

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

API 47 - 049 - 02491 County Marion District Lincoln
Quad Shinnston Pad Name Sands Pad Field/Pool Name Marcellus
Farm name XTO Energy Inc. Well Number Sands Unit A 3H
Operator (as registered with the OOG) XTO Energy Inc.
Address PO Box 1008 City Jane Lew State WV Zip 26378

As Drilled location NAD 83/UTM Attach an as-drilled plat, profile view, and deviation survey
Top hole Northing 4368404.929 Easting 559065.408
Landing Point of Curve Northing 4368110.739 Easting 558862.789
Bottom Hole Northing 4365134.971 Easting 561271.002

Elevation (ft) 1,230' 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)
OBM, Fluid Loss, Wetting Agent, Viscosifier, Barite, Emulsifier.

Date permit issued 3/20/2019 Date drilling commenced 8/6/2019 Date drilling ceased 2/13/2020
Date completion activities began 6/27/2021 Date completion activities ceased 10/4/2021
Verbal plugging (Y/N) _____ Date permission granted _____ Granted by _____

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

Freshwater depth(s) ft 120', 200' Open mine(s) (Y/N) depths N
Salt water depth(s) ft 1,450' & 1,800' Void(s) encountered (Y/N) depths N
Coal depth(s) ft 420' - 427' Cavern(s) encountered (Y/N) depths N
Is coal being mined in area (Y/N) Y

Reviewed by:
[Signature]
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API 47-049 - 02491 Farm name XTO Energy Inc. Well number Sands Unit A 3H

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	28"	24"	40'	New	PE&B / 95#		N
Surface	17 1/2"	13 3/8"	524'	New	H-40 / 48#		Y
Coal							
Intermediate 1	12 3/8"	9 5/8"	3,157'	New	J-55 / 36#		Y
Intermediate 2							
Intermediate 3							
Production	8 3/4" & 8 1/2"	5 1/2"	20,460'	New	P-110 / 20#		Est. TOC 5,100'
Tubing							
Packer type and depth set							

Comment Details Conductor - cement poured directly into annulus.

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	A	90				0	
Surface	A	475	15.6	1.21	574.75	0	
Coal							
Intermediate 1	A	1,140	15.6	1.19	1,356.60	0	
Intermediate 2							
Intermediate 3							
Production	H	510 / 2,205	15.2 / 15.6	1.10 / 1.57	561 / 3,461.85	Est. TOC 5,100'	
Tubing							

Drillers TD (ft) 20,500' Loggers TD (ft) 20,477'

Deepest formation penetrated Marcellus Plug back to (ft) N/A

Plug back procedure N/A

Kick off depth (ft) 7,783'

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 - Every 120'

Intermediate - Every 120'

Production - Every 80'

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 ProTechnics Chemical

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PERFORATION RECORD

Stage No.	Perforation date	Perforated from MD ft.	Perforated to MD ft.	Number of Perforations	Formation(s)
	See attached.				

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 attached.					

Please insert additional pages as applicable.

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<u>PRODUCING FORMATION(S)</u>	<u>DEPTHS</u>	
<u>Marcellus</u>	<u>7547</u> TVD	<u>20500</u> MD
_____	_____	_____
_____	_____	_____

Please insert additional pages as applicable.

GAS TEST Build up Drawdown Open Flow OIL TEST Flow Pump

SHUT-IN PRESSURE Surface 3270 psi Bottom Hole _____ psi DURATION OF TEST 24 hrs

OPEN FLOW Gas 13138 mcfpd Oil 0 bpd NGL 0 bpd Water 882 bpd GAS MEASURED BY Estimated Orifice Pilot

<u>LITHOLOGY/ FORMATION</u>	<u>TOP DEPTH IN FT NAME TVD</u>	<u>BOTTOM DEPTH IN FT TVD</u>	<u>TOP DEPTH IN FT MD</u>	<u>BOTTOM DEPTH IN FT MD</u>	<u>DESCRIBE ROCK TYPE AND RECORD QUANTITY AND TYPE OF FLUID (FRESHWATER, BRINE, OIL, GAS, H₂S, ETC)</u>
<u>See attached.</u>	<u>0</u>		<u>0</u>		

Please insert additional pages as applicable.

Drilling Contractor Patterson UTI Drilling
Address 207 Carlton Dr. City Eighty Four State PA Zip 15330

Logging Company Baker Hughes
Address 370 Westec Dr. City Mount Pleasant State PA Zip 15666

Cementing Company NexTier
Address 1650 Hackers Creek Rd City Jane Lew State WV Zip 26378

Stimulating Company Universal
Address 2605 Nicholson Rd Suite 5230 I City Sewickley State PA Zip 15143

Please insert additional pages as applicable.

Completed by Tim Sands Telephone 304-517-3546
Signature [Signature] Title Regulatory Coordinator Date 12-22-2021

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

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Well Sands Unit A 3H
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Stage	Perf Date	Perf from MD ft.	Perf to MD ft.	Number of Perfs	Formation(s)
1	7/27/2021	20141	20289	48	Marcellus
2	7/29/2021	19941	20089	48	Marcellus
3	7/30/2021	19741	19889	48	Marcellus
4	7/31/2021	19541	19689	48	Marcellus
5	8/1/2021	19341	19489	48	Marcellus
6	8/2/2021	19141	19289	48	Marcellus
7	8/3/2021	18941	19116	48	Marcellus
8	8/4/2021	18741	18889	48	Marcellus
9	8/5/2021	18541	18689	48	Marcellus
10	8/6/2021	18341	18489	48	Marcellus
11	8/7/2021	18141	18289	36	Marcellus
12	8/8/2021	17941	18089	36	Marcellus
13	8/9/2021	17741	17889	36	Marcellus
14	8/10/2021	17541	17689	36	Marcellus
15	8/11/2021	17341	17489	36	Marcellus
16	8/12/2021	17141	17289	36	Marcellus
17	8/13/2021	16941	17089	36	Marcellus
18	8/14/2021	16741	16889	36	Marcellus
19	8/15/2021	16541	16689	36	Marcellus
20	8/16/2021	16341	16489	36	Marcellus
21	8/17/2021	16141	16289	36	Marcellus
22	8/18/2021	15941	16089	36	Marcellus
23	8/19/2021	15741	15889	36	Marcellus
24	8/20/2021	15541	15689	36	Marcellus
25	8/21/2021	15341	15489	36	Marcellus
26	8/23/2021	15141	15289	36	Marcellus
27	8/24/2021	14941	15089	36	Marcellus
28	8/25/2021	14741	14889	36	Marcellus
29	8/26/2021	14541	14689	36	Marcellus
30	8/28/2021	14341	14489	36	Marcellus
31	8/31/2021	14141	14289	36	Marcellus
32	8/31/2021	13941	14089	36	Marcellus
33	9/2/2021	13741	13889	36	Marcellus
34	9/4/2021	13541	13689	36	Marcellus
35	9/4/2021	13341	13489	36	Marcellus
36	9/6/2021	13141	13289	36	Marcellus
37	9/6/2021	12941	13089	36	Marcellus
38	9/8/2021	12741	12889	36	Marcellus
39	9/8/2021	12541	12689	36	Marcellus
40	9/9/2021	12341	12489	36	Marcellus
41	9/10/2021	12141	12289	36	Marcellus
42	9/11/2021	11941	12089	36	Marcellus
43	9/11/2021	11741	11889	36	Marcellus
44	9/12/2021	11541	11689	36	Marcellus
45	9/12/2021	11341	11489	36	Marcellus
46	9/13/2021	11141	11289	36	Marcellus
47	9/13/2021	10941	11089	36	Marcellus
48	9/14/2021	10741	10889	36	Marcellus
49	9/14/2021	10541	10689	36	Marcellus
50	9/15/2021	10341	10489	36	Marcellus
51	9/15/2021	10141	10289	36	Marcellus
52	9/15/2021	9941	10089	36	Marcellus
53	9/16/2021	9741	9889	36	Marcellus
54	9/17/2021	9541	9689	36	Marcellus
55	9/17/2021	9341	9489	36	Marcellus

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56	9/18/2021	9141	9289	36	Marcellus
57	9/18/2021	8941	9089	36	Marcellus
58	9/19/2021	8741	8889	36	Marcellus
59	9/19/2021	8541	8689	36	Marcellus
60	9/20/2021	8341	8489	36	Marcellus
61	9/20/2021	8141	8289	36	Marcellus
62	9/20/2021	7941	8089	36	Marcellus

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Well Sands Unit A 3H
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Stage	Stimulation Date	Avg. Pump Rate (BPM)	Avg. Treatment Pressure (PSI)	Max Breakdown Pressure (PSI)	ISIP (PSI)	Amount of Proppant (lbs)	Amount of Water (bbls)	Amount of Nitrogen
1	7/27/2021	80.70	9009	7032	4194.00	410498	11821	0
2	7/29/2021	81.30	9001	6280	4528.00	410437	11858	0
3	7/30/2021	84.10	8933	5807	4781.00	411238	11868	0
4	7/31/2021	77.80	8978	7388	4890.00	410765	11781	0
5	8/1/2021	79.30	9026	7602	5009.00	410661	12025	0
6	8/2/2021	83.70	8983	5014	5499.00	410779	11865	0
7	8/3/2021	87.30	9026	6511	5104.00	410325	11809	0
8	8/4/2021	85.00	8764	6519	5117.00	410507	11773	0
9	8/5/2021	89.00	8892	6472	5140.00	410741	13242	0
10	8/6/2021	88.00	8973	6995	5207.00	411577	11634	0
11	8/7/2021	89.60	9008	5204	5246.00	410822	11906	0
12	8/8/2021	84.80	8836	7463	4970.00	412463	11996	0
13	8/9/2021	84.30	8820	6174	5079.00	412351	11900	0
14	8/10/2021	89.00	8944	6494	4805.00	412531	11938	0
15	8/11/2021	90.10	8794	6209	4716.00	414288	11804	0
16	8/12/2021	92.40	8910	6109	5189.00	412040	11878	0
17	8/13/2021	92.00	8972	6454	5196.00	412177	11788	0
18	8/14/2021	91.50	8928	6049	5101.00	412656	11741	0
19	8/15/2021	94.70	8967	6151	5114.00	412867	11896	0
20	8/16/2021	93.20	8880	6318	4779.00	353786	11622	0
21	8/17/2021	92.90	8893	6115	4857.00	412170	11903	0
22	8/18/2021	94.40	8815	6268	5085.00	412505	11728	0
23	8/19/2021	95.50	8935	6354	5471.00	412355	11844	0
24	8/20/2021	94.70	8917	5925	5175.00	412233	11796	0
25	8/21/2021	95.30	8949	6262	4979.00	413077	11653	0
26	8/23/2021	92.80	8855	6205	5722.00	412331	13129	0
27	8/24/2021	96.30	8885	6486	5752.00	412383	11598	0
28	8/25/2021	94.80	8751	6444	5608.00	413733	11649	0
29	8/26/2021	94.50	8730	6141	5334.00	414032	11276	0
30	8/28/2021	97.90	8600	5517	5343.00	413048	10980	0
31	8/31/2021	99.20	8573	6003	5614.00	412719	11795	0
32	8/31/2021	96.80	8698	6634	5436.00	415573	11423	0
33	9/2/2021	94.40	9012	6748	5268.00	412262	11180	0
34	9/4/2021	100.20	8778	6377	5853.00	412855	11288	0
35	9/4/2021	97.30	8565	6681	5754.00	412345	11433	0
36	9/6/2021	99.90	8555	6787	5574.00	412845	11199	0
37	9/6/2021	99.40	8671	6196	5375.00	412991	11857	0
38	9/8/2021	97.50	8040	6093	5528.00	412446	11672	0
39	9/8/2021	99.30	8087	5552	5418.00	412635	11754	0
40	9/9/2021	100.10	8257	6473	5428.00	413312	11703	0
41	9/10/2021	99.80	8484	6270	5689.00	412400	11714	0
42	9/11/2021	100.00	8652	6849	5697.00	416700	11721	0
43	9/11/2021	99.40	8498	6555	5453.00	412900	11685	0
44	9/12/2021	99.70	8576	5654	5565.00	398466	11474	0
45	9/12/2021	99.80	8355	6532	5757.00	412507	11649	0
46	9/13/2021	100.10	8340	6433	5686.00	412650	11633	0
47	9/13/2021	99.80	8225	6018	5635.00	397432	11516	0
48	9/14/2021	99.80	8039	5931	5590.00	412283	11678	0
49	9/14/2021	100.20	8094	5844	5686.00	412271	11675	0
50	9/15/2021	100.40	7967	6048	5649.00	412137	11625	0
51	9/15/2021	100.00	8010	6127	5661.00	412457	11637	0
52	9/15/2021	100.00	8008	5895	5744.00	412378	11693	0
53	9/16/2021	100.20	7949	5771	5693.00	412212	11670	0
54	9/17/2021	99.90	7986	6131	5743.00	412693	11616	0
55	9/17/2021	99.80	7927	5681	5683.00	415962	12034	0
56	9/18/2021	99.80	8032	5773	5561.00	413315	11746	0
57	9/18/2021	100.20	7946	6191	5150.00	414210	11745	0
58	9/19/2021	99.80	8203	6367	5130.00	413321	11822	0

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59	9/19/2021	99.50	7778	5839	5124.00	414133	11829	0
60	9/20/2021	100.00	8006	5993	5484.00	335023	10867	0
61	9/20/2021	99.70	7782	6407	5771.00	411537	11819	0
62	9/20/2021	99.40	7605	6330	5754.00	444807	12437	0

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Well
API

Sands Unit A 3H
47-049-02491

Lithology/Formation Name	Top Depth TVD	Bottom Depth TVD	Top Depth MD	Bottom Depth MD	Describe Rock Type and Record Quantity and Type of Fluid (Freshwater, Brine, Oil, Gas, H2S, ETC)
Dirt	0	31	0	31	
Sandstone	31	143	31	143	
Shale	143	279	143	279	
Sandstone	279	420	279	420	
Coal	420	427	420	427	
Shale	427	542	427	542	
SDY Shale	542	629	542	629	
Red Rock	629	639	629	639	
SDY Shale	639	659	639	659	
Red Rock	659	704	659	704	
Shale	704	969	704	969	
Sandstone	969	1,009	969	1,009	
SDY Shale	1,009	1,409	1,009	1,409	
Sandstone	1,409	1,539	1,409	1,539	
Shale	1,539	1,819	1,539	1,819	
Sandstone	1,819	1,899	1,819	1,899	
Shale	1,899	2,039	1,899	2,039	
Sandstone	2,039	2,109	2,039	2,109	
SDY Shale	2,109	2,309	2,109	2,309	
Sandstone	2,309	2,389	2,309	2,389	
SDY Shale	2,389	2,519	2,389	2,519	
Sandstone	2,519	2,549	2,519	2,549	
SDY Shale	2,549	2,629	2,549	2,629	
Sandstone	2,629	2,739	2,629	2,739	
Shale	2,739	2,889	2,739	2,889	
Sandstone	2,889	2,919	2,889	2,919	
SDY Shale	2,919	3,154	2,919	3,154	
Shale	3,154	3,989	3,154	3,989	
Sandstone	3,989	4,259	3,989	4,259	
Shale	4,259	4,469	4,259	4,469	
SDY Shale	4,469	4,638	4,469	4,638	
Sandstone	4,638	4,679	4,638	4,679	
SDY Shale	4,679	5,209	4,679	5,209	
Shale	5,209	5,319	5,209	5,319	
Sandstone	5,319	5,459	5,319	5,459	
Shale	5,459	7,203	5,459	7,352	
Burket Shale	7,221	7,243	7,371	7,399	
Tully Limestone	7,243	7,293	7,399	7,462	
Hamilton Shale	7,293	7,433	7,462	7,693	
Marcellus	7,433		7,693	20,500	

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Hydraulic Fracturing Fluid Product Component Information Disclosure

Job Start Date:	7/27/2021
Job End Date:	9/21/2021
State:	West Virginia
County:	Marion
API Number:	47-049-02491-00-00
Operator Name:	XTO Energy/ExxonMobil
Well Name and Number:	Sands Unit A 3H
Latitude:	39.46311100
Longitude:	-80.31358240
Datum:	NAD83
Federal Well:	NO
Indian Well:	NO
True Vertical Depth:	7,547
Total Base Water Volume (gal):	31,451,826
Total Base Non Water Volume:	0



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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	Cabot	Carrier/Base Fluid					
			Water	7732-18-5	100.00000	90.69864	None
Sand	UPP	Proppant					
			Crystalline Silica in the form of Quartz	14808-60-7	99.90000	8.78345	None
HCL Acid (15%)	UPP	Acidizing					
			Hydrochloric Acid	7647-01-0	7.50000	0.03206	None
FR-3	UPP	Friction reducer					
			Hydrotreated Petroleum Distillate	64742-47-8	20.00000	0.01257	None
			Oleic Acid Diethanolamide	93-83-4	1.50000	0.00094	None
			Ammonium Chloride	12125-02-9	1.50000	0.00094	None
			Alcohol Ethoxylate Surfactants	68551-12-2	1.00000	0.00063	None
Scale Hib PE-18 (Summer)	UPP	Scale Inhibitor					
			Proprietary Scale Inhibitor	Proprietary	30.00000	0.00295	None
MBC 10:5	UPP	Biocide					
			Alkyl dimethyl benzyl ammonium chloride (C 12-16)	68424-85-1	10.00000	0.00087	None
			Glutaraldehyde	111-30-8	5.00000	0.00043	None

			Ethanol	64-17-5	5.00000	0.00043	None
Unihib G	Upp	Acid inhibitor					
			Butyl diglycol	112-34-5	75.00000	0.00025	None
			Alcohols, C10-16, ethoxylated	68002-97-1	50.00000	0.00017	None
			Methanol	67-56-1	5.00000	0.00002	None
			Formaldehyde	50-00-0	1.00000	0.00000	None
			Thiourea	62-56-6	1.00000	0.00000	None
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.							
Other Chemical(s)	Listed Above	See Trade Name(s) List					
			Ammonium Chloride	12125-02-9	1.50000	0.00094	
			Oleic Acid Diethanolamide	93-83-4	1.50000	0.00094	
			Alcohol Ethoxylate Surfactants	68551-12-2	1.00000	0.00063	
			Ethanol	64-17-5	5.00000	0.00043	
			Glutaraldehyde	111-30-8	5.00000	0.00043	
			Alcohols, C10-16, ethoxylated	68002-97-1	50.00000	0.00017	
			Methanol	67-56-1	5.00000	0.00002	
			Formaldehyde	50-00-0	1.00000	0.00000	
			Thiourea	62-56-6	1.00000	0.00000	

* 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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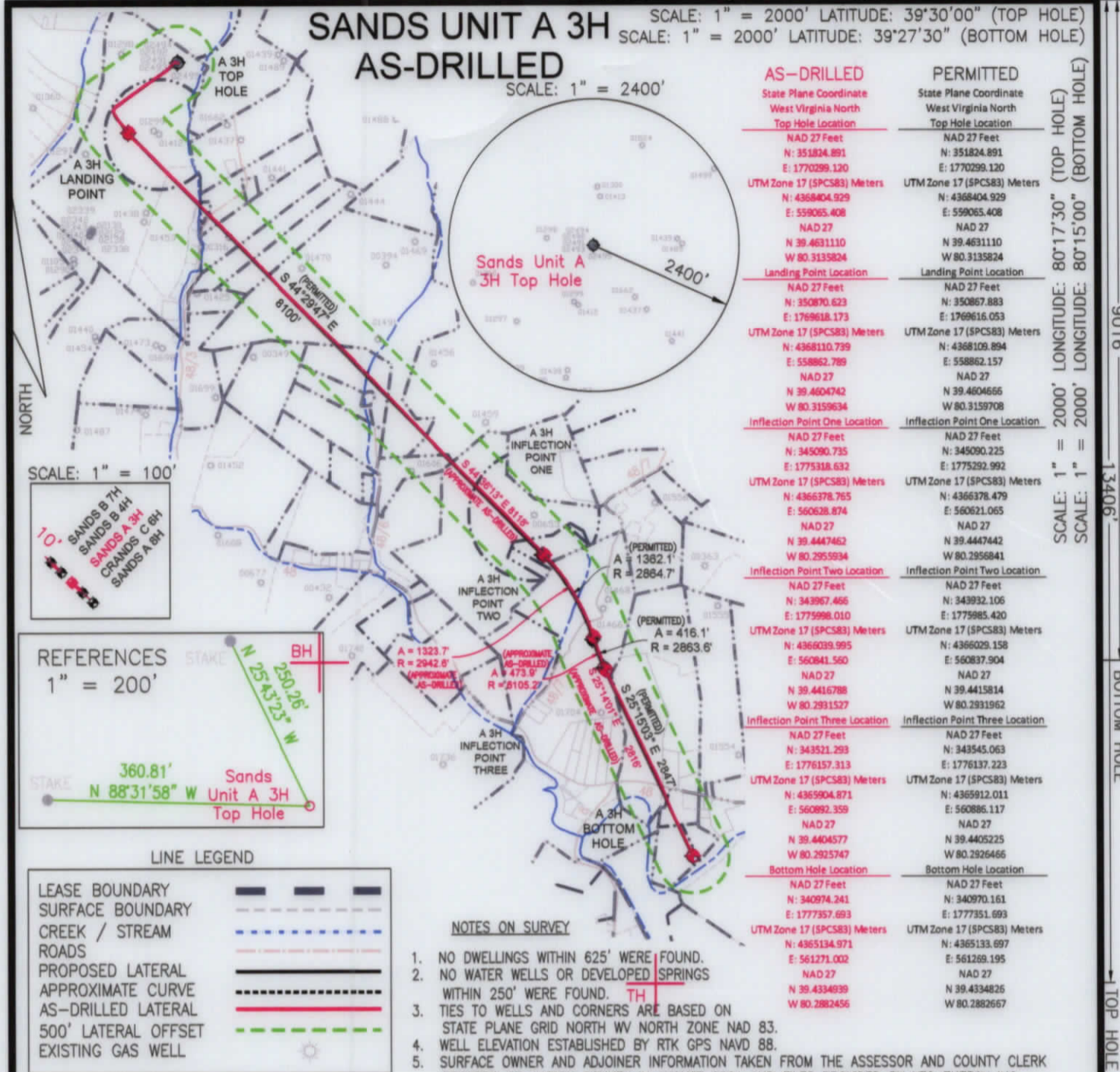
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BOTTOM HOLE 10748' 6133'

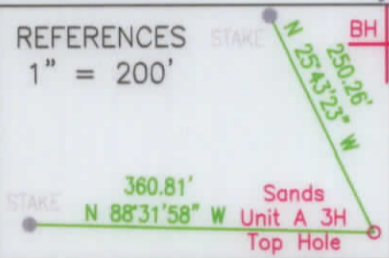
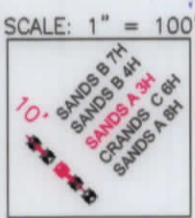
SANDS UNIT A 3H AS-DRILLED

SCALE: 1" = 2000' LATITUDE: 39°30'00" (TOP HOLE)
SCALE: 1" = 2000' LATITUDE: 39°27'30" (BOTTOM HOLE)

SCALE: 1" = 2400'



AS-DRILLED	PERMITTED
State Plane Coordinate West Virginia North	State Plane Coordinate West Virginia North
Top Hole Location	Top Hole Location
NAD 27 Feet N: 351824.891 E: 1770299.120	NAD 27 Feet N: 351824.891 E: 1770299.120
UTM Zone 17 (SPCS83) Meters N: 4368404.929 E: 559065.408	UTM Zone 17 (SPCS83) Meters N: 4368404.929 E: 559065.408
NAD 27 N 39 4631110 W 80 3135824	NAD 27 N 39 4631110 W 80 3135824
Landing Point Location	Landing Point Location
NAD 27 Feet N: 350870.623 E: 1769618.173	NAD 27 Feet N: 350870.623 E: 1769618.173
UTM Zone 17 (SPCS83) Meters N: 4368110.739 E: 558862.789	UTM Zone 17 (SPCS83) Meters N: 4368110.739 E: 558862.789
NAD 27 N 39 4604742 W 80 3159708	NAD 27 N 39 4604742 W 80 3159708
Inflection Point One Location	Inflection Point One Location
NAD 27 Feet N: 345090.735 E: 1775318.632	NAD 27 Feet N: 345090.735 E: 1775292.992
UTM Zone 17 (SPCS83) Meters N: 4366378.785 E: 560628.874	UTM Zone 17 (SPCS83) Meters N: 4366378.479 E: 560621.065
NAD 27 N 39 4447462 W 80 2955934	NAD 27 N 39 4447442 W 80 2956841
Inflection Point Two Location	Inflection Point Two Location
NAD 27 Feet N: 343967.466 E: 1775986.010	NAD 27 Feet N: 343932.106 E: 1775985.420
UTM Zone 17 (SPCS83) Meters N: 4366039.995 E: 560841.560	UTM Zone 17 (SPCS83) Meters N: 4366029.158 E: 560837.904
NAD 27 N 39 4416788 W 80 2931527	NAD 27 N 39 4415814 W 80 2931962
Inflection Point Three Location	Inflection Point Three Location
NAD 27 Feet N: 343521.293 E: 1776157.313	NAD 27 Feet N: 343545.063 E: 1776137.223
UTM Zone 17 (SPCS83) Meters N: 4365904.871 E: 560892.359	UTM Zone 17 (SPCS83) Meters N: 4365912.011 E: 560886.117
NAD 27 N 39 4404577 W 80 2925747	NAD 27 N 39 4405225 W 80 2926466
Bottom Hole Location	Bottom Hole Location
NAD 27 Feet N: 340974.241 E: 1777357.693	NAD 27 Feet N: 340970.161 E: 1777351.693
UTM Zone 17 (SPCS83) Meters N: 4365134.971 E: 561271.002	UTM Zone 17 (SPCS83) Meters N: 4365133.697 E: 561269.195
NAD 27 N 39 4334939 W 80 2882456	NAD 27 N 39 4334826 W 80 2882667



LINE LEGEND

LEASE BOUNDARY	---
SURFACE BOUNDARY	- - - -
CREEK / STREAM	~ ~ ~ ~
ROADS	— — — —
PROPOSED LATERAL	— — — —
APPROXIMATE CURVE	- · - · - ·
AS-DRILLED LATERAL	— · — · — ·
500' LATERAL OFFSET	- · - · - ·
EXISTING GAS WELL	⊙

NOTES ON SURVEY

- NO DWELLINGS WITHIN 625' WERE FOUND.
- NO WATER WELLS OR DEVELOPED SPRINGS WITHIN 250' WERE FOUND.
- TIES TO WELLS AND CORNERS ARE BASED ON STATE PLANE GRID NORTH WV NORTH ZONE NAD 83.
- WELL ELEVATION ESTABLISHED BY RTK GPS NAVD 88.
- SURFACE OWNER AND ADJOINER INFORMATION TAKEN FROM THE ASSESSOR AND COUNTY CLERK RECORDS OF MARION COUNTY IN AUGUST 2021 AND FILES PROVIDED BY XTO ENERGY INC.
- WELLS SHOWN ARE TAKEN FROM RECORDS OF WDEP AND SURVEYED LOCATIONS.



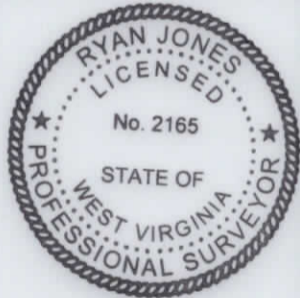
2402 PENNSYLVANIA 66 DELMONT, PA 15626
(724) 757 - 2417 www.jonesconsultant.com

SHEET 1 OF 2

FILE #: JC2017-18
DRAWING #: SANDS A 3H AS-DRILLED
SCALE: 1" = 2000'
MINIMUM DEGREE OF ACCURACY: 1:2500
PROVEN SOURCE OF ELEVATION: RTK 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 RULES ISSUED AND PRESCRIBED BY THE DEPARTMENT OF ENVIRONMENTAL PROTECTION.

Signed: *[Signature]*
R.P.E.: _____ P.S.: 2165



(+) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS
WVDEP
OFFICE OF OIL & GAS
601 57TH STREET
CHARLESTON, WV 25304

DATE: 8/5/2021
OPERATOR'S WELL #: SANDS UNIT A 3H
API WELL #: 47 049 02491
STATE COUNTY PERMIT

Well Type: Oil Waste Disposal Production Deep
 Gas Liquid Injection Storage Shallow

WATERSHED: LOWER WEST FORK RIVER (0502000206)
COUNTY/DISTRICT: MARION / LINCOLN
SURFACE OWNER: XTO ENERGY INC
OIL & GAS ROYALTY OWNER: XTO ENERGY INC

ELEVATION: 1,230' (EXISTING GRADE)
QUADRANGLE: SHINNSTON 7.5
ACREAGE: 105.34±
ACREAGE: 774.4±

01/21/2022

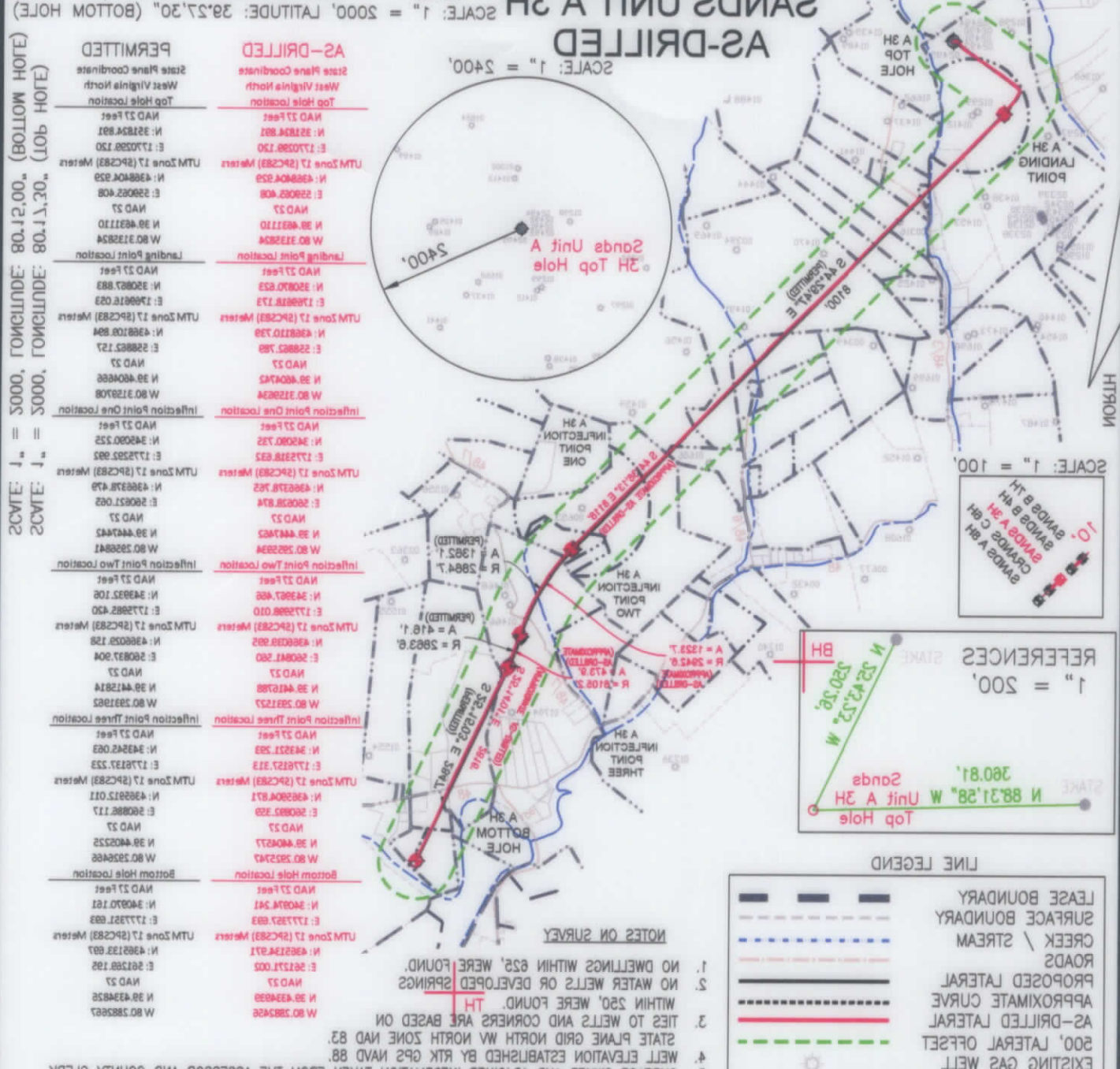
DRILL CONVERT DRILL DEEPER REDRILL FRACTURE OR STIMULATE
PLUG OFF OLD FORMATION PERFORATE NEW FORMATION PLUG & ABANDON
CLEAN OUT & REPLUG OTHER CHANGE (SPECIFY): _____

TARGET FORMATION: MARCELLUS
ESTIMATED DEPTH: 7,547' (TVD), 20,500' (TMD) AS-DRILLED

WELL OPERATOR: XTO ENERGY INC.
Address: 190 THORN HILL ROAD
City: WARRENDALE State: PA Zip Code: 15086

DESIGNATED AGENT: GARY BEALL
Address: P.O. BOX 1008
City: JANE LEW State: WV Zip Code: 26378

TOP HOLE 10748' BOTTOM HOLE 8012.00' (BOTTOM HOLE) 8012.00' (BOTTOM HOLE) 8012.00' (BOTTOM HOLE) 8012.00' (BOTTOM HOLE)



JONES CONSULTANTS

FILE #: 102017-18
DRAWING #: SANDS A 3H AS-DRILLED
SCALE: 1" = 2000'
MINIMUM DEGREE OF ACCURACY: 1:2500
PROVEN SOURCE OF ELEVATION: RTK GPS

Signed: _____
R.P.E.: _____
P.S.: _____

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 RULES ISSUED AND PRESCRIBED BY THE DEPARTMENT OF ENVIRONMENTAL PROTECTION.

RYAN JONES
LICENSED PROFESSIONAL SURVEYOR
STATE OF WEST VIRGINIA
No. 2165

www.jonesconsultant.com
(254) 757-2417
2402 PENNSYLVANIA @ DELMONT, PA 15626
SHEET 1 OF 2

CHARLESTON, WV 25304
801 57TH STREET
OFFICE OF OIL & GAS
WDEP
UNITED STATES TOPOGRAPHIC MAPS
(+) DENOTES LOCATION OF WELL ON

WELL OPERATOR: XTO ENERGY INC.
Address: 190 THORN HILL ROAD
City: WARRENDALE State: PA Zip Code: 15086

TARGET FORMATION: MARCELLUS

ESTIMATED DEPTH: 7547' (TVD), 20500' (TMD) AS-DRILLED

CLEAN OUT & REPLUG OTHER CHANGE (SPECIFY): _____

PLUG OFF OLD FORMATION PERFORATE NEW FORMATION PLUG & ABANDON

DRILL CONVERT DRILL DEEPER REDRILL FRACTURE OR STIMULATE

OIL & GAS ROYALTY OWNER: XTO ENERGY INC
COUNTY/DISTRICT: MARION / LINCOLN
WATERSHED: LOWER WEST FORK RIVER (050200206)

Well Type: Oil Waste Disposal Production Deep Gas Liquid Injection Storage Shallow

PROVEN SOURCE OF ELEVATION: RTK GPS
MINIMUM DEGREE OF ACCURACY: 1:2500
SCALE: 1" = 2000'
DRAWING #: SANDS A 3H AS-DRILLED
FILE #: 102017-18

DATE: 8/2/2021
OPERATOR'S WELL #: SANDS UNIT A 3H
API WELL #: 47
STATE COUNTY PERMIT 049 02491

DESIGNATED AGENT: GARY BEALL
Address: P.O. BOX 1008
City: JANE LEW State: WV Zip Code: 26378

01/21/2022



SANDS UNIT A 3H AS-DRILLED

LINE LEGEND

LEASE BOUNDARY	---
SURFACE BOUNDARY	---
CREEK / STREAM	---
ROADS	---
PROPOSED LATERAL	---
APPROXIMATE CURVE	---
AS-DRILLED LATERAL	---
500' LATERAL OFFSET	---

SANDS UNIT A 3H		
LEASE	LESSOR	MINERAL ACREAGE
1)	TRIO PETROLEUM CORP	138.05
2)	WACO OIL AND GAS CO. INC.	35.185
3)	JAMES C. WEEKLY, JR	0.91
4)	JAMES C. WEEKLY, JR	16.22
5)	LACY BOGCESS, ET VIR	18.00
6)	O. JOAN WEEKLY	17.00
7)	JOANNE EDGEELL	15.52
8)	PATRICIA ANN JUDY, ET AL	130.00
9)	DAVID M. TETRICK	20.00
10)	WACO OIL AND GAS CO. INC.	86.00
11)	EUGENE V. TETRICK, ET AL	8.00
12)	BERTA PEARL LAUGHLIN, ET AL	80.00
13)	BERTA PEARL LAUGHLIN	31.053
14)	BRENDA K. JOSEPH, ET AL	6.50
15)	WACO OIL AND GAS CO. INC., ET AL	91.49
16)	XTO ENERGY INC	68.16
17)	XTO ENERGY INC	2.452
18)	MICHAEL JOSEPH BOUFFIQUX	9.82

AS-DRILLED		
	SURFACE OWNER	TAX PARCEL
A	JEFFREY D. WEEKLY	11-53-29.1
B	JAMES C. WEEKLY, JR	11-57-11.4
C	VIRGINIA K. WEEKLY	11-57-11.2
D	JESSICA N. WEEKLY, ET VIR	11-57-11.5
E	ROGER L. WEEKLY	11-53-31.1
F	DAVID M. TETRICK, ET UX	11-53-3.8
G	JAMES B. WEEKLY	11-53-29.2
H	MANDY A. INGLES, ET VIR	11-51-20.2
I	ROBERT D. WILFONG	11-51-20.1
J	LORAN K. LOWDERMILK, ET VIR	11-51-23.2
K	MARK S. MCINTIRE, ET UX	11-51-23.5
L	COLETTE A. MELTON	11-51-21.4
M	HOMER L. ISER, ET UX	11-51-18
N	WILLIAM L. MILLER, JR., ET UX	11-51-15.6
O	WILLIAM G. DECKER, ET UX	11-51-15.7
P	WILLIAM G. DECKER, ET UX	11-51-15.9
Q	HOMER L. ISER, ET UX	11-51-17
R	COLLEEN DAY	11-51-25

PERMITTED
State Plane Coordinate
West Virginia North
Top Hole Location
NAD 27 Feet
N: 351824.891
E: 1770299.120
UTM Zone 17 (SPCS83) Meters
N: 4368404.929
E: 559065.408
NAD 27
N 39.4631110
W 80.3135824
Landing Point Location
NAD 27 Feet
N: 350867.883
E: 1769616.053
UTM Zone 17 (SPCS83) Meters
N: 4368109.894
E: 558862.157
NAD 27
N 39.4604666
W 80.3159708
Inflection Point One Location
NAD 27 Feet
N: 345090.225
E: 1775292.992
UTM Zone 17 (SPCS83) Meters
N: 4366378.479
E: 550621.065
NAD 27
N 39.4447442
W 80.2956841
Inflection Point Two Location
NAD 27 Feet
N: 345992.106
E: 1775985.420
UTM Zone 17 (SPCS83) Meters
N: 4365029.158
E: 560837.904
NAD 27
N 39.4415814
W 80.2931962
Inflection Point Three Location
NAD 27 Feet
N: 343545.063
E: 1776137.223
UTM Zone 17 (SPCS83) Meters
N: 4365912.011
E: 560886.117
NAD 27
N 39.4405225
W 80.2926466
Bottom Hole Location
NAD 27 Feet
N: 340970.161
E: 1777351.693
UTM Zone 17 (SPCS83) Meters
N: 4365133.697
E: 561269.195
NAD 27
N 39.4334826
W 80.2882667

AS-DRILLED
State Plane Coordinate
West Virginia North
Top Hole Location
NAD 27 Feet
N: 351824.891
E: 1770299.120
UTM Zone 17 (SPCS83) Meters
N: 4368404.929
E: 559065.408
NAD 27
N 39.4631110
W 80.3135824
Landing Point Location
NAD 27 Feet
N: 350870.623
E: 1769618.173
UTM Zone 17 (SPCS83) Meters
N: 4368110.739
E: 558862.789
NAD 27
N 39.4604742
W 80.3159634
Inflection Point One Location
NAD 27 Feet
N: 345090.735
E: 1775318.632
UTM Zone 17 (SPCS83) Meters
N: 4366378.765
E: 560628.874
NAD 27
N 39.4447462
W 80.2955934
Inflection Point Two Location
NAD 27 Feet
N: 343967.466
E: 1775998.010
UTM Zone 17 (SPCS83) Meters
N: 4366039.995
E: 560841.560
NAD 27
N 39.4416788
W 80.2931527
Inflection Point Three Location
NAD 27 Feet
N: 343521.293
E: 1776157.313
UTM Zone 17 (SPCS83) Meters
N: 4365904.871
E: 560892.359
NAD 27
N 39.4404577
W 80.2925747
Bottom Hole Location
NAD 27 Feet
N: 340974.241
E: 1777357.693
UTM Zone 17 (SPCS83) Meters
N: 4365134.971
E: 561271.002
NAD 27
N 39.4334939
W 80.2882456

- NOTES ON SURVEY**
- NO DWELLINGS WITHIN 625' WERE FOUND.
 - NO WATER WELLS OR DEVELOPED SPRINGS WITHIN 250' WERE FOUND.
 - TIES TO WELLS AND CORNERS ARE BASED ON STATE PLANE GRID NORTH WV NORTH ZONE NAD 83.
 - WELL ELEVATION ESTABLISHED BY RTK GPS NAVD 88.
 - SURFACE OWNER AND ADJOINER INFORMATION TAKEN FROM THE ASSESSOR AND COUNTY CLERK RECORDS OF MARION COUNTY IN AUGUST 2021 AND FILES PROVIDED BY XTO ENERGY INC.
 - WELLS SHOWN ARE TAKEN FROM RECORDS OF WVDEP AND SURVEYED LOCATIONS OF WELLS WITHIN 500' OF WELL BORE.

JONES CONSULTANTS, LLC

SURVEYING • MAPPING • LAND • GAS WELL • PIPELINE
2402 PENNSYLVANIA 66 DELMONT, PA 15121
(724) 757 - 2417 www.jonesconsultant.com



XTO ENERGY
190 THORN HILL ROAD
WARRENDALE, PA 15086

0' 1500'



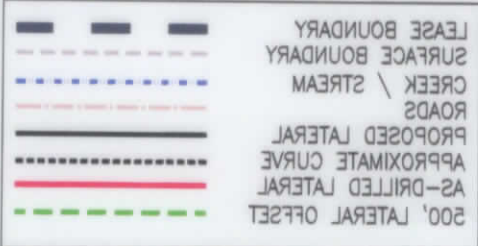
SUPPLEMENTAL SURFACE AND LESSOR EXHIBIT SANDS UNIT A 3H			
Drawn By:	Date:	LINCOLN DISTRICT MARION COUNTY, WEST VIRGINIA	
JRV	8/5/21		
Scale:	1" = 1500'	Sheet:	File No.:
AFE #	1003382	SHEET 2 OF 2	JC2017-18

01/21/2022



SANDS UNIT A 3H A2-DRILLED

LINE LEGEND

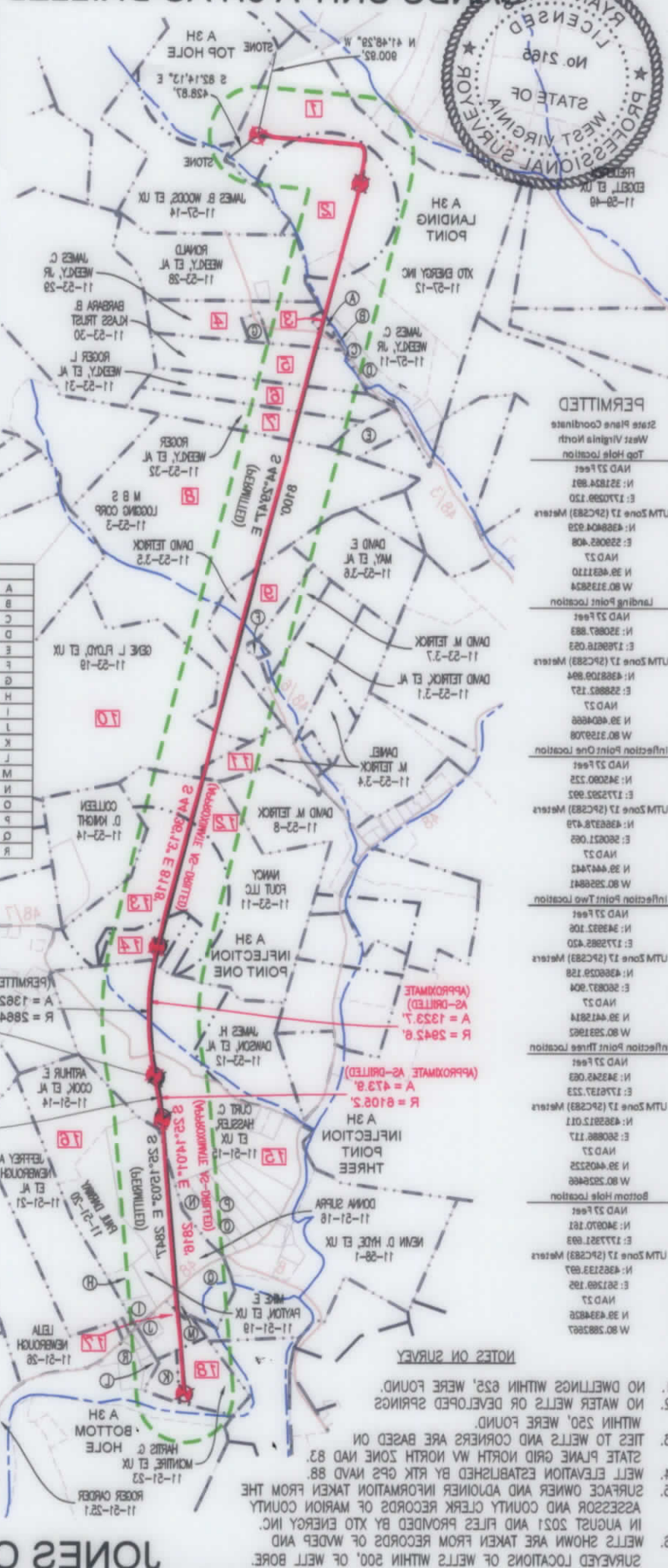


LEASE	LESSOR	MINERAL ACREAGE
181	MICHAEL JOSEPH BOUFFLOUX	9.83
171	XTO ENERGY INC	2.452
161	WACO OIL AND GAS CO., ET AL	88.18
151	WACO OIL AND GAS CO., ET AL	97.49
141	BRENDA K. LOSERPH, ET AL	6.20
131	BERTA PEARL LAUGHLIN, ET AL	80.00
121	EUGENE V. TETRICK, ET AL	8.00
111	WACO OIL AND GAS CO., INC.	88.00
101	WACO OIL AND GAS CO., INC.	17.00
91	DAVID M. TETRICK	30.00
81	PATRICIA ANN LUDY, ET AL	17.00
71	LOANNE EDGELL	12.22
61	O. JOAN WEEKLY	17.00
51	JACY BOGDZETZ, ET VIR	18.00
41	JAMES C. WEEKLY, JR	18.23
31	JAMES C. WEEKLY, JR	0.91
21	WACO OIL AND GAS CO. INC.	32.185
11	TRIO PETROLEUM CORP	138.00

TAX PARCEL	SURFACE OWNER
A	JEFFREY D. WEEKLY
B	JAMES C. WEEKLY, JR
C	VIRGINIA K. WEEKLY
D	JESSICA N. WEEKLY, ET VIR
E	ROGER L. WEEKLY
F	DAVID M. TETRICK, ET UX
G	JAMES B. WEEKLY
H	MANDY A. INGLES, ET VIR
I	ROBERT D. WILFONG
J	LOREN K. LOWDORNIK, ET VIR
K	MARK S. MCINTIRE, ET UX
L	COLLETTE A. MELTON
M	HOMER J. ISER, ET UX
N	WILLIAM J. MILLER, JR., ET UX
O	WILLIAM G. DECKER, ET UX
P	WILLIAM G. DECKER, ET UX
Q	HOMER J. ISER, ET UX
R	COLLEEN DAY

A2-DRILLED

State Plane Coordinate
West Virginia North
Top Hole Location
NAD 23 Feet
N: 321824.881
E: 1730589.120
UTM Zone 17 (29C283) Meters
N: 488804.929
E: 229022.408
NAD 23
N: 39 463110
W: 80 312824
Landing Point One Location
NAD 23 Feet
N: 320870.623
E: 1729618.173
UTM Zone 17 (29C283) Meters
N: 488810.789
E: 228882.789
NAD 23
N: 39 463042
W: 80 312824
Infection Point One Location
NAD 23 Feet
N: 342000.732
E: 1727218.623
UTM Zone 17 (29C283) Meters
N: 488828.725
E: 228028.874
NAD 23
N: 39 464282
W: 80 322294
Infection Point Two Location
NAD 23 Feet
N: 342987.486
E: 1727298.010
UTM Zone 17 (29C283) Meters
N: 488839.992
E: 228041.260
NAD 23
N: 39 464288
W: 80 322272
Infection Point Three Location
NAD 23 Feet
N: 343212.293
E: 1727257.373
UTM Zone 17 (29C283) Meters
N: 488850.871
E: 228085.359
NAD 23
N: 39 464027
W: 80 322242
Bottom Hole Location
NAD 23 Feet
N: 340244.241
E: 1727257.693
UTM Zone 17 (29C283) Meters
N: 488124.921
E: 261271.000
NAD 23
N: 39 434839
W: 80 288256



PERMITTED

State Plane Coordinate
West Virginia North
Top Hole Location
NAD 23 Feet
N: 321824.881
E: 1730589.120
UTM Zone 17 (29C283) Meters
N: 488804.929
E: 229022.408
NAD 23
N: 39 463110
W: 80 312824
Landing Point Location
NAD 23 Feet
N: 320870.623
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UTM Zone 17 (29C283) Meters
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NAD 23
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UTM Zone 17 (29C283) Meters
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E: 228041.260
NAD 23
N: 39 464288
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NAD 23
N: 39 464027
W: 80 322242
Bottom Hole Location
NAD 23 Feet
N: 340244.241
E: 1727257.693
UTM Zone 17 (29C283) Meters
N: 488124.921
E: 261271.000
NAD 23
N: 39 434839
W: 80 288256

NOTES ON SURVEY

1. NO DWELLINGS WITHIN 625' WERE FOUND.
2. NO WATER WELLS OR DEVELOPED SPRINGS WITHIN 250' WERE FOUND.
3. TIES TO WELLS AND CORNERS ARE BASED ON STATE PLANE GRID NORTH WV NORTH ZONE NAD 83.
4. WELL ELEVATION ESTABLISHED BY RTK GPS NAD 88.
5. SURFACE OWNER AND ADJOINER INFORMATION TAKEN FROM THE ASSESSOR AND COUNTY CLERK RECORDS OF MARION COUNTY IN AUGUST 2021 AND FILES PROVIDED BY XTO ENERGY INC.
6. WELLS SHOWN ARE TAKEN FROM RECORDS OF WDEP AND SURVEYED LOCATIONS OF WELLS WITHIN 500' OF WELL BORE.

JONES CONSULTANTS, LLC

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2402 PENNSYLVANIA 66 DELMONT, PA 15826
www.jonesconsultants.com (724) 757 - 2417

SUPPLEMENTAL SURFACE AND LESSOR EXHIBIT SANDS UNIT A 3H

Drawn by: JRV	Date: 8/25/21
Scale: 1" = 1500'	Sheet: 2 OF 2
File No.: 1002385	Sheet: 2 OF 2

MARION COUNTY, WEST VIRGINIA
LINCOLN DISTRICT

XTO ENERGY

150 THORN HILL ROAD
WARENDALE, PA 15086

01/21/2022

29C2 GRID NORTH
WV NORTH ZONE