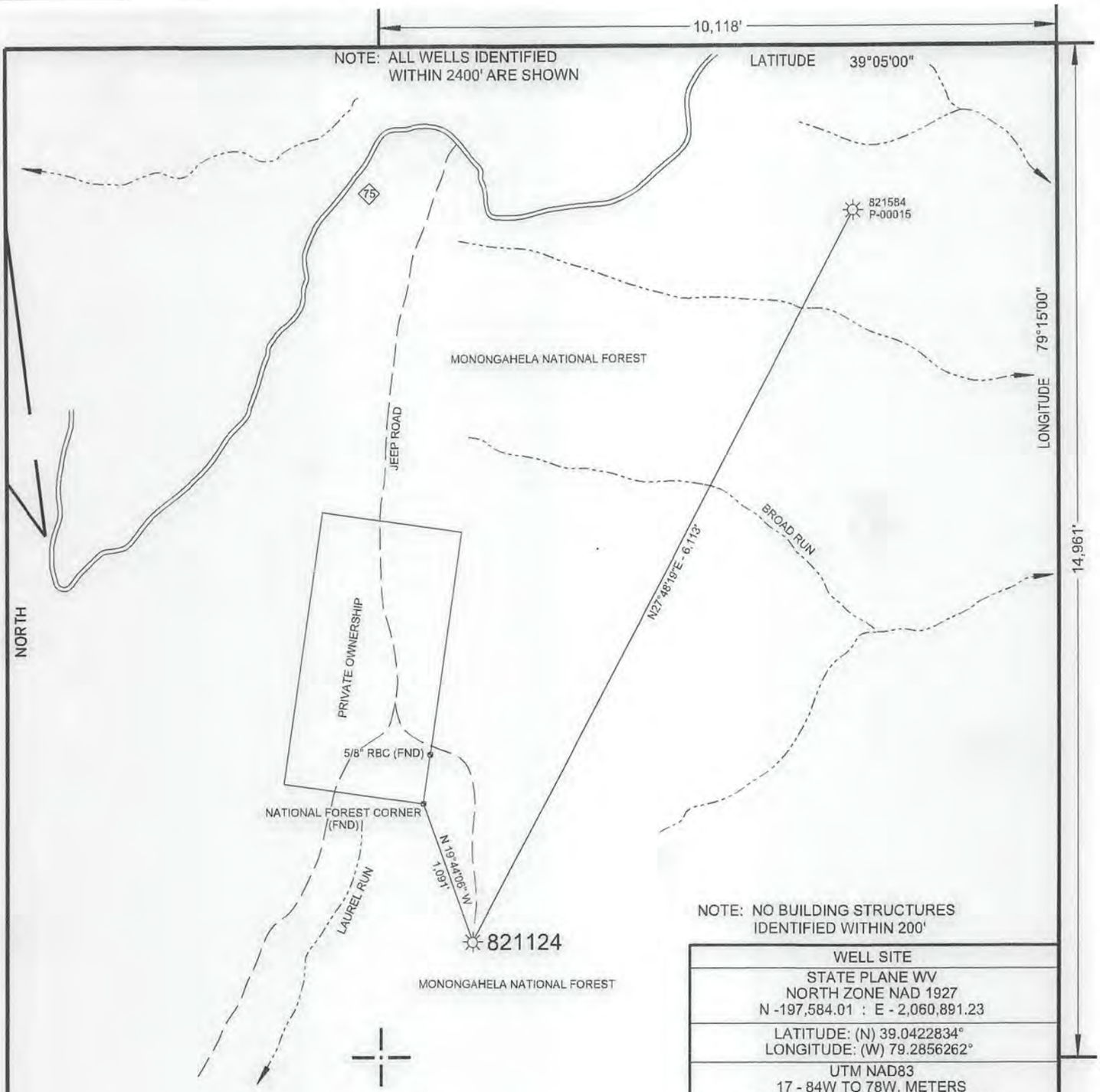
TOPOGRAPHICAL MAP OF ACCESS AND WELL LOCATION 821124

API 47-023-00005



Received
APR 27 2016
Office of Oil and Gas
WV Dept. of Environmental Protection

CHESAPEAKE ENERGY CORPORATION - EASTERN DIVISION
P.O. BOX 579 - 8165 COURT AVENUE - HAMLIN, WV 25523
304 824-5141 - FAX 304 824-2247



WELL SITE
STATE PLANE WV NORTH ZONE NAD 1927 N -197,584.01 : E - 2,060,891.23
LATITUDE: (N) 39.0422834° LONGITUDE: (W) 79.2856262°
UTM NAD83 17 - 84W TO 78W, METERS N - 4,322,879.735: E - 648,387.014

(+) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS

FILE NO. CA 821124 P&A.DGN
DRAWING NO. CA 821124 P&A
SCALE 1" = 1000'
MINIMUM DEGREE OF ACCURACY 1 : 200
PROVEN SOURCE OF ELEVATION MAPPING GRADE GPS

I THE UNDERSIGNED, HEREBY CERTIFY THAT THIS PLAT IS CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF AND SHOWS ALL THE INFORMATION REQUIRED BY LAW AND THE REGULATIONS ISSUED AND PRESCRIBED BY THE DEPARTMENT OF ENVIRONMENTAL PROTECTION.
(SIGNED) Paul E. Miller
R.P.E. _____ L.L.S. 647

PAUL E. MILLER LICENSED No. 647 STATE OF WEST VIRGINIA PROFESSIONAL SURVEYOR

STATE OF WEST VIRGINIA
DIVISION OF ENVIRONMENTAL PROTECTION
OIL AND GAS DIVISION

DATE NOVEMBER 16, 20 15
OPERATOR'S WELL NO. 821124
API WELL NO.
47 (STATE) 023 (COUNTY) 00005 P (PERMIT)

WELL TYPE: OIL ___ GAS X LIQUID INJECTION ___ WASTE DISPOSAL ___
(IF "GAS,") PRODUCTION ___ STORAGE ___ DEEP ___ SHALLOW X
LOCATION: ELEVATION 2,897' WATER SHED LAUREL RUN OF JORDAN RUN
DISTRICT UNION COUNTY GRANT
QUADRANGLE BLACKBIRD KNOB, WV 7.5'
SURFACE OWNER UNITED STATES OF AMERICA ACREAGE --
OIL & GAS ROYALTY OWNER US BUREAU OF LAND MANAGEMENT LEASE ACREAGE --
LEASE NO. --------
PROPOSED WORK: DRILL ___ CONVERT ___ DRILL DEEPER ___ REDRILL ___ FRACTURE OR STIMULATE ___ PLUG OFF OLD FORMATION ___ PERFORATE NEW FORMATION ___ OTHER PHYSICAL CHANGE IN WELL (SPECIFY) ___
PLUG AND ABANDON X CLEAN OUT AND REPLUG ___
TARGET FORMATION ___ ESTIMATED DEPTH ___
WELL OPERATOR CHESAPEAKE APPALACHIA, L.L.C. DESIGNATED AGENT JESSICA GREATHOUSE
ADDRESS P.O. BOX 18496, OKLAHOMA CITY, OK 73154-0496 ADDRESS CHESAPEAKE APPLACHIA, L.L.C. PO BOX 6070, CHARLESTON, WV 25362

COUNTY NAME
PERMIT

FORM WW-6