



 west virginia department of environmental protection

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

Austin Caperton, Cabinet Secretary
www.dep.wv.gov

Tuesday, September 18, 2018
 WELL WORK PLUGGING PERMIT
 Vertical Plugging

ROSS AND WHARTON GAS COMPANY, INC.
 RT. 5, BOX 29

BUCKHANNON, WV 262010000

Re: Permit approval for 2
 47-007-00827-00-00

This well work permit 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 any additional specific 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. Please be advised that form WR-38, Affidavit of Plugging and Filling Well, is to be submitted to this office within 90 days of completion of permitted well work, as should form WR-34 Discharge Monitoring Report within 30 days of discharge of pits, if applicable. Failure to abide by all statutory and regulatory provisions governing all duties and operations hereunder may result in suspension or revocation of this permit and, in addition, may result in civil and/or criminal penalties being imposed upon the operators.

Per 35 CSR 4-5.2.g this permit will expire in two (2) years from the issue date unless permitted well work is commenced. If there are any questions, please feel free to contact me at (304) 926- 0450.

James A. Martin
 Chief

Operator's Well Number: 2
 Farm Name: WILSON
 U.S. WELL NUMBER: 47-007-00827-00-00
 Vertical Plugging
 Date Issued: 9/18/2018

F

47-007-00827 f

09/21/2018

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.

1) Date July 26, 09/21/2018
 2) Operator's
 Well No. Wilson Lease
 3) API Well No. 47-007-00827

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 ___ /
 (If "Gas, Production ___ or Underground storage ___) Deep ___ / Shallow X

5) Location: Elevation 980' Watershed Cedar Creek
 District Otter County Braxton Quadrangle Burnsville

6) Well Operator Ross & Wharton Gas Co. Inc. 7) Designated Agent Mike Ross
 Address 354 Morton Ave. Address P.O. Box 219
Buckhannon, WV 26201 Coalton, WV 26257

8) Oil and Gas Inspector to be notified Name Danny Mullins 9) Plugging Contractor
 Address 220 Jack Acres Rd Name R & R Well Service
Buckhannon, WV 26201 Address 42 Lynch Ridge
Walton, WV 25286

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

Free point and recover casing's & tubular's

6% Gel between plug's

Set cement plug 1850' to TD (2025') Plug 100' above top perf

Set 100' cement plug across casing cut

Set 100' cement plug 1650' to 1750' (Lime, Blue Monday)

Set 100' cement plug 600' to 700' (salt bearing strata)

Set cement plug 181' to surface, (8" casing plug, freshwater protection plug and
 and surface plug) Tag plug's as necessary Set monument with API number

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

Work order approved by inspector



Date 8-6-18

Form OG-10



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

Rotary
Spudder
Cable Tools
Storage

Quadrangle Burnsville

WELL RECORD

Permit No. Brax-827

Oil or Gas Well Gas
(KIND)

Company White Shield Oil & Gas Corp.
Address P.O. 2139, Tulsa, Oklahoma 74101
Farm Wilson Acres 180
Location (waters) _____
Well No. Two Elev. 986 D.F.
District Otter County Braxton
The surface of tract is owned in fee by Okey and Lelah Shaver
Subject to the life Address estate of Ertha Wilson
Mineral rights are owned by Same Exchange W. Va.
Address _____
Drilling commenced 4-30-69
Drilling completed 6-6-69
Date Shot 5-21-69 From 1950 To 1984
With Total 14 Holes

Casing and Tubing	Used in Drilling	Left in Well	Packers
Size			Kind of Packerc
16			
13			Size of
10			Depth set
8 1/2	131		
6 3/4			
5 3/16			
4 1/2	2025		
3			Perf. top 1950
2			Perf. bottom 1984
Liners Used			Perf. top
			Perf. bottom

Open Flow /10ths Water in _____ Inch
/10ths Merc. in _____ Inch
Volume _____ Cu. Ft.
Rock Pressure _____ lbs. _____ hrs.
Oil _____ bbls. 1st 24 hrs.

Attach copy of cementing record.
CASING CEMENTED 4 1/2 SIZE 2025 No. Fr. 5-10-69 Date _____
Amount of cement used (bags) 250 SK.
Name of Service Co. Dowell
COAL WAS ENCOUNTERED AT _____ FEET _____ INCHES
_____ FEET _____ INCHES
_____ FEET _____ INCHES

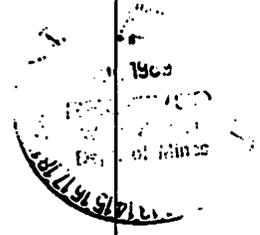
WELL ACIDIZED (DETAILS) _____

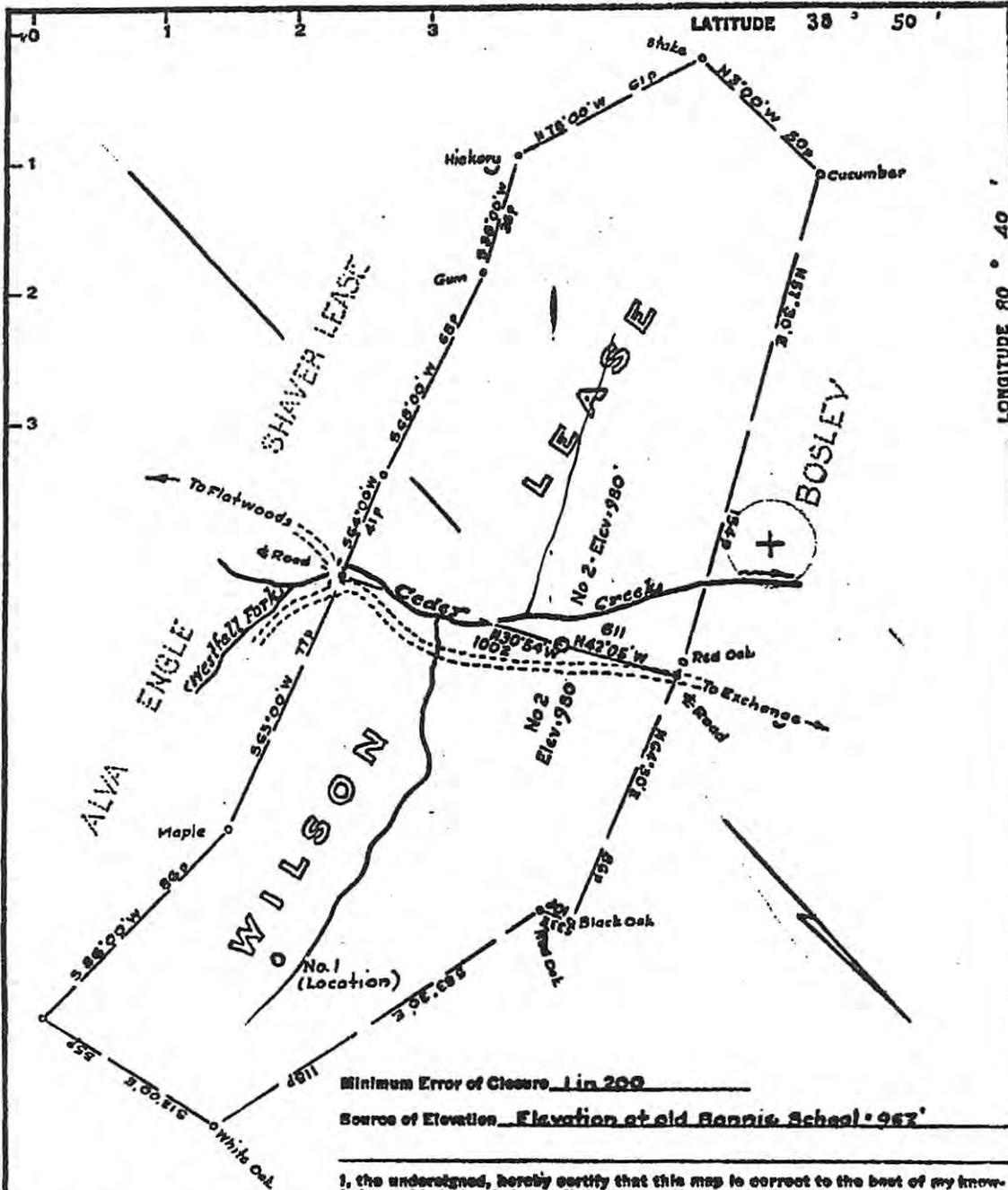
WELL FRACTURED (DETAILS) 2320 SW, 60,000 # 20/40 sd, 30,000 10/20 sd. BDP 1500# Avg. P.P. 1400#, Max P. 1600#, I.S.P. 800 # 15 Min. SIP 400#

RESULT AFTER TREATMENT (Initial open Flow or bbls.) 2.9 MMCFGPD 7.900 000
ROCK PRESSURE AFTER TREATMENT 650# HOURS 24 Hours
Fresh Water _____ Feet _____ Salt Water _____ Feet _____
Producing Sand. Big Injun Depth 1950-1984

Formation	Color	Hard or Soft	Top	Bottom	Oil, Gas or Water	Depth	Remarks
Sand and Shale			Surface	220'		PBTD 2018'	
Shale and Sand with Red Rock			220'	620'			
Shale and Sand			620'	988'			
Shale			988'	1148'			
Sand and Shale			1148'	1415'			
Shaley Sand and Lime			1415'	1714'			
Sand and Shale			1714'	1742'			
Lime			1742'	1992'			
Shale			1992'	2051'			
				TD			

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Minimum Error of Closure 1 in 200
 Source of Elevation Elevation at old Bonnie School = 967'

I, the undersigned, hereby certify that this map is correct to the best of my knowledge and belief and shows all the information required by paragraph 6 of the rules and regulations of the oil and gas section of the mining laws of West Virginia.

- Fracture
- New Location
- Drill Deeper
- Abandonment

Signed: [Signature]
 Squares: N E W

Company WHITE SHIELD OIL & GAS CORP
 Address P.O. Box 2139, Tulsa, Oklahoma
 Farm Wilson Lease
 Tract Acres 180 Lease No.
 Well (Farm) No. Two Serial No.
 Elevation (Spirit Level) 980
 Quadrangle Burnsville SW
 County Braxton District Ottar
 Engineer [Signature]
 Engineer's Registration No. 1227
 File No. Drawing No.
 Date April 17, 1969 Scale 1" = 400' = 800'

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

WELL LOCATION MAP
 FILE NO. BRAX-827

* 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.

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DM

47-007-00827P

09/21/2018

WW-4A
Revised 6-07

1) Date: July 26, 2018
2) Operator's Well Number
Wilson Lease
3) API Well No.: 47 - 007 - 00827

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

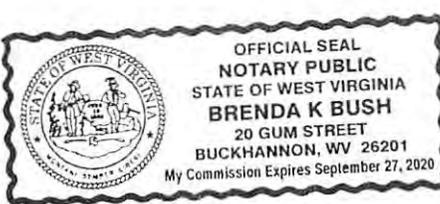
4) Surface Owner(s) to be served:	5) (a) Coal Operator
(a) Name <u>Wanda Bailey</u>	Name <u>N/A</u>
Address <u>3004 Cheverly Ave.</u>	Address _____
<u>Landover, MD 20785</u>	_____
(b) Name <u>Wavalene Wood et al.</u>	(b) Coal Owner(s) with Declaration
Address <u>3004 Cheverly Ave.</u>	Name <u>N/A</u>
<u>Landover, MD 20785</u>	Address _____
(c) Name _____	Name _____
Address _____	Address _____
6) Inspector <u>Danny Mullins</u>	(c) Coal Lessee with Declaration
Address <u>220 Jack Acres Rd</u>	Name <u>N/A</u>
<u>Buckhannon, WV 26201</u>	Address _____
Telephone <u>1-304-932-6844</u>	_____

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 reverse 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 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 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 Ross & Wharton Gas Co. Inc. (Mike Ross Inc.)
 By: Mike Ross
 Title: President
 Address 354 Morton Ave.
Buckhannon, WV 26201
 Telephone 1-304-472-4289

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WV Department of Environmental Protection

Subscribed and sworn before me this 7th day of August 2018
Brenda K Bush Notary Public
 My Commission Expires Sept 27, 2020

Oil and Gas Privacy Notice

The Office of Oil and Gas processes your personal information, such as name, address and phone number, as a 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.

WW-9
(5/16)

API Number 47 - 007 - 00827
Operator's Well No. _____

STATE OF WEST VIRGINIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION
OFFICE OF OIL AND GAS
FLUIDS/ CUTTINGS DISPOSAL & RECLAMATION PLAN

Operator Name Ross & Wharton Gas Co. Inc. OP Code 306580

Watershed (HUC 10) Cedar Creek Quadrangle Burnsville

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

Will a pit be used? Yes No

If so, please describe anticipated pit waste: _____

Will a synthetic liner be used in the pit? Yes No If so, what ml.? _____

Proposed Disposal Method For Treated Pit Wastes:

- Land Application (if selected provide a completed form WW-9-GPP)
- Underground Injection (UIC Permit Number _____)
- Reuse (at API Number _____)
- Off Site Disposal (Supply form WW-9 for disposal location)
- Other (Explain _____)

Will closed loop system be used? If so, describe: Tanks

Drilling medium anticipated for this well (vertical and horizontal)? Air, freshwater, oil based, etc. freshwater

-If oil based, what type? Synthetic, petroleum, etc. _____

Additives to be used in drilling medium? gel

Drill cuttings disposal method? Leave in pit, landfill, removed offsite, etc. N/A

-If left in pit and plan to solidify what medium will be used? (cement, lime, sawdust) _____

-Landfill or offsite name/permit number? _____

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Permittee shall provide written notice to the Office of Oil and Gas of any load of drill cuttings or associated waste rejected at any West Virginia solid waste facility. The notice shall be provided within 24 hours of rejection and the permittee shall also disclose where it was properly disposed.

I certify that I understand and agree to the terms and conditions of the GENERAL WATER POLLUTION PERMIT issued on April 1, 2016, 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.

Company Official Signature Mike Ross

Company Official (Typed Name) Mike Ross

Company Official Title President

Subscribed and sworn before me this 7th day of August, 2018

Brenda K Bush

My commission expires Sept 27, 2020



Operator's Well No. _____

Proposed Revegetation Treatment: Acres Disturbed 1 Prevegetation pH 6.5

Lime 2 Tons/acre or to correct to pH 6.5

Fertilizer type 10-20-20

Fertilizer amount as needed lbs/acre

Mulch Hay Tons/acre

Seed Mixtures

Temporary

Permanent

Seed Type lbs/acre

Seed Type lbs/acre

Fescue 30

Fescue 30

Contractors Mix

Contractors Mix

Attach:

Maps(s) of road, location, pit and proposed area for land application (unless engineered plans including this info have been provided). If water from the pit will be land applied, provide water volume, include dimensions (L, W, D) of the pit, and dimensions (L, W), and area in acres, of the land application area.

Photocopied section of involved 7.5' topographic sheet.

Plan Approved by: Danny Mulline

Comments: _____

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Title: OOG Inspector Date: 8-6-18

Field Reviewed? () Yes () No

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

Operator Name: Ross & Wharton Gas Co. Inc.

Watershed (HUC 10): Cedar Creek Quad: Burnsville

Farm Name: _____

- 1. List the procedures used for the treatment and discharge of fluids. Include a list of all operations that could contaminate the groundwater.

N/A

- 2. Describe procedures and equipment used to protect groundwater quality from the list of potential contaminant sources above.

N/A

- 3. List the closest water body, distance to closest water body, and distance from closest Well Head Protection Area to the discharge area.

Cedar Creek

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- 4. Summarize all activities at your facility that are already regulated for groundwater protection.

N/A

- 5. Discuss any existing groundwater quality data for your facility or an adjacent property.

N/A

6. Provide a statement that no waste material will be used for deicing or fill material on the property.

No material will be used

7. Describe the groundwater protection instruction and training to be provided to the employees. Job procedures shall provide direction on how to prevent groundwater contamination.

N/A

8. Provide provisions and frequency for inspections of all GPP elements and equipment.

N/A

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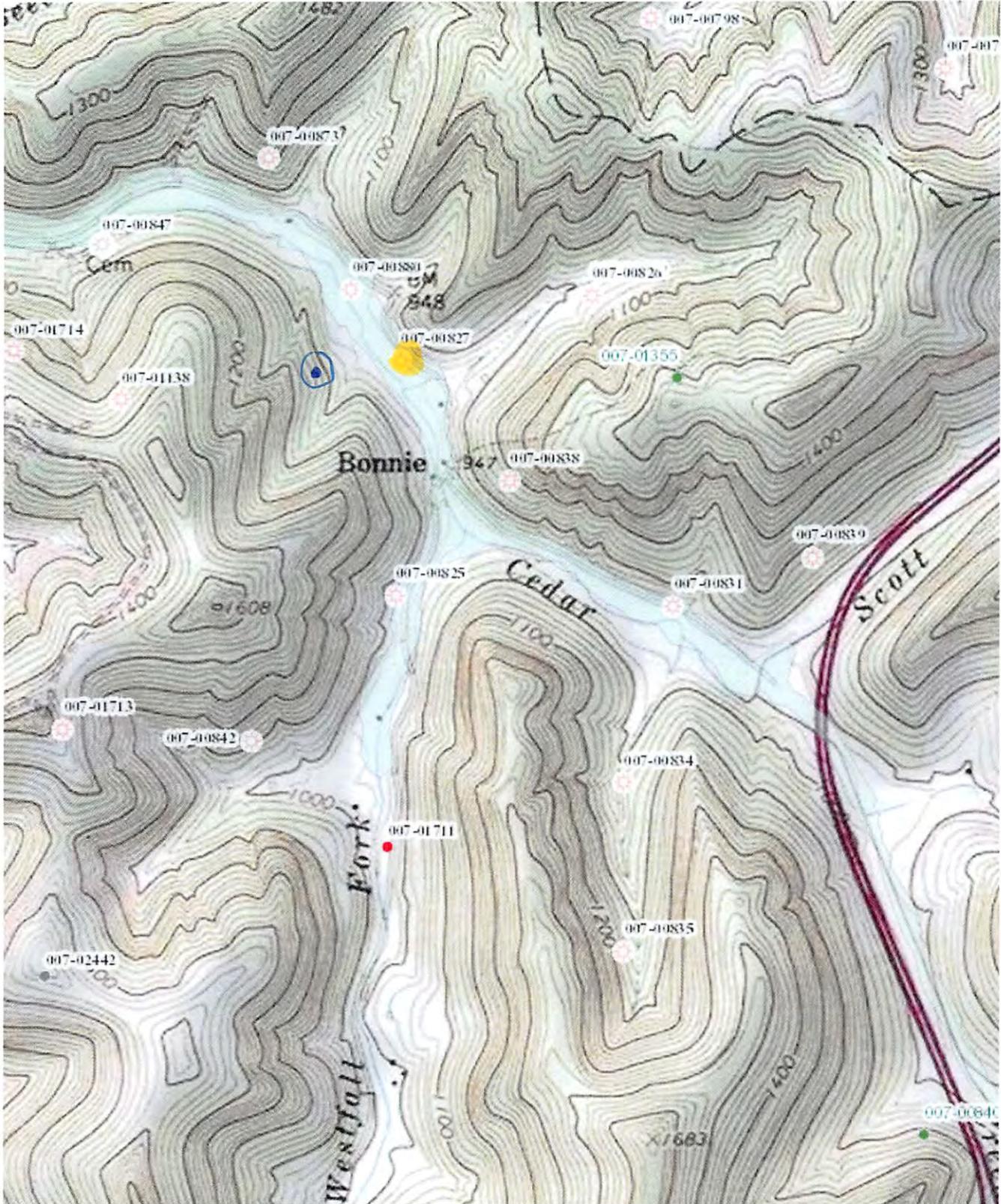
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Signature:

Stuie Ross

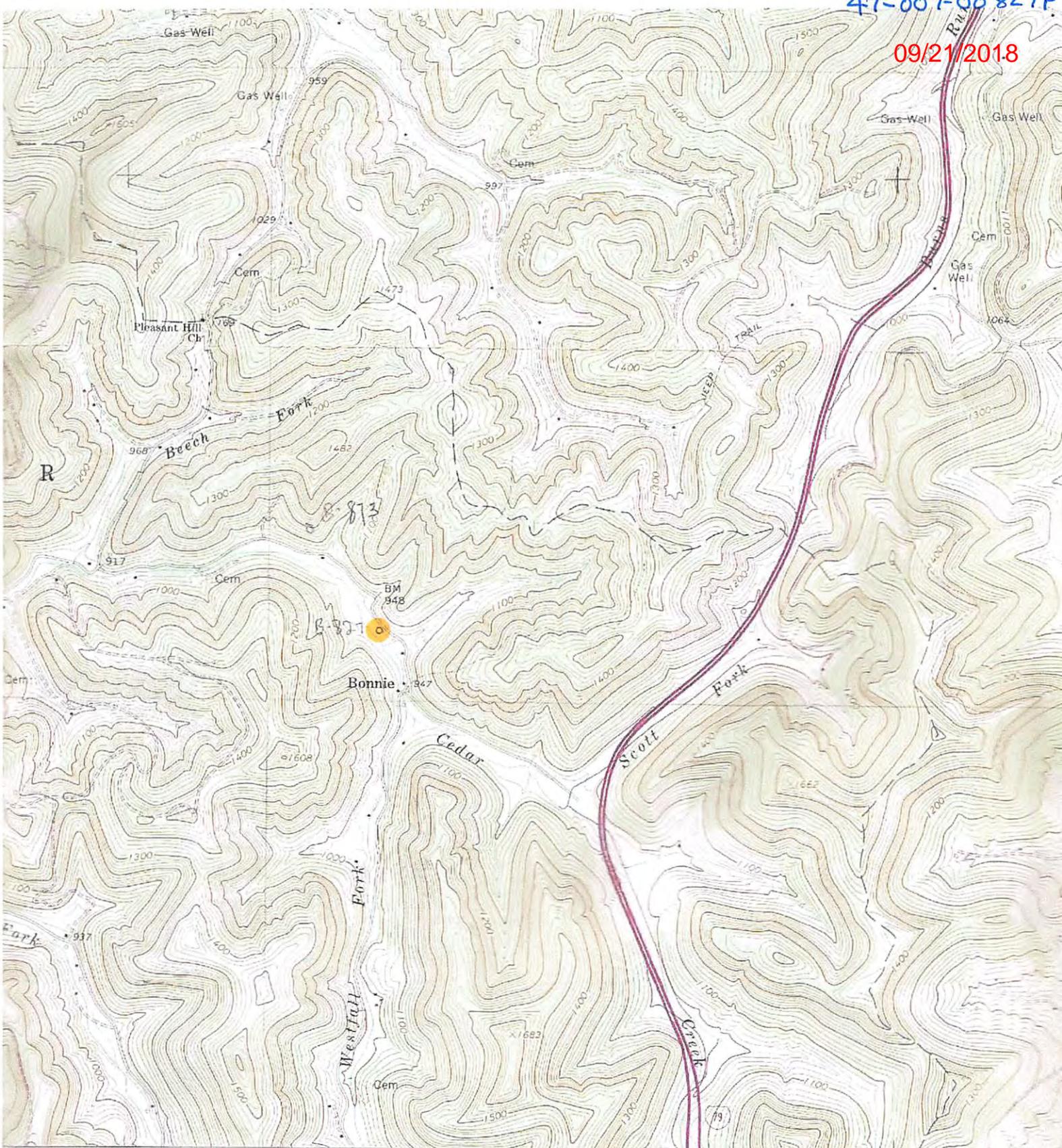
Date:

8-7-18



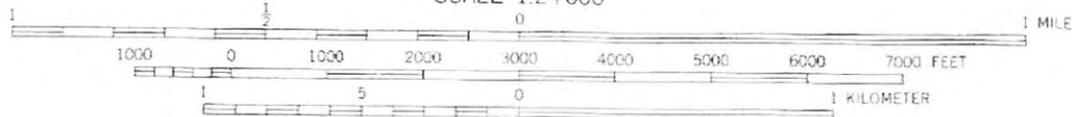
47-007-00 827P

09/21/2018



EET 525 42'30" 526 527 (SUTTON) 4861 11 NW 528 40' FLATWOODS 2 1/4' SUTTON'S 2 1/4'

SCALE 1:24 000



CONTOUR INTERVAL 20 FEET
NATIONAL GEODETIC VERTICAL DATUM OF 1929

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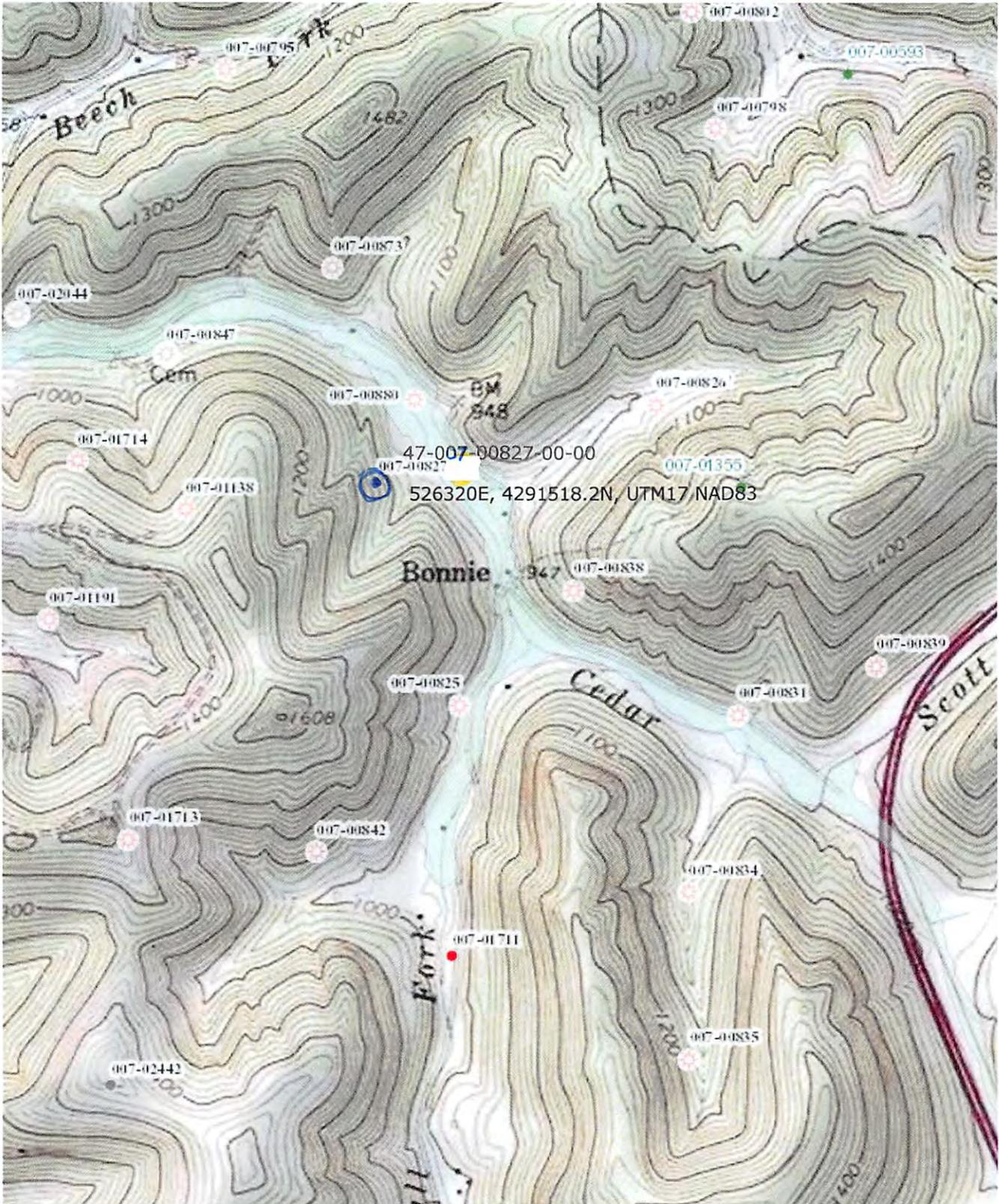
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DM

INDICATE NORTH
DIRECTION OF SHEET

QUADRANGLE

COORDINATES FROM WW-7



WW-7
8-30-06



West Virginia Department of Environmental Protection
Office of Oil and Gas

WELL LOCATION FORM: GPS

API: 47-007-00827 WELL NO.: 2

FARM NAME: Wilson Lease

RESPONSIBLE PARTY NAME: Mike Ross

COUNTY: Braxton DISTRICT: Otter

QUADRANGLE: Burnsville

SURFACE OWNER: Wanda Bailey & Wavalene Wood et.al.

ROYALTY OWNER: John D. Berry

UTM GPS NORTHING: 4291518.2

UTM GPS EASTING: 526320.0 GPS ELEVATION: 980'

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:

1. Datum: NAD 1983, Zone: 17 North, Coordinate Units: meters, Altitude: height above mean sea level (MSL) – meters.
2. Accuracy to Datum – 3.05 meters
3. Data Collection Method:

Survey grade GPS ____; Post Processed Differential ____

Real-Time Differential ____

Mapping Grade GPS ____; Post Processed Differential ____

Real-Time Differential ____

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4. **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.

Mike Ross
Signature

President
Title

8-7-18
Date