

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

API 47 - 051 - 01843 County MARSHALL District SAND HILL
Quad WHEELING Pad Name B W EDGE MSH PAD Field/Pool Name PANHANDLE FIELD WET
Farm name WILLIAM F. EDGE, JR. & BARBARA EDGE Well Number B W EDGE MSH 205H
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 4,428,553.756 Easting 531,795.481
Landing Point of Curve Northing 4,428,771.889 Easting 532,153.789
Bottom Hole Northing 4,431,137.645 Easting 531,058.686

Elevation (ft) 1253.4' 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 6/18/2015 Date drilling commenced 7/21/2018 Date drilling ceased 08/04/2018
Date completion activities began 02/06/2019 Date completion activities ceased 03/04/2019
Verbal plugging (Y/N) N Date permission granted N/A Granted by N/A

Please note: Operator is required to submit a plugging application within 5 days of verbal permission to plug RECEIVED
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Freshwater depth(s) ft 615 Open mine(s) (Y/N) depths N MAY 31 2019
Salt water depth(s) ft 930 Void(s) encountered (Y/N) depths N WV Department of
Coal depth(s) ft 742 Cavern(s) encountered (Y/N) depths N Environmental Protection
Is coal being mined in area (Y/N) N

Reviewed
Reviewed by: *[Signature]*
8/23/19

API 47-051 - 01843 Farm name WILLIAM F. EDGE, JR. & BARBARA EDGE Well number B W EDGE MSH 205H

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	805	NEW	J-55/54.50#		Y, 60
Coal	SEE SURFACE						
Intermediate 1	12.25	9.625	2042	NEW	J-55/36#		Y, 24
Intermediate 2	12.25	9.625					
Intermediate 3							
Production	8.75/8.50	5.5	15533	NEW	HCP-110/20#		Y
Tubing		2.375	6908	NEW	L-80/4.7#		N
Packer type and depth set							

Comment Details _____

CEMENT DATA	Class/Type of Cement	Number of Sacks	Slurry wt (ppg)	Yield (ft ³ /sks)	Volume (ft ³)	Cement Top (MD)	WOC (hrs)
Conductor	CLASS A	GROUT TO SURFACE				SURFACE	24
Surface	CLASS A	850	15.60	1.19	1,011.5	SURFACE	8
Coal	SEE SURFACE						
Intermediate 1	CLASS A	772	15.60	1.18	910.96	SURFACE	8
Intermediate 2							
Intermediate 3							
Production	CLASS A	3,020	15.60	1.19	3,593.8	SURFACE	24
Tubing							

Drillers TD (ft) 15,533 Loggers TD (ft) 15,533
 Deepest formation penetrated MARCELLUS Plug back to (ft) N/A
 Plug back procedure N/A

Kick off depth (ft) 5,719'

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
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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

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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 _____

API 47- 051 - 01843 Farm name WILLIAM F. EDGE, JR. & BARBARA EDGE Well number B W EDGE MSH 205H

PERFORATION RECORD

Stage No.	Perforation date	Perforated from MD ft.	Perforated to MD ft.	Number of Perforations	Formation(s)
	SEE	ATTACHMENT	1		

Please insert additional pages as applicable.

STIMULATION INFORMATION PER STAGE

Complete a separate record for each stimulation stage.

Stage No.	Stimulations 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 (units)
		SEE	ATTACHMENT	2				

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Please insert additional pages as applicable.

API 47- 051 - 01843 Farm name WILLIAM F. EDGE, JR. & BARBARA EDGE Well number B W EDGE MSH 205H

PRODUCING FORMATION(S)	DEPTHS	
MARCELLUS	6,348'	TVD 6,774' MD

Please insert additional pages as applicable.

GAS TEST Build up Drawdown Open Flow OIL TEST Flow Pump

SHUT-IN PRESSURE Surface 1164 psi Bottom Hole _____ psi DURATION OF TEST _____ hrs

OPEN FLOW Gas 2,467 mcfpd Oil 254 bpd NGL _____ bpd Water 386 bpd GAS MEASURED BY Estimated Orifice Pilot

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

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 GROGANS MILL RD City THE WOODLANDS State TX Zip 77380

Cementing Company BJ SERVICES
Address 1036 E. MAIN ST. City BRIDGEPORT State WV Zip 26330

Stimulating Company SWN WELL SERVICES
Address PO BOX 12359 City SPRING State TX Zip 77391-2359

Please insert additional pages as applicable.

Completed by BOBBY WILLIS Telephone 832-796-2884
Signature *[Signature]* Title SENIOR REGULATORY ANALYST Date 5/30/2019
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Submittal of Hydraulic Fracturing Chemical Disclosure Information Attach copy of FRACFOCUS Registry

Hydraulic Fracturing Fluid Product Component Information Disclosure

Job Start Date:	2/7/2019
Job End Date:	2/22/2019
State:	West Virginia
County:	Marshall
API Number:	47-051-01843-00-00
Operator Name:	Southwestern Energy
Well Name and Number:	BW EDGE MSH 205
Latitude:	40.00657800
Longitude:	-80.62747700
Datum:	NAD83
Federal Well:	NO
Indian Well:	NO
True Vertical Depth:	6,327
Total Base Water Volume (gal):	12,163,464
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
SCAL16486A	Nalco	Scale Inhibitor					
				Listed Below			
				Listed Below			

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HGL Services

Base Water	Operator	Base Fluid							
					Listed Below				
BIOC11219A	Nalco	Biocide			Listed Below				
SWN FRW-13LA	SWN Well Services	Friction Reducer			Listed Below				
Sand	SWN Well Services	Proppant			Listed Below				
Econo-CI200	SWN Well Services	Corrosion Inhibitor			Listed Below				
Ecopol-FEAC	SWN Well Services	Iron Control			Listed Below				
Items above are Trade Names with the exception of Base Water. Items below are the individual ingredients.									
					7732-18-5	Water	100.00000	85.12639	Density = 8.345
					14808-60-7	Crystalline Silica, quartz	100.00000	14.24347	
					7732-18-5	Water	85.00000	0.49020	
					7647-01-0	Hydrochloric Acid	15.00000	0.07582	
					64742-47-8	Petroleum Distillates, Hydrotreated	23.00000	0.02095	
					67-56-1	Methanol	60.00000	0.01496	
					68424-85-1	Benzyl-(C12-C16 Alky)-Dimethyl-Ammonium	30.00000	0.00748	
					12125-02-9	Ammonium Chloride	5.00000	0.00455	

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**B W EDGE MSH 205H
ATTACHMENT 1
PERF REPORT**

STAGE NUM	Perf Date	Perf Top MD	Perf Bottom MD	# SHOTS PER STG
1	1/27/2019	15,443	15,347	36
2	2/7/2019	15,314	15,207	42
3	2/7/2019	15,174	15,069	42
4	2/7/2019	15,034	14,927	42
5	2/8/2019	14,894	14,787	42
6	2/8/2019	14,754	14,647	42
7	2/8/2019	14,614	14,507	42
8	2/9/2019	14,475	14,367	42
9	2/9/2019	14,334	14,227	42
10	2/10/2019	14,194	14,087	42
11	2/11/2019	14,056	13,947	42
12	2/11/2019	13,914	13,807	42
13	2/12/2019	13,774	13,667	42
14	2/12/2019	13,634	13,527	42
15	2/12/2019	13,494	13,387	42
16	2/12/2019	13,354	13,247	42
17	2/12/2019	13,214	13,107	42
18	2/13/2019	13,074	12,967	42
19	2/13/2019	12,934	12,827	42
20	2/13/2019	12,794	12,687	42
21	2/13/2019	12,654	12,547	42
22	2/14/2019	12,514	12,405	42
23	2/14/2019	12,374	12,267	42
24	2/14/2019	12,234	12,127	42
25	2/14/2019	12,094	11,985	42
26	2/15/2019	11,956	11,847	42
27	2/15/2019	11,814	11,707	42
28	2/15/2019	11,674	11,565	42
29	2/15/2019	11,530	11,427	42
30	2/15/2019	11,394	11,287	42
31	2/16/2019	11,256	11,147	42
32	2/16/2019	11,116	11,007	42
33	2/16/2019	10,974	10,867	42
34	2/16/2019	10,834	10,727	42
35	2/17/2019	10,694	10,587	42
36	2/17/2019	10,554	10,447	42
37	2/17/2019	10,414	10,307	42
38	2/17/2019	10,274	10,167	42
39	2/17/2019	10,134	10,027	42
40	2/18/2019	9,994	9,887	42
41	2/18/2019	9,854	9,747	42
42	2/18/2019	9,714	9,607	42
43	2/18/2019	9,574	9,467	42

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**B W EDGE MSH 205H
ATTACHMENT 1
PERF REPORT**

STAGE NUM	Perf Date	Perf Top MD	Perf Bottom MD	# SHOTS PER STG
44	2/18/2019	9,434	9,327	42
45	2/19/2019	9,294	9,187	42
46	2/19/2019	9,154	9,047	42
47	2/19/2019	9,014	8,907	42
48	2/19/2019	8,874	8,767	42
49	2/19/2019	8,736	8,627	42
50	2/19/2019	8,594	8,487	42
51	2/20/2019	8,454	8,347	42
52	2/20/2019	8,316	8,207	42
53	2/20/2019	8,174	8,067	42
54	2/20/2019	8,034	7,927	42
55	2/21/2019	7,894	7,787	42
56	2/21/2019	7,754	7,647	42
57	2/21/2019	7,614	7,507	42
58	2/21/2019	7,474	7,367	42
59	2/21/2019	7,334	7,226	42
60	2/21/2019	7,196	7,087	42
61	2/22/2019	7,054	6,947	42

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B W EDGE MSH 205H

ATTACHMENT 2

STIM REPORT

STAGE NUM	Stim Date	Ave Pump Rate (BPM)	Ave Treatment	Max Breakdown	ISIP (PSI)	Amount of Proppant (lbs)	Amount of water bbls	Amount of nitrogen/othe
1	2/6/2019	74	7,060	6,930	3,251	285,290	8,500	0
2	2/7/2019	82	7,204	5,081	4,487	248,200	6,383	0
3	2/7/2019	86	6,500	5,150	4,916	281,510	5,739	0
4	2/8/2019	78	6,540	4,180	4,027	284,295	4,899	0
5	2/8/2019	97	6,614	4,189	4,345	284,295	5,457	0
6	2/8/2019	100	6,437	5,100	4,360	281,130	5,465	0
7	2/8/2019	99	6,583	4,958	5,219	275,130	4,962	0
8	2/9/2019	99	7,845	4,675	5,209	289,620	5,103	0
9	2/10/2019	98	7,845	5,046	4,463	280,670	5,500	0
10	2/11/2019	98	7,845	5,403	4,340	289,030	5,422	0
11	2/11/2019	96	6,160	4,972	4,567	283,400	6,235	0
12	2/11/2019	96	6,521	4,450	5,404	281,750	4,692	0
13	2/12/2019	98	6,285	4,434	5,228	288,540	5,185	0
14	2/12/2019	90	7,322	4,450	4,474	288,540	5,240	0
15	2/12/2019	90	7,322	4,187	4,651	282,720	4,556	0
16	2/12/2019	90	7,322	4,711	4,418	280,290	4,668	0
17	2/13/2019	90	7,322	4,777	5,466	283,010	4,879	0
18	2/13/2019	90	7,409	4,423	4,478	283,010	4,716	0
19	2/13/2019	90	7,023	4,438	4,598	275,730	4,579	0
20	2/13/2019	90	7,023	5,456	5,144	275,730	4,759	0
21	2/13/2019	90	7,023	5,230	4,985	283,700	4,634	0
22	2/14/2019	93	7,546	5,522	4,339	277,730	4,352	0
23	2/14/2019	93	7,546	5,120	4,358	288,620	4,588	0
24	2/14/2019	98	7,245	5,606	4,341	279,690	4,726	0
25	2/15/2019	90	7,417	5,462	4,652	279,150	4,748	0
26	2/15/2019	88	7,551	4,657	4,471	270,230	4,537	0
27	2/15/2019	91	7,494	6,010	4,462	266,740	4,674	0
28	2/15/2019	92	7,464	5,100	4,183	279,380	4,708	0
29	2/15/2019	90	7,209	5,583	4,019	287,100	4,677	0
30	2/16/2019	90	7,287	5,541	4,249	288,150	4,703	0
31	2/16/2019	91	7,363	5,686	4,427	267,430	4,439	0
32	2/16/2019	95	7,152	5,945	4,416	283,490	4,520	0
33	2/16/2019	90	7,093	6,052	4,751	269,630	4,739	0
34	2/16/2019	90	7,206	5,668	4,578	283,750	4,579	0
35	2/17/2019	92	7,224	5,912	4,906	285,290	4,388	0
36	2/17/2019	91	7,140	5,965	4,668	294,740	4,351	0
37	2/17/2019	87	7,367	6,206	4,533	248,911	4,633	0
38	2/17/2019	92	7,050	5,601	4,658	291,360	4,628	0
39	2/18/2019	92	7,039	5,591	4,650	288,900	4,579	0
40	2/18/2019	92	7,048	5,545	4,822	262,224	4,348	0
41	2/18/2019	88	7,166	5,160	4,595	269,280	4,503	0
42	2/18/2019	90	7,009	5,972	4,663	269,280	4,372	0
43	2/18/2019	88	7,211	4,968	4,294	269,280	4,025	0
44	2/18/2019	90	6,930	5,617	4,661	280,300	4,502	0
45	2/19/2019	88	6,962	5,807	4,836	291,920	4,410	0
46	2/19/2019	88	7,179	5,088	4,495	292,960	4,158	0
47	2/19/2019	95	6,986	5,938	4,378	292,960	4,095	0
48	2/19/2019	90	6,653	5,249	4,505	292,960	4,116	0
49	2/19/2019	92	6,671	5,020	4,246	288,430	4,091	0
50	2/19/2019	93	6,840	5,301	4,807	278,280	4,108	0
51	2/20/2019	92	6,725	5,000	4,687	292,470	4,097	0
52	2/20/2019	90	7,016	5,302	3,915	285,380	3,892	0
53	2/20/2019	93	6,533	5,816	4,093	288,530	5,584	0

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B W EDGE MSH 205H

ATTACHMENT 2

STIM REPORT

STAGE NUM	Stim Date	Ave Pump Rate (BPM)	Ave Treatment	Max Breakdown	ISIP (PSI)	Amount of Proppant (lbs)	Amount of water bbls	Amount of nitrogen/othe
54	2/20/2019	90	7,114	4,013	4,123	261,690	5,069	0
55	2/21/2019	95	6,605	5,073	4,306	283,600	4,241	0
56	2/21/2019	93	6,939	5,663	4,196	277,560	4,027	0
57	2/21/2019	95	6,753	5,510	4,041	290,420	4,070	0
58	2/21/2019	97	6,773	6,128	4,173	271,600	4,029	0
59	2/21/2019	97	6,817	5,439	4,306	279,250	4,397	0
60	2/22/2019	91	6,786	5,421	4,767	291,270	4,326	0
61	2/22/2019	87	6,835	5,403	4,014	236,298	5,846	0

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Well Name: BW Edge MSH 205H

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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	0.00	0.00	615.00	615.00	
Top of Salt Water	930.00	930.00	NA	NA	
Pittsburgh Coal	742.00	742.00	751.00	751.00	
Pottsville (ss)	843.00	843.00	1134.00	1134.00	
Raven Cliff (ss)	1134.00	1134.00	1825.00	1825.00	
Big Injun (ss)	1825.00	1825.00	5847.00	5764.00	
Rhinestreet (shale)	5847.00	5764.00	6288.00	6046.00	
Cashagua (shale)	6288.00	6046.00	6376.00	6119.00	
Middlesex (shale)	6376.00	6119.00	6479.00	6197.00	
Burket (shale)	6479.00	6197.00	6507.00	6216.00	
Tully (ls)	6507.00	6216.00	6554.00	6247.00	
Mahantango (shale)	6554.00	6247.00	6774.00	6348.00	
Marcellus (shale)	6774.00	6348.00	NA	NA	GAS

Via Federal Express

May 30, 2019

State of West Virginia
Department of Environmental Protection
Office of Oil & Gas
601 57th Street
Charleston, WV 25304

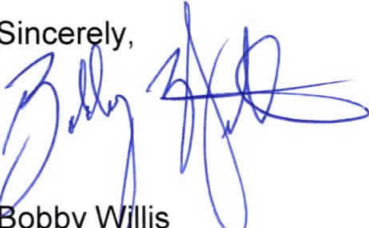
RE: SWN Production Company, LLC
Operator ID: 494512924
Regulatory Filings: WR-34 and WR-35

To Whom It May Concern:

Please find enclosed forms WR-34 Discharge Monitoring Report and WR-35 Well Operator's Report of Well Work along with supporting documentation, for the wells listed below.

API	Well Name
47-051-01845	B W Edge MSH 5H
47-051-01843	B W Edge MSH 205H

If you have any questions or require additional information, please contact me via email at bobby_willis@swn.com or telephone at (832) 796-2884.

Sincerely,

Bobby Willis
Senior Regulatory Analyst
SW Appalachia Division

/bw
Encl.

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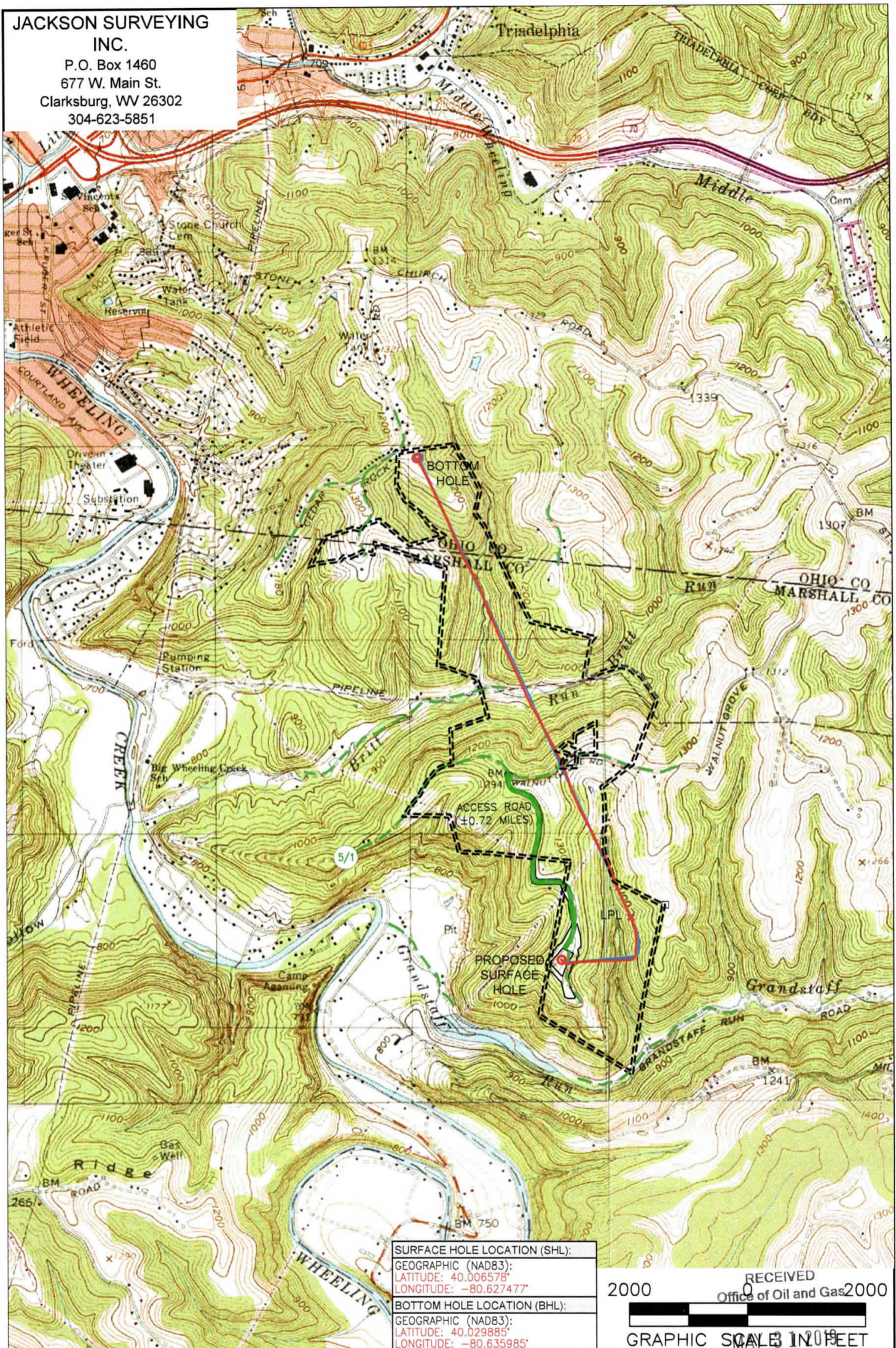
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WV Department of
Environmental Protection

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**JACKSON SURVEYING
INC.**

P.O. Box 1460
677 W. Main St.
Clarksburg, WV 26302
304-623-5851



SURFACE HOLE LOCATION (SHL):
GEOGRAPHIC (NAD83):
LATITUDE: 40.006578°
LONGITUDE: -80.627477°

BOTTOM HOLE LOCATION (BHL):
GEOGRAPHIC (NAD83):
LATITUDE: 40.029885°
LONGITUDE: -80.635985°

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2000
GRAPHIC SCALE IN FEET

NOTES ON SURVEY
1. SURFACE AND ROYALTY OWNER INFORMATION AND THEIR BOUNDARIES SHOWN HEREON WERE PLOTTED FROM DEEDS AND/OR TAX PARCEL MAPS PROVIDED BY CLIENT AND/OR FIELD LOCATIONS.
2. THIS PLAT DOES NOT REPRESENT A BOUNDARY SURVEY OF THE PARCELS SHOWN HEREON.
4. ALL INSETS ARE GRID NORTH UNLESS OTHERWISE DEPICTED.

LEGEND:
 PROPOSED SURFACE HOLE / BOTTOM HOLE
 EXISTING / PRODUCING WELLHEAD
 LPL
 FLOOD PLAIN
 WV DEPARTMENT OF PUBLIC ROAD ACCESS ROAD
 PREVIOUS SITE
 LEASE BOUNDARY
 PROPOSED PATH
 ASDRILLED PATH

WELL OPERATOR: SWN PRODUCTION COMPANY, LLC	WELL (FARM) NAME: BW EDGE MSH	WELL # 205H	SERIAL #
ADDRESS: 1300 FORT PEIRPONT RD., SUITE 200 MORGANTOWN, WV 26508	COUNTY - CODE MARSHALL - 051	DISTRICT; SAND HILL	
SURFACE OWNER: WILLIAM F. EDGE, JR. & BARBARA EDGE	USGS 7 1/2 QUADRANGLE MAP NAME WHEELING, WV-OHIO	API #: 47-051-01843	

**JACKSON SURVEYING
INC.**

P.O. Box 1460
677 W. Main St.
Clarksburg, WV 26302
304-623-5851

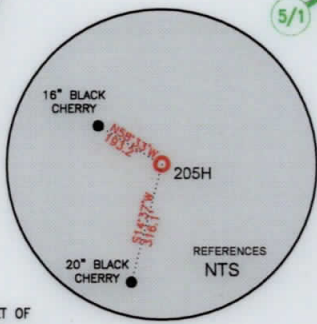
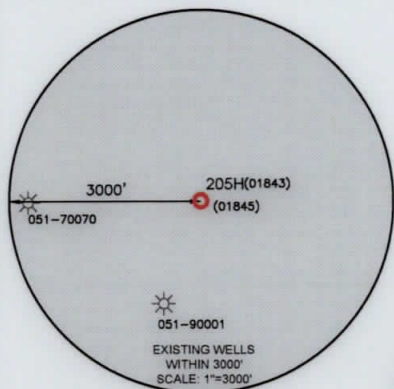
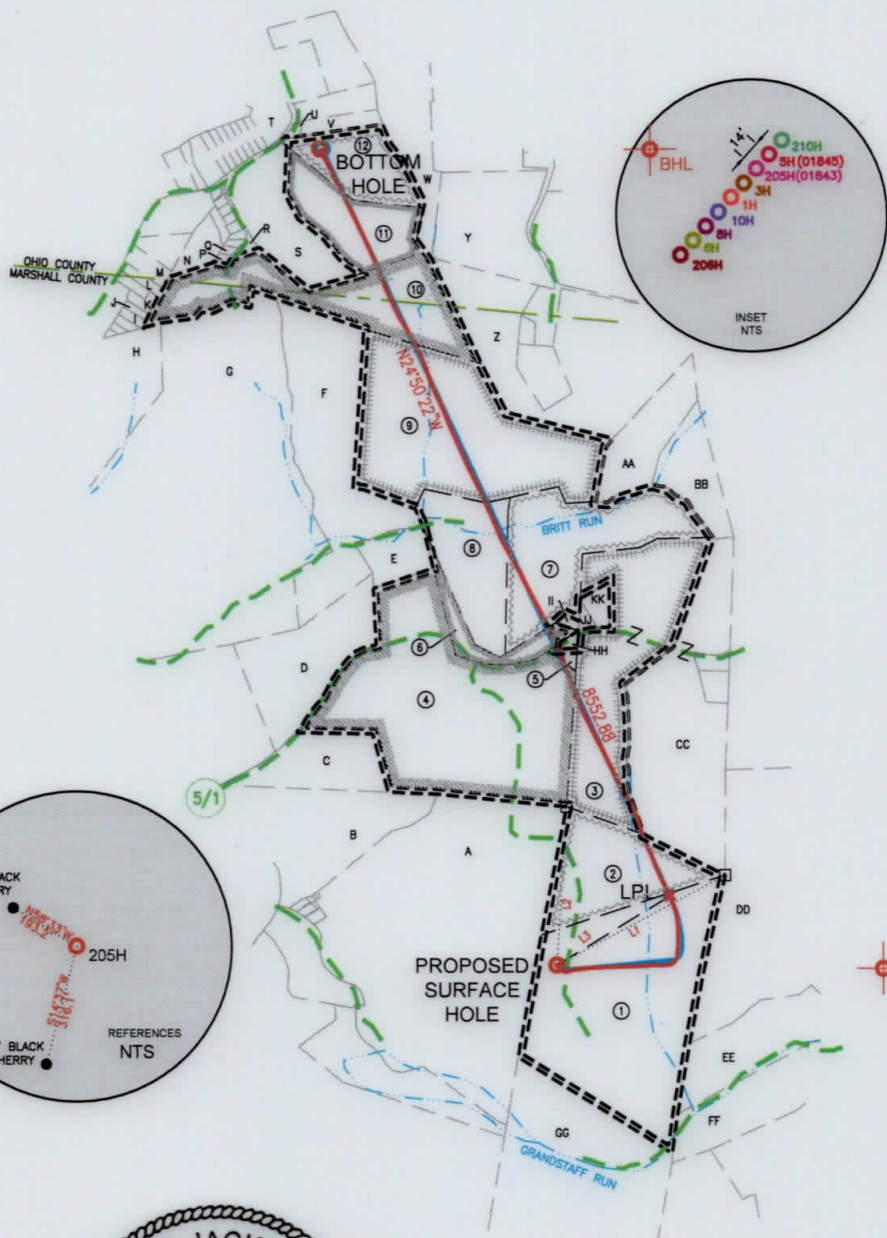
Latitude: 40°02'30"
Latitude: 40°02'30" BOTTOM HOLE

SURFACE HOLE 697'
3076'

LINE	BEARING	DISTANCE	DESCRIPTION	MONUMENT
L1	N 61°59'55" E	1989.11'	SHL TO LANDMARK	5/8" REBAR
L2	N 03°38'30" E	1646.45'	SHL TO LANDMARK	5/8" REBAR
LINE	BEARING	DISTANCE	CURVE LENGTH	DESCRIPTION
L3	N 58°40'03" E	1376.26'	1982.93'	SHL TO LPL

SURFACE HOLE LOCATION (SHL): UTM (NAD83, ZONE 17, METERS): NORTHING: 4,428,553.763 EASTING: 531,795.439
LANDING POINT (LPL): UTM (NAD83, ZONE 17, METERS): NORTHING: 4,428,775.910 EASTING: 532,153.109
BOTTOM HOLE LOCATION (BHL): UTM (NAD83, ZONE 17, METERS): NORTHING: 4,431,138.712 EASTING: 531,067.035
SURFACE HOLE LOCATION (SHL): UTM (NAD83, ZONE 17, METERS): NORTHING: 4,428,553.756 EASTING: 531,795.481
LANDING POINT (LPL): UTM (NAD83, ZONE 17, METERS): NORTHING: 4,428,771.889 EASTING: 532,153.789
BOTTOM HOLE LOCATION (BHL): UTM (NAD83, ZONE 17, METERS): NORTHING: 4,431,137.645 EASTING: 531,058.686

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



WELL RESTRICTIONS

- NO OCCUPIED DWELLINGS > 2500 SQ FT. WITHIN 625 FEET OF CENTER OF PAD.
- NO AGRICULTURE BUILDINGS > 2500 SQ FT. WITHIN 625 FEET OF CENTER OF PAD.
- NO WATER WELLS OR DEVELOPED SPRINGS ARE WITHIN 250 FEET OF PROPOSED WELL.
- NO PERENNIAL STREAMS, LAKES, PONDS, OR RESERVOIRS WITHIN 100 FEET OF THE LIMITS OF DISTURBANCE.
- NO NATURALLY PRODUCING TROUT STREAM WITHIN 300 FEET OF LIMITS OF DISTURBANCE.
- NO GROUND INTAKE OR PUBLIC WATER SUPPLY WITHIN 1000 FEET OF WELL PAD, LIMITS OF DISTURBANCE, E & S CONTROLS OR PUBLIC WATER SUPPLY.

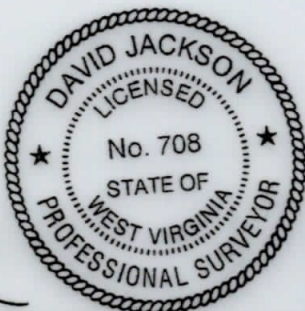
NOTES ON SURVEY

- SURFACE AND ROYALTY OWNER INFORMATION AND THEIR BOUNDARIES SHOWN HEREON WERE PLOTTED FROM DEEDS AND/OR TAX PARCEL MAPS PROVIDED BY CLIENT AND/OR FIELD LOCATIONS.
- THIS PLAT DOES NOT REPRESENT A BOUNDARY SURVEY OF THE PARCELS SHOWN HEREON.
- ALL INSETS ARE GRID NORTH UNLESS OTHERWISE DEPICTED.

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. 708

David L Jackson



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 SOURCE OF ELEVATION: SURVEY GRADE GPS (NAVD 88, US FT)

BW EDGE MSH
OPERATOR'S WELL #: 205H
API WELL #: 47 051 01843
STATE COUNTY PERMIT

WELL TYPE: OIL WASTE DISPOSAL PRODUCTION DEEP GAS LIQUID INJECTION STORAGE SHALLOW
WATERSHED: UPPER OHIO SOUTH ELEVATION: 1253.4'
DISTRICT: SAND HILL COUNTY: MARSHALL QUADRANGLE: WHEELING, WV-OHIO
SURFACE OWNER: WILLIAM F. EDGE, JR. & BARBARA EDGE ACREAGE: ±87.8
OIL & GAS ROYALTY OWNER: JOSEPHINE FLETCHER ACREAGE: ±115.8
DRILL DRILL DEEPER REDRILL FRACTURE OR STIMULATE PLUG OFF OLD FORMATION PERFORATE NEW FORMATION
CONVERT PLUG & ABANDON CLEAN OUT & REPLUG OTHER CHANGE (SPECIFY) ASDRILLED
TARGET FORMATION: MARCELLUS ESTIMATED DEPTH: 6,374' TVD 15,533' TMD

WELL OPERATOR: SWN PRODUCTION COMPANY, LLC ADDRESS: 1300 FORT PEIRPONT RD., SUITE 200
CITY: MORGANTOWN STATE: WV ZIP CODE: 26508
DESIGNATED AGENT: BRITTANY WOODY ADDRESS: 1300 FORT PEIRPONT RD., SUITE 200
CITY: MORGANTOWN STATE: WV ZIP CODE: 26508

LEGEND: ● PROPOSED SURFACE HOLE / BOTTOM HOLE * EXISTING / PRODUCING WELLHEAD LPL * LANDING POINT LOCATION ⊕ EXISTING WATER WELL ⊙ EXISTING SPRING	— SURVEYED BOUNDARY — DRILLING UNIT = LEASE BOUNDARY — ASDRILLED PATH — PROPOSED PATH	REVISIONS:	DATE: 05-16-2019 DRAWN BY: N. MANO SCALE: 1" = 2000' DRAWING NO: WELL LOCATION PLAT
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**JACKSON SURVEYING
INC.**

P.O. Box 1460
677 W. Main St.
Clarksburg, WV 26302
304-623-5951

WELL BORE TABLE FOR SURFACE / ROYALTY OWNERS		
TRACT	SURFACE OWNER / ROYALTY OWNER (R)	TAX PARCEL
1	WILLIAM F. EDGE JR. & BARBARA EDGE (S)/ JOSEPHINE FLETCHER (R)	12-09-08
TRACT	SURFACE OWNER	TAX PARCEL
2	WILLIAM F. EDGE JR. & BARBARA EDGE	12-09-08.1
3	CHESTER A. GIZA, ET UX	12-01-15
4	MARK A. & ANDREA K. SCHELLHASE	12-01-18
5	MARK A. & ANDREA K. SCHELLHASE	12-01-18.5
6	VIOLET MILLER	12-01-18.3
7	KENNETH L. MCNINCH, ET UX	12-01-14
8	PETE E. MALARSKI, ET UX.	12-01-12
9	MICHAEL L. & TYLENE R. COFFIELD	12-01-13
10	WALTER L. HARTMAN, ET UX	12-01-10.1
11	GREGORY W. & JILL ANN BEALL	06-T17-9.3
12	GREGORY W. & JILL ANN BEALL	06-T17-9.1

ADJOINING OWNERS TABLE		
TRACT	SURFACE OWNER	TAX PARCEL
A	EDITH ADELL FOLMER	12-01-19
B	GEORGE & LAURIE ADASE	12-01-28
C	GEORGE & LAURIE ADASE	12-01-29
D	ANNA LEASURE	12-01-30
E	STEPHEN M. BARTLOMICH	12-01-18.4
F	STEPHEN M. BARTLOMICH	12-01-11
G	MICHAEL L. & TYLENE R. COFFIELD	12-01-10
H	MARY SCHENK & GARY P. HAMILTON	12-01-5.1
I	LONNIE A. SNYDER	12-1A-83
J	LONNIE A. SNYDER	12-1A-83.2
K	DAVID A. STALEY, ET UX	12-1A-77
L	ALBERT R. YOUNG, SR.	6-T17-8321
M	ALBERT R. YOUNG, SR.	6-T17-8321
N	WALTER L. & GLORIA L. HARTMAN	6-T17-17
O	JERALD L. & KIMBERLY E. HETZEL	6-T17-17.10
P	DANIEL P. LAURA S. HOLMES	6-T17-17.2
Q	YUKIKO COMSTOCK	6-T17-17.3
R	WALTER L. & GLORIA L. HARTMAN	6-T17-17.11
S	RAYMOND A. & KAREN CAPPONE	6-T17-15
T	THOMAS E. & J. R. BEALL	6-T17-9.2
U	THOMAS E. & J. R. BEALL	6-T17-17.92
V	GREGORY W. & J. A. BEALL	6-T17-17.9
W	RIDGE RUNNER FARM, LLC	6-T12-14
Y	ROBERT H. & M.J. DAVIS	6-T17-13
Z	PATRICK J. LENZ	12-01-46
AA	PATRICK J. LENZ	12-01-14.1
BB	JAMES L. LITMAN, ET UX	12-01-14.2
CC	CHESTER A. GIZA, ET UX	12-01-16
DD	CHESTER A. GIZA, ET UX	12-02-14
EE	ROBERT A. ISLAY SR. ESTATE	12-02-13
FF	WILLIAM E. GIBSON	12-09-12
GG	ROBERT A. ISLAY SR. ESTATE	12-09-09
HH	CHESTER L. & KAREN S. SMITH	12-01-18.2
II	JOSEPHINE GRACE NORMAN	12-01-18.1
JJ	ARTHUR W. STRICKLIN, ET UX LIFE ESTATE	12-01-15.1
KK	ARTHUR W. STRICKLIN, ET UX LIFE ESTATE	12-01-15.2

REVISIONS:	COMPANY:	SWN Production Company, LLC		SWN $\frac{R}{A} - V^{+0}$ Production Company™
	OPERATOR'S	BW EDGE MSH		DATE: 05-16-2019
	WELL #:	205H		WELL NO. N. W. 205H
	DISTRICT:	COUNTY:	STATE:	SECTION: N/A
	SAND HILL	MARSHALL	WV	WELL PLAN: 2