

State of West Virginia  
Department of Environmental Protection - Office of Oil and Gas  
Well Operator's Report of Well Work

API 47 - 009 - 00176 County BROOKE District BUFFALO  
Quad BETHANY, WV-PA Pad Name JAMES SEABRIGHT-BRK-PAD1 Field/Pool Name PANHANDLE FIELD WET  
Farm name JAMES K. & MARTHA MAY SEABRIGHT; LIFE INTEREST & JAMES H. SEABRIGHT Well Number JAMES SEABRIGHT BRK 6H  
Operator (as registered with the OOG) SWN PRODUCTION COMPANY, LLC  
Address PO BOX 12359 City SPRING State TX Zip 77391-2359

As Drilled location NAD 83/UTM Attach an as-drilled plat, profile view, and deviation survey  
Top hole Northing 4,452,326.591 Easting 539,868.706  
Landing Point of Curve Northing 4,452,024.369 Easting 539,631.466  
Bottom Hole Northing 4,449,399.435 Easting 540,746.222

Elevation (ft) 1130.8' GL Type of Well  New  Existing Type of Report  Interim  Final  
Permit Type  Deviated  Horizontal  Horizontal 6A  Vertical Depth Type  Deep  Shallow  
Type of Operation  Convert  Deepen  Drill  Plug Back  Redrilling  Rework  Stimulate  
Well Type  Brine Disposal  CBM  Gas  Oil  Secondary Recovery  Solution Mining  Storage  Other \_\_\_\_\_  
Type of Completion  Single  Multiple Fluids Produced  Brine  Gas  NGL  Oil  Other \_\_\_\_\_  
Drilled with  Cable  Rotary

Drilling Media Surface hole  Air  Mud  Fresh Water Intermediate hole  Air  Mud  Fresh Water  Brine  
Production hole  Air  Mud  Fresh Water  Brine  
Mud Type(s) and Additive(s)  
SOBM

Date permit issued 2/25/2017 Date drilling commenced 3/15/2017 Date drilling ceased 6/9/2017  
Date completion activities began 7/28/2017 Date completion activities ceased 8/28/2017  
Verbal plugging (Y/N) N Date permission granted N/A Granted by N/A

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Please note: Operator is required to submit a plugging application within 5 days of verbal permission to plug

Freshwater depth(s) ft 252' Open mine(s) (Y/N) depths N  
Salt water depth(s) ft 870' Void(s) encountered (Y/N) depths N  
Coal depth(s) ft 313' Cavern(s) encountered (Y/N) depths N  
Is coal being mined in area (Y/N) N

Reviewed

*C. B. L. 2-7-18*

Reviewed by:  
202-7-18  
03/02/2018

API 47-009 - 00176

Farm name JAMES K. & MARTHA MAY SEABRIGHT; LIFE INTEREST & JAMES H. SEABRIGHT

Well number JAMES SEABRIGHT BRK 6H

CASING STRINGS	Hole Size	Casing Size	Depth	New or Used	Grade wt/ft	Basket Depth(s)	Did cement circulate (Y/ N) * Provide details below*
Conductor	24	20	126	NEW	J-55/94#		Y
Surface	17.5	13.375	363	NEW	H-40/48#		Y; 15 BBLs RETURNED
Coal	SEE SURFACE						
Intermediate 1	12.25	9.625	1725	NEW	J-55/36#		Y; 35 BBLs RETURNED
Intermediate 2							
Intermediate 3							
Production	8.75/8.50	5.5	15906	NEW	HCP-110/20#		Y
Tubing		2.375	6458	NEW	P-110/4.7#		N
Packer type and depth set							

Comment Details \_\_\_\_\_

CEMENT DATA	Class/Type of Cement	Number of Sacks	Slurry wt (ppg)	Yield (ft <sup>3</sup> /sks)	Volume (ft <sup>3</sup> )	Cement Top (MD)	WOC (hrs)
Conductor	CLASS A	GROUT TO SURFACE				SURFACE	24
Surface	CLASS A	340	15.60	1.18	401.2	SURFACE	8
Coal	SEE SURFACE						
Intermediate 1	CLASS A	674	15.60	1.18	795.32	SURFACE	8
Intermediate 2							
Intermediate 3							
Production	CLASS A	2976	15.60	1.19	3541.44	SURFACE	24
Tubing							

Drillers TD (ft) 15,906' Loggers TD (ft) 15,906'  
 Deepest formation penetrated MARCELLUS Plug back to (ft) N/A  
 Plug back procedure \_\_\_\_\_

Kick off depth (ft) 5,518'

Check all wireline logs run  caliper  density  deviated/directional  induction  
 neutron  resistivity  gamma ray  temperature  sonic

Well cored  Yes  No Conventional Sidewall Were cuttings collected  Yes  No

DESCRIBE THE CENTRALIZER PLACEMENT USED FOR EACH CASING STRING \_\_\_\_\_

SURFACE: 7 CENTRALIZERS - EVERY THIRD JOINT OF CASING  
 INTERMEDIATE: 24 CENTRALIZERS - EVERY THIRD JOINT OF CASING  
 PRODUCTION: 181 CENTRALIZERS - EVERY THIRD JOINT FROM SURFACE TO TOP OF CURVE, THEN EVERY JOINT UNTIL TD

WAS WELL COMPLETED AS SHOT HOLE  Yes  No DETAILS \_\_\_\_\_

WAS WELL COMPLETED OPEN HOLE?  Yes  No DETAILS \_\_\_\_\_

WERE TRACERS USED  Yes  No TYPE OF TRACER(S) USED \_\_\_\_\_

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API 47- 009 - 00176

Farm name JAMES K. & MARTHA MAY SEABRIGHT, LIFE INTEREST & JAMES H. SEABRIGHT Well number JAMES SEABRIGHT BRK 6H

<u>PRODUCING FORMATION(S)</u>	<u>DEPTHS</u>	
<u>MARCELLUS</u>	<u>6,035.91'</u> TVD	<u>6,365'</u> MD
_____	_____	_____
_____	_____	_____
_____	_____	_____

Please insert additional pages as applicable.

GAS TEST  Build up  Drawdown  Open Flow OIL TEST  Flow  Pump

SHUT-IN PRESSURE Surface 1575 psi Bottom Hole \_\_\_\_\_ psi DURATION OF TEST \_\_\_\_\_ hrs

OPEN FLOW Gas 2,406 mcfpd Oil 261 bpd NGL \_\_\_\_\_ bpd Water 0 bpd GAS MEASURED BY  Estimated  Orifice  Pilot

LITHOLOGY/ FORMATION	TOP	BOTTOM	TOP	BOTTOM	DESCRIBE ROCK TYPE AND RECORD QUANTITY AND TYPE OF FLUID (FRESHWATER, BRINE, OIL, GAS, H <sub>2</sub> S, ETC)
	DEPTH IN FT NAME TVD	DEPTH IN FT TVD	DEPTH IN FT MD	DEPTH IN FT MD	
	<u>0</u>		<u>0</u>		
	<u>SEE</u>	<u>ATTACHMENT</u>	<u>3</u>		

Please insert additional pages as applicable.

Drilling Contractor SWN DRILLING COMPANY  
Address PO BOX 12359 City SPRING State TX Zip 77391-2359

Logging Company BAKER HUGHES  
Address 9110 GROGAN MILL RD City THE WOODLANDS State TX Zip 77380

Cementing Company BJ SERVICES  
Address 11211 FM 2920 City TOMBALL State TX Zip 77377

Stimulating Company US WELL SERVICES  
Address 770 S POST OAK LN #405 City HOUSTON State TX Zip 77056

Please insert additional pages as applicable.

Completed by DENISE GRANTHAM Telephone 832-796-6139  
Signature Denise Grantham Title REGULATORY TECHNICIAN Date 11.17

Submittal of Hydraulic Fracturing Chemical Disclosure Information Attach copy of FRACFOCUS Registry

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**JAMES SEABRIGHT BRK 6H  
PERF SUMMARY**

STAGE NUM	Perf Date	Perf Top MD	Perf Bottom MD	# SHOTS PER STG
1	7/28/2017	15,657	15,799	33
2	7/28/2017	15,472	15,604	33
3	7/29/2017	15,277	15,409	33
4	7/29/2017	15,082	15,214	33
5	7/29/2017	14,860	15,019	66
6	8/4/2017	14,627	14,824	42
7	8/4/2017	14,367	14,564	42
8	8/5/2017	14,107	14,304	42
9	8/5/2017	13,847	14,044	42
10	8/5/2017	13,587	13,784	42
11	8/5/2017	13,395	13,526	33
12	8/5/2017	13,202	13,333	33
13	8/6/2017	13,008	13,139	33
14	8/6/2017	12,815	12,946	33
15	8/6/2017	12,621	12,752	33
16	8/7/2017	12,428	12,559	33
17	8/7/2017	12,234	12,365	33
18	8/7/2017	12,041	12,172	33
19	8/8/2017	11,847	11,978	33
20	8/8/2017	11,654	11,785	33
21	8/9/2017	11,460	11,591	33
22	8/9/2017	11,267	11,398	33
23	8/9/2017	11,073	11,204	33
24	8/9/2017	10,880	11,011	33
25	8/9/2017	10,686	10,817	33
26	8/10/2017	10,493	10,624	33
27	8/10/2017	10,299	10,430	33
28	8/10/2017	10,106	10,237	33
29	8/10/2017	9,912	10,043	33
30	8/11/2017	9,719	9,850	33
31	8/11/2017	9,525	9,656	33
32	8/11/2017	9,332	9,463	33
33	8/11/2017	9,138	9,269	33
34	8/11/2017	8,945	9,076	33
35	8/11/2017	8,751	8,882	33
36	8/11/2017	8,558	8,689	33
37	8/12/2017	8,364	8,495	33
38	8/12/2017	8,171	8,302	33
39	8/12/2017	7,977	8,108	33
40	8/12/2017	7,784	7,915	33
41	8/12/2017	7,590	7,721	33
42	8/12/2017	7,397	7,528	33
43	8/12/2017	7,203	7,334	33
44	8/12/2017	7,010	7,141	33
45	8/13/2017	6,816	6,947	33
46	8/13/2017	6,623	6,754	33
47	8/13/2017	6,429	6,560	33

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JAMES SEABRIGHT BRK 6H  
FRAC STAGE SUMMARY

STAGE NUM	Stim Date	Ave Pump Rate (BPM)	Ave Treatment Pressure (PSI)	Max Breakdown Pressure (PSI)	ISIP (PSI)	Amount of Proppant (lbs)	Amount of water bbls	Amount of nitrogen/other
1	7/28/2017	80	7,535	8,848	3,937	381,100	5,811	
2	7/28/2017	81	7,739	9,187	4,241	379,460	6,007	
3	7/29/2017	80	7,694	8,143	4,463	379,300	6,046	
4	7/29/2017	76	7,953	8,615	4,417	375,020	6,371	
5	7/29/2017	78	8,294	9,177	7,685	260,260	8,456	
6	8/4/2017	95	8,004	8,472	4,834	498,580	11,508	
7	8/4/2017	98	8,130	8,432	5,009	501,015	10,161	
8	8/5/2017	98	8,128	8,534	4,947	499,560	8,012	
9	8/5/2017	99	7,971	8,202	4,819	500,600	7,773	
10	8/5/2017	100	7,758	8,075	4,954	499,000	7,764	
11	8/5/2017	91	7,905	8,199	4,785	372,060	5,749	
12	8/5/2017	92	7,716	8,308	4,763	374,140	5,685	
13	8/6/2017	77	7,393	8,541	5,100	374,950	7,426	
14	8/6/2017	87	7,246	7,834	4,672	372,920	5,784	
15	8/6/2017	85	7,550	8,075	4,668	373,880	5,694	
16	8/7/2017	65	8,197	9,467	4,701	232,620	7,196	
17	8/7/2017	84	7,534	7,852	4,638	376,440	5,877	
18	8/7/2017	78	7,669	8,912	5,126	376,020	5,754	
19	8/8/2017	88	7,526	8,649	4,606	376,180	5,679	
20	8/8/2017	87	7,620	8,022	4,517	375,000	5,726	
21	8/9/2017	90	7,491	7,839	4,607	364,745	5,565	
22	8/9/2017	85	7,027	8,109	4,902	375,040	5,708	
23	8/9/2017	85	6,895	8,824	5,071	375,040	5,642	
24	8/9/2017	86	7,642	8,308	4,698	371,800	5,625	
25	8/9/2017	87	7,634	8,264	4,610	377,400	5,557	
26	8/10/2017	78	6,663	7,816	4,876	375,320	6,536	
27	8/10/2017	82	8,289	8,751	5,030	374,080	7,039	
28	8/10/2017	84	7,147	7,923	4,637	379,440	5,560	
29	8/10/2017	96	7,644	8,066	4,932	376,160	5,480	
30	8/11/2017	98	7,659	8,080	4,660	374,500	5,558	
31	8/11/2017	90	7,098	8,125	4,986	375,460	5,508	
32	8/11/2017	97	7,684	8,143	4,642	375,420	5,514	
33	8/11/2017	99	7,333	7,886	5,115	374,840	5,513	
34	8/11/2017	100	7,487	8,065	4,759	379,400	5,527	
35	8/11/2017	97	7,480	8,505	4,961	374,380	5,431	
36	8/11/2017	96	7,390	8,095	4,990	383,260	5,411	
37	8/12/2017	98	7,348	7,805	4,935	380,000	5,414	
38	8/12/2017	99	7,411	8,264	5,001	375,170	5,561	
39	8/12/2017	100	7,569	8,114	4,807	375,520	5,320	
40	8/12/2017	100	7,428	8,249	4,902	375,080	5,296	
41	8/12/2017	100	7,524	8,623	5,056	374,890	5,317	
42	8/12/2017	99	7,043	7,567	4,891	378,620	5,311	
43	8/12/2017	99	7,206	7,845	4,799	381,300	5,349	
44	8/12/2017	100	7,136	7,937	4,807	380,460	5,303	
45	8/13/2017	100	7,014	7,974	4,667	387,000	5,297	
46	8/13/2017	100	7,114	8,037	4,891	374,000	5,240	
47	8/13/2017	101	6,814	8,194	4,766	373,900	5,148	

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Well Name:

JAMES SEABRIGHT BRK 6H

47009001760000

LITHOLOGY/FORMATION	TOP DEPTH, MD (FT)	TOP DEPTH, TVD (FT)	BOTTOM DEPTH, MD (FT)	BOTTOM DEPTH, TVD (FT)	QUANTITY AND TYPE OF FLUID
Base of Fresh Water	N.A.	N.A.	252.00	252.00	N.A.
Top of Salt Water	870.00	870.00	N.A.	N.A.	N.A.
Pittsburgh Coal	313.00	313.00	318.00	318.00	N.A.
Big Injun (ss)	1491.07	1488.25	1654.33	1650.83	N.A.
Berea (siltstone)	Not Logged	Not Logged	5683.10	5570.65	N.A.
Rhinestreet (shale)	5683.10	5570.65	5835.81	5709.67	N.A.
Cashaqua (shale)	5835.81	5709.67	5900.17	5764.24	N.A.
Middlesex (shale)	5900.17	5764.24	5992.34	5836.32	N.A.
Burket (shale)	5992.34	5836.32	6013.32	5851.74	N.A.
Tully (ls)	6013.32	5851.74	6093.51	5906.19	N.A.
Mahantango (shale)	6093.51	5906.19	6099.00	5909.81	N.A.
Marcellus (shale)	6365.00	6035.91	N.A.	N.A.	GAS

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# Hydraulic Fracturing Fluid Product Component Information Disclosure

Job Start Date:	7/28/2017
Job End Date:	8/13/2017
State:	West Virginia
County:	Brooke
API Number:	47-009-00176-00-00
Operator Name:	Southwestern Energy
Well Name and Number:	James Seabright BRK 6H
Latitude:	40.22041300
Longitude:	-80.53142400
Datum:	NAD83
Federal Well:	NO
Indian Well:	NO
True Vertical Depth:	6,144
Total Base Water Volume (gal):	11,978,670
Total Base Non Water Volume:	0



## Hydraulic Fracturing Fluid Composition:

Trade Name	Supplier	Purpose	Ingredients	Chemical Abstract Service Number (CAS #)	Maximum Ingredient Concentration in Additive (% by mass)**	Maximum Ingredient Concentration in HF Fluid (% by mass)**	Comments
Water	Southwestern Energy	Carrier/Base Fluid	Water	7732-18-5	100.00000	83.81841	
Sand	U.S. Well Services, LLC	Proppant	Crystalline Silica, quartz	14808-60-7	100.00000	15.13594	
HCL Acid (12.6%-17.5%)	U.S. Well Services, LLC	Bulk Acid	Water	7732-18-5	87.40000	0.64150	
			Hydrogen Chloride	7647-01-0	17.50000	0.14915	
HCL Acid (17.6%-22.5%)	U.S. Well Services, LLC	Bulk Acid	Water	7732-18-5	82.40000	0.11520	
			Hydrogen Chloride	7647-01-0	22.50000	0.03653	
WFRA-2000	U.S. Well Services, LLC	Friction Reducer	Water	7732-18-5	60.00000	0.05215	
			2-Propenoic acid, polymer with 2-propenamide	9003-06-9	30.00000	0.02607	
			Hydrated light distillate (petroleum)	64742-47-8	30.00000	0.02138	

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Deeprop 1000	J.S. Well Services, LLC	Fluid Loss Additive				
			Ceramic Microspheres	66402-68-4	65.00000	0.00290
			Glutaraldehyde	111-30-8	1.00000	0.00003
AI-303	J.S. Well Services, LLC	Acid Corrosion Inhibitors				
			Ethylene glycol	107-21-1	40.00000	0.00027
			Cinnamaldehyde	104-55-2	20.00000	0.00010
			Formic acid	64-18-6	20.00000	0.00009
			Butyl cellosolve	111-76-2	20.00000	0.00008
			Polyether	60828-78-6	10.00000	0.00005
			Acetophenone,thiourea,formaldehyde polymer	68527-49-1	5.00000	0.00002
OPTI-FLEX	J.S. Well Services, LLC	Friction Reducer				
			Trade Secret	Proprietary	50.00000	0.00007
			Distillates, petroleum, hydrotreated light	64742-47-8	50.00000	0.00006
AP One	J.S. Well Services, LLC	Gel Breakers				
			Ammonium Persulfate	7727-54-0	100.00000	0.00000

Ingredients shown above are subject to 29 CFR 1910.1200(i) and appear on Material Safety Data Sheets (MSDS). Ingredients shown below are Non-MSDS.

\* Total Water Volume sources may include fresh water, produced water, and/or recycled water

\*\* Information is based on the maximum potential for concentration and thus the total may be over 100%

Note: For Field Development Products (products that begin with FDP), MSDS level only information has been provided.

Ingredient information for chemicals subject to 29 CFR 1910.1200(i) and Appendix D are obtained from suppliers Material Safety Data Sheets (MSDS)

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# RETTEW

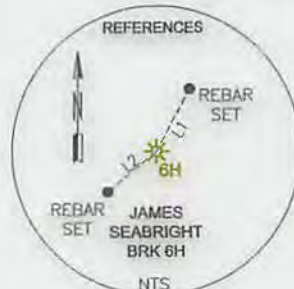
RETTEW Associates, Inc.  
27 Travato Street, Suite 101  
Bridgeport, WV 26330  
Phone (800) 738-8395  
Email: rette@rette.com  
Website: www.rette.com

<b>SURFACE HOLE LOCATION (SHL):</b>
UTM (NAD83, ZONE 17, METERS): NORTHING: 4,452,326.591 EASTING: 539,868.706
<b>LANDING POINT LOCATION (LPL):</b>
UTM (NAD83, ZONE 17, METERS): NORTHING: 4,452,024.369 EASTING: 539,631.466
<b>BOTTOM HOLE LOCATION (BHL):</b>
UTM (NAD83, ZONE 17, METERS): NORTHING: 4,449,399.435 EASTING: 540,746.222
<b>SURFACE HOLE LOCATION (SHL):</b>
UTM (NAD83, ZONE 17, METERS): NORTHING: 4,452,326.655 EASTING: 539,868.683
<b>LANDING POINT LOCATION (LPL):</b>
UTM (NAD83, ZONE 17, METERS): NORTHING: 4,452,025.484 EASTING: 539,634.654
<b>BOTTOM HOLE LOCATION (BHL):</b>
UTM (NAD83, ZONE 17, METERS): NORTHING: 4,449,398.737 EASTING: 540,749.642

GRID NORTH  
UTM, NAD83 DATUM, ZONE 17, US FT

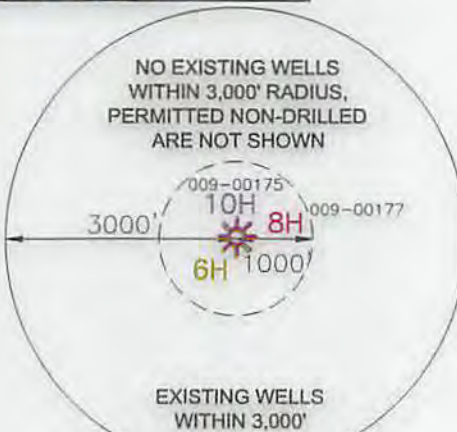
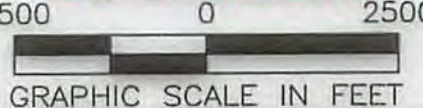
TRACT	SURFACE OWNERS	TAX PARCEL	ACRES
1	JAMES K. SEABRIGHT AND MARTHA MAY SEABRIGHT, HUSBAND AND WIFE, LIFE INTEREST, JAMES H. SEABRIGHT, REMAINDER	03-B39-0008-0000	173.00±
2	JAMES K. AND MARTHA MAE SEABRIGHT, LE, JAMES H. SEABRIGHT, AND CECELA M. SEABRIGHT, REMAINDER	03-B39-0010-0000	160.04±
3	RAYMOND L. TREDWAY AND LINDSEY G. TREDWAY, JOINT TENANTS WITH RIGHT OF SURVIVORSHIP	03-B39-0011-0000	170.38±
4	VICKI G. HAMILTON AND SHAWN P. HAMILTON, HER HUSBAND	03-B44-0001-0000	13.60±
5	LINDA REEVES GREATHOUSE AND JAMES RUSSELL GREATHOUSE, HER HUSBAND	03-B39-0012-0000	202.41±
6	MILDRED MAIN	03-B44-0006-0000	12.53±
7	FORNEY AND SONS HOLDING CO., LLC	03-B44-0005-0000	180.00±

LINE	BEARING	DISTANCE	DESCRIPTION	MONUMENT
L1	N 27°50'07" E	293.84'	SHL TO REF. PNT.	1/2" # REBAR SET
L2	S 50°06'21" W	263.82'	SHL TO REF. PNT.	1/2" # REBAR SET
L3	S 43°48'42" E	753.35'	SHL TO GIS CORNER	
L4	S 75°29'30" W	1479.08'	SHL TO GIS CORNER	
L5	S 38°07'53" W	1260.55'	SHL TO LP	
L6	S 23°00'36" E	9356.39'	LP TO BHL	



**AS-DRILLED SURFACE HOLE LOCATION**  
ELEV: 1,130.8'

**AS-DRILLED**



**NOTES ON SURVEY**

- COORDINATES SYSTEM IS UTM, NAD 83 DATUM, ZONE 17, U.S. FOOT AND WELL COORDINATES ESTABLISHED USING SURVEY GRADE GPS.
- SURFACE AND ROYALTY OWNER INFORMATION AND THEIR BOUNDARIES SHOWN HEREON WERE PLOTTED FROM DEEDS AND/OR TAX PARCEL MAPS PROVIDED BY CLIENT AND FIELD LOCATIONS.
- THIS PLAT DOES NOT REPRESENT A BOUNDARY SURVEY OF THE PARCELS SHOWN HEREON.
- NO DWELLINGS AND BUILDINGS WITHIN 625 FEET OF PROPOSED OF CENTER OF PAD.
- NO WATER WELLS OR DEVELOPED SPRINGS WITHIN 250 FEET OF PROPOSED WELL.
- NO PERENNIAL STREAMS, LAKES, PONDS, RESERVOIRS OR WETLANDS WITHIN 100 FEET OF THE LIMITS OF DISTURBANCE.
- NO NATURALLY PRODUCING TROUT STREAM WITHIN 300 FEET OF LIMITS OF DISTURBANCE.

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 REGULATIONS ISSUED AND PRESCRIBED BY THE DEPARTMENT OF ENVIRONMENTAL PROTECTION.



P.S. 2241

COMPANY: **SWN** Production Company, LLC

(+) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS  
WVDEP  
OFFICE OF OIL & GAS  
601 57TH STREET  
CHARLESTON, WV 25034

MINIMUM DEGREE OF ACCURACY: 1/200  
PROVEN SURVEY SOURCE OF GRADE GPS ELEVATION: (NAVD 88, US FT)

JAMES SEABRIGHT BRK  
OPERATOR'S WELL #: 6H  
API WELL #: 47 STATE 009 COUNTY 00176 PERMIT

WELL TYPE: OIL  WASTE DISPOSAL  PRODUCTION  DEEP  GAS  LIQUID INJECTION  STORAGE  SHALLOW

WATERSHED: SUGARCAMP RUN, BUFFALO CREEK ELEVATION: 1130.8' (AS-Built)

DISTRICT: BUFFALO COUNTY: BROOKE QUADRANGLE: BETHANY, WV-PA

SURFACE OWNER: JAMES K. & MARTHA MAY SEABRIGHT; LIFE INTEREST & JAMES H. SEABRIGHT ACREAGE: 173.00±

OIL & GAS ROYALTY OWNER: MARTHA MAY SEABRIGHT, LE, & JAMES H. SEABRIGHT ACREAGE: 173.00±

DRILL  DRILL DEEPER  REDRILL  FRACTURE OR STIMULATE  PLUG OFF OLD FORMATION  PERFORATE NEW FORMATION

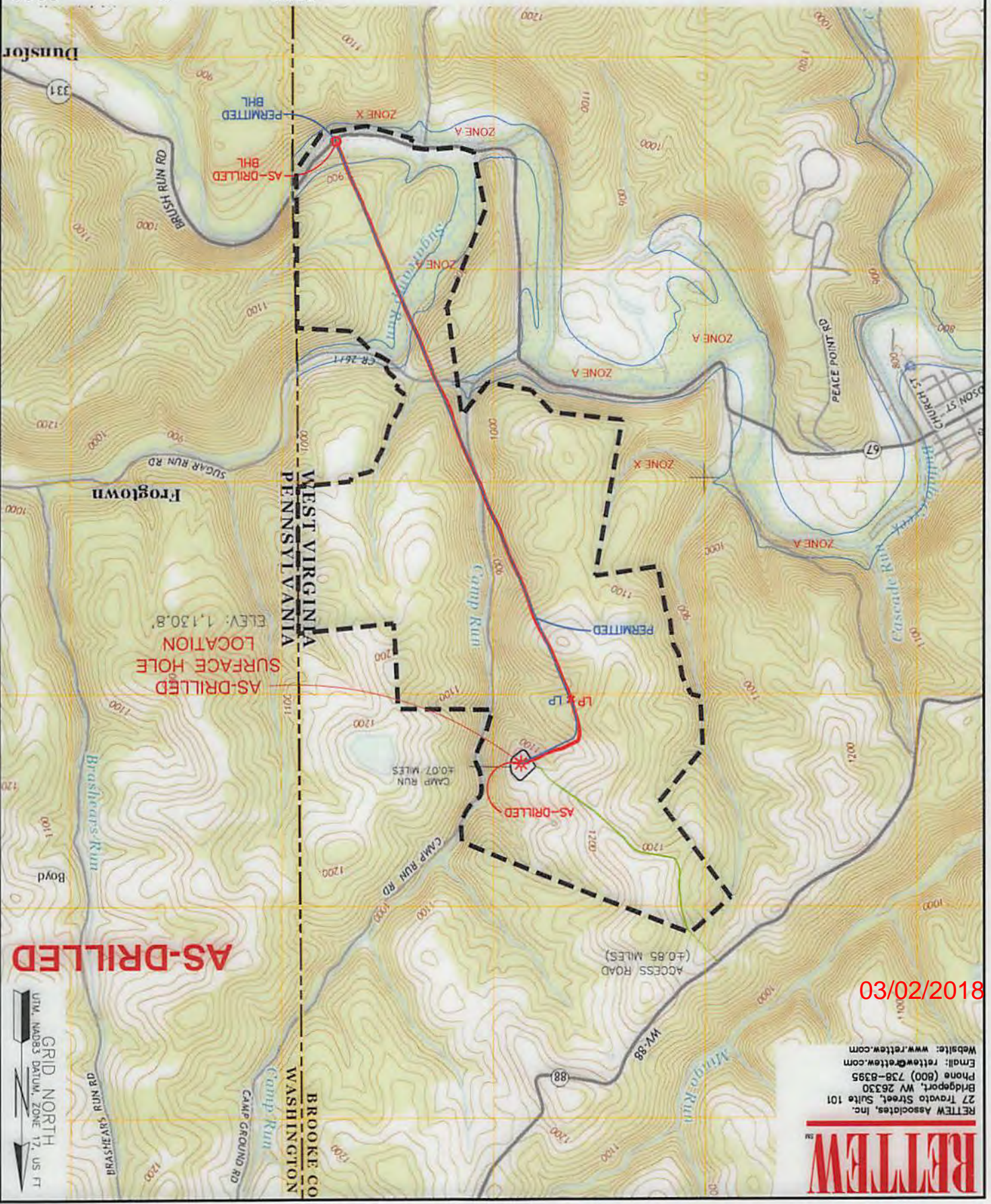
CONVERT  PLUG & ABANDON  CLEAN OUT & REPLUG  OTHER CHANGE  (SPECIFY) **As-Drilled**

TARGET FORMATION: MARCELLUS ESTIMATED DEPTH: 6,236' TVD 15,906' TMD

WELL OPERATOR: SWN PRODUCTION COMPANY, LLC DESIGNATED AGENT: DEE SOUTHALL  
ADDRESS: P.O. BOX 1300 ADDRESS: P.O. BOX 1300  
CITY: JANE LEW STATE: WV ZIP CODE: 26378 CITY: JANE LEW STATE: WV ZIP CODE: 26378

<b>LEGEND:</b>	<b>REVISIONS:</b>	<b>DATE:</b> 10-03-2017
○ PROPOSED SURFACE HOLE / BOTTOM HOLE	--- TIE LINE	
⊗ EXISTING / PRODUCING WELLHEAD	--- LEASE BOUNDARY	
⊗ ABANDONED WELL	--- AS-DRILLED WELLPATH	
⊗ PLUGGED & ABANDONED WELL	--- PERMITTED WELLPATH	
⊗ CUT CONDUCTOR	--- STREAM	
		DRAWN BY: W. MCCLEAF
		SCALE: 1" = 2500'
		DRAWING NO: 087569036
		AS-DRILLED PLAT

18/02/20



WELL: JAMES SEABRIGHT BRK 6H  
 QUAD: BETHANY, WV-PA

GRAPHIC SCALE IN FEET



NAME AND DISTANCE TO THE NEAREST STREAM: STREAM CROSSING COORDINATES (NAD 83): CAMP RUN IS LOCATED ±0.07 MILES EAST OF THE CENTER OF THE DRILL PAD. NO NEW CROSSINGS.	COMPANY: <b>SWN</b> Production Company, LLC Production Company™
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WELL RESTRICTIONS: WELL PAD, LOD, & E & S CONTROL FEATURES TO PERENNIAL STREAM, LAKE, POND, RESERVOIR OR WETLAND: >100 FEET WELL PAD, LOD, & E & S CONTROL FEATURES TO NATURALLY PRODUCING TROUT STREAM: >300 FEET WELL PAD, LOD, & E & S CONTROL FEATURES TO GROUNDWATER INTAKE OR PUBLIC WATER SUPPLY: >1000 FEET WELL SHL TO EXISTING WATER WELL OR DEVELOPED SPRING: >250 FEET CENTER OF PAD TO OCCUPIED DWELLING STRUCTURE: >625 FEET CENTER OF PAD TO AGRICULTURAL BUILDINGS LARGER THAN 2500 SQ FT: >625 FEET	OPERATOR'S JAMES SEABRIGHT BRK WELL #: 6H LOCATION: BUFFALO DISTRICT, BROOKE COUNTY, WEST VIRGINIA
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FEMA FLOOD INFORMATION: BY GRAPHIC PLOTTING ONLY FEMA FIRM INCORPORATED AREA OF BROOKE COUNTY, WEST VIRGINIA; MAP NUMBER 54009C01350; EFFECTIVE DATE: APRIL 19, 2010. FLOOD ZONES A & X ARE SITUATED WITHIN THE UNIT.	REVISIONS: DATE: 10-03-2017 DRAWN BY: W. MCGLEAF SCALE: 1" = 2000' DRAWING NO: 087569036 TOPOGRAPHIC MAP
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LEASING BOUNDARY AS-DRILLED WELLPATH PERMITTED WELLPATH EXISTING / PRODUCING WELLPATH ABANDONED WELL PLUGGED & ABANDONED WELL CUT CONDUCTOR	LEGEND: PROPOSED SURFACE HOLE / BOTTOM HOLE EXISTING / PRODUCING WELLPATH ABANDONED WELL PLUGGED & ABANDONED WELL CUT CONDUCTOR
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