



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

October 20, 2015

WELL WORK PLUGGING PERMIT

Plugging

This permit, API Well Number: 47-700142, issued to EQT PRODUCTION COMPANY, 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 penalties 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: 7836
Farm Name: BOGGS, E. L.
API Well Number: 47-700142
Permit Type: Plugging
Date Issued: 10/20/2015

Promoting a healthy environment.

10/23/2015

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.

Form WW-4 (B)
Permit Copy
(Rev 2/01)

Date: September 21, 2015
Operator's Well
Well No. 607836 (E. L. Boggs, et al. #10)
API Well No.: 47 007 - 00142

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

Ch # 19879
\$100.00

APPLICATION FOR A PERMIT TO PLUG AND ABANDON

4) Well Type: Oil Gas X Liquid Injection Waste Disposal:
If Gas, Production X Or Underground storage Deep Shallow X

5) Elevation: 1078 ft. ~~-328 ft.~~ Watershed: Duck Creek
Location: Birch County: Braxton Quadrangle: Strange Creek
District:

6) Well Operator EQT Production Company
120 Professional Place
Address: Bridgeport, WV 26330

7) Designated Agent: Rex C. Ray
Address: 120 Professional Place
Bridgeport, WV 26330

8) Oil & Gas Danny Mullins
Name: 124 Big Trace Fork
Address: Harts, WV 25524

9) Plugging Contractor:
Name: HydroCarbon Well Service
Address: PO BOX 995
Buckhannon, WV 26201

10) Work Order: The work order for the manner of plugging this well is as follows:
See Attachment for details and procedures.

OFFICE USE ONLY

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

Work order approved by inspector _____

Date _____

RECEIVED
Office of Oil and Gas

SEP 23 2015

WV Department of
Environment **10/23/2015**

PLUGGING PROGNOSIS

Boggs et al 10 (607836)

Braxton Co, WV
 API # 47-007- 00142
 District: Birch

BY: Craig Duckworth
 DATE: 8/18/15

CURRENT STATUS:

8 1/4" csg @ 593'
 6 5/8" csg @ 1812'
 3" tbg @ 2018' (Packer @1927')

TD @ 2018'

Fresh Water @ 182' & 446' **Salt Water @ None reported**
Coal @ 446'-448'
Gas shows @ Rosedale Sand 1450'-1495', Big Injun 1960' & 1978'-1986'
Oil Shows @ None Reported
Stimulation: Shot 1976'-1985'
Elevation: 1089'

1. Notify State Inspector, **Danny Mullins 304-932-6844**, 24 hrs. Prior to commencing operations.
2. Attempt to pull 3" tbg if unable to pull cut 3" tbg off at packer @ 1927' TOOH w/3" tbg
3. Set a 100' C1A Cement Plug 50' In/Out of cut. Perf all FW, Coal, Oil and Gas shows below 3" cut. Do not omit any plugs
4. TIH w/ tbg @ 1927'; Set 200' C1A Cement Plug @ 1927' to 1727' (3" csg cut @ ^{1927'}1483' & 6 5/8" @ 1812', Big Injun @ 1960' & 1978'-1986')
5. Set a 100' C1A Cement Plug 50' In/Out of cut. Perf all FW, Coal, Oil and Gas shows below 6 5/8" cut. Do not omit any plugs
6. TIH w/ tbg @ 1727'; gel hole @ 1727' to 1550'.
7. TOOH w/ tbg @ 1550'; Set 150' C1A Cement Plug @ 1550' to 1400' (Rosedale Sand @ 1450'-1495')
8. TOOH w/ tbg @ 1400'; gel hole @ 1400' to 1100'.
9. TOOH w/ tbg @ 1100'; Set 150' C1A Cement Plug @ 1100' to 1000' (Elevation @ 1089')
10. TOOH w/ tbg @ 1000'; gel hole @ 1000' to 650'.
11. TOOH w/ tbg @ 650'; Set 250' C1A Cement Plug @ 650' to 400' (8 1/4" @ 593' & Coal @ 446'-448')
 TOOH w/ 8 1/4" csg
12. Set a 100' C1A Cement Plug 50' In/Out of cut. Perf all FW, Coal, Oil and Gas shows below 8 1/4" cut. Do not omit any plugs
13. TIH w/ tbg @ 500'; gel hole @ 500' to 230'
14. TOOH w/ tbg @ 230'; Set 230' C1A Cement Plug @ 200' to 0 (Surface & Fresh Water @ 182')
15. Top off as needed
16. Set Monument to WV-DEP Specifications
17. Reclaim Location & Road to WV-DEP Specifications

RECEIVED
 Office of Oil and Gas

SEP 23 2015

WV Department of
 Environmental Protection

10/23/2015

DEPARTMENT OF MINES
OIL AND GAS DIVISION

WELL RECORD

Permit No. BRAY-142 Oil or Gas Well Gas

Company Pittsburgh & West Va Gas Company.
 Address Clarksburg, West Va.,
 Farm Ed. L. Boggs et al. Acres 1060
 Location (waters) Wass. S/W. 1-4
 Well No. 7836 Elev 1089'
 District Birch County Braxton
 The surface of tract is owned in fee by Bernie Sirk
 Address Duck, West Va.,
 Mineral rights are owned by Ed. L. Boggs
 Address Big Otter, West Va.
 Drilling commenced June 17, 1941.
 Drilling completed July 31, 1941.
 Date shot 8-4-1941 Depth of shot 1976-1985'
 Open Flow /10ths Water in _____ Inch
19 /10ths Merc. in. 1-1/2" Inch
 Volume 331,000 Cu. Ft.
 Rock Pressure 412 lbs 24 hrs.
 Oil _____ bbls., 1st 24 hrs.
 Fresh water _____ feet _____ feet
 Salt water _____ feet _____ feet

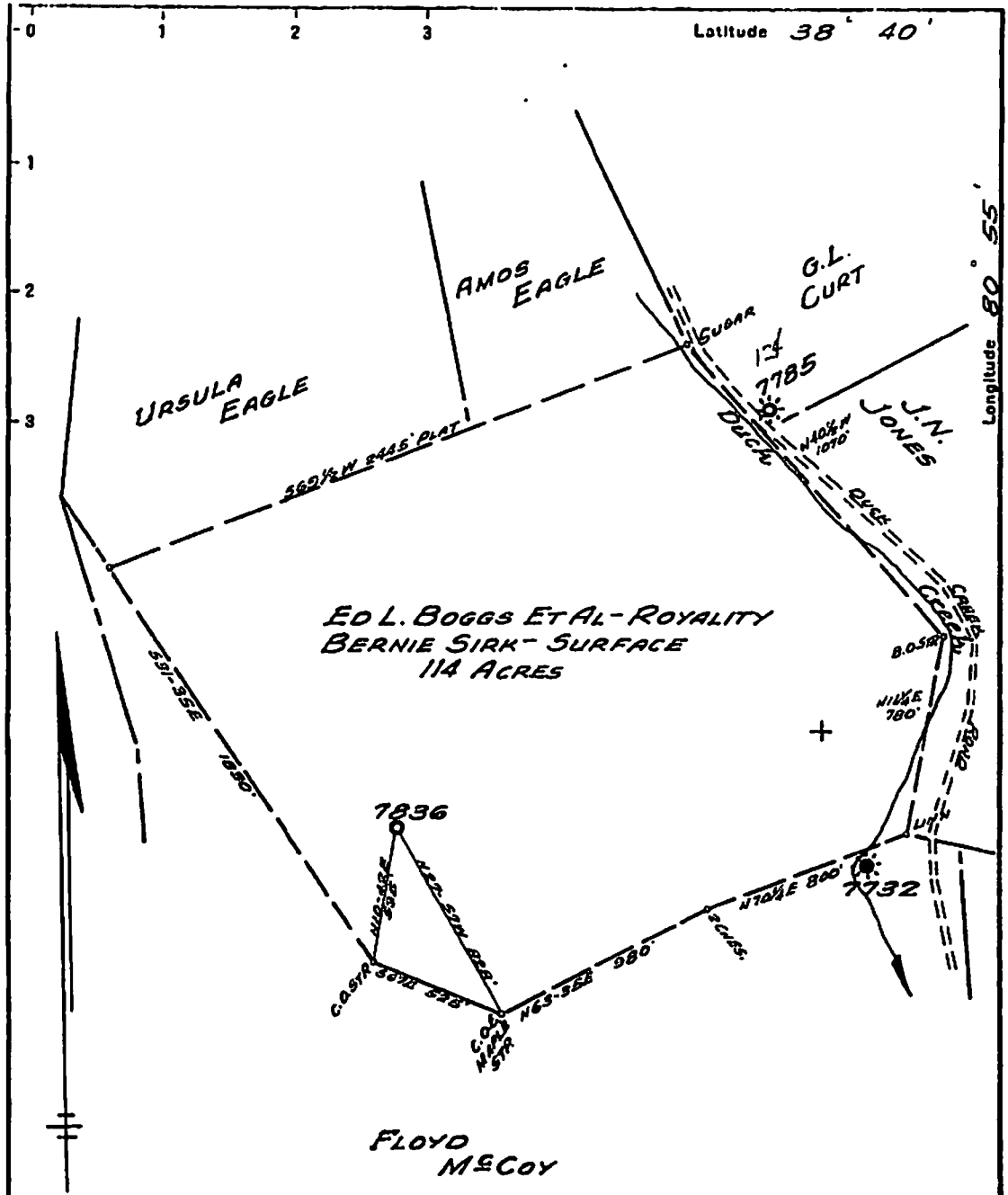
Casing and Tubing	Used in Drilling	Left in Well	Packers
Size			
16.			Kind of Packer.....
18.			Hook ball
10.			Size of <u>6-5/8" X</u>
8 1/2.	<u>593'</u>	<u>593'</u>	Depth set <u>1927'</u>
6 1/2.	<u>1812'</u>	<u>1812'</u>	
5 3/16.			
3.	<u>2018'</u>	<u>2018'</u>	Perf. top. <u>1974'</u>
2.			Perf. bottom. <u>1998'</u>
Liners Used.....			Perf. top.....
			Perf. bottom.....

CASING CEMENTED _____ SIZE _____ No. Ft. _____ Dat _____
 COAL WAS ENCOUNTERED AT 446 FEET 24 INCH
 _____ FEET _____ INCHES _____ FEET _____ INCH
 _____ FEET _____ INCHES _____ FEET _____ INCH

Formation	Color	Hard or Soft	Top	Bottom	Oil, Gas or Water	Depth Found	Remarks
Red Rock	Red	Soft	0	40			
Slate	Black	"	40	65			
Lime	White	Hard	65	82			
Slate	Dark	Hard&Soft	82	164			
Sand-Freeport	White	Hard	164	261	Water	182'	1 Bailer Hr.
Lime	"	"	261	357			
East Lynn Sand	"	Soft	357	392			
Slate	Black	"	392	400			
East Lynn	White	"	400	440			
Slate	Dark	"	440	446			
Coal	Black	"	446	448	Water	446'	4 Bailer Hr.
Slate	"	"	448	465			
Sand	White	Hard	465	514			
Slate-Shells	Dark	Soft	514	520			
Lime	White	Hard	520	550			
Slate	Shells	Soft	550	594			
Homewood Sand	White	"	594	719			
Slate&Shells	Dark	Hard&Soft	719	975			
Sand	White	Hard	975	1016			
Lime	"	"	1016	1040			
Gas Sand	"	"	1040	1091			
Slate&Shells	Dark	Soft&Hard	1091	1250			
Salt Sand	"	Hard&Soft	1250	1285			
Slate Shells	"	"	1285	1353			
Rosedale Gas Sand-Dark	Hard	"	1353	1387			
Slate&Shells	Hard&Soft	"	1387	1437			
Rosedale Sand	Dark	Hard	1437	1716	Sh. Gas	1450-1495'	
Slate	White	Soft	1716	1735			
Lime	Black	Hard	1735	1782			S.L. 1751'
Slate	Dark	Soft	1782	1789			
Blue Monday	Blue	Hard	1789	1792			
Slate	Black	Soft	1792	1812			
Big Lime	Dark	Hard	1812	1875			
Big Injun Sand	Gray	"	1875	2013	Sh. Gas	1960'	
Red Rock	Red	Soft	2013	2018	Gas	1978-86'	12/10 Water 1-1/2" Opng.
Total Depth							

AUG 1941

OFFICE OF THE SUPERVISOR OF GAS
SEP 23 2015



New Location...
 Drill Deeper.....
 Abandonment.....

7761

Company PITTSBURGH & W.VA. GAS CO.
 Address CLARKSBURG, W.VA.
 Farm ED L. BOGGS ET AL
 Tract _____ Acres 1060 Lease No. 2239B
 Well (Farm) No. TEN Serial No. 7836
 Elevation (Spirit Level) 1089' KA.
 Quadrangle GASSAWAY S. W. 2 1/2
 County BRAXTON District BIRCH
 Engineer Jamund J. Jeffries
 Engineer's Registration No. 1084
 File No. V-89 P. 145 Drawing No. _____
 Date APRIL 24, 1941 Scale 1" = 500'

STATE OF WEST VIRGINIA
 DEPARTMENT OF MINES
 OIL AND GAS DIVISION
 CHARLESTON

WELL LOCATION MAP
 FILE NO. BRAX-142

+ Denotes location of well on United States Topographic Maps, scale 1 to 62,500, latitude and longitude lines being represented by border lines as shown.

- Denotes one inch spaces on border line of original tracing.

RECEIVED
 Oil and Gas
 SEP 23 2015

700142P

WW-4-A
Revised 6/07

1) Date: September 21, 2015
2) Operator's Well Number
607836 (E. L. Boggs, et al. #10)
3) API Well No.: 47 007 - 00142
State County Permit

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

4) Surface Owner(s) to be served:
(a) Name Judith E. Gray
Address P. O. Box 85
Duck, WV 25063

(b) Name _____
Address _____

(c) Name _____
Address _____

6) Inspector Danny Mullins
Address 124 Big Trace Fork
Harts, WV 25524
Telephone (304) 932-6844

5) (a) Coal Operator:
Name None
Address _____

(b) Coal Owner(s) with Declaration
Name Wolfpen Know Development Co.
1000 Consol Energy Drive
Address Cannonsburg, PA 15317

Name _____
Address _____

(c) Coal Lessee with Declaration
Name None
Address _____

Name _____
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 this 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 Division 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 this 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.



Well Operator:
EQT Production Company
Victoria J. Roark
Permitting Supervisor
PO Box 280
Bridgeport, WV 26330
(304) 848-0076
Telephone: _____

Victoria J. Roark
Permitting Supervisor
PO Box 280
Bridgeport, WV 26330
(304) 848-0076

Subscribed and sworn before me this 22nd day of September, 2015
Misty S. Christie Notary Public
My Commission Expires: 2/20/18

The Office of Oil & Gas processes your personal information, such as name, address and phone number, as part of our regulatory duties. Your personal information may be disclosed to other State agencies or third parties in the normal course of business or as needed to comply with statutory or regulatory requirements, including Freedom of Information Act requests. Our office will appropriately secure your personal information. If you have any questions about our use of your personal information, please contact DEP's Chief Privacy Officer at depprivacyofficer@wv.gov.

RECEIVED
Office of Oil and Gas
10/23/2015
WV Department of Environmental Protection

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

Operator Name: EQT PRODUCTION COMPANY OP ID: _____
Watershed: Duck Creek Quadrangle: Strange Creek
Elevation: 328 ft County: Braxton District: Birch

Description of anticipated Pit Waste: Formation Fluids

Do you anticipate using more than 5,000 bbls of water to complete the proposed well work? Yes ___ No X

Will synthetic liner be used in the pit? Yes Is so, what ml.? 40 ml - 20 ml
TRW

Proposed Disposal Method for Treated Pit Wastes:

- Land Application
- Underground Injection - UIC Permit Number _____
- Reuse (at API Number) _____
- Offsite Disposal Permit #. _____
- Other: Explain _____

Drilling medium anticipated for this well? Air, freshwater, oil based, etc. _____
If oil based, what type? Synthetic, petroleum, etc. _____

Additives to be used? _____

Will closed loop system be used? _____

Drill Cuttings disposal method? Leave in pit, landfill, remove offsite, etc. _____
If left in pit and plan to solidify what medium will be used? Cement, Lime, sawdust _____
Landfill or offsite name/permit number? _____

I certify that I understand and agree to the terms and conditions of the GENERAL WATER POLLUTION PERMIT issued on August 1, 2005, by the Office of Oil and Gas of the West Virginia Division of Environmental Protection. I understand that the provisions of the permit are enforceable by law. Violations of any terms 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.

Company Official Signature *Victoria Roark*

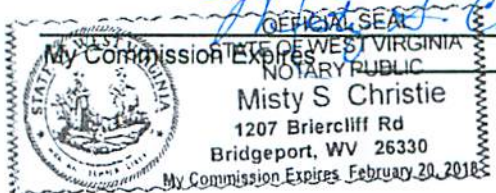
Company Official (Typed or Printed) Victoria Roark

Company Official Title Permitting Supervisor-WV

Subscribed and sworn before me this 20th day of September 2015

RECEIVED
Office of Oil and Gas

SEP 23 2015

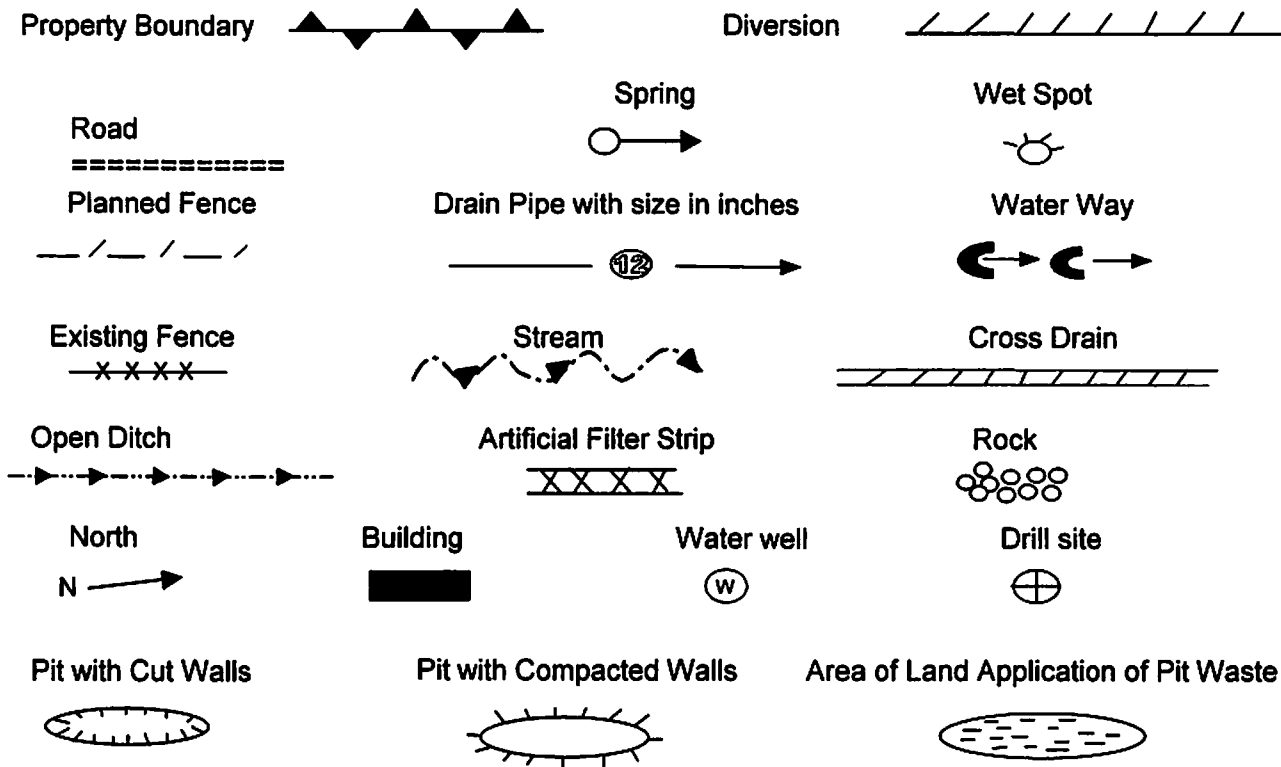


Misty S. Christie Notary Public

WV Department of Environmental Protection
10/23/2015

OPERATOR'S WELL NO.:
607836 (E. L. Boggs, et al. #10)

LEGEND



Proposed Revegetation Treatment: Acres Disturbed: 1± Prevegetation pH

Lime 3 Tons/acre or to correct to pH 6.5

Fertilizer (10-20-20) or equivalent 1/3 ton lbs/acre (500 lbs minimum)

Mulch 2 Tons/acre or hydroseed.

SEED MIXTURES

Area I		Area II	
Seed Type	lbs/acre	Seed Type	lbs/acre
Red Fescue	40	Red Fescue	15
Alsike Clover	5	Alsike Clover	5
Annual Rye	15		

ATTACH:

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

Photocopies section of involved 7.5' topographic sheet.

Plan approved by: _____

Comments: _____

Title: _____

Date: _____

Field Reviewed? Yes No

RECEIVED
 Office of Oil and Gas

SEP 23 2015

10/23/2015
 WV Dept of Environmental Protection

Topo Quad: Strange Creek 7.5'

Scale: 1" = 2000'

County: Braxton

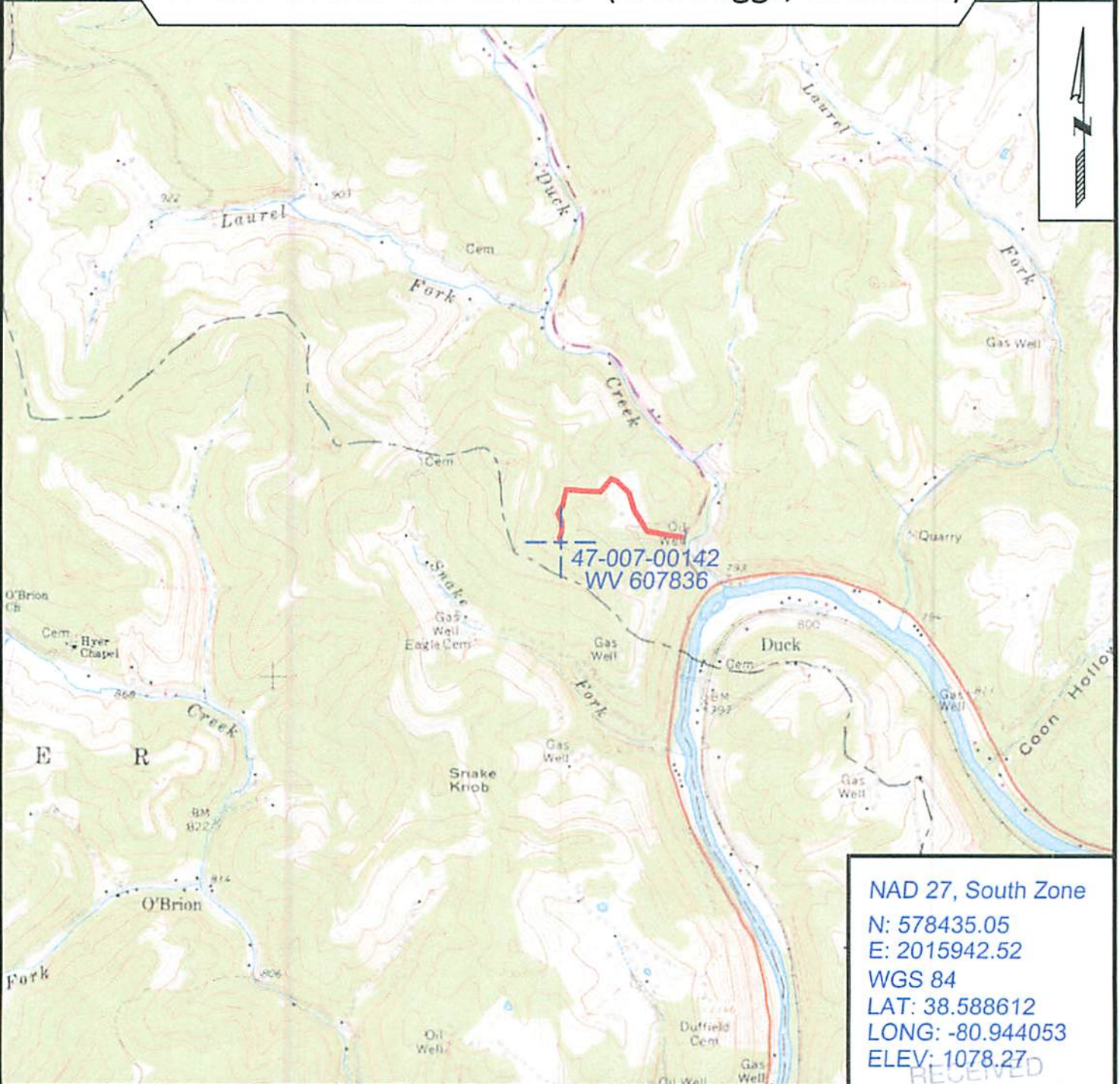
Date: August 26, 2015

District: Birch

Project No: 40-02-00-07

47-007-00142 WV 607836 (E. L. Boggs, et al. #10)

Topo



NAD 27, South Zone
 N: 578435.05
 E: 2015942.52
 WGS 84
 LAT: 38.588612
 LONG: -80.944053
 ELEV: 1078.27



SURVEYING AND MAPPING SERVICES PERFORMED BY:
ALLEGHENY SURVEYS, INC.
 1-800-482-8606
 237 Birch River Road
 Birch River, WV 26610
 PH: (304) 649-8606
 FAX: (304) 649-8608

PREPARED FOR:
 Office of Oil and Gas
EQT Production Company
 P.O. Box 280
 Bridgeport, WV 26330

RECEIVED
 WV Department of
 Environment
 10/23/2015

WW-7
8-30-06



West Virginia Department of Environmental Protection
Office of Oil and Gas
WELL LOCATION FORM: GPS

API: 47-007-00142 WELL NO.: WV 607836 (E. L. Boggs, et al. #10)

FARM NAME: E. L. Boggs

RESPONSIBLE PARTY NAME: EQT Production Company

COUNTY: Braxton DISTRICT: Birch

QUADRANGLE: Strange Creek 7.5'

SURFACE OWNER: Judith E. Gray

ROYALTY OWNER: Mike Ross, Inc., et al.

UTM GPS NORTHING: 4271127

UTM GPS EASTING: 504873 GPS ELEVATION: 328 m (1078 ft)

The Responsible Party named above has chosen to submit GPS coordinates in lieu of preparing a new well location plat for a plugging permit or assigned API number on the above well. The Office of Oil and Gas will not accept GPS coordinates that do not meet the following requirements:

- Datum: NAD 1983, Zone: 17 South, Coordinate Units: meters, Altitude: height above mean sea level (MSL) – meters.
- Accuracy to Datum – 3.05 meters
- Data Collection Method:
Survey grade GPS ; Post Processed Differential
Real-Time Differential
Mapping Grade GPS X; Post Processed Differential X
Real-Time Differential
- Letter size copy of the topography map showing the well location.**

I the undersigned, hereby certify this data 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 Office of Oil and Gas.

Shy O'Brien
Signature

PS #2180
Title

RECEIVED
Office of Oil and Gas
8/28/15 SEP 23 2015
Date



POTENTIAL WATER SAMPLE DATA SHEET

CLIENT: EQT PRODUCTION COMPANY
 LEASE NAME AND WELL No. E. L. Boggs, et al. #10 - WV 607836 - API No. 47-007-00142

POTENTIAL SAMPLE LOCATIONS

There appears to be no known water samples within the required 1000' of the existing well WV 607836.

BIRCH RIVER OFFICE

237 Birch River Road
 Birch River, WV 26610
phone: 304-649-8606
fax: 304-649-8608

BRIDGEPORT OFFICE

172 Thompson Drive
 Bridgeport, WV 26330
phone: 304-848-5035
fax: 304-848-5037

ALUM CREEK OFFICE

P.O. Box 108 • 1413 Childress Rd
 Alum Creek, WV 25003
phone: 304-756-2949
fax: 304-756-2948

RECEIVED
 Office of Oil and Gas
 RANSON OFFICE
 401 South Fairfax Blvd, Suite 3
 Ranson, WV 25058
phone: 304-724-5008
fax: 304-724-5010

700142P

Topo Quad: Strange Creek 7.5' Scale: 1" = 2000'

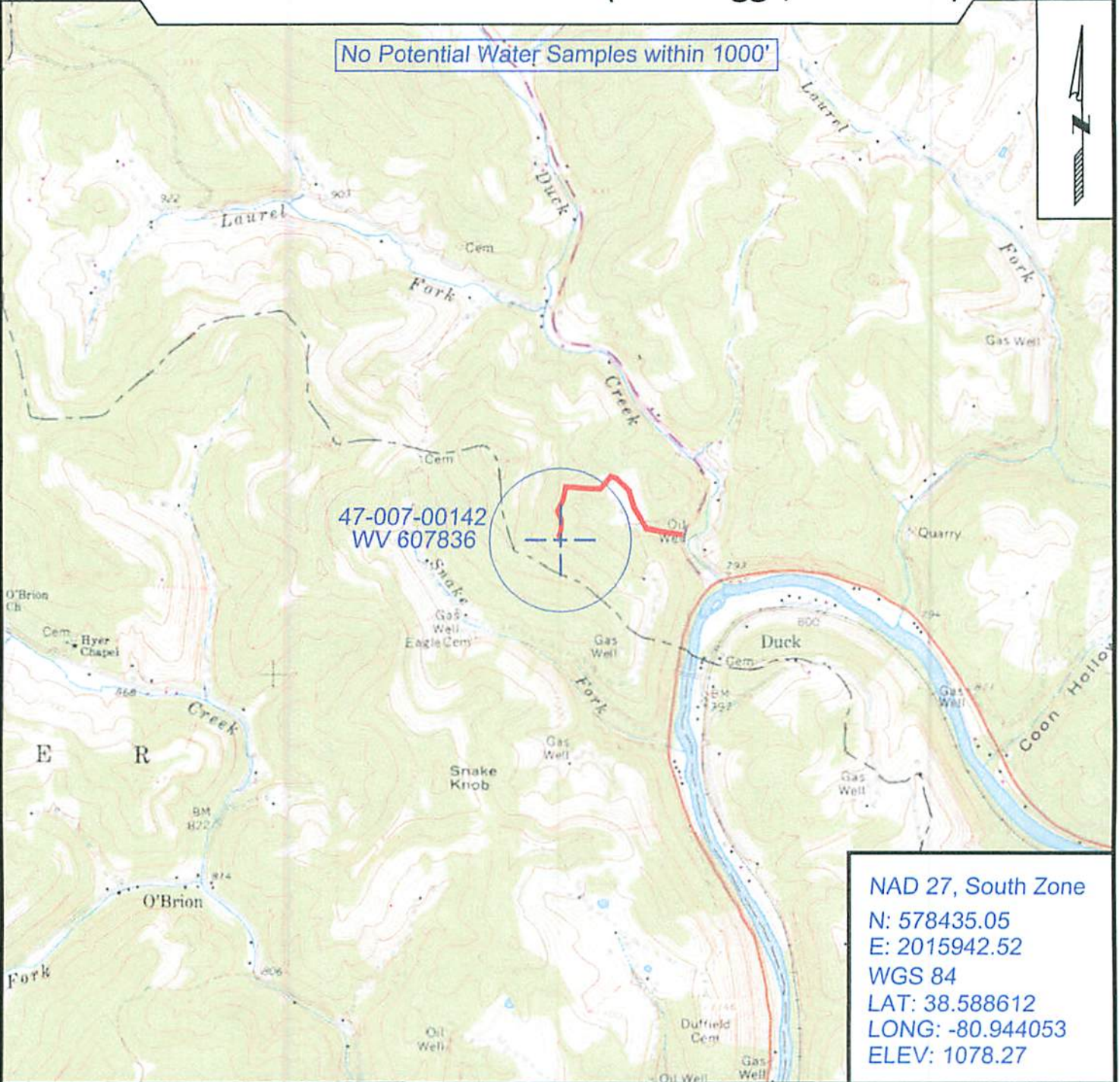
County: Braxton Date: August 26, 2015

District: Birch Project No: 40-02-00-07

Water

47-007-00142 WV 607836 (E. L. Boggs, et al. #10)

No Potential Water Samples within 1000'



47-007-00142
WV 607836

NAD 27, South Zone
 N: 578435.05
 E: 2015942.52
 WGS 84
 LAT: 38.588612
 LONG: -80.944053
 ELEV: 1078.27



SURVEYING AND MAPPING SERVICES PERFORMED BY:
ALLEGHENY SURVEYS, INC.
 1-800-482-8606
 237 Birch River Road
 Birch River, WV 26610
 PH: (304) 649-8606
 FAX: (304) 649-8608

PREPARED FOR:
EQT Production Company
 P.O. Box 280
 Bridgeport, WV 26330

RECEIVED
 Office of Oil and Gas
 10/23/2015
 WV Dept. of Environmental Protection