

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

RECEIVED
Office Of Oil and Gas

OCT 08 2024

WV Department of
Environmental Protection

API 47 - 017 - 06961 County Doddridge District West Union
Quad West Union Pad Name Genevieve Field/Pool Name -----
Farm name Antero Resources Corp Well Number Lyle Unit 2H
Operator (as registered with the OOG) Antero Resources Corporation
Address 1615 Wynkoop Street City Denver State CO Zip 80202

As Drilled location NAD 83/UTM Attach an as-drilled plat, profile view, and deviation survey
Top hole Northing 4350496.892m Easting 518818.116m
Landing Point of Curve Northing 4350205.73m Easting 518468.53m
Bottom Hole Northing 4347910.098m Easting 519229.609m

Elevation (ft) 886' 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)
Air - Foam & 4% KCL

Mud - Polymer

Date permit issued 9/11/2023 Date drilling commenced 12/12/2023 Date drilling ceased 4/7/2024
Date completion activities began 5/25/2024 Date completion activities ceased 7/1/2024
Verbal plugging (Y/N) N/A 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

Freshwater depth(s) ft 414, 516' Open mine(s) (Y/N) depths No
Salt water depth(s) ft 1468' Void(s) encountered (Y/N) depths No
Coal depth(s) ft N/A Cavern(s) encountered (Y/N) depths No
Is coal being mined in area (Y/N) No

APPROVED

Reviewed by:
SK 12-4-24
12/13/2024

API 47-017 - 06961 Farm name Antero Resources Corp Well number Lyle Unit 2H

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"	20"	130'	New	91.59#, J-55	N/A	Y
Surface	17-1/2"	13-3/8"	624'	New	54.5#, J-55	N/A	Y
Coal							
Intermediate 1	12-3/8"	9-5/8"	3288'	New	36#, J-55	N/A	Y
Intermediate 2							
Intermediate 3							
Production	8-3/4"/8-1/2"	5-1/2"	15256'	New	23#, P-110	N/A	Y
Tubing		2-3/8"	6829'		4.7#, P-110		
Packer type and depth set		N/A					

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	204 sx	15.6	1.18	241	0'	8 Hrs.
Surface	Class C	565 sx	15.8	1.16	661	0'	8 Hrs.
Coal							
Intermediate 1	Class A	1240 sx	15.8	1.16	1438	0'	8 Hrs.
Intermediate 2							
Intermediate 3							
Production	Class H	2059 sx (Tail)	13.5 (Lead), 15.2(Tail)	1.31 (Tail)	2697	-500' into Intermediate Casing	8 Hrs.
Tubing							

Drillers TD (ft) 15256' MD, 6506' TVD (BHL), 6561' (Deepest Point Drilled) Loggers TD (ft) 15256' MD
 Deepest formation penetrated Marcellus Plug back to (ft) N/A
 Plug back procedure N/A

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Kick off depth (ft) 5448'

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 _____

Conductor - 0
 Surface - 1 above guide shoe, 1 above insert float, 1 every 4th joint to surface
 Intermediate - 1 above float joint, 1 above float collar, 1 every 4th joint to surface
 Production - 1 above float joint, 1 below float collar, 1 every 3rd joint to top of cement

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 N/A

APPROVED 12/13/2024-24

API 47-017-06961 Farm name Antero Resources Corp Well number Lyle Unit 2H

PERFORATION RECORD

Stage No.	Perforation date	Perforated from MD ft.	Perforated to MD ft.	Number of Perforations	Formation(s)
*PLEASE SEE ATTACHED EXHIBIT 1					

Please insert additional pages as applicable.

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STIMULATION INFORMATION PER STAGE

WV Department of
Environmental Protection

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)
*PLEASE SEE ATTACHED EXHIBIT 2								

Please insert additional pages as applicable.

APPROVED *SK 12-4-24*
12/13/2024

API 47- 017 - 06961 Farm name Antero Resources Corp Well number Lyle Unit 2H

<u>PRODUCING FORMATION(S)</u>	<u>DEPTHS</u>		
<u>Marcellus</u>	<u>6508' (TOP)</u>	<u>TVD</u>	<u>7065' (TOP)</u> <u>MD</u>
_____	_____	_____	_____
_____	_____	_____	_____

Please insert additional pages as applicable.

GAS TEST Build up Drawdown Open Flow OIL TEST Flow Pump

SHUT-IN PRESSURE Surface 2492 psi Bottom Hole --- psi DURATION OF TEST --- hrs

OPEN FLOW Gas 12721 mcfpd Oil 88 bpd NGL --- bpd Water 355 bpd GAS MEASURED BY Estimated Orifice Pilot

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

***PLEASE SEE ATTACHED EXHIBIT 3**

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Please insert additional pages as applicable.

Drilling Contractor H & P Drilling
Address 912 N Eagle Valley Rd City Howard State PA Zip 16841

Logging Company Nine Energy Services
Address 6500 West Fwy City Fort Worth State TX Zip 76116

Cementing Company Halliburton Energy Services
Address 3000 W. Sam Houston Pkwy City Houston State TX Zip 76114

Stimulating Company Halliburton
Address 3000 W. Sam Houston Pkwy City Houston State TX Zip 76114

Please insert additional pages as applicable.

Completed by Carly Marvel Telephone 303-357-7373
Signature Carly Marvel Title Permitting Agent Date 9/23/2024

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

APPROVED

12/13/2024

API 47-017-06961 Farm Name Antero Resources Corporation Well Number Lyle Unit 2H

Exhibit 1

Stage No.	Perforation Date	Perforated from MD ft.	Perforated to MD ft.	Number of Perforations	Formations
1	5/25/2024	15181.2	15137.2	36	Marcellus
2	5/26/2024	15098.59583	14933.575	36	Marcellus
3	5/26/2024	14898.17083	14733.15	36	Marcellus
4	5/27/2024	14697.74583	14532.725	36	Marcellus
5	5/28/2024	14497.32083	14332.3	36	Marcellus
6	5/29/2024	14296.89583	14131.875	36	Marcellus
7	5/29/2024	14096.47083	13931.45	36	Marcellus
8	5/30/2024	13896.04583	13731.025	36	Marcellus
9	5/31/2024	13695.62083	13530.6	36	Marcellus
10	6/1/2024	13495.19583	13330.175	36	Marcellus
11	6/1/2024	13294.77083	13129.75	36	Marcellus
12	6/2/2024	13094.34583	12929.325	36	Marcellus
13	6/2/2024	12893.92083	12728.9	36	Marcellus
14	6/2/2024	12693.49583	12528.475	36	Marcellus
15	6/3/2024	12493.07083	12328.05	36	Marcellus
16	6/3/2024	12292.64583	12127.625	36	Marcellus
17	6/3/2024	12092.22083	11927.2	36	Marcellus
18	6/4/2024	11891.79583	11726.775	36	Marcellus
19	6/4/2024	11691.37083	11526.35	36	Marcellus
20	6/4/2024	11490.94583	11325.925	36	Marcellus
21	6/5/2024	11290.52083	11125.5	36	Marcellus
22	6/5/2024	11090.09583	10925.075	36	Marcellus
23	6/5/2024	10889.67083	10724.65	36	Marcellus
24	6/6/2024	10689.24583	10524.225	36	Marcellus
25	6/6/2024	10488.82083	10323.8	36	Marcellus
26	6/7/2024	10288.39583	10123.375	36	Marcellus
27	6/7/2024	10087.97083	9922.95	36	Marcellus
28	6/7/2024	9887.545833	9722.525	36	Marcellus
29	6/8/2024	9687.120833	9522.1	36	Marcellus
30	6/8/2024	9486.695833	9321.675	36	Marcellus
31	6/8/2024	9286.270833	9121.25	36	Marcellus
32	6/8/2024	9085.845833	8920.825	36	Marcellus
33	6/8/2024	8885.420833	8720.4	36	Marcellus
34	6/9/2024	8684.995833	8519.975	36	Marcellus
35	6/9/2024	8484.570833	8319.55	36	Marcellus
36	6/9/2024	8284.145833	8119.125	36	Marcellus
37	6/9/2024	8083.720833	7918.7	36	Marcellus
38	6/10/2024	7883.295833	7718.275	36	Marcellus
39	6/10/2024	7682.870833	7517.85	36	Marcellus
40	6/11/2024	7482.445833	7317.425	36	Marcellus
41	6/12/2024	7282.020833	7117	36	Marcellus

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EXHIBIT 2

Stage No.	Stimulations Date	Avg Pump Rate	Avg Treatment Pressure (PSI)	Max Breakdown Pressure (PSI)	ISIP (PSI)	Amount of Proppant (lbs)	Amount of Water (bbls)	Amount of Nitrogen/ other (units)
1	5/25/2024	91.7	8752.1	5204	4195.4	166440	4794.4	N/A
2	5/26/2024	96.2	8825.9	6679.42	4550.0	416760	7019.0	N/A
3	5/26/2024	95.3	9016.1	7215.82	3936.9	412280	7072.8	N/A
4	5/27/2024	97.1	9045.1	6484.07	3380.3	414480	7083.3	N/A
5	5/28/2024	94.7	9073.5	6761.48	3656.2	415420	7377.6	N/A
6	5/29/2024	96.7	9233.0	7035.64	3590.0	418400	6857.7	N/A
7	5/29/2024	97.1	9629.3	6900.84	3487.0	412140	7052.3	N/A
8	5/30/2024	97.6	9612.7	7106.66	3463.2	417740	7096.4	N/A
9	5/31/2024	95.7	9057.7	6830.79	3756.4	417300	7111.4	N/A
10	6/1/2024	97.6	9055.3	6625.36	3606.0	414820	6945.9	N/A
11	6/1/2024	97.8	9192.3	6663.97	3541.5	421200	7058.7	N/A
12	6/2/2024	97.7	9246.0	6791.96	3516.0	417220	6844.4	N/A
13	6/2/2024	95.6	8967.2	7090.31	3636.9	413380	7067.2	N/A
14	6/2/2024	93.0	8900.2	7161.72	3339.0	416400	7079.0	N/A
15	6/3/2024	87.7	8666.0	6988.93	3956.7	436540	9526.8	N/A
16	6/3/2024	96.4	8929.2	6328.48	3617.3	419340	7010.5	N/A
17	6/3/2024	96.8	8819.3	6422.41	3562.0	397160	6417.7	N/A
18	6/4/2024	97.1	8713.8	6332.6	3933.0	400400	6748.4	N/A
19	6/4/2024	91.0	8646.6	6087.68	4093.0	410760	7073.3	N/A
20	6/4/2024	94.8	8554.9	6713.41	3815.0	395150	6931.3	N/A
21	6/5/2024	94.2	8789.8	6862.91	4378.2	397560	6890.8	N/A
22	6/5/2024	97.2	9070.2	6394.83	4425.4	414900	6972.9	N/A
23	6/5/2024	96.1	8866.8	6147.16	3893.9	399750	6812.6	N/A
24	6/6/2024	96.8	8867.9	6838.74	3935.0	395380	6495.1	N/A
25	6/6/2024	93.6	8891.0	6172.46	4157.6	394930	6574.3	N/A
26	6/7/2024	95.8	8560.9	6052.45	3720.1	395790	6735.7	N/A
27	6/7/2024	95.8	8903.5	6542.25	3809.2	401230	6894.1	N/A
28	6/7/2024	94.9	8953.4	6115.37	3573.0	397500	6618.8	N/A
29	6/8/2024	93.2	8998.3	7229.17	4612.4	198280	5555.9	N/A
30	6/8/2024	98.0	8650.1	6102.77	3593.2	405600	6775.5	N/A
31	6/8/2024	96.2	8308.1	7306.91	4042.8	410480	6807.7	N/A
32	6/8/2024	96.6	8461.3	6668.68	3544.0	398270	6680.2	N/A
33	6/8/2024	94.6	8184.9	7552.9	3847.6	399170	6505.2	N/A
34	6/9/2024	97.2	8077.0	6333.82	3582.3	413700	6960.7	N/A
35	6/9/2024	92.4	8640.8	7024.66	3542.2	400100	6874.0	N/A
36	6/9/2024	96.6	8359.5	5963.41	3833.0	397470	6678.9	N/A
37	6/9/2024	96.6	7976.0	6113.38	3811.0	399490	6467.2	N/A
38	6/10/2024	97.9	8307.0	6853.2	3764.1	393740	6622.8	N/A
39	6/10/2024	97.5	7844.6	6763.3	3746.9	399280	6675.9	N/A
40	6/11/2024	96.8	8062.4	8507.54	3637.7	399650	6614.4	N/A
41	6/12/2024	97.2	8188.8	7723.6	4172.4	400310	6485.4	N/A
	AVERAGE	96	8,754	6,700	3,811	16,245,910	279,866	TOTAL

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EXHIBIT 3

LITHOLOGY/ FORMATION	TOP DEPTH (TVD)	BOTTOM DEPTH (TVD)	TOP DEPTH (MD)	BOTTOM DEPTH (MD)
	From Surface	From Surface	From Surface	From Surface
Sandy Siltstone, Occ Shale	100	200	100	200
Silty Shale, Occ Sandstone	200	250	200	250
Silty Sandstone, Occ Shale	250	550	250	550
Silty Shale, Occ Sandstone	300	700	300	700
Sandy Siltstone, Occ Shale	550	700	550	700
Silty Sandstone	700	800	700	800
Sandstone, Occ Siltstone	800	1,000	800	1,000
Sandy Siltstone, Occ Shale	1,000	1,100	1,000	1,100
Silty Sandstone	1,100	1,250	1,100	1,250
Sandy Siltstone, rr Coal	1,250	1,350	1,250	1,350
Silty Sandstone	1,350	1,450	1,350	1,450
Silty Sandstone, tr Coal	1,450	1,600	1,450	1,600
Sandy Siltstone	1,600	1,800	1,600	1,800
Sandy Siltstone, tr Shale	1,800	1,820	1,800	1,820
Shaley Siltstone, tr Sandstone	1,820	1,782	1,820	1,847
Big Lime	1,812	2,453	1,847	2,599
Fifty Foot Sandstone	2,453	2,536	2,569	2,691
Gordon	2,536	2,764	2,661	2,940
Fifth Sandstone	2,764	2,863	2,910	3,048
Bayard	2,863	3,648	3,018	3,908
Speechley	3,648	3,915	3,878	4,209
Balltown	3,915	4,417	4,179	4,760
Bradford	4,417	4,840	4,730	5,227
Benson	4,840	5,133	5,197	5,549
Alexander	5,133	6,345	5,519	6,927
Sycamore	6,186	6,315	6,725	6,897
Middlesex	6,315	6,442	6,897	7,118
Burkett	6,442	6,472	7,118	7,186
Tully	6,472	6,516	7,186	7,325
Marcellus	6,516	NA	7,325	NA

*Please note Antero determines formation tops based on mud logs that are only run on one well on a multi-well pad. The measured depth (MD) data on subsequent wells may be slightly different due to the well's unique departure.

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Environmental Protection

12/13/2024

**Antero Resources
Well No. Lyle 2H
As-Drilled
Antero Resources Corporation**

9,032' to Top Hole

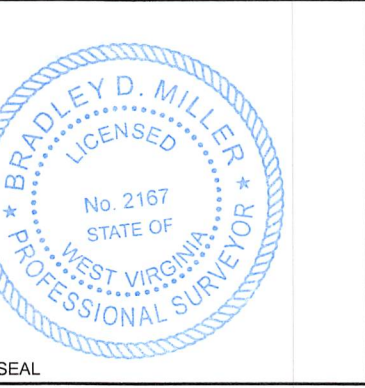
7,705' to Bottom Hole
TOP HOLE LATITUDE 39 - 20 - 00
BTM HOLE LATITUDE 39 - 17 - 30



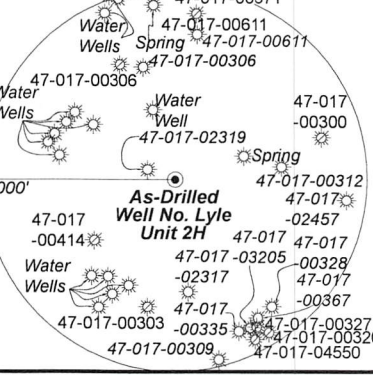
Top Hole Coordinates, As-drilled data, and information was provided by Antero Resources Corporation. Allegheny Surveys Inc. (ASI) is not certifying the data and information provided. ASI is not responsible for any errors or inaccuracies with the data and information that has been provided.

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.

Bradley D. Miller
Bradley D. Miller, P.S. 2167



Note: 14 water wells and 2 springs were found within 2000' of proposed well. No occupied dwellings or buildings 2,500 square feet or larger used to house or shelter dairy cattle or poultry husbandry are located within 625' of the center of the well pad.

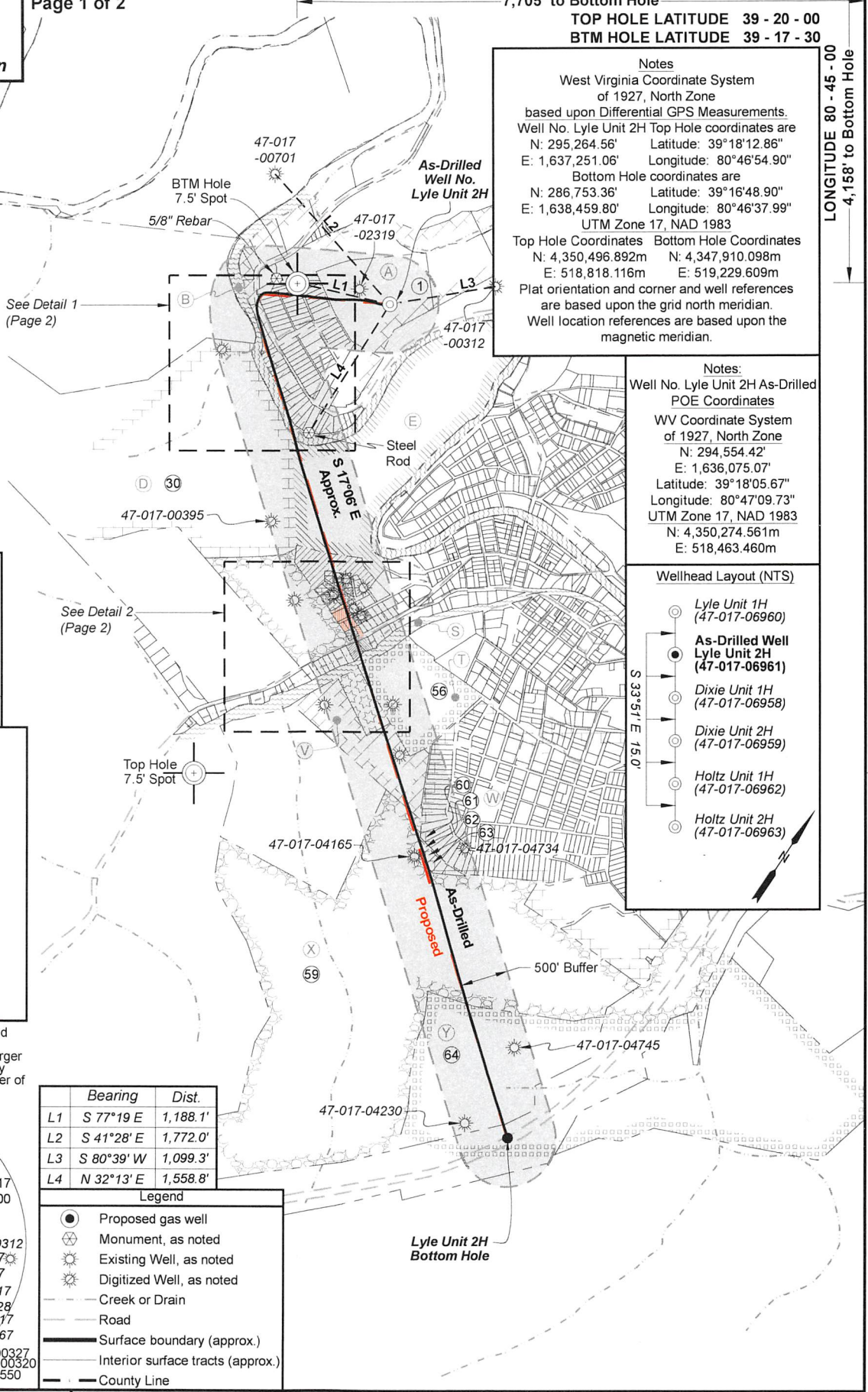
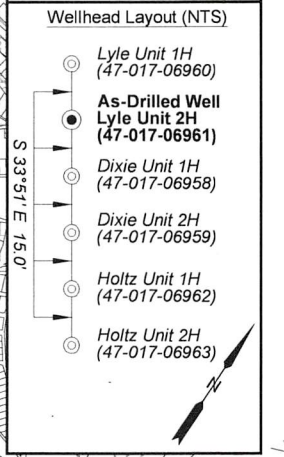


Bearing	Dist.
L1 S 77°19' E	1,188.1'
L2 S 41°28' E	1,772.0'
L3 S 80°39' W	1,099.3'
L4 N 32°13' E	1,558.8'

- Legend**
- Proposed gas well
 - ⊕ Monument, as noted
 - ☼ Existing Well, as noted
 - ☼ Digitized Well, as noted
 - Creek or Drain
 - Road
 - Surface boundary (approx.)
 - Interior surface tracts (approx.)
 - County Line

Notes
West Virginia Coordinate System of 1927, North Zone based upon Differential GPS Measurements.
Well No. Lyle Unit 2H Top Hole coordinates are
N: 295,264.56' Latitude: 39°18'12.86"
E: 1,637,251.06' Longitude: 80°46'54.90"
Bottom Hole coordinates are
N: 286,753.36' Latitude: 39°16'48.90"
E: 1,638,459.80' Longitude: 80°46'37.99"
UTM Zone 17, NAD 1983
Top Hole Coordinates Bottom Hole Coordinates
N: 4,350,496.892m N: 4,347,910.098m
E: 518,818.116m E: 519,229.609m
Plat orientation and corner and well references are based upon the grid north meridian.
Well location references are based upon the magnetic meridian.

Notes:
Well No. Lyle Unit 2H As-Drilled POE Coordinates
WV Coordinate System of 1927, North Zone
N: 294,554.42'
E: 1,636,075.07'
Latitude: 39°18'05.67"
Longitude: 80°47'09.73"
UTM Zone 17, NAD 1983
N: 4,350,274.561m
E: 518,463.460m



LONGITUDE 80 - 45 - 00
4,158' to Bottom Hole

10,841' to Top Hole

FILE NO: 59-30-WU-14
DRAWING NO: Lyle Unit 2H As-Drilled Plat
SCALE: 1" = 1500'
MINIMUM DEGREE OF ACCURACY: Submeter
PROVEN SOURCE OF ELEVATION: WVDOT, Harrisville, WV

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

DATE: October 4 20 24
OPERATOR'S WELL NO. Lyle Unit 2H
API WELL NO
47 - 017 - 06961
STATE COUNTY PERMIT

WELL TYPE: OIL GAS LIQUID INJECTION WASTE DISPOSAL
(IF GAS) PRODUCTION: STORAGE DEEP SHALLOW
Headwaters Middle
LOCATION: ELEVATION: As-Drilled 886' WATERSHED: Island Creek QUADRANGLE: West Union
DISTRICT: West Union COUNTY: Doddridge
SURFACE OWNER: Antero Resources Corp. ACREAGE: 16.5
ROYALTY OWNER: Claude F. Smith, et ux LEASE NO: ACREAGE: 90
PROPOSED WORK: DRILL CONVERT DRILL DEEPER FRACTURE OR STIMULATE PLUG OFF OLD FORMATION
 PERFORATE NEW FORMATION OTHER PHYSICAL CHANGE IN WELL (SPECIFY) As-Drilled
 PLUG AND ABANDON CLEAN OUT AND REPLUG TARGET FORMATION: Marcellus Shale ESTIMATED DEPTH: 6,506' TVD
15,256' MD

WELL OPERATOR: Antero Resources Corporation DESIGNATED AGENT: Kevin Ellis
ADDRESS: 1615 Wynkoop Street ADDRESS: 535 White Oaks Blvd.
Denver, CO 80202 Bridgeport, WV 26330

Antero Resources
Well No. Lyle 2H
As-Drilled
Antero Resources Corporation

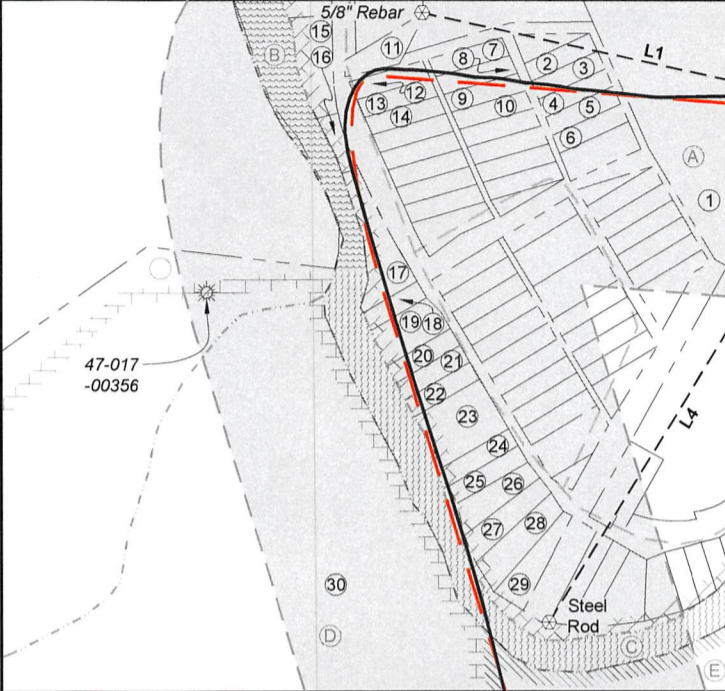


Leases	
A	Claude F. Smith, et ux
B	WVDNR
C	WVDNR
D	Claude F. Smith, et ux
E	J.M.L. Smith
F	XTO Energy, Inc.
G	TBB Consulting, LLC
H	TBB Consulting, LLC
I	Cheryl Ann Tarbet

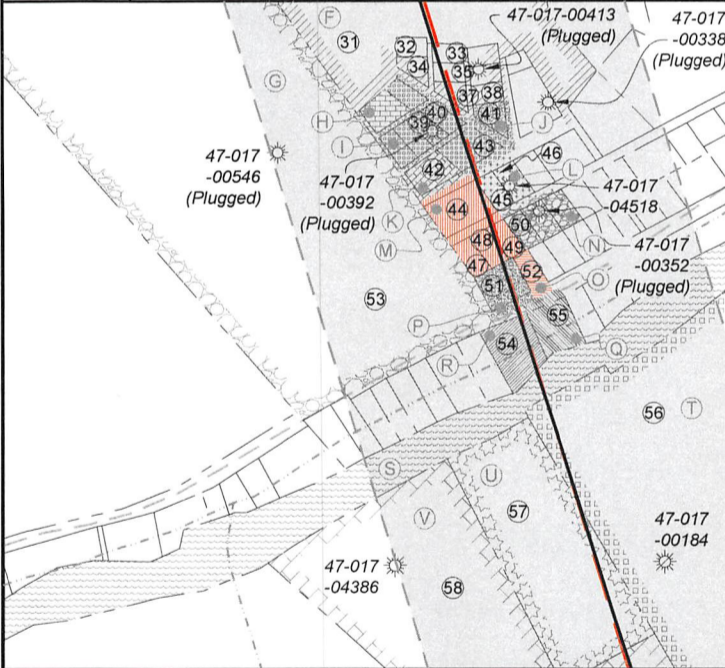
Leases	
J	Nancy Ody
K	Kenneth R. Mason, et ux
L	Paul Lister
M	Antero Minerals, LLC
N	Donna R. Cempbell, et al
O	Mary Lou Knight
P	Wilma Smith
Q	Amanda Lin Iden
R	Dennis H. Powell

Leases	
S	WV State Rail Authority
T	John C. Farr
U	John C. Farr
V	Harry E. Cline
W	Mary A. Stuart, et al
X	Celia Schutte, et al
Y	Joseph Cheuvront & W.S. Stuart

Detail 1 (NTS)



Detail 2 (NTS)



ID	TM-Par	Owner	Bk/Pg	Acres
1	11-3	Antero Resources Corp.	431 / 528	16.50
2	35-91	Antero Resources Corp.	430 / 666	0.23
3	35-92	Antero Resources Corp.	430 / 666	0.23
4	35-3	Antero Resources Corp.	430 / 666	0.23
5	35-93	Antero Resources Corp.	430 / 666	0.23
6	35-94	Antero Resources Corp.	430 / 666	0.23
7	35-72	Robert M. Cutright	170 / 723	0.23
8	35-73	Robert M. Cutright	170 / 723	0.23
9	35-74	Larry D. Patterson	240 / 110	0.23
10	35-75	Larry D. Patterson	240 / 110	0.23
11	11-2.2	Volusia Ventures, LLC	476 / 92	0.30
12	35-51	Danny G. Rowe	256 / 588	0.23
13	35-14	Danny G. Rowe	256 / 588	0.23
14	35-52	Danny G. Rowe	256 / 588	0.23
15	35-19	Sharon A. Ferrell & Charles Dale Allen	469 / 579	0.81
16	35-38	Michael L. Smith & Joseph M. Smith	365 / 407	0.31
17	35-39	Michael L. Smith & Joseph M. Smith	365 / 407	0.60
18	35-40	Michael L. Smith & Joseph M. Smith	365 / 407	0.33
19	35-20	Michael L. Smith & Joseph M. Smith	365 / 407	0.44
20	35-41	Michael L. Smith & Joseph M. Smith	365 / 407	0.23
21	35-42	Michael L. Smith & Joseph M. Smith	365 / 407	0.23
22	35-43	Joshua A. & Kimberly D. Weekley	273 / 124	0.23
23	35-21	Joshua A. & Kimberly D. Weekley	273 / 124	0.69
24	35-22	Joshua A. & Kimberly D. Weekley	273 / 124	0.24
25	35-23	Joshua A. & Kimberly D. Weekley	273 / 124	0.25
26	35-24	Joshua A. & Kimberly D. Weekley	273 / 124	0.26
27	35-44	Ralph P. & Shelia R. McCutchan	205 / 263	0.30
28	35-25	Ralph P. & Shelia R. McCutchan	205 / 263	0.44
29	35-45	Ralph P. & Shelia R. McCutchan	205 / 263	0.17
30	11-13.2	Frank E. McGill	429 / 448	199.30
31	33-1	Franklin R. & R. Leroy Kinney	236 / 519	4.94
32	33-66	Franklin R. & R. Leroy Kinney	236 / 519	0.09
33	33-67	Franklin R. & R. Leroy Kinney	236 / 519	0.09
34	33-65	Franklin R. & R. Leroy Kinney	236 / 519	0.11
35	33-68	Franklin R. & R. Leroy Kinney	236 / 519	0.09
36	33-64	Cheryl Ann Tarbet	W119 / 228	0.09
37	33-69	Franklin R. & R. Leroy Kinney	236 / 519	0.11
38	33-70	Franklin R. & R. Leroy Kinney	236 / 519	0.07
39	33-3	Cheryl Ann Tarbet	W119 / 228	0.11
40	33-63	Cheryl Ann Tarbet	W119 / 228	0.11
41	33-6	Ralph Percy	68 / 317	0.14
42	33-4	Roy L. Smith, et al	W18 / 117	0.21
43	33-5	Cheryl Ann Tarbet	W119 / 228	0.24
44	33-60	Steven & James Carpenter	233 / 556	0.34
45	33-9	Paul Lister, et al	234 / 531	0.11
46	33-10	Paul Lister, et al	234 / 531	0.13
47	33-56	Steven & James Carpenter	233 / 556	0.11
48	33-16	Steven & James Carpenter	233 / 556	0.11
49	33-57	Steven & James Carpenter	233 / 556	0.11
50	33-58	Donna R. Campbell	462 / 328	0.11
51	33-23	Wilma Smith	283 / 427	0.26
52	33-24	William T. Howell, III	510 / 559	0.10
53	11-20	Nora Summers Estate	113 / 488	18.31
54	33-51	Dennis H. Powell	279 / 480	0.53
55	33-52	Amanda Lin Iden	493 / 453	0.44
56	11-38	John C. Farr	234 / 91	17.90
57	11-37	John C. Farr	234 / 91	4.00
58	11-38.1	John C. Farr	234 / 91	17.90
59	15-3	E Properties LTD	201 / 396	186.86
60	31-194	J. Charles Buff & George J. Buff, III	377 / 517	0.53
61	31-237	J. Charles Buff & George J. Buff, III	377 / 517	0.22
62	31-238	J. Charles Buff & George J. Buff, III	377 / 517	0.24
63	31-239	J. Charles Buff & George J. Buff, III	377 / 517	0.28
64	15-4	E Properties LTD	201 / 396	115.03

FILE NO: 59-30-WU-14
 DRAWING NO: Lyle Unit 2H As-Drilled Plat
 SCALE: 1" = 1500'
 MINIMUM DEGREE OF ACCURACY:
 Submeter
 PROVEN SOURCE OF ELEVATION:
 WVDOT, Harrisville, WV

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

DATE: October 4, 2024
 OPERATOR'S WELL NO. Lyle Unit 2H
 API WELL NO
 47 - 017 - 06961
 STATE COUNTY PERMIT

WELL TYPE: OIL GAS LIQUID INJECTION WASTE DISPOSAL
 (IF GAS) PRODUCTION: STORAGE DEEP SHALLOW
 Headwaters Middle
 LOCATION: ELEVATION: As-Drilled 886' WATERSHED: Island Creek QUADRANGLE: West Union
 DISTRICT: West Union COUNTY: Doddridge
 SURFACE OWNER: Antero Resources Corp. ACREAGE: 16.5
 ROYALTY OWNER: Claude F. Smith, et ux LEASE NO: ACREAGE: 90
 PROPOSED WORK: DRILL CONVERT DRILL DEEPER FRACTURE OR STIMULATE PLUG OFF OLD FORMATION
 PERFORATE NEW FORMATION OTHER PHYSICAL CHANGE IN WELL (SPECIFY) As-Drilled 6,506' TVD
 PLUG AND ABANDON CLEAN OUT AND REPLUG TARGET FORMATION: Marcellus Shale ESTIMATED DEPTH: 15,256' MD

WELL OPERATOR: Antero Resources Corporation DESIGNATED AGENT: Kevin Ellis
 ADDRESS: 1615 Wynkoop Street ADDRESS: 535 White Oaks Blvd.
 Denver, CO 80202 Bridgeport, WV 26330

Antero Resources
Well No. Lyle 2H
As-Drilled
Antero Resources Corporation

Page 1 of 2

9,032' to Top Hole

7,705' to Bottom Hole

TOP HOLE LATITUDE 39 - 20 - 00
 BTM HOLE LATITUDE 39 - 17 - 30

LONGITUDE 80 - 45 - 00
 4,158' to Bottom Hole

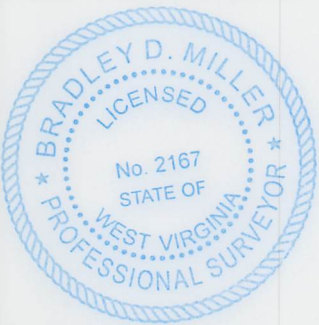
10,841' to Top Hole



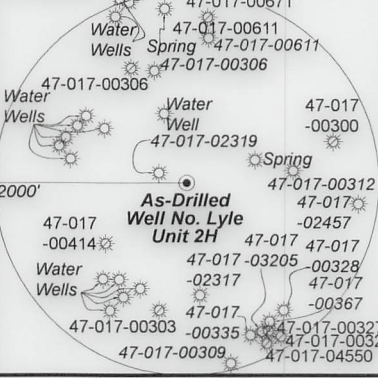
Top Hole Coordinates, As-drilled data, and information was provided by Antero Resources Corporation. Allegheeny Surveys Inc. (ASI) is not certifying the data and information provided. ASI is not responsible for any errors or inaccuracies with the data and information that has been provided.

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.

Bradley D. Miller
 Bradley D. Miller, P.S. 2167



Note: 14 water wells and 2 springs were found within 2000' of proposed well. No occupied dwellings or buildings 2,500 square feet or larger used to house or shelter dairy cattle or poultry husbandry are located within 625' of the center of the well pad.

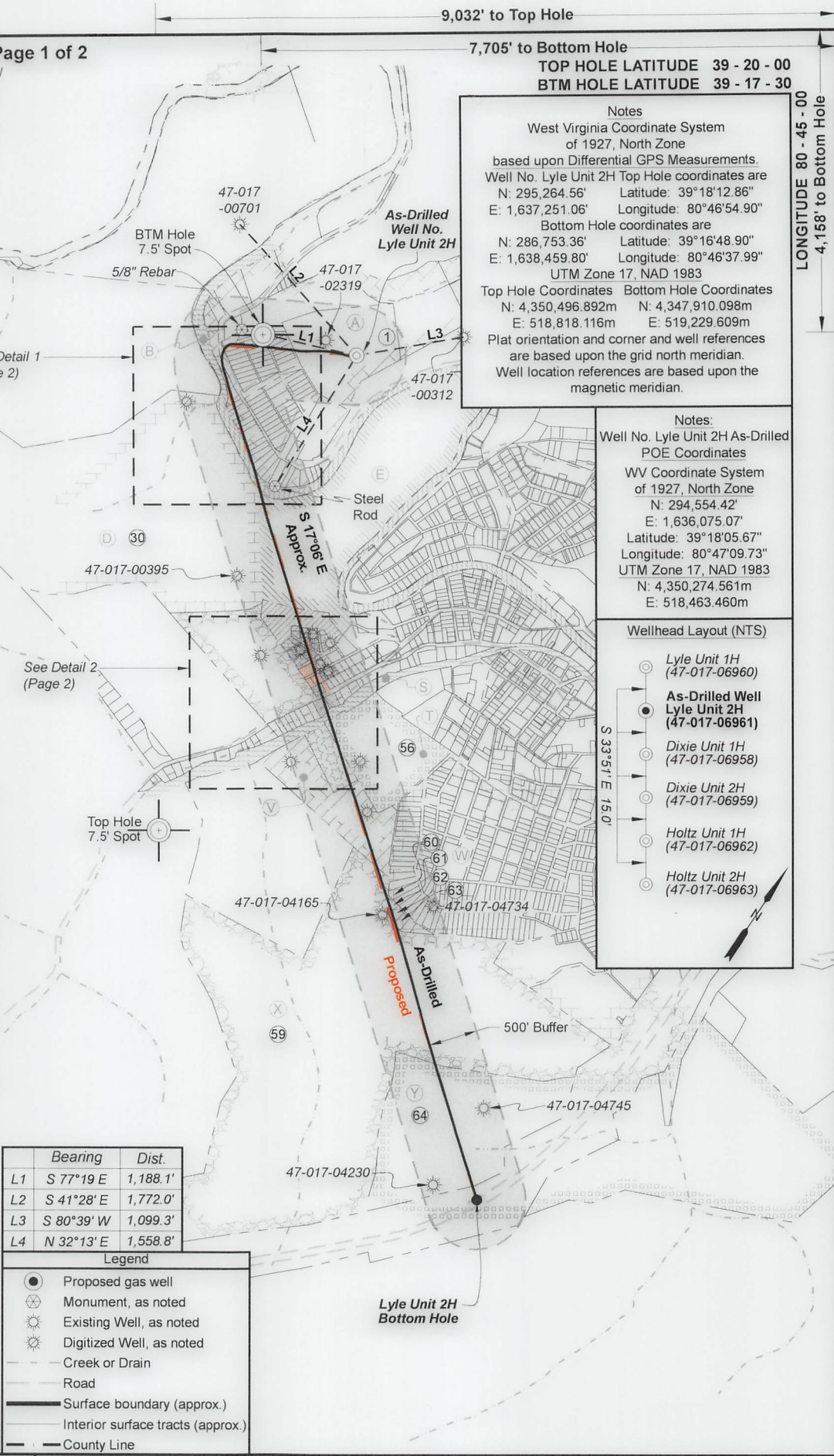
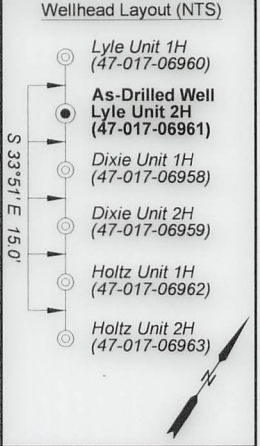


	Bearing	Dist.
L1	S 77°19' E	1,188.1'
L2	S 41°28' E	1,772.0'
L3	S 80°39' W	1,099.3'
L4	N 32°13' E	1,558.8'

- Legend**
- Proposed gas well
 - ⊗ Monument, as noted
 - ☼ Existing Well, as noted
 - ☼ Digitized Well, as noted
 - Creek or Drain
 - Road
 - Surface boundary (approx.)
 - Interior surface tracts (approx.)
 - County Line

Notes
 West Virginia Coordinate System of 1927, North Zone based upon Differential GPS Measurements.
 Well No. Lyle Unit 2H Top Hole coordinates are
 N: 295,264.56' Latitude: 39°18'12.86"
 E: 1,637,251.06' Longitude: 80°46'54.90"
 Bottom Hole coordinates are
 N: 286,753.36' Latitude: 39°16'48.90"
 E: 1,638,459.80' Longitude: 80°46'37.99"
 UTM Zone 17, NAD 1983
 Top Hole Coordinates Bottom Hole Coordinates
 N: 4,350,496.892m N: 4,347,910.098m
 E: 518,818.116m E: 519,229.609m
 Plat orientation and corner and well references are based upon the grid north meridian. Well location references are based upon the magnetic meridian.

Notes:
 Well No. Lyle Unit 2H As-Drilled POE Coordinates
 WV Coordinate System of 1927, North Zone
 N: 294,554.42'
 E: 1,636,075.07'
 Latitude: 39°18'05.67"
 Longitude: 80°47'09.73"
 UTM Zone 17, NAD 1983
 N: 4,350,274.561m
 E: 518,463.460m



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OIL AND GAS DIVISION

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WR-35

Antero Resources
Well No. Lyle 2H
As-Drilled
Antero Resources Corporation

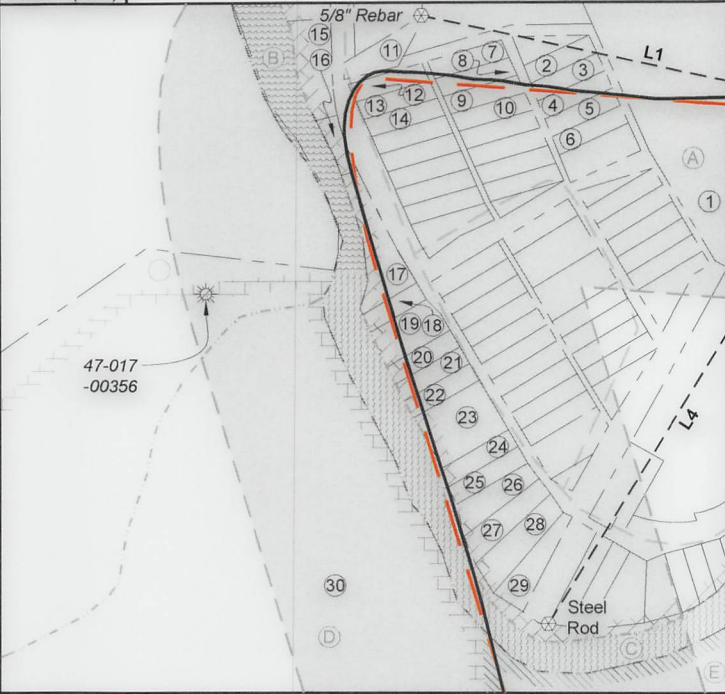


Leases	
A	Claude F. Smith, et ux
B	WVDNR
C	WVDNR
D	Claude F. Smith, et ux
E	J.M.L. Smith
F	XTO Energy, Inc.
G	TBB Consulting, LLC
H	TBB Consulting, LLC
I	Cheryl Ann Tarbet

Leases	
J	Nancy Ody
K	Kenneth R. Mason, et ux
L	Paul Lister
M	Antero Minerals, LLC
N	Donna R. Campbell, et al
O	Mary Lou Knight
P	Wilma Smith
Q	Amanda Lin Iden
R	Dennis H. Powell

Leases	
S	WV State Rail Authority
T	John C. Farr
U	John C. Farr
V	Harry E. Cline
W	Mary A. Stuart, et al
X	Celia Schutte, et al
Y	Joseph Cheuvront & W.S. Stuart

Detail 1 (NTS)



Detail 2 (NTS)



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21	35-42	Michael L. Smith & Joseph M. Smith	365 / 407	0.23
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47	33-56	Steven & James Carpenter	233 / 556	0.11
48	33-16	Steven & James Carpenter	233 / 556	0.11
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57	11-37	John C. Farr	234 / 91	4.00
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59	15-3	E Properties LTD	201 / 396	186.86
60	31-194	J. Charles Buff & George J. Buff, III	377 / 517	0.53
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OIL AND GAS DIVISION

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WELL OPERATOR: Antero Resources Corporation DESIGNATED AGENT: Kevin Ellis
 ADDRESS: 1615 Wynkoop Street ADDRESS: 535 White Oaks Blvd.
 Denver, CO 80202 Bridgeport, WV 26330

Hydraulic Fracturing Fluid Product Component Information Disclosure

Job Start Date:	05/23/2024
Job End Date:	06/12/2024
State:	West Virginia
County:	Doddridge
API Number:	47-017-06961-00-00
Operator Name:	Antero Resources Corporation
Well Name and Number:	LYLE UNIT 2H
Latitude:	39.30365
Longitude:	-80.78175
Datum:	WGS84
Federal Well:	NO
Indian Well:	NO
True Vertical Depth:	6560
Total Base Water Volume (gal)*:	12032162.5
Total Base Non Water Volume:	0



Water Source	Percent
Produced Water	100.00%

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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
Excelerate LX-21	Halliburton	Friction Reducer					
HAI-501	Halliburton	Acid Corrosion Inhibitor					
HYDROCHLORIC ACID, 22 BAUME	Halliburton	Solvent					
MC B-8123	MultiChem	Biocide					
OPTIFLO-II DELAYED RELEASE BREAKER	Halliburton	Breaker					
Produced Water (Density 10.0)	Operator	Base Fluid					
Sand-Common White-100 Mesh, SSA-2	Halliburton	Proppant					
WG-36 GELLING AGENT	Halliburton	Gelling Agent					

Items above are Trade Names. Items below are the individual ingredients.

12/13/2024

			Water	7732-18-5	100.00000	87.94805	None
			Crystalline silica, quartz	14808-60-7	100.00000	11.87810	None
			Water	7732-18-5	100.00000	0.14890	None
			Hydrochloric acid	7647-01-0	30.00000	0.03647	None
			Complex amine compound	Proprietary	60.00000	0.02188	None
			Hydrotreated distillate	Proprietary	30.00000	0.01094	None
			Guar gum	9000-30-0	100.00000	0.00764	None
			Glutaraldehyde	111-30-8	30.00000	0.00233	None
			Ammonium chloride	12125-02-9	5.00000	0.00182	None
			Fatty nitrogen derived amides	Proprietary	5.00000	0.00182	None
			Ethoxylated alcohol	Proprietary	5.00000	0.00182	None
			Quaternary ammonium compounds, benzyl-C12-16-alkyldimethyl, chlorides	68424-85-1	5.00000	0.00039	None
			Sorbitan, mono-9-octadecenoate, (Z)	1338-43-8	1.00000	0.00036	None
			Sorbitan monooleate polyoxyethylene derivative	9005-65-6	1.00000	0.00036	None
			Methanol	67-56-1	100.00000	0.00023	None
			Ammonium persulfate	7727-54-0	100.00000	0.00018	None
			Citric acid	77-92-9	1.00000	0.00008	None
			Mixture of dimer and trimer fatty acids of indefinite composition derived from tall oil	61790-12-3	30.00000	0.00007	None
			Modified thiourea polymer	Proprietary	30.00000	0.00007	None
			Oxylated phenolic resin	Proprietary	30.00000	0.00005	None
			Propargyl alcohol	107-19-7	5.00000	0.00001	None
			Hexadecene	629-73-2	5.00000	0.00001	None
			Ethoxylated alcohols	Proprietary	5.00000	0.00001	None
			C.I. pigment Orange 5	3468-63-1	1.00000	0.00000	None

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WV Department of
Environmental Protection

* Total Water Volume sources may include various types of water including fresh water, produced water, and recycled water

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

12/13/2024

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(j) and Appendix D are obtained from suppliers Material Safety Data Sheets (MSDS)

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12/13/2024