APPENDIX H
Oil and Gas Wells Within 0.25 Mile of the Leach XPress Project

APPENDIX H
Oil and Gas Wells Located within 0.25 Mile of the Leach XPress Project

Approximate Milepost/Facility	Type	Product	Status
Pipeline Facilities			
LEX			
Marshall County, WV			
2.1	Plugged well	Stratigraphy test	Inactive
2.9	Plugged well	Stratigraphy test	Inactive
3.0	Plugged gas	Gas	Inactive
8.4, RR-1	Unknown Status	Unknown	Inactive
10.9	Dry methane	Methane	Inactive
Monroe County, OH			
28.6	Expired Permit	Unknown	Inactive
28.7	Plugged Gas	Gas	Inactive
39.4	Plugged oil	Oil	Inactive
39.5	Dry hole with oil show	Oil	Inactive
41.1	Gas	Gas	Active
41.9	Oil	Oil	Active
44.3	Dry hole	Unknown	Inactive
45.1	Oil	Oil	Active
46.8	Expired permit	Unknown	Inactive
50.8, RR-6	Unknown Status	Unknown	Inactive
51.9	Gas	Gas	Active
52.4	Expired permit	Unknown	Inactive
Noble County, OH			
62.0	Dry hole	Unknown	Inactive
63.9	Unknown status	Unknown	Inactive
69.2	Unknown status	Unknown	Inactive
73.9	Dry hole	Unknown	Inactive
74.0	Plugged gas	Gas	Inactive
Muskingum County, OH			
77.8	Plugged gas	Gas	Inactive
84.2	Dry hole	Unknown	Inactive
84.2	Oil and gas	Oil and gas	Inactive
Morgan County, OH			
85.8	Dry hole	Unknown	Inactive
91.0	Oil and gas	Oil and gas	Active
91.4	Oil and gas	Oil and gas	Active
92.0	Oil and gas	Oil and gas	Active
93.8	Dry hole	Unknown	Inactive
97.2	Dry hole	Unknown	Inactive
Perry County, OH			
TAR 42 (MP 85.3)	Oil and gas	Oil and gas	Inactive
100.7	Gas	Gas	Active
104.4	Plugged oil and gas	Oil and gas	Inactive
107.3	Plugged oil and gas	Oil and gas	Inactive
108.4	Plugged oil	Oil	Inactive
109.0	Plugged oil	Oil	Inactive
109.5	Plugged oil	Oil	Inactive
109.7	Plugged oil and gas	Oil and gas	Inactive
112.9	Plugged oil	Oil	Inactive
114.7	Plugged oil and gas	Oil and gas	Inactive

APPENDIX H
Oil and Gas Wells Located within 0.25 Mile of the Leach XPress Project

Approximate Milepost/Facility	Type	Product	Status
117.3	Oil	Oil	Inactive
117.9	Plugged oil	Oil	Inactive
118.0	Plugged oil and gas	Oil and gas	Inactive
Hocking County, OH			
124.9	Dry hole	Unknown	Inactive
Fairfield County, OH			
126.6	Gas	Gas	Inactive
128.0	Gas	Gas	Inactive
R-801 Loop			
Hocking County, OH			
0.5	Plugged gas	Gas	Inactive
1.8	Gas	Gas	Inactive
Vinton County, OH			
17.9	Plugged gas	Gas	Inactive
19.0	Dry hole	Unknown	Inactive
BM-111 Loop			
Lawrence County, OH			
0.0	Unknown	Stratigraphy test	Inactive
R-501 Abandonment			
Hocking County, OH			
2.6	Expired permit	Unknown	Inactive
Contractor/Staging/Pipe Yards			
LEX			
Monroe County, OH			
MP 42.3 (Pipe Yard 04 (Alternate))	Plugged gas	Gas	Inactive
Muskingum County, OH			
MP 100.3 (Pipe Yard 36) [a]	Dry hole	Unknown	Inactive
	Plugged oil and gas	Oil and gas	Inactive
	Plugged oil and gas	Oil and gas	Inactive
MP 100.3 (Pipe Yard 48) [a]	Oil and gas	Oil and gas	Active
Guernsey County, OH			
MP 63.1 (Pipe Yard 14) [a]	Plugged oil	Oil	Inactive
Fairfield County, OH			
MP 120.2 (Pipe Yard 11 (Alternate)) [a]	Plugged gas	Gas	Inactive
Noble County, OH			
MP 67.5 (Pipe Yard 33) [a]	Oil and gas	Oil and gas	Active
R-801 Loop			
Hocking County, OH			
MP 0.00 (Pipe Yard 41) [a]	Gas storage	Gas	Active
Vinton County, OH			
MP 13.5 (Pipe Yard 19) [a]	Dry hole	Unknown	Historic
MP 14.4 (Pipe Yard 20) [a]	Unknown	Unknown	Historic

Sources: WVDEP, 2014; 2011; Pennsylvania Spatial Data Access 2015a, 2015b; ODNR, 2014b

[a] Contractor yard is located offline; therefore, the milepost provided is associated with the nearest temporary workspace, additional temporary workspace, access road, or aboveground facility boundary.

APPENDIX I
Active and Abandoned Mines within 0.25 Mile of the Leach XPress Project

APPENDIX I
Active and Abandoned Mines within 0.25 mile of the Leach XPress Project

Approximate Milepost		Distance and Direction from Project (miles)	Crossing Length (miles)	Elevation (feet)	Status	Type	Mine Name	Operator Name
Begin MP	**End MP**							
LEX								
Marshall County, WV								
1.8	2.1	N/A[a]	0.8	Unknown	Active (scheduled for completion December 2015)	Longwall, coal	Shoemaker	Murray Energy, Co.
2.1	2.4	N/A[a]	0.8	Unknown	Active (scheduled for completion September 2016)	Longwall, coal	Shoemaker	Murray Energy, Co.
2.4	2.7	N/A[a]	0.8	Unknown	Future (Sep. 2016– Sep. 2017)	Longwall, coal	Shoemaker	Murray Energy, Co.
3.1	3.4	N/A[a]	4.0	Unknown	Inactive (completed Aug. 2014)	Longwall, coal	Bailey	Consolidation Coal, Co.
3.4	3.8	N/A[a]	4.0	Unknown	Inactive (completed April 2015)	Longwall, coal	Bailey	Consolidation Coal, Co.
3.8	4.2	N/A[a]	4.0	Unknown	Active (scheduled for completion Feb. 2016)	Longwall, coal	Bailey	Consolidation Coal, Co.
4.2	4.5	N/A[a]	4.0	Unknown	Future (March 2016 – Jan. 2017	Longwall, coal	Bailey	Consolidation Coal, Co.
4.5	4.8	N/A[a]	4.0	Unknown	Future (Feb. 2017 – Jan. 2018)	Longwall, coal	Bailey	Consolidation Coal, Co.
4.8	5.3	N/A[a]	4.0	Unknown	Future (Jan. 2018 – Dec. 2018)	Longwall, coal	Bailey	Consolidation Coal, Co.
5.4	5.7	N/A[a]	4.0	Unknown	Future (Dec. 2018 – Nov. 2019)	Longwall, coal	Bailey	Consolidation Coal, Co.
5.7	6.0	N/A[a]	4.0	Unknown	Future (Nov. 2019 – Dec. 2020)	Longwall, coal	Bailey	Consolidation Coal, Co.
6.0	6.4	N/A[a]	4.0	Unknown	Future (Dec. 2020 – Nov. 2021)	Longwall, coal	Bailey	Consolidation Coal, Co.
6.4	6.7	N/A[a]	4.0	Unknown	Future (Nov. 2021 – Dec. 2022)	Longwall, coal	Bailey	Consolidation Coal, Co.
6.7	7.1	N/A[a]	4.0	Unknown	Future (Dec. 2022 – Nov. 2023)	Longwall, coal	Bailey	Consolidation Coal, Co.
7.2	7.5, RR-1	N/A[a]	4.0	Unknown	Future (Nov. 2023 – Dec. 2025)	Longwall, coal	Bailey	Consolidation Coal, Co.
9.6	9.9	N/A[a]	1.9	Unknown	Inactive	Longwall, coal	McElroy	Murray Energy, Co.
9.8	10.2	N/A[a]	1.9	Unknown	Future (January 2017- June 2017)	Longwall, coal	McElroy	Murray Energy, Co.
10.3	10.7	N/A[a]	1.9	Unknown	Unknown	Longwall, coal	McElroy	Murray Energy, Co.
10.9	11.7	N/A[a]	1.9	Unknown	Unknown	Longwall, coal	McElroy	Murray Energy, Co.
Monroe County, OH								
26.3, RR-5	33.7	N/A[a]	7.4	Unknown	Abandoned	Underground, coal	Marcoll	Quarto Mining, Co.
33.9	33.9	0.1 S	N/A[b]	Unknown	Active	Surface, coal	Unknown	Consolidation Coal, Co.

APPENDIX I
Active and Abandoned Mines within 0.25 mile of the Leach XPress Project

Approximate Milepost		Distance and Direction from Project (miles)	Crossing Length (miles)	Elevation (feet)	Status	Type	Mine Name	Operator Name
Begin MP	End MP							
Noble County, OH								
54.70 RR-7	55.09 RR-7	N/A [a]	0.39	Unknown	Released for reclamation	Surface, coal	Unknown	B&N Coal, Inc.
55.2	55.2	0.03 S	N/A[b]	Unknown	Inactive	Surface, coal	Unknown	Orange Coal, Co.
55.25 RR-7	55.39 RR-7	N/A [a]	0.14	Unknown	Inactive	Surface, Coal	Unknown	Orange Coal, Co
55.9	55.9	0.1 SW	N/A[b]	1,046	Abandoned (1932)	Surface, coal	Horton	Eugene Horton
56.2	56.5	N/A[a]	1.8	Unknown	Released for reclamation	Surface, coal	Unknown	B&N Coal, Inc.
56.6	58.0	N/A[a]	1.8	Unknown	Released for reclamation	Surface, coal	Unknown	B&N Coal, Inc.
56.1	56.1	0.3 SW	N/A[b]	1,039	Abandoned (1953)	Surface, coal	Stephens	W.C. Stephens
59.4	59.4	0.3 N	N/A[b]	Unknown	Abandoned	Surface, coal	Unknown	Orange Coal, Co.
66.1	66.1	N/A[a]	2.1	557	Abandoned (1939)	Underground, coal	Caldwell	Cambridge Collieries, Co.
66.3	66.5	N/A[a]	2.1	557	Abandoned (1939)	Underground, coal	Caldwell	Cambridge Collieries, Co.
66.8	66.9	N/A[a]	2.1	557	Abandoned (1939)	Underground, coal	Caldwell	Cambridge Collieries, Co.
67.0	68.7	N/A[a]	2.1	557	Abandoned (1939)	Underground, coal	Caldwell	Cambridge Collieries, Co.
68.8	68.9	N/A[a]	2.1	557	Abandoned (1939)	Underground, coal	Caldwell	Cambridge Collieries, Co.
68.9	69.2	N/A[a]	0.3	570	Abandoned (1936)	Underground, coal	Imperial No. 1	New Forsythe Coal, Co.
70.1	70.2	N/A[a]	0.1	Unknown	Inactive	Surface, coal	Unknown	Knowlton Industries
70.3	70.3	N/A[a]	0.1	Unknown	Inactive	Surface, coal	Unknown	Knowlton Industries
71.7	71.7	0.1 S	N/A[b]	Unknown	Abandoned	Surface, coal	Unknown	Central Ohio Coal, Co.
71.8	71.8	N/A[a]	0.1	Unknown	Abandoned	Surface, coal	Unknown	Central Ohio Coal, Co.
71.8	71.9	N/A[a]	0.1	Unknown	Abandoned	Surface, coal	Unknown	Central Ohio Coal, Co.
71.8	71.8	N/A[a]	0.1	Unknown	Abandoned	Surface, coal	Unknown	Ohio Power, Co.
72.1	72.1	N/A[a]	0.1	Unknown	Abandoned	Surface, coal	Unknown	Ohio Power, Co.
72.1	72.1	0.3 SE	N/A[b]	950	Abandoned (1932)	Surface, coal	Hedge	R.T Doyenbarger.
72.3	75.2	N/A[a]	6.2	Unknown	Released for reclamation	Surface, coal	Unknown	Central Ohio Coal, Co.
75.3	78.6 [c]	N/A[a]	6.2	Unknown	Released for reclamation	Surface, coal	Unknown	Central Ohio Coal, Co.
Muskingum County, OH								
84.3	84.7	N/A[a]	0.9	Unknown	Abandoned	Surface, coal	Unknown	Ohio Power, Co.

APPENDIX I
Active and Abandoned Mines within 0.25 mile of the Leach XPress Project

Approximate Milepost		Distance and Direction from Project (miles)	Crossing Length (miles)	Elevation (feet)	Status	Type	Mine Name	Operator Name
Begin MP	End MP							
84.7	85.2 [d]	N/A[a]	0.9	Unknown	Abandoned	Surface, coal	Unknown	Ohio Power, Co.
Morgan County, OH								
89.7	90.0	N/A [a]	0.28	733	Future [e]	Surface, gravel	Unknown	Muskingum River Gravel Company
Perry County, OH								
98.0	100.1	N/A[a]	2.1	763	Abandoned (1955)	Underground, coal	Misco	Muskingum Coal, Co.
98.3	99.9	N/A[a]	1.7	Unknown	Future[e]	Surface, limestone	Unknown	Lin Engineering
100.1	100.1	0.2 N	N/A[b]	Unknown	Released for reclamation	Surface, coal	Unknown	Crooksville Coal, Co.
100.3	100.5	N/A[a]	2.4	802	Abandoned (1985)	Underground, coal	Sunnyhill No. 9 North	Peabody Coal, Co.
100.5	100.7	N/A[a]	2.4	802	Abandoned (1985)	Underground, coal	Sunnyhill No. 9 North	Peabody Coal, Co.
100.7	101.9	N/A[a]	2.4	802	Abandoned (1985)	Underground, coal	Sunnyhill No. 9 North	Peabody Coal, Co.
101.1	101.4	N/A[a]	2.4	802	Abandoned (1985)	Underground, coal	Sunnyhill No. 9 North	Peabody Coal, Co.
101.5	101.7	N/A[a]	2.4	802	Abandoned (1985)	Underground, coal	Sunnyhill No. 9 North	Peabody Coal, Co.
101.8	102.0	N/A[a]	2.4	802	Abandoned (1985)	Underground, coal	Sunnyhill No. 9 North	Peabody Coal, Co.
102.2	102.4	N/A[a]	2.4	802	Abandoned (1985)	Underground, coal	Sunnyhill No. 9 North	Peabody Coal, Co.
102.5	102.7	N/A[a]	0.2	803	Abandoned (1956)	Underground, coal	Alexander No. 2	Alex Wilson Coal, Co.
103.1	103.1	0.1 S	N/A[b]	809	Abandoned (1945)	Underground, coal	Allen	Allen Bros. Coal, Co.
103.2	103.2	0.1 N	N/A[b]	804	Abandoned (1944)	Underground, coal	Fred Price	Fred Price Coal, Co.
103.3	104.0	N/A[a]	2.9	886	Abandoned (1967)	Underground, coal	Sunnyhill No. 7	Peabody Coal, Co.
104.1	104.4	N/A[a]	2.9	886	Abandoned (1967)	Underground, coal	Sunnyhill No. 8	Peabody Coal, Co.
104.4	104.5	N/A[a]	2.9	886	Abandoned (1967)	Underground, coal	Sunnyhill No. 9	Peabody Coal, Co.
104.6	104.6	N/A[a]	2.9	886	Abandoned (1967)	Underground, coal	Sunnyhill No. 10	Peabody Coal, Co.
104.9	105.4	N/A[a]	2.9	886	Abandoned (1967)	Underground, coal	Sunnyhill No. 11	Peabody Coal, Co.
105.4	106.5	N/A[a]	2.9	886	Abandoned (1967)	Underground, coal	Sunnyhill No. 12	Peabody Coal, Co.
104.3	104.3	0.2 N	N/A[b]	818	Abandoned (1937)	Underground, coal	Buchanan	Buchanan Coal, Co.
104.4	104.4	0.1 N	N/A[b]	816	Abandoned (1942)	Underground, coal	Bear Run	Bear Run Coal, Co.
105.4	106.5	N/A[a]	1.1	Unknown	Active	Surface, coal	Unknown	Heritage Coal Co.

APPENDIX I
Active and Abandoned Mines within 0.25 mile of the Leach XPress Project

Approximate Milepost		Distance and Direction from Project (miles)	Crossing Length (miles)	Elevation (feet)	Status	Type	Mine Name	Operator Name
Begin MP	End MP							
106.8	107.3	N/A[a]	0.5	Unknown	Abandoned (1966)	Underground, coal	Sunnyhill No. 1	Peabody Coal, Co.
107.4	107.4	0.2 S	N/A[b]	Unknown	Abandoned (1923)	Underground, coal	Caledonian	Malone Bearls Coal, Co.
107.4	109.0	N/A[a]	1.9	956	Abandoned (1969)	Underground, coal	Sunnyhill No. 2	Peabody Coal, Co.
109.1	109.3	N/A[a]	1.9	956	Abandoned (1969)	Underground, coal	Sunnyhill No. 3	Peabody Coal, Co.
109.0	109.0	0.2 S	N/A[b]	940	Abandoned (1971)	Underground, coal	Sunnyhill No. 3	Peabody Coal, Co.
109.3	109.4	N/A[a]	0.5	Unknown	Released for reclamation	Surface, coal	Unknown	Buckingham Coal, Co.
109.5	109.9	N/A[a]	1.5	Unknown	Released for reclamation	Surface, coal	Unknown	Buckingham Coal, Co.
109.9	110.1	N/A[a]	0.2	Unknown	Inactive	Surface, coal	Unknown	Lominco, Inc.
110.1	110.1	0.2 N	N/A[b]	Unknown	Inactive	Surface, coal	Unknown	Star Mining Co. Inc.
111.7	111.7	0.2 S	N/A[b]	Unknown	Inactive	Surface, coal	Unknown	Star Mining Co. Inc.
112.9	113.3	N/A[a]	0.4	Unknown	Inactive	Surface, coal	Unknown	Star Mining Co. Inc.
112.7	112.7	<0.1 S	N/A[b]	Unknown	Abandoned	Surface, coal	Unknown	Sidwell Brothers
113.1	113.1	0.1 N	N/A[b]	987	Abandoned (1932)	Underground, coal	Studer	C.E. Studer
113.2	113.2	0.1 N	N/A[b]	991	Abandoned (1933)	Underground, coal	Sweeney	William M. Sweeney
R-801 Loop								
Vinton County, OH								
23.2	23.2	0.2 W	N/A[b]	Unknown	Inactive	Surface, coal	Unknown	Lawrence G. Daft
26.3	26.3	N/A[a]	0.0	Unknown	Released for reclamation	Surface, coal	Unknown	Elk Coal, Inc.
26.3	26.3	0.1 W	N/A[b]	Unknown	Released for reclamation	Abandoned (1986)	Unknown	Elk Coal, Inc.

Source: WVDEP, 2014, 2011; PASDA, 2015c; ODNR 2014c.
N/A – not applicable
RR – Reroute adopted into the route during Columbia Gas' March 2016 supplemental filing
[a] Mine is crossed by the proposed Project.
[b] Mine is not directly crossed by the project, but occurs within 0.25 mile of the project area.
[c] Mine is crossed in both Noble and Muskingum Counties, Ohio.
[d] Mine is crossed in both Muskingum and Morgan Counties, Ohio
[e] Project crosses area slated for future mining activities; however, Columbia is in negotiations with the associated mining company to purchase mineral rights along the proposed pipeline.

APPENDIX J
Longwall Mining Plan

LONGWALL MINING PLAN

1.0 Introduction

This *Longwall Mining Plan* outlines the procedures and safety measures that Columbia Gas Transmission, LLC (Columbia) will implement when areas of the proposed Leach XPress Project (Project) are affected by underground longwall mining activity.

2.0 Background Information

Longwall mining is a mining method that involves the subsurface removal of a resource; usually coal, through underground tunnels. Many underground mines can cause surface subsidence, however longwall mining subsidence is generally predictable, occurs almost immediately and the event is largely complete within one to three months. Residual subsidence can occur over a longer period, but it is generally small in nature. There are areas along the proposed pipeline route in Marshall county, WV that have been identified as potential future longwall mining panels.

3.0 Construction During Active Mining

In the event that a longwall mining panel is active between November 2016 and November 2017 along the proposed pipeline routes, Columbia will construct the pipeline within this particular panel after the subsidence period, if schedule allows. If the Project construction schedule cannot accommodate the active panel's subsidence then Columbia will lay the pipeline in the ditch on earth bags and delay backfilling the pipe until after the mining subsidence period. The spoil piles will be secured with environmental controls and seeding and mulch will be installed in the ditch as well as on the spoil piles to temporary restore the construction area.

Stream crossings and road crossings will be evaluated on a case by case basis and will involve input from agencies. Road crossings may require temporary bridges and traffic control measures. Stream crossings, depending on the stream and the location within the panel, will either be installed and backfilled as normal with monitoring on each side of the stream or the pipe will laid across the stream with saddle sand bags on top of the pipe for buoyancy control.

In areas that have been identified as future longwall mines, the pipeline has been designed to a higher class strength of pipe as an additional precautionary measure. The monitoring of the pipeline within active panels during construction and during future operations will follow the same procedure as outlined below.

4.0 Monitoring

To relieve stress on the pipeline and mitigate damage during the subsidence period Columbia will strip out and monitor the pipeline. This mitigation measure involves removal of the overburden and trenching around the pipe to allow free movement without “pinning” the pipe. Removal of the overburden stops the transfer of load to the pipeline from soil weight. Typically the overburden will be removed from the pipeline across the panel and about halfway through the edges that separate longwall panels. The trench extends along the sides of the pipeline to the bottom of the pipe.

When the stripping is completed, monitoring of the pipeline shall begin as the mining approaches. Monitoring is typically done by installing and reading strain gages during the undermining of the pipeline and throughout the subsidence event. Strain gages are installed at locations on the pipeline where stress is expected to increase (over the edges of the panels, at overbends, near the center of the longwall panel, etc.) as a result of ground movement. A strain gage reader is used to measure strain induced upon the pipeline by the ground movement. A baseline reading and at least one additional set of strain readings shall be obtained prior to the undermining of the pipeline. This is for comparison purposes to assure that the strain gages are in working order. Pipelines may need to be realigned if calculated stress levels meet threshold limits, in this situation, air bags are used for this purpose, although excavators and side booms can also be used. In this case, the pipeline is instrumented using strain gages and verification that the realignment was effective can be accomplished quickly by analyzing readings after the re-alignment is completed.

APPENDIX K
Waterbodies Crossed or Impacted by the Projects

APPENDIX K-1
Waterbodies Crossed or Impacted by the Leach XPress Project

APPENDIX K-1

Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
Pipeline Facilities									
LEX									
Greene County, PA									
0.1	SA8GR330	Unnamed Tributary of Enlow Fork	WWF	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
0.1	SA8GR330	Unnamed Tributary of Enlow Fork	WWF	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
0.1	SA8GR329	Unnamed Tributary of Enlow Fork	WWF	Warmwater	Intermittent	Minor	4	7	Dry open-cut
0.2	SA8GR331	Unnamed Tributary of Enlow Fork	WWF	Warmwater	Intermittent	Minor	3	0 [c]	Workspace only
0.2	SA8GR333	Unnamed Tributary of Enlow Fork	WWF	Warmwater	Perennial	Minor	6	7	Dry open-cut
0.2	SA8GR336	Unnamed Tributary of Enlow Fork	WWF	Warmwater	Ephemeral	Minor	3	0 [c]	Workspace only
0.2	SA8GR336	Unnamed Tributary of Enlow Fork	WWF	Warmwater	Ephemeral	Intermediate	3	11	Dry open-cut
0.4	SA8GR359	Unnamed Tributary of Enlow Fork	WWF	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
0.4	SA8GR333	Unnamed Tributary of Enlow Fork	WWF	Warmwater	Perennial	Minor	6	0 [c]	Workspace only
0.4	SA8GR355	Unnamed Tributary of Enlow Fork	WWF	Warmwater	Intermittent	Minor	4	4	Dry open-cut
0.4	SA8GR353	Unnamed Tributary of Enlow Fork	WWF	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
0.4	SA8GR353	Unnamed Tributary of Enlow Fork	WWF	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
0.7	SA8GR328	Unnamed Tributary of Dunkard Fork	WWF	Warmwater	Intermittent	Minor	6	6	Dry open-cut
1.3	SA6GR005	Unnamed Tributary of Dunkard Fork	WWF	Warmwater	Perennial	Intermediate	10	14	Dry open-cut
1.4	SA6GR003	Unnamed Tributary of Dunkard Fork	WWF	Warmwater	Intermittent	Minor	2	3	Dry open-cut
1.5	SA6GR002	Unnamed Tributary of Dunkard Fork	WWF	Warmwater	Ephemeral	Minor	2	2	Dry open-cut
1.8	SA6MR001	Dunkard Fork [j]	WWF	Warmwater	Perennial	Intermediate	73	75	Dry open-cut
Marshall County, WV									

APPENDIX K-1

Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
1.8	SA8MR344	Unnamed Tributary of Dunkard Fork	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
1.8	SA6MR025	Unnamed Tributary of Dunkard Fork	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	0 [c]	Workspace only
1.9	SA6MR025	Unnamed Tributary of Dunkard Fork	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	0 [c]	Workspace only
2.0	SA6MR032	Unnamed Tributary of Dunkard Fork	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	1	Wet open-cut
2.0	SA6MR031	Unnamed Tributary of Dunkard Fork	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	2	Wet open-cut
2.0	SA6MR026	Unnamed Tributary of Dunkard Fork	B1 (Tier 2)	Warmwater	Perennial	Minor	2	2	Wet open-cut
2.3	SA5MR365_DT	Unnamed Tributary of Dunkard Fork	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	2	Wet open-cut
2.5	SA5MR366_DT	Unnamed Tributary of Dunkard Fork	B1 (Tier 2)	Warmwater	Ephemeral	Minor	3	4	Wet open-cut
3.4	SA6MR326	Unnamed Tributary of Granny Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	3	0 [c]	Workspace only
3.5	SA6MR325	Unnamed Tributary of Granny Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	5	6	Wet open-cut
3.9	SA6MR116	Granny Run	B1 (Tier 2)	Warmwater	Perennial	Minor	5	5	Wet open-cut
4.2	SA8MR013	Unnamed Tributary of Howard Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	2	Wet open-cut
4.5	SA8MR018	Unnamed Tributary of Howard Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	1	Wet open-cut
4.7	SA8MR020	Howard Run	B1 (Tier 2)	Warmwater	Perennial	Minor	7	9	Wet open-cut
4.8	SA8MR021	Unnamed Tributary of Howard Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	0 [c]	Workspace only
5.9	SA8MR024	Williams Run	B1 (Tier 2)	Warmwater	Perennial	Intermediate	21	23	Dry open-cut
6.0	SA8MR025	Unnamed Tributary of Williams Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
6.3	SA8MR026	Unnamed Tributary of Williams Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	0 [c]	Workspace only
6.3	SA8MR027	Unnamed Tributary of Williams Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	0 [c]	Workspace only
6.3	SA8MR026	Unnamed Tributary of Williams Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	0 [c]	Workspace only

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
6.4	SA6MR016	Unnamed Tributary of Williams Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	0 [c]	Workspace only
6.4	SA6MR017	Unnamed Tributary of Williams Run	B1 (Tier 2)	Warmwater	Perennial	Minor	3	3	Wet open-cut
6.8	SA6MR020	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	2	Wet open-cut
7.0	SA6MR022	Wolf Run	B1 (Tier 2)	Warmwater	Perennial	Minor	12	8	Dry open-cut
7.7, RR-1	SA7MR015	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	2	Wet open-cut
7.8, RR-1	SA8MR363	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	1	Wet open-cut
7.8, RR-1	SA8MR364	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	2	Wet open-cut
7.8, RR-1	SA8MR365	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	3	3	Wet open-cut
7.9, RR-1	SA8MR367	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
8.3, RR-1	SA8MR368	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	2	Wet open-cut
8.3, RR-1	SA8MR371	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	1	Wet open-cut
8.3, RR-1	SA8MR373	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
8.4	SA8MR035	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	2	Wet open-cut
8.6	SA8MR032	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	4	4	Wet open-cut
8.9	SA8MR046	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	2	Wet open-cut
9.1, RR-1	SA8MR047	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	4	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
9.1, RR-1	SA8MR048	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	2	Wet open-cut
9.1, RR-1	SA8MR049	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	1	Wet open-cut
9.3, RR-1	SA8MR052	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	0 [c]	Wet open-cut
9.4, RR-1	SA8MR054	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	10	Workspace only
9.4, RR-1	SA8MR053	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	5	Wet open-cut
9.7	SA6MR037	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	1	Wet open-cut
9.7	SA6MR035	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Perennial	Minor	7	9	Wet open-cut
9.8	SA6MR035	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Perennial	Minor	7	0 [c]	Workspace only
9.8	SA6MR034	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Perennial	Minor	5	6	Wet open-cut
10.5	SA6MR038	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	4	5	Wet open-cut
10.5	SA6MR039	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
10.5	SA6MR041	Unnamed Tributary of Middle Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
10.8	SA6MR044	Unnamed Tributary of French Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	2	Wet open-cut
10.8	SA6MR045	Unnamed Tributary of French Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
11.0	SA6MR046	French Run	B1 (Tier 2)	Warmwater	Perennial	Minor	6	8	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
11.1	SA6MR048	Unnamed Tributary of French Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
11.4	SA8MR066	Unnamed Tributary of Lick Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
11.5	SA6MR050	Unnamed Tributary of Lick Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	5	Wet open-cut
11.5	SA6MR050	Unnamed Tributary of Lick Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
11.5	SA8MR064	Unnamed Tributary of Lick Run	B1 (Tier 2)	Warmwater	Perennial	Minor	3	3	Wet open-cut
11.7	SA8MR063	Lick Run	B1 (Tier 2)	Warmwater	Perennial	Minor	3	3	Wet open-cut
11.9	SA8MR061	Unnamed Tributary of Lick Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	2	Wet open-cut
12.1	SA8MR058	Unnamed Tributary of Lick Run	B1 (Tier 2)	Warmwater	Perennial	Minor	3	6	Wet open-cut
12.1	SA8MR059	Unnamed Tributary of Lick Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	0 [c]	Workspace only
12.6	SA8MR218	Unnamed Tributary of Cedar Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
12.6	SA8MR219	Unnamed Tributary of Cedar Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	3	0 [c]	Workspace only
12.7	SA8MR220	Unnamed Tributary of Cedar Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	1	Wet open-cut
12.7	SA8MR221	Unnamed Tributary of Cedar Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
12.7	SA8MR220	Unnamed Tributary of Cedar Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	3	Wet open-cut
12.7	SA8MR220	Unnamed Tributary of Cedar Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	5	Wet open-cut
12.8	SA6MR054	Cedar Run	B1 (Tier 2)	Warmwater	Perennial	Intermediate	8	12	Wet open-cut
13.2	SA6MR057	Unnamed Tributary of Cedar Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	3	3	Wet open-cut
13.4	SA6MR064	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	4	Wet open-cut
13.4	SA6MR063	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	1	Wet open-cut
13.4	SA6MR065	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
13.4	SA8MR083	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
13.4	SA6MR062	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
13.4	SA6MR066	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	3	3	Wet open-cut
13.4	SA6MR067	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	2	Wet open-cut
13.6	SA8MR081	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	7	7	Wet open-cut
13.6	SA8MR082	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	1	Wet open-cut
13.9	SA8MR078	Bartletts Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	7	8	Wet open-cut
14.0	SA8MR077	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	4	5	Wet open-cut
14.0	SA6MR324	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
14.3, RR-2	SA5MR900_DT	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	5	9	Wet open-cut
14.4, RR-2	SA5MR810_DT	Bartletts Run	B1 (Tier 2)	Warmwater	Intermittent	Intermediate	15	47	Dry open-cut
15.3, RR-2	SA5MR808_DT	Bartletts Run	B1 (Tier 2)	Warmwater	Intermittent	Intermediate	15	42	Dry open-cut
15.2	SA8MR223	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Perennial	Intermediate	11	12	Dry open-cut
15.5	SA8MR227	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	6	8	Wet open-cut
15.7	SA8MR230	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	2	Wet open-cut
16.1	SA2MR580	Grave Creek	B1 (Tier 2)	Warmwater	Perennial	Intermediate	51	51	Dry open-cut
16.1	SA6MR052	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
16.2	SA6MR052	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
16.2	SA6MR053	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	3	0 [c]	Workspace only
16.3	SA6MR052	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
16.5	SA8MR074	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
17.8	SA8MR239	Tribble Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	5	5	Wet open-cut
17.9	SA8MR107	Unnamed Tributary of Tribble Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	4	4	Wet open-cut
18.2	SA8MR114	Unnamed Tributary of Tribble Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	5	5	Wet open-cut
18.2	SA8MR115	Unnamed Tributary of Tribble Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
18.3	SA8MR116	Unnamed Tributary of Tribble Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	1	Wet open-cut
18.4	SA8MR119	Unnamed Tributary of Tribble Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	4	7	Wet open-cut
18.4	SA8MR121	Unnamed Tributary of Tribble Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	4	4	Wet open-cut
18.5	SA8MR122	Unnamed Tributary of Tribble Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	3	0 [c]	Workspace only
18.7	SA7MR056	Unnamed Tributary of Tribble Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	5	5	Wet open-cut
19.4	SA2MR565	Unnamed Tributary of Little Tribble Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	3	Wet open-cut
19.5	SA2MR566	Unnamed Tributary of Little Tribble Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	5	0 [c]	Workspace only
20.6	SA6MR334	Big Tribble Creek	B1 (Tier 2)	Warmwater	Perennial	Intermediate	12	21	Dry open-cut
21.0	SA8MR244	Unnamed Tributary of Fish Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	3	Wet open-cut
21.0	SA8MR246	Unnamed Tributary of Fish Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
21.0	SA8MR243	Unnamed Tributary of Fish Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	3	3	Wet open-cut
21.2	SA6MR330	Unnamed Tributary of Fish Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
21.2	SA6MR331	Unnamed Tributary of Fish Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	0 [c]	Workspace only
21.2	SA6MR332	Unnamed Tributary of Fish Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	3	0 [c]	Workspace only
21.2	SA6MR329	Unnamed Tributary of Fish Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
21.3	SA6MR328	Fish Creek	B1 (Tier 1)	Warmwater	Perennial	Major	104	0 [c]	Workspace only
21.3	SA6MR328	Fish Creek	B1 (Tier 1)	Warmwater	Perennial	Major	104	0 [d]	HDD
21.3	SA6MR328	Fish Creek	B1 (Tier 1)	Warmwater	Perennial	Major	104	0 [c]	Workspace only
21.8	SA8MR247	Unnamed Tributary of Fish Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	6	6	Wet open-cut
22.1	SA6MR336	Unnamed Tributary of Fish Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	6	Wet open-cut
22.4	SA6MR070	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	1	Wet open-cut
22.4	SA6MR069	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	6	Wet open-cut
22.4	SA6MR071	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
22.4	SA6MR072	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	3	3	Wet open-cut
22.5	SA6MR075	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	2	Wet open-cut
22.6	SA6MR076	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Perennial	Minor	5	5	Wet open-cut
22.6	SA6MR077	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	0 [c]	Workspace only
22.7	SA6MR078	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Perennial	Minor	5	5	Wet open-cut
22.7	SA6MR080	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
22.7	SA6MR082	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
22.7	SA6MR081	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	1	Wet open-cut
22.7	SA6MR083	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	2	Wet open-cut
22.7	SA6MR083	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	2	Wet open-cut
22.8	SA6MR084	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	2	Wet open-cut
23.2	SA6MR089	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Perennial	Minor	3	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
23.2	SA8MR106	Long Run	B1 (Tier 2)	Warmwater	Perennial	Intermediate	49	56	Dry open-cut
23.3	SA8MR104	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Perennial	Intermediate	32	36	Dry open-cut
23.3	SA8MR103	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	3	7	Wet open-cut
23.4	SA8MR103	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Intermediate	3	31	Wet open-cut
23.4	SA8MR103	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	3	4	Wet open-cut
23.7	SA8MR097	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	3	5	Wet open-cut
23.7	SA8MR100	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
23.7	SA8MR101	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	2	Wet open-cut
23.9	SA8MR093	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	0 [c]	Workspace only
24.0	SA8MR092	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	4	Wet open-cut
24.0	SA8MR090	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Perennial	Minor	12	14	Dry open-cut
24.1	SA8MR087	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	3	Wet open-cut
24.3	SA2MR156	Unnamed Tributary of Long Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	0 [c]	Workspace only
25.1	SA6MR096	Unnamed Tributary of Ohio River	B1 (Tier 2)	Warmwater	Perennial	Intermediate	10	17	Dry open-cut
25.1	SA6MR096	Unnamed Tributary of Ohio River	B1 (Tier 2)	Warmwater	Perennial	Intermediate	10	52	Dry open-cut
25.1	SA6MR097	Unnamed Tributary of Ohio River	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
25.2, RR-5	SA6MR096	Unnamed Tributary of Ohio River	B1 (Tier 2)	Warmwater	Perennial	Minor	10	0 [d]	HDD
25.3, RR-5	SA6MR098	Unnamed Tributary of Ohio River	B1 (Tier 2)	Warmwater	Ephemeral	Minor	4	0 [d]	HDD
25.3, RR-5	SA6MR096	Unnamed Tributary of Ohio River	B1 (Tier 2)	Warmwater	Perennial	Minor	10	0 [d]	HDD
25.3,RR-5	SA6MR100	Unnamed Tributary of Ohio River	B1 (Tier 2)	Warmwater	Perennial	Minor	3	0 [d]	HDD

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
25.4, RR-5	SA6MR096	Unnamed Tributary of Ohio River	B1 (Tier 2)	Warmwater	Perennial	Minor	10	0 [d]	HDD
25.4, RR-5	SA7MN027	Ohio River e, f	B2 (Tier 1), SHQ	Warmwater	Perennial	Major	1,366	0 d	HDD
Monroe County, OH									
25.8, RR-5	SA7MN028	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Intermittent	Minor	3	0 [d]	HDD
25.8. RR-5	SA6MN372	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [d]	HDD
25.8, RR-5	SA6MN372	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
25.9, RR-5	SA6MN361	Unnamed Tributary of Ohio River	PCR- Class B	Coldwater	Perennial	Intermediate	25	0 [c]	Workspace only
27.1	SA6MN103	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
27.3	SA6MN105	Unnamed Tributary of Johnson Run	PCR- Class B	Coldwater	Perennial	Minor	10	10	Dry open-cut
27.3	SA6MN107	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
27.8	SA1MN492	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
27.8	SA1MN491	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
28.1	SA1MN487	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Ephemeral	Minor	3	5	Wet open-cut
28.1	SA1MN485	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Intermittent	Minor	8	9	Wet open-cut
28.1	SA1MN488	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
28.1	SA1MN486	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Ephemeral	Minor	4	0 [c]	Workspace only
28.4	SA1MN478	Unnamed Tributary of Johnson Run	PCR- Class B	Coldwater	Perennial	Intermediate	8	13	Dry open-cut
28.5	SA1MN474	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
28.5	SA1MN475	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
28.5	SA1MN476	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
28.6	SA1MN477	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
28.8	SA8MN250	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
28.8	SA8MN251	Johnson Run	PCR- Class B	N/A	Intermittent	Minor	7	7	Wet open-cut
28.9	SA8MN253	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
29.1	SA6MN109	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
29.2	SA6MN110	Unnamed Tributary of Stillhouse Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
29.2	SA6MN113	Unnamed Tributary of Stillhouse Run	PCR- Class B	Coldwater	Perennial	Minor	5	5	Dry open-cut
29.5	SA8MN347	Unnamed Tributary of Stillhouse Run	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
29.5	SA8MN346	Unnamed Tributary of Stillhouse Run	PCR- Class B	N/A	Intermittent	Minor	6	6	Wet open-cut
29.8	SA2MN476	Stillhouse Run	PCR- Class B	N/A	Perennial	Intermediate	12	16	Dry open-cut
30.0	SA2MN474	Unnamed Tributary of Stillhouse Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
30.1	SA2MN473	Unnamed Tributary of Stillhouse Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
30.1	SA2MN472	Unnamed Tributary of Stillhouse Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
30.2	SA2MN471	Unnamed Tributary of Stillhouse Run	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
30.3	SA2MN469	Unnamed Tributary of Stillhouse Run	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
30.5	SA1MN182	Unnamed Tributary of Nigger Run	PCR- Class B	N/A	Intermittent	Minor	3	2	Wet open-cut
31.1	SA1MN178	Nigger Run	PCR- Class B	N/A	Intermittent	Minor	4	0 [c]	Workspace only
31.1	SA1MN178	Nigger Run	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
31.1	SA1MN177	Unnamed Tributary of Nigger Run	PCR- Class B	N/A	Intermittent	Minor	2	3	Wet open-cut
31.3	SA1MN176	Unnamed Tributary of Nigger Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
31.5	SA2MN556	Unnamed Tributary of Nigger Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
31.6	SA2MN553	Unnamed Tributary of Nigger Run	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
31.9	SA2MN564	Unnamed Tributary of Paine Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
31.9	SA2MN563	Unnamed Tributary of Paine Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
32.3	SA8MN124	Unnamed Tributary of Paine Run	PCR- Class B	Coldwater	Perennial	Intermediate	18	26	Dry open-cut
32.6	SA2MN289	Unnamed Tributary of Paine Run	PCR- Class B	N/A	Intermittent	Minor	6	10	Wet open-cut
33.0	SA2MN275	Unnamed Tributary of Paine Run	PCR- Class B	N/A	Intermittent	Minor	7	10	Wet open-cut
33.1	SA2MN276	Unnamed Tributary of Paine Run	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
33.4	SA2MN281	Paine Run	WWH, AWS, IWS, SCR	Warmwater	Perennial	Minor	15	13	Dry open-cut
34.6	SA4MN005	Unnamed Tributary of Ackerson Run	PCR- Class B	N/A	Intermittent	Minor	7	7	Wet open-cut
34.8	SA4MN004	Ackerson Run	WWH, AWS, IWS, PCR – Class B	Warmwater	Perennial	Intermediate	12	18	Dry open-cut
34.8	SA4MN002	Unnamed Tributary of Ackerson Run	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
34.8	SA4MN003	Unnamed Tributary of Ackerson Run	PCR- Class B	N/A	Intermittent	Minor	5	0 [c]	Workspace only
34.9	SA4MN002	Unnamed Tributary of Ackerson Run	PCR- Class B	N/A	Ephemeral	Minor	3	6	Wet open-cut
34.9	SA4MN001	Unnamed Tributary of Ackerson Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
35.2	SA3MN114	Unnamed Tributary of Ackerson Run	PCR- Class B	N/A	Intermittent	Minor	5	7	Wet open-cut
35.2	SA3MN112	Unnamed Tributary of Ackerson Run	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
35.8	SA6MN347	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
35.9	SA6MN346	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
36.0	SA6MN344	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
36.0	SA6MN342	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
36.2	SA2MN269	Unnamed Tributary of East Fork	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
36.4	SA6MN377	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
36.5	SA5MN100_DT	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
36.7	SA5MN101_DT	East Fork	WWH, AWS, IWS, SCR	Warmwater	Perennial	Intermediate	30	31	Dry open-cut
36.9	SA5MN103_DT	Unnamed Tributary of East Fork	PCR- Class B	N/A	Intermittent	Minor	9	9	Wet open-cut
36.9	SA5MN505_DT	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
37.2	SA5MN104_DT	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
37.3	SA2MN262	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
37.3	SA2MN263	Unnamed Tributary of East Fork	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
38.0	SA2MN267	Unnamed Tributary of Piney Fork	PCR- Class B	Coldwater	Perennial	Minor	4	5	Dry open-cut
38.1	SA2MN268	Unnamed Tributary of Piney Fork	PCR- Class B	N/A	Intermittent	Minor	4	5	Wet open-cut
38.3	SA3MN111	Unnamed Tributary of Piney Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
38.4	SA3MN109	Unnamed Tributary of Piney Fork	PCR- Class B	Coldwater	Perennial	Minor	10	4	Dry open-cut
38.7	SA3MN107	Piney Fork	WWH, PWS, AWS, IWS, PCR, SHQ	Warmwater	Perennial	Minor	29	29	Dry open-cut
39.1	SA3MN104	Unnamed Tributary of Piney Fork	PCR- Class B	N/A	Intermittent	Minor	3	5	Wet open-cut
39.2	SA3MN103	Unnamed Tributary of Piney Fork	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
39.4	SA3MN102	Unnamed Tributary of Piney Fork	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
39.5	SA3MN100	Unnamed Tributary of Piney Fork	PCR- Class B	N/A	Intermittent	Minor	2	7	Wet open-cut
39.5	SA3MN100	Unnamed Tributary of Piney Fork	PCR- Class B	N/A	Intermittent	Minor	2	5	Wet open-cut
39.5	SA3MN101	Unnamed Tributary of Piney Fork	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
39.7	SA3MN099	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
39.9	SA3MN098	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
40.1	SA3MN097	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
40.3	SA2MN261	Unnamed Tributary of Death Creek	PCR- Class B	N/A	Ephemeral	Minor	2.5	7	Wet open-cut
40.4	SA2MN257	Unnamed Tributary of Death Creek	PCR- Class B	N/A	Intermittent	Minor	6	6	Wet open-cut
40.4	SA2MN258	Unnamed Tributary of Death Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
40.5	SA2MN256	Unnamed Tributary of Death Creek	PCR- Class B	N/A	Ephemeral	Minor	1.5	0 [c]	Workspace only
40.7	SA2MN254	Death Creek	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	15	16	Dry open-cut
41.0	SA2MN249	Unnamed Tributary of Death Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
41.0	SA2MN248	Unnamed Tributary of Death Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
41.5	SA2MN245	Unnamed Tributary of Grassy Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
41.5	SA2MN244	Grassy Creek	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	12	16	Dry open-cut
41.7	SA2MN246	Unnamed Tributary of Grassy Creek	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
41.9	SA8MN258	Unnamed Tributary of Baker Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
42.0	SA3MN096	Baker Fork	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	23	24	Dry open-cut
42.7	SA3MN093	Unnamed Tributary of Baker Fork	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
43.5	SA3MN086	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
43.6	SA3MN087	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
43.7	SA3MN088	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	3	4	Wet open-cut
43.8	SA3MN089	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
44.0	SA3MN090	Unnamed Tributary of Sunfish Creek	PCR- Class B	Coldwater	Perennial	Intermediate	10	19	Dry open-cut
44.2	SA3MN092	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	3	5	Wet open-cut
44.4	SA2MN243	Unnamed Tributary of Wheeler Run	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
44.6	SA2MN242	Unnamed Tributary of Wheeler Run	PCR- Class B	N/A	Intermittent	Intermediate	7	13	Wet open-cut
44.7	SA2MN241	Unnamed Tributary of Wheeler Run	PCR- Class B	N/A	Intermittent	Minor	7	7	Wet open-cut
45.2	SA2MN236	Wheeler Run	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	15	22	Dry open-cut
45.7	SA2MN218	Unnamed Tributary of Wheeler Run	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
45.8	SA2MN219	Unnamed Tributary of Wheeler Run	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
46.3	SA2MN222	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
46.4	SA2MN223	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Intermediate	2	12	Wet open-cut
46.4	SA2MN223	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	2	7	Wet open-cut
46.5	SA2MN223	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	2	3	Wet open-cut
47.0	SA2MN226	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
47.0	SA2MN227	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
47.2	SA1MN164	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
47.5	SA1MN163	Unnamed Tributary of Sunfish Creek	PCR- Class B	N/A	Intermittent	Minor	1	1	Wet open-cut
47.9	SA2MN228	Unnamed Tributary of South Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
48.2	SA2MN230	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Minor	7	7	Wet open-cut
48.4	SA2MN231	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Minor	6	6	Wet open-cut
48.9	SA1MN173	Unnamed Tributary of South Fork	PCR- Class B	Coldwater	Perennial	Minor	4	3	Dry open-cut
48.9	SA1MN172	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Minor	3	7	Wet open-cut
49.5	SA1MN170	Unnamed Tributary of South Fork	PCR- Class B	Coldwater	Perennial	Minor	5	5	Dry open-cut
49.8	SA1MN168	Unnamed Tributary of South Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
49.8	SA1MN166	Unnamed Tributary of South Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
50.0	SA2MN204	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Minor	6	7	Wet open-cut
50.0	SA2MN206	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
50.3	SA2MN209	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
50.4	SA2MN210	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
50.5	SA2MN212	Unnamed Tributary of South Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
50.9, RR-6	SA2MN216	South Fork	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	15	13	Dry open-cut
50.9, RR-6	SA5MN901_DT	South Fork	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	15	0 [c]	Workspace only
51.2	SA1MN160	Unnamed Tributary of South Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
51.2	SA1MN161	Unnamed Tributary of South Fork	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
51.3	SA1MN158	Unnamed Tributary of South Fork	PCR- Class B	Coldwater	Perennial	Minor	6	6	Dry open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
51.3	SA1MN157	Unnamed Tributary of South Fork	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
51.7	SA1MN155	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Minor	3	9	Wet open-cut
52.3	SA6MN124	Unnamed Tributary of Bishop Run	PCR- Class B	N/A	Ephemeral	Minor	2	5	Wet open-cut
52.5	SA6MN125	Bishop Run	WWH, AWS, IWS, PCR	Warmwater	Perennial	Minor	5	5	Wet open-cut
52.8	SA6MN129	Unnamed Tributary of Bishop Run	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
52.8	SA6MN130	Unnamed Tributary of Bishop Run	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
52.8	SA6MN131	Unnamed Tributary of Bishop Run	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
52.8	SA6MN132	Unnamed Tributary of Bishop Run	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
53.0	SA8MN134	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
53.0	SA8MN135	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Minor	1	1	Wet open-cut
Noble County, OH									
53.2	SA8NO132	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Intermediate	1	15	Wet open-cut
53.2	SA8NO132	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Minor	1	2	Wet open-cut
53.2	SA8NO132	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Minor	1	9	Wet open-cut
53.2	SA8NO131	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Perennial	Minor	2	2	Wet open-cut
53.2	SA8NO131	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Perennial	Minor	2	4	Wet open-cut
53.3	SA8NO132	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Minor	1	1	Wet open-cut
53.3	PA8NO007	Manmade Pond	PCR- Class B	N/A	Manmade Pond	Intermediate	98	0 [c]	Workspace only
53.3	SA8NO130	Unnamed Tributary of Barnes Run	PCR- Class B	Coldwater	Perennial	Minor	6	7	Dry open-cut
53.3	SA8NO129	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Minor	1	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
53.5	SA8NO127	Unnamed Tributary of Greasy Run	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
53.5	SA8NO126	Unnamed Tributary of Greasy Run	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
53.6	SA8NO125	Unnamed Tributary of Greasy Run	PCR- Class B	Coldwater	Perennial	Minor	6	6	Dry open-cut
53.7	SA8NO138	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Minor	1	1	Wet open-cut
53.7	SA8NO137	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
53.7	SA8NO139	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
53.9	SA8NO141	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
53.9	SA8NO142	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Ephemeral	Minor	1	2	Wet open-cut
54.1	SA6NO141	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
54.6, RR-7	SA6NO140	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
54.6, RR-7	SA6NO140	Unnamed Tributary of Greasy Run	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
54.8, RR-7	SA8NO362	Unnamed Tributary of Greasy Run	PCR- Class B	N/A	Intermittent	Minor	1	1	Wet open-cut
55.5, RR-7	SA8NO361	Barnes Run	WWH, AWS, IWS, PCR	Warmwater	Intermittent	Minor	7	7	Dry open-cut
56.1	SA8NO147	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Minor	1	0 [c]	Workspace only
56.1	SA8NO145	Unnamed Tributary of Barnes Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
56.5	SA6NO143	Wolfpen Run	WWH (*L), AWS, IWS, PCR	Limited warmwater	Intermittent	Minor	5	6	Wet open-cut
56.6	SA6NO144	Tributary of Wolfpen Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
57.8	SA5NO138_DT	Unnamed Tributary of East Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
57.8	SA6NO145	Unnamed Tributary of East Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	3	4	Wet open-cut
57.8	SA6NO146	Unnamed Tributary of East Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
57.9	SA5NO139_DT	Unnamed Tributary of East Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
57.9	SA5NO506_DT	Unnamed Tributary of East Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
58.0	SA8NO149	Unnamed Tributary of East Fork Duck Creek	PCR- Class B	N/A	Intermittent	Minor	1	1	Wet open-cut
58.1	SA8NO150	East Fork Duck Creek	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	5	22	Dry open-cut
58.1	SA8NO152	Unnamed Tributary of East Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	1	3	Wet open-cut
58.8	SA5NO141_DT	Unnamed Tributary of East Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
59.1	SA5NO142_DT	Unnamed Tributary of East Fork Duck Creek	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
59.2	SA5NO143_DT	Unnamed Tributary of East Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
59.7	SA3NO047	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Minor	3	5	Wet open-cut
60.3	SA1NO208	Unnamed Tributary of South Fork	PCR- Class B	N/A	Ephemeral	Minor	3	4	Wet open-cut
60.4	SA2NO135	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Intermediate	1	12	Wet open-cut
61.2	SA2NO312	Unnamed Tributary of Buffalo Creek	PCR- Class B	N/A	Intermittent	Minor	4	6	Wet open-cut
61.3	SA2NO315	Unnamed Tributary of Buffalo Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
61.3	SA2NO313	Unnamed Tributary of Buffalo Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
61.4	SA2NO312	Unnamed Tributary of Buffalo Creek	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
61.4	SA4NO059	Unnamed Tributary of Buffalo Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
61.5	SA4NO059	Unnamed Tributary of Buffalo Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
61.9	SA3NO037	Unnamed Tributary of Buffalo Creek	PCR- Class B	N/A	Intermittent	Minor	3	4	Wet open-cut
62.0	SA3NO037	Unnamed Tributary of Buffalo Creek	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
62.0	SA3NO038	Buffalo Creek	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	12	17	Dry open-cut
62.2	SA3NO039	Unnamed Tributary of Buffalo Creek	PCR- Class B	N/A	Ephemeral	Minor	1	3	Wet open-cut
62.3	SA3NO040	Unnamed Tributary of Buffalo Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
62.5	SA3NO042	Unnamed Tributary of Buffalo Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
63.3	SA1NO136	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Ephemeral	Minor	1	2	Wet open-cut
63.4	SA1NO134	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
63.4	SA1NO133	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
63.9	SA6NO351	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Intermittent	Minor	4	5	Wet open-cut
64.4	SA3NO169	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
64.7	SA1NO245	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
64.7	SA1NO245	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
64.8	SA1NO244	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
65.1	SA3NO023	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Intermittent	Minor	6	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
65.1	SA3NO022	Unnamed Tributary of Dog Run	PCR- Class B	Coldwater	Perennial	Minor	9	8	Dry open-cut
65.2	SA3NO024	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
65.2	SA3NO024	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Ephemeral	Minor	2	6	Wet open-cut
65.4	SA3NO025	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Intermittent	Minor	3	4	Wet open-cut
65.5	SA3NO028	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
65.5	SA3NO027	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Intermittent	Minor	3	7	Wet open-cut
65.6	SA3NO030	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
65.7	SA3NO031	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Intermittent	Minor	7	7	Wet open-cut
65.8	SA3NO032	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Intermittent	Minor	3	5	Wet open-cut
66.0	SA1NO467	Unnamed Tributary of Dog Run	PCR- Class B	N/A	Intermittent	Minor	3	5	Wet open-cut
66.2	SA3NO035	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
66.3	SA1NO129	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
66.3	SA1NO128	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
67.0	SA3NO168	West Fork Duck Creek	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	35	0 [c]	Workspace only
67.0	SA3NO168	West Fork Duck Creek	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	35	0 [d]	HDD
67.5	SA4NO033	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
67.7	SA4NO029	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
67.8	SA4NO028	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
67.8	SA4NO030	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
67.8	SA4NO028	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
68.1	SA4NO027	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
68.4	SA3NO015	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
68.6	SA2NO110	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
68.6	SA2NO109	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
68.6	SA2NO111	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
68.6	SA2NO112	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
68.6	SA2NO115	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
68.6	SA2NO113	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
68.6	SA2NO114	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	2	1	Wet open-cut
68.7	SA2NO116	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
68.7	SA2NO117	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
68.7	SA2NO118	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
68.7	SA2NO121	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Intermittent	Minor	4	5	Wet open-cut
68.8	SA4NO034	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
68.9	SA4NO037	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
68.9	SA4NO036	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Intermittent	Minor	3	4	Wet open-cut
68.9	SA4NO038	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
69.0	SA4NO039	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
69.0	SA4NO041	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
69.0	SA4NO040	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
69.0	SA4NO042	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
69.0	SA4NO043	Unnamed Tributary of Sharon Fork	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
69.2	SA4NO046	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
69.3	SA4NO047	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	Coldwater	Perennial	Minor	10	10	Dry open-cut
69.7	SA4NO048	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
69.7	SA4NO049	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
70.1	SA4NO050	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
70.1	SA4NO051	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
70.2	SA4NO052	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
70.2	SA4NO055	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
70.3	SA1NO256	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
70.4	SA1NO254	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Intermittent	Minor	5	6	Wet open-cut
70.5	SA1NO253	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
70.7	SA1NO251	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
70.7	SA1NO248	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Intermittent	Minor	6	8	Wet open-cut
70.8	SA1NO248	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Intermittent	Minor	6	4	Wet open-cut
71.3	SA1NO403	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
71.3	SA1NO402	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Intermittent	Minor	6	6	Wet open-cut
71.4	SA1NO406	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
71.5	SA1NO406	Unnamed Tributary of West Fork Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
72.4	PA1NO038	Manmade Pond	PCR- Class B	N/A	Manmade Pond	Intermediate	68	54	Dry open-cut
72.4	SA1NO410	Unnamed Tributary of Coal Run	PCR- Class B	N/A	Intermittent	Minor	1	0 [c]	Workspace only
72.4	SA1NO411	Unnamed Tributary of Dyes Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
73.3	SA2NO513	Unnamed Tributary of Dyes Fork	PCR- Class B	N/A	Perennial	Minor	2	0 [c]	Workspace only
73.4	SA2NO511	Unnamed Tributary of Dyes Fork	PCR- Class B	N/A	Perennial	Minor	3	3	Wet open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
73.5	SA2NO510	Unnamed Tributary of Dyes Fork	PCR- Class B	N/A	Perennial	Minor	2	3	Wet open-cut
73.5	SA2NO509	Unnamed Tributary of Dyes Fork	PCR- Class B	N/A	Perennial	Minor	3	3	Wet open-cut
74.1	SA2NO523	Unnamed Tributary of Dyes Fork	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
74.2	SA2NO525	Unnamed Tributary of Dyes Fork	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
74.2	SA2NO526	Unnamed Tributary of Dyes Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
74.4	SA2NO515	Unnamed Tributary of Dyes Fork	PCR- Class B	N/A	Ephemeral	Minor	4	5	Wet open-cut
74.6	SA2NO516	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
74.7	SA2NO518	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
74.7	SA2NO517	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
74.8	SA2NO519	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	5	7	Wet open-cut
74.8	SA2NO520	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	3	5	Wet open-cut
74.9	SA2NO521	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
75.1	SA1NO412	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
75.3	SA1NO413	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
75.3	SA1NO414	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
75.4	SA1NO257	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	1.5	2	Wet open-cut
75.6	SA1NO258	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
75.7	SA4NO058	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Intermittent	Intermediate	3	28	Wet open-cut
75.7	SA4NO058	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
75.7	SA4NO058	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Intermittent	Minor	3	5	Wet open-cut
75.8	SA4NO057	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
76.0	SA4NO056	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	4	5	Wet open-cut
76.1	SA2NO522	Unnamed Tributary of Tiltons Run	N/A	N/A	Ephemeral	Minor	2	2	Wet open-cut
Muskingum County, OH									
76.5	SA1MU416	Unnamed Tributary of Tiltons Run	N/A	N/A	Ephemeral	Minor	2	2	Wet open-cut
76.8	SA1MU418	Unnamed Tributary of Tiltons Run	N/A	N/A	Ephemeral	Minor	2	2	Wet open-cut
76.9	SA1MU419	Unnamed Tributary of Tiltons Run	N/A	N/A	Ephemeral	Minor	2	2	Wet open-cut
77.0	SA2MU528	Unnamed Tributary of Tiltons Run	N/A	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
77.2	SA1MU420	Unnamed Tributary of Tiltons Run	N/A	N/A	Ephemeral	Minor	3	3	Wet open-cut
77.3	SA2MU529	Unnamed Tributary of Tiltons Run	N/A	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
77.4	SA1MU422	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
77.5	SA1MU423	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
78.1	SA2MU532	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
78.1	SA2MU531	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
78.2	SA2MU530	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
78.5	SA2MU534	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
78.9	SA2MU537	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
78.9	SA2MU536	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
79.3	SA1MU427	Unnamed Tributary of Guyst Fork	PCR- Class B	Coldwater	Perennial	Minor	9	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
79.3	SA1MU427	Unnamed Tributary of Guyst Fork	PCR- Class B	Coldwater	Perennial	Minor	9	0 [c]	Workspace only
79.3	SA1MU430	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Intermittent	Intermediate	9	10	Wet open-cut
79.4	SA1MU428	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
79.5	SA1MU427	Unnamed Tributary of Guyst Fork	PCR- Class B	Coldwater	Perennial	Minor	9	0 [c]	Workspace only
79.5	SA1MU427	Unnamed Tributary of Guyst Fork	PCR- Class B	Coldwater	Perennial	Minor	9	0 [c]	Workspace only
79.6	SA1MU427	Unnamed Tributary of Guyst Fork	PCR- Class B	Coldwater	Perennial	Minor	9	0 [c]	Workspace only
79.7	SA1MU427	Unnamed Tributary of Guyst Fork	PCR- Class B	Coldwater	Perennial	Minor	9	0 [c]	Workspace only
79.7	SA1MU426	Guyst Fork	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	12	29	Dry open-cut
80.0	SA2MU541	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
80.3	SA2MU542	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
80.4	SA2MU543	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
80.6	SA2MU544	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Ephemeral	Intermediate	3	36	Wet open-cut
80.6	SA2MU545	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Intermittent	Minor	10	7	Wet open-cut
80.7	SA2MU548	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Intermittent	Minor	4	0 [c]	Workspace only
80.7	SA2MU547	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Intermittent	Minor	7	9	Wet open-cut
81.0	SA2MU550	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Intermittent	Minor	8	8	Wet open-cut
81.2	SA8MU256	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
81.2	PA8MU014	Manmade Pond	PCR- Class B	N/A	Manmade Pond	Intermediate	67	0 [c]	Workspace only
81.2	SA8MU255	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Intermittent	Minor	4	0 [c]	Workspace only

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
81.5	SA1MU432	Unnamed Tributary of Guyst Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
81.6	SA1MU433	Unnamed Tributary of Meigs Creek	PCR- Class B	N/A	Intermittent	Intermediate	10	14	Dry open-cut
81.6	SA1MU434	Unnamed Tributary of Meigs Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
82.0	SA1MU435	Starrett Creek	WWH, AWS, IWS, PCR	Warmwater	Perennial	Minor	7	8	Wet open-cut
82.1	SA1MU436	Meigs Creek	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	20	19	Dry open-cut
82.7	SA8MU154	Unnamed Tributary of Marshall Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
82.8	SA3MU171	Unnamed Tributary of Marshall Creek	PCR- Class B	N/A	Ephemeral	Minor	4	4	Wet open-cut
83.0	SA3MU172	Unnamed Tributary of Marshall Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
83.4	SA1MU442	Unnamed Tributary of Marshall Creek	PCR- Class B	N/A	Intermittent	Intermediate	12	12	Dry open-cut
83.6	SA1MU444	Unnamed Tributary of Marshall Creek	PCR- Class B	N/A	Ephemeral	Minor	4	4	Wet open-cut
83.7	SA1MU445	Marshall Creek	WWH, AWS, IWS, PCR	Warmwater	Perennial	Minor	10	0 [c]	Workspace only
83.7	SA1MU448	Unnamed Tributary of Marshall Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
83.7	SA1MU450	Unnamed Tributary of Marshall Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
83.7	SA1MU449	Unnamed Tributary of Marshall Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
84.0	SA1MU451	Unnamed Tributary of Marshall Creek	PCR- Class B	N/A	Intermittent	Minor	4	5	Wet open-cut
84.4	SA1MU454	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
84.6	SA1MU455	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
84.9	SA6MO153	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	2	4	Wet open-cut
Morgan County, OH									
85.0	SA6MO154	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	3	4	Wet open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
85.0	SA6MO154	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
85.1	SA6MO156	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
85.1	SA6MO157	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
85.5	SA6MO162	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
85.9	SA6MO165	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
85.9	SA6MO164	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
86.2	SA6MO166	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
86.2	SA6MO167	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
86.2	SA6MO168	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
86.2	SA6MO169	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
86.9	SA3MO500	Unnamed Tributary of Mans Fork	PCR- Class B	Coldwater	Perennial	Intermediate	12	11	Dry open-cut
87.4	SA3MO179	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
87.5	SA1MO462	Mans Fork	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	15	27	Dry open-cut
87.9	SA1MO461	Unnamed Tributary of Mans Fork	PCR- Class B	Coldwater	Perennial	Intermediate	7	14	Dry open-cut
88.1	SA1MO459	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
88.3	SA2MO098	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
88.5	SA2MO103	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
88.5	SA2MO102	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
88.6	SA2MO105	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	3	7	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
88.7	SA2MO106	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	5	5	Wet open-cut
88.8	SA2MO107	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	2	4	Wet open-cut
89.0	SA6MO294	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	2	5	Wet open-cut
89.0	SA6MO295	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
89.0	SA1MO520	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
89.0	SA6MO296	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Intermittent	Minor	1	1	Wet open-cut
89.3	SA7MO052	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Intermittent	Minor	6	0 [d]	HDD
89.4	SA6MO298	Muskingum River [f]	WWH, AWS, IWS, PCR, SHQ	Warmwater	Perennial	Major	300	0 [d]	HDD
89.6	SA8MO202	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Intermittent	Minor	6	0 [d]	HDD
89.6	SA8MO202	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Intermittent	Minor	6	0 [d]	HDD
89.9	SA7MO062	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
89.9	SA7MO063	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
89.9	SA7MO064	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
89.9	SA7MO065	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
89.9	SA7MO066	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
89.9	SA7MO067	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
90.0	SA8MO203	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	3	4	Wet open-cut
90.1	SA8MO204	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	3	8	Wet open-cut
90.1	SA8MO204	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
90.4	SA6MO292	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
90.4	SA6MO286	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
90.5	SA6MO286	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
90.5	SA6MO287	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
90.5	SA6MO287	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
91.5	SA7MO060	Unnamed Tributary of Moores Run	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
91.9	SA3MO137	Unnamed Tributary of North Branch Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
91.9	SA3MO138	Unnamed Tributary of North Branch Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
92.2	SA3MO139	Unnamed Tributary of North Branch Run	PCR- Class B	N/A	Intermittent	Minor	2	8	Wet open-cut
92.3	SA3MO142	Unnamed Tributary of North Branch Run	PCR- Class B	N/A	Intermittent	Minor	7	8	Wet open-cut
92.7	SA3MO135	Unnamed Tributary of North Branch Run	PCR- Class B	N/A	Intermittent	Minor	6	6	Wet open-cut
93.0	SA3MO132	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
93.0	SA3MO133	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
93.0	SA3MO130	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
93.0	SA3MO131	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	4	4	Wet open-cut
93.1	SA3MO129	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
93.3	SA6MO300	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
93.4	SA6MO455	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	1	1	Wet open-cut
93.8	SA6MO307	Unnamed Tributary of South Branch Island Run	PCR- Class B	Coldwater	Perennial	Intermediate	15	35	Dry open-cut
94.1	SA6MO311	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
94.2	SA6MO312	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	4	4	Wet open-cut
94.2	SA6MO313	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	5	6	Wet open-cut
94.3	SA6MO314	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
94.3	PA6MO006	Manmade Pond	PCR- Class B	N/A	Manmade Pond	Intermediate	20	0 [c]	Workspace only
94.6	SA8MO214	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	5	5	Wet open-cut
94.7	SA8MO213	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
94.7	SA8MO212	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
94.8	SA8MO210	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
94.9	SA8MO211	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
94.9	SA8MO209	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
95.1	SA2MO082	Unnamed Tributary of South Branch Island Run	PCR- Class B	Coldwater	Perennial	Minor	8	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
95.1	SA2MO082	Unnamed Tributary of South Branch Island Run	PCR- Class B	Coldwater	Perennial	Minor	8	8	Dry open-cut
95.4	SA2MO086	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	5	5	Wet open-cut
95.6	SA2MO088	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	6	6	Wet open-cut
95.8	SA1MO109	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	5	6	Wet open-cut
96.0	SA1MO106	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Intermittent	Minor	5	5	Wet open-cut
96.2	SA1MO105	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
96.2	SA2MO330	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
96.2	SA1MO104	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
96.3	SA1MO103	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
96.3	SA2MO331	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
96.4	SA1MO101	Unnamed Tributary of South Branch Island Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
96.7	SA1MO274	Unnamed Tributary of Bennett Run	N/A	N/A	Intermittent	Minor	4	4	Wet open-cut
96.8	SA1MO096	Unnamed Tributary of Bennett Run	N/A	N/A	Perennial	Intermediate	5	11	Wet open-cut
96.8	SA1MO095	Unnamed Tributary of Bennett Run	N/A	N/A	Perennial	Minor	5	4	Wet open-cut
97.0	SA1MO093	Unnamed Tributary of Bennett Run	N/A	N/A	Intermittent	Minor	4	4	Wet open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
97.0	SA1MO094	Unnamed Tributary of Bennett Run	N/A	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
Perry County, OH									
97.9	SA2PE074	Unnamed Tributary of Bennett Run	N/A	N/A	Intermittent	Minor	6	7	Wet open-cut
97.9	SA2PE074	Unnamed Tributary of Bennett Run	N/A	N/A	Intermittent	Intermediate	6	11	Wet open-cut
97.9	SA2PE074	Unnamed Tributary of Bennett Run	N/A	N/A	Intermittent	Minor	6	6	Wet open-cut
98.0	SA2PE073	Unnamed Tributary of Bennett Run	N/A	N/A	Intermittent	Minor	5	6	Wet open-cut
98.3	SA2PE072	Bennett Run	N/A	Coldwater	Perennial	Intermediate	18	21	Dry open-cut
98.6	SA1PE233	Unnamed Tributary of Bennett Run	N/A	N/A	Intermittent	Intermediate	8	22	Wet open-cut
98.7	SA1PE232	Unnamed Tributary of Bennett Run	N/A	N/A	Ephemeral	Minor	1	1	Wet open-cut
98.8	SA1PE231	Unnamed Tributary of Bennett Run	N/A	N/A	Ephemeral	Minor	1	1	Wet open-cut
98.8	SA1PE229	Unnamed Tributary of Bennett Run	N/A	N/A	Ephemeral	Minor	1	7	Wet open-cut
98.8	SA1PE230	Unnamed Tributary of Bennett Run	N/A	N/A	Intermittent	Minor	4	0 [c]	Workspace only
98.8	SA2PE334	Unnamed Tributary of Bennett Run	N/A	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
99.6	SA2PE335	Unnamed Tributary of Black Fork	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
99.8	SA2PE339	Unnamed Tributary of Black Fork	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
100.1	SA1PE280	Unnamed Tributary of Black Fork	PCR- Class B	N/A	Ephemeral	Minor	1	2	Wet open-cut
100.1	SA1PE280	Unnamed Tributary of Black Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
100.1	SA1PE279	Black Fork	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	20	53	Dry open-cut
100.4	SA2PE061	Unnamed Tributary of Black Fork	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
100.4	SA1PE283	Unnamed Tributary of Black Fork	PCR- Class B	N/A	Ephemeral	Minor	4	5	Wet open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
100.8	SA3PE180	Unnamed Tributary of Black Fork	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
101.2	SA3PE184	Unnamed Tributary of Black Fork	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
101.8	SA3PE187	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	3	6	Wet open-cut
102.0	SA3PE186	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Intermittent	Minor	6	8	Wet open-cut
102.0	SA1PE220	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
102.2	SA1PE217	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
102.7	SA1PE089	Moxahala Creek	LRW, AWS, IWS, PCR	N/A	Perennial	Intermediate	20	45	Dry open-cut
104.0	SA7PE095	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
104.0	SA7PE096	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Intermittent	Minor	4	0 [c]	Workspace only
104.5	SA2PE055	Unnamed Tributary of Bear Creek	PCR- Class B	N/A	Intermittent	Minor	2	3	Wet open-cut
104.6	SA2PE054	Unnamed Tributary of Bear Creek	PCR- Class B	N/A	Intermittent	Minor	4	5	Wet open-cut
104.6	SA2PE053	Unnamed Tributary of Bear Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
105.2	SA3PE155	Unnamed Tributary of Bear Creek	PCR- Class B	N/A	Ephemeral	Minor	4	0 [c]	Workspace only
105.8	SA1PE074	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
105.9	SA1PE073	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	1	2	Wet open-cut
106.3	SA2PE046	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
106.3	SA2PE045	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Intermittent	Minor	4	8	Wet open-cut
106.9	SA1PE071	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
106.9	SA1PE070	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
107.2	SA1PE069	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
107.2	SA1PE068	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
107.2	SA1PE067	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
107.3	SA1PE066	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
107.6	SA8PE214	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
107.7	SA6PE318	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
108.2	SA3PE159	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
108.3	SA3PE161	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
108.3	SA3PE162	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
108.4	SA3PE165	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	1	1	Wet open-cut
108.5	SA3PE166	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
108.6	SA4PE025	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
109.0	SA4PE020	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	1	3	Wet open-cut
109.0	SA4PE018	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
110.1	SA8PE174	Turkey Run	WWH, AWS, IWS, PCR, SHQ	Warmwater	Perennial	Intermediate	8	28	Dry open-cut
110.3	SA8PE172	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
110.4	SA4PE016	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
110.6	SA1PE048	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Perennial	Minor	4	5	Wet open-cut
110.8	SA4PE014	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
110.9	SA4PE013	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	2	3	Wet open-cut
110.9	SA1PE046	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Perennial	Minor	5	6	Wet open-cut
110.9	SA4PE011	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
111.4	SA3PE148	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
111.4	SA2PE036	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	4	5	Wet open-cut
111.5	PA2PE009	Manmade Pond	PCR- Class B	N/A	Manmade Pond	Intermediate	25	0 [c]	Workspace only
111.6	SA2PE035	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
111.7	PA2PE008	Manmade Pond	PCR- Class B	N/A	Manmade Pond	Intermediate	36	0 [c]	Workspace only
111.7	SA2PE034	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	2	10	Wet open-cut
111.7	SA2PE031	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Perennial	Minor	10	4	Wet open-cut
111.8	SA2PE032	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	4	5	Wet open-cut
112.5	SA2PE593	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
112.7	SA2PE596	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Ephemeral	Minor	3	4	Wet open-cut
113.3	SA1PE525	Unnamed Tributary of Little Monday Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
113.3	SA1PE524	Unnamed Tributary of Little Monday Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
113.6	SA7PE082	Unnamed Tributary of Little Monday Creek	PCR- Class B	N/A	Intermittent	Minor	5	5	Wet open-cut
113.6	SA7PE081	Unnamed Tributary of Little Monday Creek	PCR- Class B	N/A	Intermittent	Minor	3	4	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
114.1	SA1PE037	Unnamed tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
114.3	SA1PE039	Unnamed tributary of Rush Creek	PCR- Class B	Coldwater	Perennial	Intermediate	8	17	Dry open-cut
115.3	SA2PE019	Unnamed tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
115.4	SA2PE020	Unnamed tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	3	7	Wet open-cut
115.4	SA8PE171	Unnamed tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
115.4	SA2PE020	Unnamed tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	3	5	Wet open-cut
115.5	SA2PE021	Unnamed tributary of Rush Creek	PCR- Class B	Coldwater	Perennial	Intermediate	9	13	Dry open-cut
115.7	SA1PE226	Unnamed tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
117.3	SA1PE241	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Ephemeral	Minor	1	2	Wet open-cut
117.3	SA1PE242	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
117.4	SA1PE240	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
117.5	SA5PE509_DT	Unnamed Tributary of Turkey Run	PCR- Class B	Coldwater	Perennial	Intermediate	8	13	Dry open-cut
117.7	SA6PE238	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	4	0 [c]	Workspace only
117.7	SA5PE510_DT	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	4	3	Wet open-cut
118.2	SA6PE236	Turkey Run	WWH, AWS, IWS, PCR, SHQ	Warmwater	Perennial	Intermediate	10	25	Dry open-cut
118.2	SA6PE234	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
Fairfield County, OH									
118.4	SA2FA488	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
118.7	SA2FA494	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
118.7	SA2FA495	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
118.8	SA5FA187_DT	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	7	8	Wet open-cut
119.3	SA3HO149	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
119.3	SA3HO150	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
119.3	SA3HO151	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
119.6	SA1FA387	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
125.5	SA6FA171	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
125.5	SA6FA170	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
125.7	SA6FA195	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
125.7	SA6FA195	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
125.7	SA6FA196	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
125.7	SA6FA197	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
125.7	SA6FA193	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	4	5	Wet open-cut
126.1	SA6FA200	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	4	0 [c]	Workspace only
126.1	SA6FA200	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
126.1	SA6FA201	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	5	5	Wet open-cut
126.1	SA6FA202	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	4	Wet open-cut
126.2	SA6FA203	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
126.4	SA6FA204	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
126.4	SA6FA206	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
126.6	SA8FA165	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
127.1	SA6FA207	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
127.1	SA6FA209	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
127.1	SA6FA210	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Ephemeral	Minor	2	4	Wet open-cut
127.3	SA6FA212	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
127.3	SA6FA214	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
127.5	SA6FA216	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Ephemeral	Minor	4	0 [c]	Workspace only
127.7	SA8FA298	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
127.9	SA8FA299	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Perennial	Minor	4	4	Wet open-cut
127.9	SA8FA300	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
128.0	SA8FA301	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Perennial	Minor	7	8	Wet open-cut
129.0	SA8FA302	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
129.2	SA8FA303	Unnamed Tributary of Hocking River	PCR- Class B	Coldwater	Perennial	Minor	5	5	Dry open-cut
129.2	SA8FA304	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Perennial	Minor	3	0 [c]	Workspace only
Hocking County, OH									
119.7	SA1FA386	Unnamed tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	6	0 [d]	HDD
120.0	SA1FA385	Rush Creek	LRW, AWS, IWS, PCR	N/A	Perennial	Intermediate	30	0 [d]	HDD
120.0	SA1FA385	Rush Creek	LRW, AWS, IWS, PCR	N/A	Perennial	Intermediate	30	0 [c]	Workspace only
120.2	SA8HO170	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
120.2	SA8HO170	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	6	Wet open-cut
120.2	SA8HO170	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	8	Wet open-cut
120.8	SA1HO028	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
121.2	SA1HO027	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
121.2	SA1HO026	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
121.3	SA1HO023	Unnamed Tributary of Rush Creek	PCR- Class B	Coldwater	Perennial	Minor	6	7	Dry open-cut
121.3	SA1HO023	Unnamed Tributary of Rush Creek	PCR- Class B	Coldwater	Perennial	Minor	6	0 [c]	Workspace only
121.3	SA1HO023	Unnamed Tributary of Rush Creek	PCR- Class B	Coldwater	Perennial	Minor	6	0 [c]	Workspace only
121.4	SA1HO023	Unnamed Tributary of Rush Creek	PCR- Class B	Coldwater	Perennial	Minor	6	0 [c]	Workspace only
121.4	SA3HO144	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
121.6	SA1HO382	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	5	7	Wet open-cut
122.3	SA1HO018	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Perennial	Minor	6	7	Wet open-cut
122.5	SA1HO019	Rush Creek	LRW, AWS, IWS, PCR	N/A	Perennial	Major	100	104	Dry open-cut
122.7	SA8HO157	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Perennial	Minor	4	4	Wet open-cut
123.6	SA8HO158	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Perennial	Minor	6	6	Wet open-cut
123.8	SA8HO161	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
124.1	SA8HO163	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Perennial	Minor	4	6	Wet open-cut
124.2	SA8HO164	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	5	Wet open-cut
124.5	SA6HO187	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Perennial	Minor	6	7	Wet open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
124.5	SA6HO185	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	2	Wet open-cut
124.6	SA6HO185	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
124.8	SA6HO180	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
124.9	SA6HO177	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
125.1	SA6HO176	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	4	Wet open-cut
125.2	SA6HO173	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
125.2	SA6HO172	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Perennial	Minor	7	8	Wet open-cut
125.2	SA6HO173	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
125.2	SA6HO173	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
125.3	SA6HO174	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
125.3	SA6HO175	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
129.5	SA8FA305	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	3	5	Wet open-cut
129.9	SA8HO308	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
130.1	SA8HO312	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
130.1	SA8HO312	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
130.1	SA8HO310	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
130.2	SA8HO311	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Perennial	Minor	3	3	Wet open-cut
130.2	SA8HO310	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
130.4	SA1HO291	Hocking River [f]	WWH, AWS, IWS, PCR, SHQ	Warmwater	Perennial	Major	120	0 [d]	HDD

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
130.6	SA8HO314	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Ephemeral	Minor	3	0 [d]	HDD
130.7	SA8HO315	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	3	0 [d]	HDD
131.0	SA8HO317	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Perennial	Minor	4	5	Wet open-cut
131.1	SA2HO345	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
LEX1									
Fairfield County, OH									
0.2	SA8FA295	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
0.3	SA8FA293	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	3	Wet open-cut
0.4	SA2FA002	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
0.4	SA2FA001	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
0.9	SA8FA339	Rush Creek	LRW, AWS, IWS, PCR	N/A	Perennial	Intermediate	70	87	Dry open-cut
R-801 Loop									
Hocking County, OH									
0.2	SA2HO346	Buck Run	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	10	15	Dry open-cut
0.2	SA8HO168	Unnamed Tributary of Buck Run	PCR- Class B	N/A	Intermittent	Minor	4	1	Wet open-cut
0.9	SA2HO350	Unnamed Tributary of Hocking River	PCR- Class B	Coldwater	Perennial	Minor	7	7	Dry open-cut
0.9	SA2HO352	Unnamed Tributary of Hocking River	PCR- Class B	Coldwater	Perennial	Minor	5	0 [c]	Workspace only
0.9	SA2HO352	Unnamed Tributary of Hocking River	PCR- Class B	Coldwater	Perennial	Minor	5	0 [c]	Workspace only
1.3	SA2HO353	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
1.6	SA2HO354	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
2.1	SA2HO356	Unnamed Tributary of Clear Fork	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
2.2	SA2HO356	Unnamed Tributary of Clear Fork	PCR- Class B	N/A	Intermittent	Minor	3	4	Wet open-cut
2.3	SA2HO357	Unnamed Tributary of Clear Fork	PCR- Class B	N/A	Ephemeral	Minor	3	5	Wet open-cut
2.3	SA1HO301	Clear Fork	WWH, AWS, IWS, PCR	Warmwater	Perennial	Minor	4	8	Wet open-cut
2.4	SA1HO299	Unnamed Tributary of Clear Fork	PCR- Class B	N/A	Intermittent	Minor	2	6	Wet open-cut
2.4	SA1HO299	Unnamed Tributary of Clear Fork	PCR- Class B	N/A	Intermittent	Intermediate	2	11	Wet open-cut
2.5	SA1HO299	Unnamed Tributary of Clear Fork	PCR- Class B	N/A	Intermittent	Intermediate	2	35	Wet open-cut
2.5	SA1HO300	Unnamed Tributary of Clear Fork	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
2.7	SA1HO298	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
2.8	SA1HO297	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
2.9	SA1HO296	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
3.0	SA1HO295	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
3.2	SA1HO294	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
3.3	SA1HO293	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
3.5	SA1HO302	Unnamed Tributary of Duck Creek	PCR- Class B	Coldwater	Perennial	Intermediate	10	11	Dry open-cut
3.5	SA1HO303	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Intermittent	Minor	5	9	Wet open-cut
4.1	SA1HO305	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
4.1	SA1HO304	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
4.2	SA1HO307	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
4.3	SA1HO308	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
4.3	SA1HO309	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
4.6	SA1HO312	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
4.6	SA1HO311	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	5	10	Wet open-cut
4.8	SA2HO367	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Intermittent	Minor	5	5	Wet open-cut
5.0	SA2HO366	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
5.2	SA2HO466	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Intermittent	Minor	4	0 [c]	Workspace only
5.2	SA2HO466	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Intermittent	Minor	4	0 [c]	Workspace only
5.2	SA1HO325	Unnamed Tributary of Duck Creek	PCR- Class B	Coldwater	Perennial	Minor	6	6	Dry open-cut
5.5	SA8HO176	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
5.7	SA6HO228	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Intermittent	Minor	7	7	Wet open-cut
5.7	SA6HO229	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Intermittent	Minor	6	0 [c]	Workspace only
5.9	SA2HO365	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
5.9	SA2HO364	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
5.9	SA2HO363	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
6.1	SA2HO362	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
6.2	SA2HO361	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
6.5	SA2HO360	Unnamed Tributary of Pine Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
6.6	SA2HO360	Unnamed Tributary of Pine Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
6.7	SA8HO318	Pine Creek	PCR- Class B	N/A	Perennial	Minor	5	6	Wet open-cut
6.9	SA8HO319	Unnamed Tributary of Pine Creek	PCR- Class B	N/A	Perennial	Minor	5	6	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
6.9	SA8HO320	Unnamed Tributary of Pine Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
7.0	SA8HO322	Unnamed Tributary of Pine Creek	PCR- Class B	N/A	Intermittent	Minor	3	3	Wet open-cut
7.2	SA8HO324	Unnamed Tributary of Pine Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
7.2	SA8HO323	Unnamed Tributary of Pine Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
7.2	SA8HO325	Unnamed Tributary of Pine Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
7.4	SA8HO326	Unnamed Tributary of Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
7.4	SA2HO464	Unnamed Tributary of Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
7.6	SA2HO463	Unnamed Tributary of Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
7.6	SA2HO368	Blackjack Branch	SRW, WWH, AWS, IWS,PCR	Warmwater	Perennial	Intermediate	25	25	Dry open-cut
7.7	SA2HO369	Unnamed Tributary of Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
7.9	SA6HO243	Unnamed Tributary of Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
7.9	SA6HO242	Unnamed Tributary of Blackjack Branch	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
8.0	SA2HO371	Unnamed Tributary of Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
8.1	SA6HO247	Unnamed Tributary of Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
8.7	SA1HO316	Unnamed Tributary of Little Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	6	8	Wet open-cut
8.8	SA1HO315	Unnamed Tributary of Little Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	4	4	Wet open-cut
8.9	SA1HO314	Unnamed Tributary of Little Blackjack Branch	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
8.9	SA1HO313	Little Blackjack Branch	SRW, WWH, AWS, IWS, PCR	Warmwater	Perennial	Minor	7	10	Dry open-cut
9.1	SA2HO385	Unnamed Tributary of Little Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
9.2	SA2HO386	Unnamed Tributary of Little Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
9.2	SA2HO388	Unnamed Tributary of Little Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
9.3	SA2HO389	Unnamed Tributary of Little Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
9.9	SA1HO327	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
10.2	SA1HO328	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Intermittent	Minor	3	4	Wet open-cut
10.5	SA1HO317	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Ephemeral	Minor	3	4	Wet open-cut
10.6	SA1HO318	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
11.8	SA1HO324	Queer Creek	EWH, CWH, AWS, IWS, PCR, SHQ	Exceptional warmwater, coldwater	Perennial	Intermediate	12	18	Dry open-cut
12.0	SA2HO384	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Ephemeral	Minor	2	4	Wet open-cut
12.1	SA2HO383	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
12.2	SA2HO382	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
12.3	SA2HO381	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Intermittent	Minor	6	9	Wet open-cut
12.4	SA2HO379	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
12.6	SA2HO378	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
12.7	SA2HO376	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Ephemeral	Minor	3	4	Wet open-cut

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
12.8	SA2HO375	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
13.0	SA2HO391	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
13.1	SA2HO393	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
13.3	SA2HO394	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
13.3	SA2HO394	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
13.3	SA2HO394	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
17.3	SA2HO394	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
Vinton County, OH									
13.4	SA2HO396	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
13.4	SA2HO397	Unnamed Tributary of East Fork	PCR- Class B	N/A	Intermittent	Intermediate	8	13	Wet open-cut
13.4	SA2HO398	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
13.6	SA2HO399	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	2	10	Wet open-cut
13.7	SA1HO332	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	3	4	Wet open-cut
13.7	SA1HO331	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
13.7	SA1HO330	East Fork	WWH, AWS, IWS, PCR	Warmwater	Perennial	Minor	6	7	Wet open-cut
14.0	SA1HO333	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
14.0	SA1HO334	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
14.1	SA1HO335	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
14.1	SA1HO336	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
14.2	SA1HO337	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
14.5	SA1HO339	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	3	6	Wet open-cut
14.5	SA1HO340	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
14.8	SA2HO406	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	3	6	Wet open-cut
15.4	SA2VN402	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
15.5	SA2VN401	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
15.6	SA2VN400	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Intermittent	Intermediate	15	22	Dry open-cut
15.6	SA2VN401	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
16.2	SA2VN408	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Intermittent	Minor	10	7	Wet open-cut
16.4	SA2VN410	Siverly Creek	WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	15	11	Dry open-cut
16.6	SA2VN413	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
16.6	SA2VN414	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
16.7	SA1VN345	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	3	4	Wet open-cut
16.8	SA1VN344	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0	Wet open-cut
16.8	SA1VN343	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	3	7	Wet open-cut
17.0	SA1VN342	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	3	4	Wet open-cut
17.6	SA2VN415	Dunkle Creek	WWH, AWS, IWS, PCR	Warmwater	Intermittent	Minor	6	8	Wet open-cut
17.6	SA2VN416	Unnamed Tributary of Dunkle Creek	PCR- Class B	N/A	Ephemeral	Minor	3	6	Wet open-cut
18.0	SA2VN419	Unnamed Tributary of Dunkle Creek	PCR- Class B	N/A	Intermittent	Minor	4	4	Wet open-cut
19.0	SA2VN420	Unnamed Tributary of Dunkle Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
18.4	SA1VN360	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
18.5	SA1VN361	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
18.5	SA1VN356	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
18.6	SA1VN357	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
18.8	SA1VN353	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
19.1	SA1VN351	Elk Fork	SRW, WWH, AWS, IWS, PCR	Warmwater	Perennial	Intermediate	5	23	Dry open-cut
19.1	SA6VN254	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
19.2	SA1VN349	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
19.2	SA8VN181	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
19.3	SA1VN348	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
19.8	SA2VN424	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Perennial	Minor	7	8	Wet open-cut
19.8	SA2VN424	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Perennial	Minor	7	0 [c]	Workspace only
20.0	SA8VN183	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
20.0	SA2VN425	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
20.0	SA2VN426	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	3	4	Wet open-cut
20.2	SA2VN427	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	3	4	Wet open-cut
20.3	SA2VN428	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
20.7	SA2VN431	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Intermediate	3	18	Wet open-cut
20.7	SA2VN431	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
20.7	SA2VN433	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	7	7	Wet open-cut
20.9	SA8VN189	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Intermittent	Minor	2	6	Wet open-cut
20.9	SA8VN189	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Intermittent	Minor	2	2	Wet open-cut
21.1	SA2VN436	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
21.6	SA6VN260	Unnamed Tributary of Puncheon Fork	PCR- Class B	Coldwater	Perennial	Minor	10	2	Dry open-cut
21.8	SA6VN259	Unnamed Tributary of Puncheon Fork	PCR- Class B	N/A	Ephemeral	Minor	2	2	Wet open-cut
22.2	SA6VN257	Unnamed Tributary of Puncheon Fork	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only
22.3	SA1VN363	Unnamed Tributary of Puncheon Fork	PCR- Class B	N/A	Intermittent	Intermediate	10	10	Wet open-cut
22.3	SA6VN256	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
22.3	SA1VN362	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Intermittent	Intermediate	10	12	Dry open-cut
22.6	SA6VN264	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Ephemeral	Minor	1	2	Wet open-cut
22.8	SA1VN366	Unnamed Tributary of Puncheon Fork	PCR- Class B	N/A	Ephemeral	Minor	7	7	Wet open-cut
23.0	PA1VN035	Manmade Pond	PCR- Class B	N/A	Manmade Pond	Major	128	0 [c]	Workspace only
23.1	SA1VN367	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Intermittent	Minor	4	5	Wet open-cut
23.4	SA6VN271	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Ephemeral	Minor	2	3	Wet open-cut
23.5	SA6VN271	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
23.5	SA2VN449	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Ephemeral	Minor	3	5	Wet open-cut
23.6	SA8VN192	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Ephemeral	Minor	1	1	Wet open-cut
23.7	SA2VN445	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Ephemeral	Minor	4	5	Wet open-cut
23.8	SA2VN444	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Ephemeral	Minor	4	4	Wet open-cut
23.9	SA2VN442	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Wet open-cut
24.0	SA2VN441	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Ephemeral	Minor	4	0 [c]	Workspace only
BM-111 Loop									
Lawrence County, OH									
0.1	SA1WA368	Ohio River [e, f]	WWH, PWS, AWS, IWS, PCR, SHQ	Warmwater	Perennial	Major	1,666	0 [d]	HDD
Wayne County, WV									
0.5	SA1WA369	Unnamed Tributary of the Ohio River	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [d]	HDD
0.5	SA1WA370	Twelvepole Creek	A, B1, C, 303 (d) (Tier 1)	Warmwater	Perennial	Major	144	0 [d]	HDD
0.9	SA6WA273	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	6	0 [d]	HDD
0.9	SA6WA273	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	6	0 [d]	HDD
1.1	SA6WA273	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	6	0 [c]	Workspace only
1.1	SA6WA279	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	2	Wet open-cut
1.2	SA6WA277	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	2	Wet open-cut

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
1.2	SA6WA278	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
1.3	SA6WA280	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Intermediate	2	11	Wet open-cut
1.3	SA2WA460	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	3	Wet open-cut
1.3	SA2WA459	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	3	Wet open-cut
1.3	SA2WA459	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	2	Wet open-cut
1.4	SA8WA197	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	0 [c]	Workspace only
1.4	SA1WA372	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	0 [c]	Workspace only
1.5	SA1WA373	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	2	Wet open-cut
1.5	SA1WA372	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	1	Wet open-cut
1.5	SA1WA371	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	3	3	Wet open-cut
1.8	SA2WA458	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	2	Wet open-cut
2.3	SA2WA457	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	4	4	Wet open-cut
2.5	SA2WA454	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	1	Wet open-cut
2.5	SA2WA454	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	1	Wet open-cut
2.6	SA2WA450	Twelvepole Creek	A, B1, C (Tier 1)	Warmwater	Perennial	Intermediate	80	90	Dry open-cut
2.7	SA2WA452	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	4	0 [c]	Workspace only
2.7	SA2WA452	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	4	4	Wet open-cut
R-501 Abandonment									
Hocking County, OH									
4.2	SA7HO111	Unnamed Tributary of Buck Run	PCR- Class B	N/A	Intermittent	Minor	3	0 [c]	Workspace only

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
6.5	SA7HO113	Unnamed Tributary of Clear Fork	PCR- Class B	N/A	Perennial	Minor	5	0 [c]	Workspace only
9.1	SA2HO367	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Intermittent	Minor	5	0 [c]	Workspace only
9.7	SA8HO176	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Intermittent	Minor	2	0 [c]	Workspace only
11.8	SA7HO117	Unnamed Tributary of Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
12.2	SA2HO371	Unnamed Tributary of Blackjack Branch	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
13.1	SA6HO245	Unnamed Tributary of Little Blackjack Branch	PCR- Class B	N/A	Intermittent	Minor	5	0 [c]	Workspace only
16.8	SA2HO376	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
Vinton County, OH									
17.6	SA2HO399	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	2	0 [c]	Workspace only
17.8	SA1HO331	Unnamed Tributary of East Fork	PCR- Class B	N/A	Ephemeral	Minor	1	0 [c]	Workspace only
17.8	SA1HO330	East Fork	WWH, AWS, IWS, PCR	Warmwater	Perennial	Minor	6	0 [c]	Workspace only
20.0	SA6VN354	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
20.4	SA6VN355	Siverly Creek	WWH, AWS, IWS, PCR	Warmwater	Perennial	Minor	10	0 [c]	Workspace only
21.6	SA2VN415	Dunkle creek	WWH, AWS, IWS, PCR	Warmwater	Intermittent	Minor	6	0 [c]	Workspace only
22.0	SA2VN419	Unnamed Tributary of Dunkle Creek	PCR- Class B	N/A	Intermittent	Minor	4	0 [c]	Workspace only
23.8	SA2VN424	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Perennial	Minor	7	0 [c]	Workspace only
24.3	SA2VN427	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	3	0 [c]	Workspace only
25.6	SA6VN260	Unnamed Tributary of Puncheon Fork	PCR- Class B	N/A	Perennial	Minor	10	0 [c]	Workspace only
26.3	SA1VN363	Unnamed Tributary of Puncheon Fork	PCR- Class B	N/A	Intermittent	Minor	10	0 [c]	Workspace only
Aboveground Facilities									

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
LEX									
Marshall County, WV									
Lone Oak CS	SA7MR006	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	N/A	Timber mat
Lone Oak CS	SA7MR008	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	N/A	Timber mat
Lone Oak CS	SA7MR007	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2	N/A	Timber mat
Lone Oak CS	SA7MR013	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	N/A	Fill [h]
Lone Oak CS	SA7MR014	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	N/A	Timber mat
Lone Oak CS	SA7MR014	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	N/A	Fill [h]
Lone Oak CS	SA7MR012	Unnamed Tributary of Wolf Run	B1 (Tier 2)	Warmwater	Intermittent	Minor	1	N/A	Fill [h]
LEX1									
Fairfield County, OH									
K-260 RS	SA7FA106	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Timber mat
K-260 RS	SA6FA222	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Timber mat
R-801 Loop									
Hocking County, OH									
R-System RS	SA8HO169	Unnamed Tributary of Buck Run	PCR- Class B	N/A	Intermittent	Minor	3	N/A	Timber mat
Benton RS	SA2HO375	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Geotextile fabric/ Timber mat
BM-111 Loop									
Wayne County, WV									
Ceredo CS	SA2WA452	Unnamed Tributary of Twelvepole Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	4	N/A	Fill[h]
Existing Columbia Pipeline System									
Jackson County, OH									

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
Oak Hill CS suction/discharge lines	SA7JA129	Unnamed Tributary of Symmes Creek	PCR- Class B	N/A	Ephemeral	Minor	3	3	Dry open-cut
Oak Hill CS suction/discharge lines	SA2JA597	Unnamed Tributary of Symmes Creek	PCR- Class B	N/A	Ephemeral	Minor	2	2	Dry open-cut
Hocking County, OH									
Benton CS	SA6HO459	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Intermittent	Minor	4	N/A	Existing culvert
Access Roads									
LEX									
Greene County, PA									
TAR-145 (MP 1.7)	SA7GR016	Unnamed Tributary of Dunkard Fork	WWF	Warmwater	Intermittent	Minor	3	N/A	Timber mat
Marshall County, WV									
TAR-148 (MP 5.1)	SA7MR001	Unnamed Tributary of Williams Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	N/A	Timber mat
TAR-148 (MP 5.1)	SA7MR002	Unnamed Tributary of Williams Run	B1 (Tier 2)	Warmwater	Ephemeral	Minor	2.5	N/A	Timber mat
PAR -145 (MP 17.5)	SA5MR504_DT	Unnamed Tributary of Grave Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	N/A	Timber mat
TAR-126 (MP 21.3)	SA7MR018	Unnamed Tributary of Fish Creek	B1 (Tier 2)	Warmwater	Ephemeral	Minor	1	N/A	Timber mat
TAR-14 (MP 21.4)	SA7MR020	Unnamed Tributary of Fish Creek	B1 (Tier 2)	Warmwater	Intermittent	Minor	2	N/A	Timber mat
TAR-14 (MP 21.4)	SA7MR019	Fish Creek	B1 (Tier 1)	Warmwater	Perennial	Major	75	N/A	Existing bridge
TAR-HDD-2 (MP 25.2), RR-5	SA6MR096	Unnamed Tributary of Ohio River	B1 (Tier 2)	Warmwater	Perennial	Minor	10	N/A	Timber mat
TAR-HDD-2 (MP 25.2), RR-5	SA6MR098	Unnamed Tributary of Ohio River	B1 (Tier 2)	Warmwater	Ephemeral	Minor	4	N/A	Timber mat
Monroe County, OH									
TAR-156 (MP 25.8), RR-5	SA7MN028	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Intermittent	Minor	3	N/A	Timber mat
TAR-HDD-3 (MP 25.8), RR-5	SA6MN372	Unnamed Tributary of Johnson Run	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Timber mat

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
TAR-38 (MP 31.1)	SA7MN021	Unnamed Tributary of Nigger Run	PCR- Class B	N/A	Intermittent	Minor	5	N/A	Timber mat
TAR-38 (MP 31.1)	SA7MN023	Unnamed Tributary of Nigger Run	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-63 (MP 34.8)	SA4MN004	Ackerson Run	WWH, AWS, IWS, PCR – Class B	Warmwater	Perennial	Intermediate	12	N/A	Timber mat
TAR-63 (MP 34.8)	SA4MN002	Unnamed Tributary of Ackerson Run	PCR- Class B	N/A	Ephemeral	Minor	3	N/A	Timber mat
TAR-63 (MP 34.8)	SA4MN004	Ackerson Run	WWH, AWS, IWS, PCR – Class B	Warmwater	Perennial	Intermediate	12	N/A	Timber mat
TAR-63 (MP 34.8)	SA4MN004	Ackerson Run	WWH, AWS, IWS, PCR – Class B	Warmwater	Perennial	Intermediate	12	N/A	Timber mat
TAR-62 (MP 45.1)	SA7MN029	Unnamed Tributary of Wheeler Run	PCR- Class B	N/A	Perennial	Intermediate	15	N/A	Timber mat
TAR-40 (MP 48.9)	SA7MN033	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Minor	1	N/A	Timber mat
TAR-41 (MP 49.5)	SA7MN035	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-41 (MP 49.5)	SA7MN036	Unnamed Tributary of South Fork	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-41 (MP 49.5)	SA1MN170	Unnamed Tributary of South Fork	PCR- Class B	N/A	Perennial	Minor	5	N/A	Timber mat
Noble County, OH									
PAR-F-5 (Summerfield CS [MP 57.20])	SA7NO037	Unnamed Tributary of Wolfpen Run	PCR- Class B	Coldwater	Intermittent	Minor	2	N/A	Permanent culvert[l]
PAR-F-5 (Summerfield CS [MP 57.20])	SA7NO038	Wolfpen Run	WWH (*L), AWS, IWS, PCR	Limited warmwater	Perennial	Minor	8	N/A	Permanent culvert[l]
TAR-74 (MP 68.8)	SA7NO040	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Perennial	Minor	5	N/A	Timber mat
TAR-71 (MP 74.6)	SA7NO042	Unnamed Tributary of Blanchard Run	PCR- Class B	N/A	Intermittent	Minor	3	N/A	Timber mat
Morgan County, OH									

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
TAR-42 (MP 85.3)	SA7MO043	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-42 (MP 85.3)	SA7MO044	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	1	N/A	Timber mat
TAR-30 (MP 87.5)	SA7MO048	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Perennial	Minor	7	N/A	Timber mat
TAR-30 (MP 87.5)	SA7MO049	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	1	N/A	Timber mat
TAR-30 (MP 87.5)	SA7MO049	Unnamed Tributary of Mans Fork	PCR- Class B	N/A	Ephemeral	Minor	1	N/A	Timber mat
TAR-15 (MP 89.4)	SA7MO051	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Perennial	Intermediate	15	N/A	Timber mat
TAR-15 (MP 89.4)	SA7MO052	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Intermittent	Minor	6	N/A	Timber mat
TAR-15 (MP 89.4)	SA7MO052	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Intermittent	Minor	6	N/A	Timber mat
TAR-HDD-4 (MP 89.4)	SA7MO052	Unnamed Tributary of Muskingum River	PCR- Class B	N/A	Intermittent	Minor	6	N/A	Timber mat
Perry County, OH									
TAR-28 (MP 110.5)	SA7PE101	Unnamed Tributary of Turkey Run	PCR- Class B	N/A	Intermittent	Minor	4	N/A	Timber mat
TAR-24 (MP 115.7)	SA7PE087	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-24 (MP 115.7)	SA7PE084	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-24 (MP 115.7)	SA7PE086	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Timber mat
TAR-25 (MP 116.5)	SA7PE088	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-5 (MP 117.7)	SA7PE091	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-5 (MP 117.7)	SA7PE091	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
Fairfield County, OH									
TAR-21	SA6FA197	Unnamed Tributary	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Timber mat

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
(MP 125.7)		of Rush Creek							
Hocking County, OH									
TAR-172 (MP 119.6)	SA7HO103	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-172 (MP 119.6)	SA7HO104	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	1	N/A	Timber mat
TAR-172 (MP 119.6)	]SA3HO145	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Timber mat
TAR-52 (MP 130.2)	SA8HO340	Unnamed Tributary of Hocking River	PCR- Class B	N/A	Intermittent	Minor	1	N/A	Timber mat
LEX1									
Fairfield County, OH									
PAR-4-22 (K-260 RS [MP 0.3])	SA7FA106	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Permanent culvert[i]
PAR-4-22 (K-260 RS [MP 0.3])	SA6FA222	Unnamed Tributary of Rush Creek	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Permanent culvert[i]
R-801 Loop									
Hocking County, OH									
TAR-49 (MP 2.3)	SA2HO357	Unnamed Tributary of Clear Fork	PCR- Class B	N/A	Ephemeral	Minor	3	N/A	Timber mat
TAR-49 (MP 2.3)	SA1HO301	Clear Fork	WWH, AWS, IWS, PCR	Warmwater	Perennial	Minor	4	N/A	Timber mat
TAR-8 (MP 7.7)	SA2HO368	Blackjack Branch	SRW, WWH, AWS, IWS,PCR	Warmwater	Perennial	Intermediate	15	N/A	Timber mat
Vinton County, OH									
TAR-46 (MP 14.5)	SA1HO340	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-77 (MP 15.2)	SA7VN122	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Intermittent	Minor	3	N/A	Timber mat
TAR-77 (MP 15.2)	SA7VN119	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Perennial	Intermediate	12	N/A	Timber mat
TAR-68 (MP 15.6)	SA7VN500	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Perennial	Intermediate	16	N/A	Timber mat

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Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
TAR-68 (MP 15.6)	SA7VN125	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Perennial	Intermediate	15	N/A	Timber mat
R-501 Abandonment									
Hocking County, OH									
TAR-90 (MP 4.2)	SA7HO111	Unnamed Tributary of Buck Run	PCR- Class B	N/A	Intermittent	Minor	3	N/A	Timber mat
TAR-90 (MP 4.2)	SA7HO110	Unnamed Tributary of Buck Run	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-93 (MP 6.5)	SA7HO113	Clear Fork	WWH, AWS, IWS, PCR	Warmwater	Perennial	Minor	5	N/A	Timber mat
TAR-93 (MP 6.5)	SA7HO112	Unnamed Tributary of Clear Fork	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-98 (MP 8.9)	SA7HO116	Duck Creek	WWH, AWS, IWS, PCR	Warmwater	Perennial	Minor	15	N/A	Timber mat
TAR-101 (MP 9.2)	SA2HO366	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	3	N/A	Timber mat
TAR-104 (MP 9.7)	SA8HO175	Duck Creek	WWH, AWS, IWS, PCR	Warmwater	Intermittent	Minor	8	N/A	Timber mat
TAR-105 (MP 11.9)	SA2HO369	Unnamed Tributary of Duck Creek	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Timber mat
Vinton County, OH									
TAR-112 (MP 21.6)	SA2VN416	Unnamed Tributary of Dunkle Creek	PCR- Class B	N/A	Ephemeral	Minor	3	N/A	Timber mat
TAR-178 (MP 23.1)	SA8VN181	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Intermittent	Minor	2	N/A	Timber mat
TAR-178 (MP 23.1)	SA1VN349	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	3	N/A	Timber mat
TAR-178 (MP 23.1)	SA1VN348	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Timber mat
TAR-173 (MP 23.8)	SA2VN425	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	3	N/A	Timber mat
TAR-173 (MP 23.8)	SA2VN426	Unnamed Tributary of Elk Fork	PCR- Class B	N/A	Ephemeral	Minor	3	N/A	Timber mat
TAR-174 (MP 26.3)	SA1VN362	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Intermittent	Minor	10	N/A	Timber mat

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
TAR-174 (MP 26.3)	SA6VN264	Unnamed Tributary of Little Raccoon Creek	PCR- Class B	N/A	Ephemeral	Minor	1	N/A	Timber mat
Existing Columbia Pipeline System									
Jackson County, OH									
PAR-F-16 (Oak Hill CS tie-in facility)	SA7JA129	Unnamed Tributary of Symmes Creek	PCR- Class B	N/A	Ephemeral	Minor	3	N/A	Permanent culvert
TAR-F-15 (Oak Hill CS)	SA8JA338	Unnamed Tributary of Symmes Creek	PCR- Class B	N/A	Perennial	Minor	7	N/A	Existing culvert
Contractor/Staging/Pipe Yards									
LEX									
Marshall County, WV									
Pipe Yard 26 (MP 16.0)	SA6MR340	Unnamed Tributary of Little Grave Creek	PCR- Class B	N/A	Ephemeral	Minor	4	N/A	Timber mat
Pipe Yard 02 (MP 23.6)	SA6MR341	Unnamed Tributary of Ohio River	PCR- Class B	N/A	Ephemeral	Minor	1	N/A	Timber mat
Monroe County, OH									
Pipe Yard 34 (Alternate) (MP 42.8)	SA8MN249	Unnamed Tributary of Town Fork	PCR- Class B	N/A	Ephemeral	Minor	3	N/A	Timber mat
Muskingum County, OH									
Pipe Yard 36 (MP 100.0)	PA7MU004	Manmade Pond	PCR- Class B	N/A	Manmade Pond	Major	310	N/A	N/A [g]
Pipe Yard 36 (MP 100.0)	SA7MU076	Unnamed Tributary of Jonathan Creek	PCR- Class B	N/A	Intermittent	Minor	3	N/A	Timber mat
Pipe Yard 36 (MP 100.0)	SA7MU077	Unnamed Tributary of Jonathan Creek	PCR- Class B	N/A	Ephemeral	Minor	1	N/A	Timber mat
Pipe Yard 36 (MP 100.0)	SA7MU079	Unnamed Tributary of Jonathan Creek	PCR- Class B	N/A	Intermittent	Minor	1	N/A	Timber mat
Pipe Yard 36 (MP 100.0)	SA7MU078	Unnamed Tributary of Jonathan Creek	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Timber mat
Pipe Yard 36 (MP 100.0)	PA7MU005	Manmade Pond	PCR- Class B	N/A	Manmade Pond	Major	126	N/A	N/A [g]
Perry County, OH									

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Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method
Pipe Yard 18 (Alternate) (MP 102.6)	SA7PE075	Unnamed Tributary of Moxahala Creek	PCR- Class B	N/A	Ephemeral	Minor	2	N/A	Timber mat
R-801 Loop									
Hocking County, OH									
Pipe Yard 13 (Alternate) (MP 9.7)	SA6HO244	Unnamed Tributary of Queer Creek	PCR- Class B	N/A	Ephemeral	Minor	1	N/A	Timber mat
Vinton County, OH									
Pipe Yard 20 (MP 14.4)	SA7VN128	Unnamed Tributary of Brushy Fork	PCR- Class B	N/A	Intermittent	Minor	3	N/A	Timber mat
CP Anode Beds									
LEX									
Marshall County, WV									
17.5	SA8MR233	Unnamed Tributary of Grave Creek	PCR- Class B	N/A	Intermittent	Minor	4	N/A	Wet open-cut
Hocking County, OH									
14.2	SA1HO337	Unnamed Tributary of Siverly Creek	PCR- Class B	N/A	Ephemeral	Minor	1	N/A	Wet open-cut

APPENDIX K-1

Waterbodies Crossed or Impacted by the Leach XPress Project

Milepost/ Facility	Feature ID	Waterbody Name	State Water Quality Classification [a, b]	Fisheries Classification	Flow Regime	FERC Classification	Waterbody Width (feet)	Pipeline Crossing Length (feet)	Proposed Crossing Method

'_DT' denotes features identified via desktop analysis.

Waterbody data is based on field delineations conducted to date.

N/A - Not Applicable

HDD - Horizontal directional drill

[a] West Virginia water quality and fisheries classifications are based on the designated use of a waterbody and level of protection required to maintain the water's use, as determined by the West Virginia Water Quality Standards (47 CSR 2):

A – Category A waterbody (public water supply)

B1 – Category B1 waterbody (warmwater fishery)

C – Category C waterbody (water contact recreation)

E3 – Category E3 waterbody (industrial)

Tier 1 – Maintains and protects existing uses of a water body and the water quality conditions necessary to support such uses. A waterbody that is listed as impaired on the states 303(d) list is considered a Tier 1 water as it pertains to the specific pollutant listed.

Tier 2 – Maintains and protects "high quality" waters - waterbodies where the level of water quality exceeds levels necessary to support recreation and wildlife and the propagation and maintenance of fish and other aquatic life. Tier 2 is the default assignment for a waterbody not listed as impaired on the states 303(d) list.

[b] Ohio water quality and fisheries classifications are based on the designated use of a waterbody, as determined by the Ohio Water Quality Standards (OAC 3745-1).

PCR – primary contact recreation waterbody (Class B)

SCR - secondary contact recreation waterbody

SRW – state resource water

SHQ – superior high quality

WWH - warmwater habitat

WWH (*L) - limited warmwater habitat

EWH - exceptional warmwater habitat

CWH - coldwater habitat

LRW - limited resource water

AWS - agricultural water supply

IWS - industrial water supply

[c] Waterbody will not be crossed by the pipeline centerline, but is located within the Project footprint.

[d] Waterbody will be crossed by HDD method.

[e] The Project crosses the Ohio River in both West Virginia and Ohio. Impacts associated with the crossing are only provided for the county and state where the Project first crosses the Ohio River.

[f] Denotes Section 10 waterbodies.

[g] Two manmade ponds located within the workspace at Pipe Yard 36 will be avoided during construction activities; therefore, impacts are not anticipated.

[h] Waterbody will be permanently filled to accommodate construction and operation of proposed compressor station facility.

[i] Waterbody will be permanently filled by placement of a new or replacement of an existing permanent culvert to accommodate access during operation of proposed facility.

[j] The Project crosses Dunkard Fork in both Pennsylvania and West Virginia. The collective impacts associated with the crossing for both states are only presented for the county and state where the Project first crosses Dunkard Fork.

APPENDIX K-2
303(d) Listed Impaired Waterbodies Crossed by the Leach XPress Project

APPENDIX K-2
303(d) Listed Impaired Waterbodies Crossed by the Leach XPress Project

Approximate Milepost	Feature ID	Name of Waterbody	Source of Impairment	TMDL
LEX				
Marshall County, WV				
25.4, RR-5	SA7MN027	Ohio River (Upper South)	Dioxins, bacteria, metals (other than Mercury), PCB	No
Monroe County, OH				
25.9, RR-5	SA6MN361	Unnamed Tributary of Ohio River	Unknown, Pathogens	No
27.3	SA6MN105	Unnamed Tributary of Johnson Run	Unknown, Pathogens	No
28.8	SA8MN251	Johnson Run	Unknown, Pathogens	No
29.8	SA2MN476	Stillhouse Run	Unknown, Pathogens	No
31.1	SA1MN178	Nigger Run	Unknown, Pathogens	No
31.1	SA1MN178	Nigger Run	Unknown, Pathogens	No
32.3	SA8MN124	Unnamed Tributary of Paine Run	Unknown, Pathogens	No
33.4	SA2MN281	Paine Run	Unknown, Pathogens	No
34.8	SA4MN004	Ackerson Run	Unknown, Pathogens	No
35.9	SA6MN346	Unnamed Tributary of Sunfish Creek	Unknown, Pathogens	No
36.7	SA5MN101_DT	East Fork	Unknown, Pathogens	No
36.9	SA5MN103_DT	Unnamed Tributary of East Fork	Unknown, Pathogens	No
38.0	SA2MN267	Unnamed Tributary of Piney Fork	Unknown, Pathogens	No
38.4	SA3MN109	Unnamed Tributary of Piney Fork	Unknown, Pathogens	No
38.7	SA3MN107	Piney Fork	Unknown, Pathogens	No
39.9	SA3MN098	Unnamed Tributary of Sunfish Creek	Unknown, Pathogens	No
40.7	SA2MN254	Death Creek	Unknown, Pathogens	No
41.5	SA2MN244	Grassy Creek	Unknown, Pathogens	No
42.0	SA3MN096	Baker Fork	Unknown, Pathogens	No
44.0	SA3MN090	Unnamed Tributary of Sunfish Creek	Unknown, Pathogens	No
45.2	SA2MN236	Wheeler Run	Unknown, Pathogens	No
46.4	SA2MN223	Unnamed Tributary of Sunfish Creek	Unknown, Pathogens	No
46.4	SA2MN223	Unnamed Tributary of Sunfish Creek	Unknown, Pathogens	No
Noble County, OH				
55.5, RR-7	SA8NO361	Barnes Run	Pathogens	No
56.1	SA8NO145	Unnamed Tributary of Barnes Run	Pathogens	No
56.5	SA6NO143	Wolfpen Run	Pathogens	No
58.1	SA8NO150	East Fork Duck Creek	Pathogens	No
62.0	SA3NO038	Buffalo Creek	Ammonia, habitat alterations, metals (other than mercury), pathogens, siltation	No

APPENDIX K-2
303(d) Listed Impaired Waterbodies Crossed by the Leach XPress Project

Approximate Milepost	Feature ID	Name of Waterbody	Source of Impairment	TMDL
63.9	SA6NO351	Unnamed Tributary of Dog Run	DDT in tissue, PCB in fish tissue, Pathogens	No
64.4	SA5NO169	Unnamed Tributary of Dog Run	DDT in tissue, PCB in fish tissue, Pathogens	No
65.1	SA3NO022	Unnamed Tributary of Dog Run	DDT in tissue, PCB in fish tissue, Pathogens	No
67.0	SA3NO168	West Fork Duck Creek	DDT in tissue, PCB in fish tissue, Pathogens	No
67.0	SA3NO168	West Fork Duck Creek	DDT in tissue, PCB in fish tissue, Pathogens	No
69.3	SA4NO047	Unnamed Tributary of West Fork Duck Creek	DDT in tissue, PCB in fish tissue, Pathogens	No
70.7	SA1NO248	Unnamed Tributary of West Fork Duck Creek	DDT in tissue, PCB in fish tissue, Pathogens	No
70.8	SA1NO248	Unnamed Tributary of West Fork Duck Creek	DDT in tissue, PCB in fish tissue, Pathogens	No
71.3	SA1NO402	Unnamed Tributary of West Fork Duck Creek	DDT in tissue, PCB in fish tissue, Pathogens	No
74.2	SA2NO525	Unnamed Tributary of Dyes Fork	Pathogens, Siltation	No
74.4	SA2NO515	Unnamed Tributary of Dyes Fork	Pathogens, Siltation	No
74.8	SA2NO519	Unnamed Tributary of Blanchard Run	Pathogens, Siltation	No
75.7	SA4NO058	Unnamed Tributary of Blanchard Run	Pathogens, Siltation	No
75.7	SA4NO058	Unnamed Tributary of Blanchard Run	Pathogens, Siltation	No
75.7	SA4NO058	Unnamed Tributary of Blanchard Run	Pathogens, Siltation	No
Muskingum County, OH				
79.3	SA1MU430	Unnamed Tributary of Guyst Fork	Pathogens, Siltation	No
79.3	SA1MU427	Unnamed Tributary of Guyst Fork	Pathogens, Siltation	No
79.3	SA1MU427	Unnamed Tributary of Guyst Fork	Pathogens, Siltation	No
79.5	SA1MU427	Unnamed Tributary of Guyst Fork	Pathogens, Siltation	No
79.5	SA1MU427	Unnamed Tributary of Guyst Fork	Pathogens, Siltation	No
79.6	SA1MU427	Unnamed Tributary of Guyst Fork	Pathogens, Siltation	No
79.7	SA1MU427	Unnamed Tributary of Guyst Fork	Pathogens, Siltation	No
79.7	SA1MU426	Guyst Fork	Pathogens, Siltation	No
80.6	SA2MU545	Unnamed Tributary of Guyst Fork	Pathogens, Siltation	No
81.6	SA1MU433	Unnamed Tributary of Meigs Creek	Pathogens, Siltation	No
82.0	SA1MU435	Starrett Creek	Pathogens, Siltation	No
82.1	SA1MU436	Meigs Creek	Pathogens, Siltation	No

APPENDIX K-2
303(d) Listed Impaired Waterbodies Crossed by the Leach XPress Project

Approximate Milepost	Feature ID	Name of Waterbody	Source of Impairment	TMDL
83.7	SA1MU445	Marshall Creek	Pathogens, Siltation	No
Morgan County, OH				
86.9	SA3MO500	Unnamed Tributary of Mans Fork	Pathogens, Siltation	No
87.5	SA1MO462	Mans Fork	Pathogens, Siltation	No
87.9	SA1MO461	Unnamed Tributary of Mans Fork	Pathogens, Siltation	No
88.8	SA2MO107	Unnamed Tributary of Mans Fork	Pathogens, Siltation	No
89.4	SA6MO298	Muskingum River	PCB in fish tissue	No
96.8	SA1MO095	Unnamed Tributary of Bennett Run	Flow Alterations(s), Habitat Alterations, Siltation, pH	No
Perry County, OH				
97.9	SA2PE074	Unnamed Tributary of Bennett Run	Flow Alterations(s), Habitat Alterations, Siltation, pH	No
97.9	SA2PE074	Unnamed Tributary of Bennett Run	Flow Alterations(s), Habitat Alterations, Siltation, pH	No
97.9	SA2PE074	Unnamed Tributary of Bennett Run	Flow Alterations(s), Habitat Alterations, Siltation, pH	No
98.3	SA2PE072	Bennett Run	Flow Alterations(s), Habitat Alterations, Siltation, pH	No
100.1	SA1PE279	Black Fork	Flow Alterations(s), Habitat Alterations, Siltation, pH	No
102.0	SA3PE186	Unnamed Tributary of Moxahala Creek	Flow Alterations(s), Habitat Alterations, Siltation, pH	No
102.7	SA1PE089	Moxahala Creek	Flow Alterations(s), Habitat Alterations, Siltation, pH	No
110.1	SA8PE174	Turkey Run	Aluminum, habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	No, Yes, Yes, Yes, No, Yes, No
112.5	SA2PE593	Unnamed Tributary of Turkey Run	Aluminum, habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	No, Yes, Yes, Yes, No, Yes, No
114.3	SA1PE039	Unnamed Tributary of Rush Creek	Aluminum, habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	No, Yes, Yes, Yes, No, Yes, No
115.3	SA2PE019	Unnamed Tributary of Rush Creek	Aluminum, habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	No, Yes, Yes, Yes, No, Yes, No
117.5	SA5PE509_DT	Unnamed Tributary of Turkey Run	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
118.2	SA6PE236	Turkey Run	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
118.2	SA6PE234	Unnamed Tributary of Turkey Run	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
Fairfield County, OH				

APPENDIX K-2
303(d) Listed Impaired Waterbodies Crossed by the Leach XPress Project

Approximate Milepost	Feature ID	Name of Waterbody	Source of Impairment	TMDL
120.0	SA1FA385	Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
120.0	SA1FA385	Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
Hocking County, OH				
121.3	SA1HO023	Unnamed Tributary of Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
121.3	SA1HO023	Unnamed Tributary of Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
121.3	SA1HO023	Unnamed Tributary of Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
121.4	SA1HO023	Unnamed Tributary of Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
122.3	SA1HO018	Unnamed Tributary of Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
122.5	SA1HO019	Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
122.7	SA8HO157	Unnamed Tributary of Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
123.6	SA8HO158	Unnamed Tributary of Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
125.2	SA6HO172	Unnamed Tributary of Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
Fairfield County, OH				
126.1	SA6FA201	Unnamed Tributary of Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
126.6	SA8FA165	Unnamed Tributary of Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
128.0	SA8FA301	Unnamed Tributary of Hocking River	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
Hocking County, OH				
130.4	SA1HO291	Hocking River	PCB in fish tissue, pathogens	No
LEX1				
Fairfield County, OH				
0.9	SA8FA339	Rush Creek	Habitat alterations, nutrients, organic enrichment, low dissolved oxygen, pathogens, siltation	Fecal coliform 5,704 (cfu*10/day)
R-801 Loop				
Hocking County, OH				

APPENDIX K-2
303(d) Listed Impaired Waterbodies Crossed by the Leach XPress Project

Approximate Milepost	Feature ID	Name of Waterbody	Source of Impairment	TMDL
0.2	SA2HO346	Buck Run	Habitat alterations, nutrients, low dissolved oxygen, pcb in fish tissues, pathogens, siltation	Fecal coliform 1,363(cfu*10/day)
0.9	SA2HO350	Unnamed Tributary of Hocking River	Habitat alterations, nutrients, organic enrichment/low dissolved oxygen, PCB in fish tissue, pathogens, siltation	Yes, No, No, No, Yes, Yes
1.3	SA2HO353	Unnamed Tributary of Hocking River	Unknown, habitat alterations, natural limits, nutrients, organic enrichment/low dissolved oxygen, PCB in fish tissue, siltation, pH	Phosphorous 12 lbs/day
2.3	SA1HO301	Clear Fork	Unknown, habitat alterations, natural limits, nutrients, organic enrichment/low dissolved oxygen, PCB in fish tissue, siltation, pH	Phosphorous 12 lbs/day
2.8	SA1HO297	Unnamed Tributary of Duck Creek	Unknown, habitat alterations, natural limits, nutrients, organic enrichment/low dissolved oxygen, PCB in fish tissue, siltation, pH	Yes, Yes, No, Yes, Yes, No, Yes, No
3.5	SA1HO302	Unnamed Tributary of Duck Creek	Unknown, habitat alterations, natural limits, nutrients, organic enrichment/low dissolved oxygen, PCB in fish tissue, siltation, pH	Yes, Yes, No, Yes, Yes, No, Yes, No
5.2	SA1HO325	Unnamed Tributary of Duck Creek	Unknown, habitat alterations, natural limits, nutrients, organic enrichment/low dissolved oxygen, PCB in fish tissue, siltation, pH	Yes, Yes, No, Yes, Yes, No, Yes, No
5.7	SA6HO228	Unnamed Tributary of Duck Creek	Unknown, habitat alterations, natural limits, nutrients, organic enrichment/low dissolved oxygen, PCB in fish tissue, siltation, pH	Yes, Yes, No, Yes, Yes, No, Yes, No
6.7	SA8HO318	Pine Creek	Nutrients, PCB in fish tissue, sediment/siltation	No, No, Yes
7.6	SA2HO368	Blackjack Branch	Nutrients, PCB in fish tissue, sedimentation/siltation	No, No, Yes
8.9	SA1HO313	Little Blackjack Branch	Nutrients, PCB in fish tissue, sedimentation/siltation	No, No, Yes
9.9	SA1HO327	Unnamed Tributary of Queer Creek	Unknown, natural limits	No
11.8	SA1HO324	Queer Creek	Unknown, natural limits	No
12.3	SA2HO381	Unnamed Tributary of Queer Creek	Unknown, natural limits	No
13.7	SA1HO330	East Fork	Unknown, natural limits	No
Vinton County, OH				
15.6	SA2VN400	Unnamed Tributary of Siverly Creek	Aluminum, habitat alterations, iron, metals (other than Mercury), siltation, zinc, pH	No
16.4	SA2VN410	Siverly Creek	Aluminum, habitat alterations, iron, metals (other than mercury), siltation, zinc, pH	No
17.6	SA2VN415	Dunkle Creek	Aluminum, habitat alterations, iron, metals (other than mercury), siltation, zinc, pH	No
19.1	SA1VN351	Elk Fork	Aluminum, habitat alterations, iron, metals (other than mercury), siltation, zinc, pH	No

APPENDIX K-2
303(d) Listed Impaired Waterbodies Crossed by the Leach XPress Project

Approximate Milepost	Feature ID	Name of Waterbody	Source of Impairment	TMDL
19.8	SA2VN424	Unnamed Tributary of Elk Fork	Unknown, iron, metals, nutrients, oil and grease, salinity/total dissolved solids/ chlorides, siltation, zinc, pH	No
19.8	SA2VN424	Unnamed Tributary of Elk Fork	Unknown, iron, metals, nutrients, oil and grease, salinity/total dissolved solids/ chlorides, siltation, zinc, pH	No
21.1	SA2VN436	Unnamed Tributary of Elk Fork	Unknown, iron, metals (other than mercury), nutrients, oil and grease, salinity/total dissolved solids/chlorides, siltation, zinc, pH	No
21.6	SA6VN260	Unnamed Tributary of Puncheon Fork	Unknown, iron, metals (other than mercury), nutrients, oil and grease, salinity/total dissolved solids/chlorides, siltation, zinc, pH	No
22.3	SA1VN362	Unnamed Tributary of Little Raccoon Creek	Unknown, iron, metals (other than mercury), nutrients, oil and grease, salinity/total dissolved solids/chlorides, siltation, zinc, pH	No
22.8	SA1VN366	Unnamed Tributary of Puncheon Fork	Unknown, iron, metals (other than mercury), nutrients, oil and grease, salinity/total dissolved solids/chlorides, siltation, zinc, pH	No
23.7	SA2VN445	Unnamed Tributary of Little Raccoon Creek	Aluminum, habitat alterations, iron, metals (other than Mercury), nickel, nutrients, organic enrichment/low dissolved oxygen, salinity/total dissolved solids/chlorides, siltation, thermal modifications, pH	No
BM-111 Loop				
Lawrence County, OH				
0.1	SA1WA368	Ohio River	Dioxins, bacteria, iron, PCB	No
Wayne County, OH				
0.5	SA1WA370	Twelvepole Creek	Fecal coliform, iron, zinc	No
2.6	SA2WA450	Twelvepole Creek	Fecal coliform, iron, zinc	No
R-501 Abandonment				
Hocking County, OH				
6.5	SA7HO113	Unnamed Tributary of Clear Fork	Unknown, habitat alterations, natural limits, nutrients, organic enrichment/lower dissolved oxygen, PCB in fish tissue, siltation, pH	Phosphorous 12 lbs/day
Vinton County, OH				
17.8	SA1HO330	East Fork	Unknown, natural limits	No
20.4	SA6VN355	Siverly Creek	Aluminum, habitat alterations, iron, metals (other than mercury), siltation, zinc, pH	No
21.6	SA2VN415	Dunkle creek	Aluminum, habitat alterations, iron, metals (other than mercury), siltation, zinc, pH	No

APPENDIX K-2
303(d) Listed Impaired Waterbodies Crossed by the Leach XPress Project

Approximate Milepost	Feature ID	Name of Waterbody	Source of Impairment	TMDL
23.8	SA2VN424	Unnamed Tributary of Elk Fork	Unknown, iron, metals, nutrients, oil and grease, salinity/total dissolved solids/ chlorides, siltation, zinc, pH	No
25.6	SA6VN260	Unnamed Tributary of Puncheon Fork	Unknown, iron, metals (other than mercury), nutrients, oil and grease, salinity/total dissolved solids/chlorides, siltation, zinc, pH	No

APPENDIX L
Wetlands Affected by the Leach XPress Project

APPENDIX L
Wetlands Affected by the Leach XPress Project

Feature ID	Approximate Milepost / Facility	Hydrologic Unit Code (8 digit)	Wetland Type [a]	Proposed Crossing Method	Approximate Crossing Length (feet)	Temporary Impacts (acres)	10-foot Corridor Operational Impacts (acres) [b]	30-foot Corridor Operational Impacts (acres) [c]
LEX								
Greene County, PA								
WA8GR201	0.3	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA7GR008	1.8	05030106	PEM	Conventional Bore	35	0.1	0.0	0.0
WA7GR008	1.8	05030106	PEM	Conventional Bore	19	0.0	0.0	0.0
Greene County, PA Subtotal					54	0.1	0.0	0.0
Marshall County, WV								
WA6MR010_PFO	1.8	05030106	PFO	Conventional Bore	34	<0.1	<0.1	<0.1
WA6MR010_PEM	1.8	05030106	PEM	Conventional Bore	55	0.1	0.0	0.0
WA6MR092	4.0	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8MR004	4.8	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6MR002	5.7	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8MR005	6.3	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6MR007	6.9	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8MR207	8.1 RR-1	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8MR208	8.1 RR-1	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8MR210	8.3 RR-1	05030106	PEM	Workspace Only	0 [d]	0.1	0.0	0.0
WA8MR014	9.7	05030106	PEM	Open-cut	66	0.2	0.0	0.0
WA6MR012	11.0	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6MR015	11.5	05030106	PEM	Open-cut	32	<0.1	0.0	0.0
WA8MR018	11.7	05030106	PFO	Open-cut	38	<0.1	<0.1	<0.1
WA8MR016	12.3	05030106	PEM	Open-cut	72	0.1	0.0	0.0
WA8MR015	12.5	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8MR154	12.7	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6MR017	13.4	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8MR027	13.5	05030106	PEM	Open-cut	72	0.1	0.0	0.0
WA8MR025	13.5	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8MR024	13.9	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6MR086	21.2	05030106	PEM	Open-cut	12	0.2	0.0	0.0
WA8MR157	21.5	05030106	PEM	Open-cut	7	<0.1	0.0	0.0
WA6MR020	22.6	05030106	PEM	Open-cut	7	<0.1	0.0	0.0

APPENDIX L
Wetlands Affected by the Leach XPress Project

Feature ID	Approximate Milepost / Facility	Hydrologic Unit Code (8 digit)	Wetland Type [a]	Proposed Crossing Method	Approximate Crossing Length (feet)	Temporary Impacts (acres)	10-foot Corridor Operational Impacts (acres) [b]	30-foot Corridor Operational Impacts (acres) [c]
WA6MR020	22.6	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6MR021	22.8	05030106	PSS	Open-cut	25	<0.1	<0.1	<0.1
WA8MR030	23.2	05030106	PEM	Open-cut	72	0.1	0.0	0.0
WA2MR070	24.3	05030106	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6MR023	25.2	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
Marshall County, WV Subtotal					492	1.2	<0.1	0.1
Monroe County, OH								
WA7MN014_PSS	25.8 RR-5	05030201	PSS	HDD	0 [d]	0.0 [e]	0.0 [e]	0.0 [e]
WA1MN085	30.5	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1MN084	30.5	05030201	PEM	Open-cut	8	<0.1	0.0	0.0
WA1MN083	31.1	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8MN033	31.8	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8MN032	31.8	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA7MN013	34.8	05030201	PSS	Open-cut	96	0.1	<0.1	<0.1
WA1MN199_PSS	35.2	05030201	PSS	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1MN199_PEM	35.2	05030201	PEM	Open-cut	41	0.1	0.0	0.0
WA6MN089	35.8	05030201	PEM	Open-cut	29	0.1	0.0	0.0
WA6MN090	35.8	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6MN099	36.2	05030201	PEM	Open-cut	34	0.1	0.0	0.0
WA6MN100	36.2	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2MN087	37.3	05030201	PEM	Open-cut	54	0.1	0.0	0.0
WA2MN088	38.1	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1MN154	39.2	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA3MN058	39.4	05030201	PEM	Open-cut	87	0.2	0.0	0.0
WA1MN155	39.5	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2MN085	41.2	05030201	PEM	Open-cut	31	<0.1	0.0	0.0
WA8MN159_PEM	41.5	05030201	PEM	Open-cut	17	<0.1	0.0	0.0
WA3MN053	42.8	05030201	PEM	Workspace Only	0 [d]	0.1	0.0	0.0
WA3MN047	42.9	05030201	PEM	Open-cut	58	0.1	0.0	0.0
WA3MN048	43.1	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA3MN049	43.4	05030201	PEM	Open-cut	15	<0.1	0.0	0.0

APPENDIX L
Wetlands Affected by the Leach XPress Project

Feature ID	Approximate Milepost / Facility	Hydrologic Unit Code (8 digit)	Wetland Type [a]	Proposed Crossing Method	Approximate Crossing Length (feet)	Temporary Impacts (acres)	10-foot Corridor Operational Impacts (acres) [b]	30-foot Corridor Operational Impacts (acres) [c]
WA3MN051	43.5	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2MN084	44.4	05030201	PEM	Open-cut	20	<0.1	0.0	0.0
WA2MN083	44.5	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2MN150	45.7	05030201	PEM	Open-cut	3	<0.1	0.0	0.0
WA2MN076	46.2	05030201	PEM	Open-cut	28	0.1	0.0	0.0
WA2MN077	46.3	05030201	PEM	Open-cut	95	0.1	0.0	0.0
WA2MN081	46.4	05030201	PEM	Open-cut	51	0.1	0.0	0.0
WA2MN082	46.5	05030201	PEM	Open-cut	12	0.1	0.0	0.0
WA2MN081	46.5	05030201	PEM	Open-cut	79	0.1	0.0	0.0
WA2MN081	46.5	05030201	PEM	Open-cut	44	<0.1	0.0	0.0
WA1MN077	47.2	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1MN073_PEM_ D	47.6	05030201	PEM	Open-cut	136	0.2	0.0	0.0
WA1MN073_PFO	47.6	05030201	PFO	Open-cut	140	0.1	<0.1	0.1
WA1MN073_PEM_ B	47.7	05030201	PEM	Open-cut	38	<0.1	0.0	0.0
WA1MN072	47.8	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1MN081	49.2	05040005	PEM	Workspace Only	0 [d]	0.0	0.0	0.0
WA2MN074	50.3	05040005	PEM	Open-cut	27	<0.1	0.0	0.0
WA1MN069	51.1 RR-6	05040005	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1MN065	52.3	05040005	PEM	Open-cut	29	0.1	0.0	0.0
WA6MN027	52.3	05040005	PEM	Open-cut	26	<0.1	0.0	0.0
WA6MN030	52.7	05040005	PEM	Open-cut	29	<0.1	0.0	0.0
WA6MN031	52.8	05040005	PEM	Open-cut	56	<0.1	0.0	0.0
Monroe County, OH Subtotal					1,283	2.1	0.1	0.1
Noble County, OH								
WA8NO036	53.3	05040005	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8NO038	53.7	05040005	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8NO039	53.8	05040005	PEM	Workspace Only	0 [d]	0.1	0.0	0.0
WA8NO040	53.9	05040005	PEM	Open-cut	85	<0.1	0.0	0.0
WA8NO043	56.3	05030201	PSS	Open-cut	43	0.1	<0.1	<0.1
WA6NO045	56.4	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6NO044	56.5	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0

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Feature ID	Approximate Milepost / Facility	Hydrologic Unit Code (8 digit)	Wetland Type [a]	Proposed Crossing Method	Approximate Crossing Length (feet)	Temporary Impacts (acres)	10-foot Corridor Operational Impacts (acres) [b]	30-foot Corridor Operational Impacts (acres) [c]
WA6NO043	56.6	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6NO039	56.6	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6NO036	56.8	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8NO045	58.1	05030201	PEM	Open-cut	29	<0.1	0.0	0.0
WA2NO063_PSS	60.3	05040005	PSS	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2NO063_PEM_ B	60.3	05040005	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA4NO032	61.8	05040005	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA3NO023	61.8	05040005	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA3NO023	61.9	05040005	PEM	Open-cut	125	0.2	0.0	0.0
WA3NO023	61.9	05040005	PEM	Open-cut	97	0.1	0.0	0.0
WA3NO020	62.3	05040005	PEM	Open-cut	20	<0.1	0.0	0.0
WA3NO021	62.4	05040005	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1NO060	63.3	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1NO057	63.5	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6NO097	63.9	05030201	PEM	Open-cut	54	0.1	0.0	0.0
WA6NO095	63.9	05030201	PEM	Open-cut	14	<0.1	0.0	0.0
WA8NO215	64.3	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1NO112	64.5	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1NO110	64.5	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1NO111	64.5	05030201	PEM	Workspace Only	0 [d]	0.1	0.0	0.0
WA1NO109	64.5	05030201	PEM	Open-cut	13	<0.1	0.0	0.0
WA3NO017	64.9	05030201	PEM	Open-cut	23	0.1	0.0	0.0
WA3NO013	65.2	05030201	PEM	Open-cut	46	0.1	0.0	0.0
WA3NO016	66.3	05030201	PEM	Workspace Only	0 [d]	0.0	0.0	0.0
WA3NO016	66.3	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA3NO078	66.9	05030201	PEM	Open-cut	10	<0.1	0.0	0.0
WA3NO079	66.9	05030201	PEM	Open-cut	78	0.1	0.0	0.0
WA3NO080	66.9	05030201	PEM	Open-cut	17	0.1	0.0	0.0
WA3NO081	67.0	05030201	PEM	HDD	28	0.0 [e]	0.0 [e]	0.0 [e]
WA2NO056	68.7	05030201	PEM	Open-cut	14	<0.1	0.0	0.0
WA4NO019	68.7	05030201	PEM	Open-cut	7	<0.1	0.0	0.0

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Feature ID	Approximate Milepost / Facility	Hydrologic Unit Code (8 digit)	Wetland Type [a]	Proposed Crossing Method	Approximate Crossing Length (feet)	Temporary Impacts (acres)	10-foot Corridor Operational Impacts (acres) [b]	30-foot Corridor Operational Impacts (acres) [c]
WA4NO021	69.1	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA4NO022	69.2	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA4NO023	69.4	05030201	PEM	Open-cut	65	0.1	0.0	0.0
WA4NO023	69.4	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA4NO024	69.7	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA4NO025	69.9	05030201	PEM	Open-cut	9	<0.1	0.0	0.0
WA4NO026	69.9	05030201	PEM	Open-cut	11	<0.1	0.0	0.0
WA4NO027	70.2	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6NO048	70.8	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1NO113	70.8	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6NO049	70.8	05030201	PEM	Open-cut	55	0.1	0.0	0.0
WA1NO113	70.8	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1NO161	71.1	05030201	PEM	Open-cut	147	0.2	0.0	0.0
WA1NO165_PFO	72.4	05030201	PFO	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1NO166	72.4	05030201	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2NO139	73.3	05040004	PEM	Open-cut	252	0.4	0.0	0.0
WA2NO138	73.5	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2NO137_PEM	73.5	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2NO137_PSS	73.5	05040004	PSS	Workspace Only	0 [d]	<0.1	<0.1	<0.1
WA2NO136	73.5	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1NO167	75.1	05040004	PEM	Open-cut	20	<0.1	0.0	0.0
WA1NO116_PSS	75.6	05040004	PSS	Open-cut	26	<0.1	<0.1	<0.1
WA1NO116_PEM	75.6	05040004	PEM	Open-cut	50	<0.1	0.0	0.0
WA4NO031	75.7	05040004	PEM	Workspace Only	0 [d]	0.1	0.0	0.0
WA4NO029	75.9	05040004	PEM	Workspace Only	0 [d]	0.0	0.0	0.0
WA1NO172_PFO	76.1	05040004	PFO	Open-cut	61	0.1	<0.1	<0.1
Noble County, OH Subtotal					1,399	2.5	<0.1	0.1
Muskingum County, OH								
WA1MU178	76.8	05040004	PEM	Open-cut	3	<0.1	0.0	0.0
WA1MU179_PSS	77.8	05040004	PSS	Workspace Only	0 [d]	<0.1	<0.1	<0.1
WA1MU179_PEM	77.8	05040004	PEM	Open-cut	20	<0.1	0.0	0.0

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Feature ID	Approximate Milepost / Facility	Hydrologic Unit Code (8 digit)	Wetland Type [a]	Proposed Crossing Method	Approximate Crossing Length (feet)	Temporary Impacts (acres)	10-foot Corridor Operational Impacts (acres) [b]	30-foot Corridor Operational Impacts (acres) [c]
WA1MU180_PSS	77.8	05040004	PSS	Open-cut	24	<0.1	<0.1	<0.1
WA2MU144	78.3	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2MU149	80.9	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2MU149	80.9	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8MU052	82.1	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1MU183	82.4	05040004	PEM	Open-cut	20	<0.1	0.0	0.0
WA8MU048	82.7	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA3MU090_PEM	82.7	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1MU185	83.7	05040004	PEM	Open-cut	120	0.2	0.0	0.0
WA3MU093	84.1	05040004	PEM	Workspace Only	0 [d]	0.1	0.0	0.0
WA1MU186	84.4	05040004	PEM	Open-cut	12	<0.1	0.0	0.0
Muskingum County, OH Subtotal					199	0.5	<0.1	<0.1
Morgan County, OH								
WA6MO052	84.9	05040004	PEM	Open-cut	4	<0.1	0.0	0.0
WA6MO053_PEM	84.9	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1MO191	85.3	05040004	PEM	Open-cut	28	<0.1	0.0	0.0
WA1MO192	85.4	05040004	PEM	Open-cut	44	0.1	0.0	0.0
WA6MO059	86.0	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6MO065	86.6	05040004	PEM	Open-cut	54	0.1	0.0	0.0
WA3MO101	86.9	05040004	PEM	Open-cut	22	<0.1	0.0	0.0
WA7MO040	87.2	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8MO077	87.7	05040004	PEM	Open-cut	16	<0.1	0.0	0.0
WA2MO045	88.8	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6MO083	89.3	05040004	PEM	HDD	37	0.0 [e]	0.0 [e]	0.0 [e]
WA7MO038	90.0	05040004	PFO	Workspace Only	0 [d]	<0.1	0.0	0.0
WA7MO036	91.2	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA7MO035	91.4	05040004	PFO	Workspace Only	0 [d]	<0.1	0.0	0.0
WA7MO034_PEM	91.4	05040004	PEM	Open-cut	28	<0.1	0.0	0.0
WA7MO033	91.5	05040004	PEM	Open-cut	20	<0.1	0.0	0.0
WA7MO032	91.5	05040004	PEM	Open-cut	52	0.1	0.0	0.0
WA7MO032	91.5	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0

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WA7MO032	91.6	05040004	PEM	Open-cut	334	0.6	0.0	0.0
WA3MO066	92.8	05040004	PEM	Open-cut	47	0.1	0.0	0.0
WA6MO127	93.4	05040004	PEM	Open-cut	22	<0.1	0.0	0.0
WA2MO042_PFO_ B	95.1	05040004	PFO	Open-cut	45	0.1	<0.1	<0.1
WA2MO042_PEM	95.1	05040004	PEM	Open-cut	165	0.3	0.0	0.0
WA1MO048	95.9	05040004	PSS	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2MO102	96.0	05040004	PEM	Open-cut	41	0.1	0.0	0.0
WA1MO045	97.0	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
Morgan County, OH Subtotal					959	1.6	<0.1	<0.1
Perry County, OH								
WA2PE039	98.9	05040004	PEM	Workspace Only	0 [d]	0.2	0.0	0.0
WA1PE198	99.2	05040004	PEM	Open-cut	28	<0.1	0.0	0.0
WA2PE103_PEM	100.0	05040004	PEM	Open-cut	82	0.1	0.0	0.0
WA1PE127	100.1	05040004	PEM	Open-cut	56	0.1	0.0	0.0
WA1PE127	100.1	05040004	PEM	Open-cut	13	<0.1	0.0	0.0
WA3PE077	102.8	05040004	PFO	Open-cut	35	<0.1	<0.1	<0.1
WA2PE036_PEM	104.2	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2PE036_PSS	104.2	05040004	PSS	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2PE035	104.3	05040004	PEM	Open-cut	79	0.1	0.0	0.0
WA3PE073	105.4	05040004	PEM	Open-cut	7	<0.1	0.0	0.0
WA3PE074	105.5	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1PE035	107.2	05040004	PEM	Open-cut	46	0.1	0.0	0.0
WA3PE076	107.2	05040004	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA4PE017	108.8	05040004	PEM	Open-cut	38	0.1	0.0	0.0
WA4PE016	108.9	05030204	PEM	Open-cut	114	0.2	0.0	0.0
WA4PE014	108.9	05030204	PEM	Workspace Only	0 [d]	0.1	0.0	0.0
WA4PE012	109.1	05030204	PEM	Open-cut	18	<0.1	0.0	0.0
WA4PE008	110.0	05030204	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA4PE006	110.0	05030204	PSS	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8PE067	110.1	05030204	PFO	Open-cut	92	0.1	<0.1	0.1
WA8PE064	110.3	05030204	PEM	Open-cut	23	<0.1	0.0	0.0

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Feature ID	Approximate Milepost / Facility	Hydrologic Unit Code (8 digit)	Wetland Type [a]	Proposed Crossing Method	Approximate Crossing Length (feet)	Temporary Impacts (acres)	10-foot Corridor Operational Impacts (acres) [b]	30-foot Corridor Operational Impacts (acres) [c]
WA8PE063_PEM	110.3	05030204	PEM	Open-cut	28	0.1	0.0	0.0
WA8PE065	110.3	05030204	PEM	Workspace Only	0 [d]	0.2	0.0	0.0
WA8PE063_PSS	110.3	05030204	PSS	Workspace Only	0 [d]	0.0	0.0	0.0
WA8PE063_PSS	110.4	05030204	PSS	Open-cut	57	0.1	<0.1	<0.1
WA4PE004	110.4	05030204	PEM	Open-cut	14	<0.1	0.0	0.0
WA4PE003_PEM	110.9	05030204	PEM	Open-cut	67	0.1	0.0	0.0
WA4PE003_PSS	110.9	05030204	PSS	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2PE020	111.6	05030204	PEM	Open-cut	54	0.1	0.0	0.0
WA2PE018	111.6	05030204	PEM	Open-cut	62	0.1	0.0	0.0
WA2PE015	111.9	05030204	PEM	Open-cut	34	0.1	0.0	0.0
WA1PE196	112.3	05030204	PFO	Open-cut	13	<0.1	<0.1	<0.1
WA1PE195	112.3	05030204	PEM	Open-cut	99	0.3	0.0	0.0
WA2PE154	112.5	05030204	PEM	Open-cut	100	0.2	0.0	0.0
WA2PE007	115.4	05030204	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1PE104	115.6	05030204	PEM	Open-cut	18	<0.1	0.0	0.0
WA1PE103	115.9	05030204	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6PE072	118.0	05030204	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6PE071	118.1	05030204	PFO	Open-cut	31	<0.1	<0.1	<0.1
WA6PE070_PEM	118.2	05030204	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA6PE070_PFO	118.2	05030204	PFO	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2PE129	118.2	05030204	PEM	Open-cut	63	0.2	0.0	0.0
Perry County, OH Subtotal					1,271	2.7	0.1	0.1
Hocking County, OH								
WA8HO061_PFO	120.2	05030204	PFO	Open-cut	124	0.1	<0.1	0.1
WA8HO062	120.2	05030204	PEM	Open-cut	9	<0.1	0.0	0.0
WA3HO070	121.4	05030204	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8HO054_PEM	123.4	05030204	PEM	Open-cut	993	1.5	0.0	0.0
WA8HO054_PFO	123.4	05030204	PFO	Open-cut	43	0.2	<0.1	0.1
WA8HO054_PFO	123.6	05030204	PFO	Open-cut	50	0.1	<0.1	<0.1
WA8HO056_PFO	124.1	05030204	PFO	Open-cut	138	0.1	<0.1	0.1
WA8HO056_PEM_ B	124.1	05030204	PEM	Open-cut	41	0.1	0.0	0.0

APPENDIX L
Wetlands Affected by the Leach XPress Project

Feature ID	Approximate Milepost / Facility	Hydrologic Unit Code (8 digit)	Wetland Type [a]	Proposed Crossing Method	Approximate Crossing Length (feet)	Temporary Impacts (acres)	10-foot Corridor Operational Impacts (acres) [b]	30-foot Corridor Operational Impacts (acres) [c]
WA8HO056_PEM_ B	124.2	05030204	PEM	Workspace Only	0 [d]	0.0	0.0	0.0
WA8HO057	124.5	05030204	PEM	Open-cut	69	0.1	0.0	0.0
WA6HO066_PSS	125.2	05030204	PSS	Open-cut	157	0.2	<0.1	<0.1
WA6HO066_PFO	125.2	05030204	PFO	Workspace Only	0 [d]	<0.1	<0.1	<0.1
WA8HO186	129.9	05030204	PEM	Open-cut	68	<0.1	0.0	0.0
WA8HO187_PEM	130.0	05030204	PEM	Workspace Only	0 [d]	0.1	0.0	0.0
WA8HO189_PEM	130.1	05030204	PEM	Open-cut	63	0.1	0.0	0.0
WA8HO189_PFO	130.1	05030204	PFO	Open-cut	48	<0.1	<0.1	<0.1
WA8HO189_PFO	130.1	05030204	PFO	Open-cut	183	0.2	<0.1	0.1
WA8HO190_PEM	130.2	05030204	PEM	Open-cut	181	0.3	0.0	0.0
WA8HO190_PSS	130.3	05030204	PSS	Workspace Only	0 [d]	0.1	0.0	0.0
WA8HO191	130.3	05030204	PFO	HDD	331	0.0 [e]	0.0 [e]	0.0 [e]
WA8HO192_PFO	130.7	05030204	PFO	HDD	68	0.0 [e]	0.0 [e]	0.0 [e]
WA8HO192_PSS	130.7	05030204	PSS	HDD	42	0.0 [e]	0.0 [e]	0.0 [e]
Hocking County, OH Subtotal					2,608	3.3	0.2	0.5
Fairfield County, OH								
WA6FA067	126.1	05030204	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8FA178	127.3	05030204	PEM	Open-cut	10	<0.1	0.0	0.0
WA8FA179	127.8	05030204	PEM	Workspace Only	0 [d]	0.1	0.0	0.0
WA8FA182	127.9	05030204	PEM	Open-cut	14	<0.1	0.0	0.0
WA8FA184	128.0	05030204	PEM	Open-cut	42	0.1	0.0	0.0
Fairfield County, OH Subtotal					66	0.2	0.0	0.0
LEX Subtotal					8,331	14.3	0.4	0.9
LEX1								
Fairfield County, OH								
WA8FA177	0.4	05030204	PSS	Workspace Only	0 [d]	<0.1	0.0	0.0
WA8FA195	0.9	05030204	PEM	Open-cut	50	0.1	0.0	0.0
Fairfield County, OH Subtotal					50	0.1	0.0	0.0
LEX1 Subtotal					50	0.1	0.0	0.0
R-801 Loop								
Hocking County, OH								

APPENDIX L
Wetlands Affected by the Leach XPress Project

Feature ID	Approximate Milepost / Facility	Hydrologic Unit Code (8 digit)	Wetland Type [a]	Proposed Crossing Method	Approximate Crossing Length (feet)	Temporary Impacts (acres)	10-foot Corridor Operational Impacts (acres) [b]	30-foot Corridor Operational Impacts (acres) [c]
WA2HO115	0.2	05030204	PEM	Open-cut	46	0.1	0.0	0.0
WA2HO116	2.2	05030204	PEM	Open-cut	13	0.1	0.0	0.0
WA1HO137	2.7	05030204	PEM	Open-cut	78	0.1	0.0	0.0
WA1HO138	9.0	05060002	PEM	Open-cut	143	0.2	0.0	0.0
Hocking County, OH Subtotal					280	0.5	0.0	0.0
Vinton County, OH								
WA2HO118	13.4	05060002	PEM	Open-cut	18	<0.1	0.0	0.0
WA2VN119	14.8	05090101	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA1VN142	16.9	05090101	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2VN120	17.6	05090101	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2VN121	18.0	05090101	PEM	Open-cut	1	<0.1	0.0	0.0
WA6VN075	19.0	05090101	PEM	Open-cut	14	<0.1	0.0	0.0
WA6VN075	19.1	05090101	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
WA2VN122	20.7	05090101	PEM	Workspace Only	0 [d]	0.0	0.0	0.0
WA2VN123	21.1	05090101	PEM	Open-cut	40	0.1	0.0	0.0
WA8VN071	23.8	05090101	PEM	Workspace Only	0 [d]	<0.1	0.0	0.0
Vinton County, OH Subtotal					73	0.2	0.0	0.0
R-801 Loop Subtotal					353	0.7	0.0	0.0
BM-111 Loop								
Wayne County, WV								
WA1WA147	0.5	05090102	PFO	HDD	628	0.0 [e]	0.0 [e]	0.0 [e]
WA1WA147_A	0.6	05090102	PEM	HDD	17	0.0 [e]	0.0 [e]	0.0 [e]
WA2WA122	2.3	05090102	PEM	Open-cut	18	<0.1	0.0	0.0
WA2WA125	2.7	05090102	PFO	Open-cut	67	<0.1	<0.1	<0.1
WA2WA125	2.7	05090102	PFO	Open-cut	49	0.1	<0.1	<0.1
Wayne County, WV Subtotal					779	0.1	<0.1	0.1
BM-111 Loop Subtotal					779	0.1	<0.1	0.1
R-501 Abandonment								
Vinton County, OH								
WA2HO118	17.4	05060002	PEM	Open-cut	N/A	<0.1	0.0	0.0
WA2VN120	21.6	05090101	PEM	Open-cut	N/A	<0.1	0.0	0.0

APPENDIX L

Wetlands Affected by the Leach XPress Project

Feature ID	Approximate Milepost / Facility	Hydrologic Unit Code (8 digit)	Wetland Type [a]	Proposed Crossing Method	Approximate Crossing Length (feet)	Temporary Impacts (acres)	10-foot Corridor Operational Impacts (acres) [b]	30-foot Corridor Operational Impacts (acres) [c]
Vinton County, OH Subtotal					N/A	0.1	0.0	0.0
R-501 Abandonment Subtotal					N/A	0.1	0.0	0.0
PIPELINE FACILITIES TOTAL					9,913	15.2	0.4	1.0

Acreage impacts may not add up due to rounding.

[a] Cowardin Wetland Types: PEM - palustrine emergent; PSS - palustrine scrub-shrub; PFO - palustrine forested

[b] Operational impacts in this column reflect permanent wetland loss due to fill.

[c] Milepost is associated with Columbia Gas' existing Line R-515.

[d] All wetlands located within contractor/staging/pipe yards will be avoided during construction; therefore, no impacts are anticipated.

[e] Wetland will be permanently filled to accommodate construction and operation of proposed compressor station facility.

APPENDIX M
Interagency Endangered Species Act Consultation Documentation

APPENDIX M-1
Federally Listed Species Potentially Affected by the Leach XPress and Rayne Xpress Expansion Projects

APPENDIX M
Federally Listed Species Potentially Affected by the Leach XPress and Rayne XPress Expansion Projects

Common Name (*Scientific Name*)	MSHCP / Non-MSHCP Species	Federal Status	Habitat Description	County, State	Determination	Rationale
Eastern Small-Footed Myotis *(Myotis leibii)*	Not Listed	SC	These bats use a wide variety of habitats for roosting. They occur in caves, mines, protected sites along cliff lines, abandoned buildings and are occasionally found roosting under rocks on the ground of floors of caves. Summer habitat is currently unknown, but may be similar sites.	Carter and Menifee, KY	No Effect – would not threaten the population viability	No suitable habitat identified through desktop and field. Consultation complete.
Gray Bat *(Myotis grisescens)*	MSHCP	E	Year-round cave obligate species, roosting in caves during both hibernation and summer. Foraging habitat is correlated with rivers, streams, lakes, or reservoirs. Forest corridors are used to travel between caves and foraging areas.	Carter, Menifee and Montgomery, KY	MSHCP-covered	MSHCP database review determined no suitable habitat in Project area. Consultation complete.
Indiana bat (Myotis sodalis)	MSHCP	E	Roosts in caves and abandoned mines during the winter months. In the late spring and summer (April – November), roost in maternity colonies located under the exfoliating bark of dead trees in riparian zones, bottomland and floodplain habitats, wooded wetlands, and upland communities. Typically forage in semi-open forested habitats, forest edges, and riparian areas.	All Pennsylvania, West Virginia, and Kentucky Counties. All Ohio Counties except Belmont, Guernsey, Monroe, Morgan and Muskingum	MSHCP-covered in covered lands	Columbia Gas and Columbia Gulf committed to implementation of MSHCP AMMs for covered lands. Compensatory mitigation and incidental take is addressed by the MSHCP. Consultation complete.
				Belmont, Guernsey, Monroe, Morgan, Muskingum, Noble, Perry and Vinton, Ohio	NLAA in non-covered lands	Columbia Gas assumed presence and would adhere to FWS-recommended clearing windows. Consultation is ongoing. Final consultation would be required prior to construction.
Northern Long-Eared bat (Myotis septentrionalis)	MSHCP	T	Hibernate in caves and abandoned mines during the winter months. Occupies hardwood forested areas for roosting and foraging during the summer months. Roost singly or in colonies underneath exfoliating tree bark, in cavities, or in crevices of both living and dead trees. Occasionally found utilizing structures as roost sites (e.g., barns and sheds). Forage within the understories of forested hillsides and ridges.	All Pennsylvania, West Virginia, and Kentucky Counties. All Ohio Counties except Belmont, Guernsey, Monroe, Morgan and Muskingum	MSHCP-covered in covered lands	Columbia Gas and Columbia Gulf committed to implementation of MSHCP AMMs for covered lands. Compensatory mitigation and incidental take is addressed by the MSHCP. Consultation complete.
				Belmont, Guernsey, Monroe, Morgan, Muskingum, Noble, Perry and Vinton, Ohio	NLAA in non-covered lands	Columbia Gas assumed presence and would adhere to FWS-recommended clearing windows. Consultation is ongoing. Final consultation would be required prior to construction.

APPENDIX M
Federally Listed Species Potentially Affected by the Leach XPress and Rayne XPress Expansion Projects

Common Name (*Scientific Name*)	MSHCP / Non-MSHCP Species	Federal Status	Habitat Description	County, State	Determination	Rationale
Rafinesque's Big-Eared Bat (Corynorhinus rafinesqii)	Not Listed	SC	This bat uses a variety of sites for roosting including caves, protected sites along cliff lines, large, hollow trees, old mine portals, abandoned tunnels, cisterns, and old or seldom used buildings.	Carter and Menifee, KY	No Effect – would not threaten the population viability	No suitable habitat identified through desktop and field. Consultation complete.
Virginia Big-Eared Bat (Corynorhinus townsendii virginianus)	MSHCP	E	Roosts and hibernates in caves in Appalachian Mountain region; total population exceeds 10,000 and has increased in recent years. Occurs only in 15 caves, of which 5 contain the bulk of the population.	Carter, Menifee, and Montgomery, KY	MSHCP-covered	No suitable habitat identified through desktop and field. Consultation complete.
Eastern Massasauga (Sistrurus catenatus)	Non- MSHCP	pT	Prefers wet prairies and marshes with emergent vegetative cover. Generally hibernates in crayfish burrows but may also be found under logs and tree roots or in small burrows.	Fairfield, OH	Population level effects are unlikely and/or would not contribute to a trend toward federal listing.	Per MSHCP Biological Opinion, Consultation complete.
Pink mucket (Lampsilis abrupta)	Non-MSHCP	E	Inhabits large, fast-flowing waters of the Lower Ohio River and its larger tributaries with rocky or boulder substrates. Prefers shallow water but may also be found in deeper water with a slower current.	Monroe and Lawrence, OH Wayne and Marshall, WV	NLAA Tiered consultation in covered lands	Columbia Gas committed to implementation of FWS-recommended HDD crossings of the Ohio River and BMPs, as well as adherence to their Horizontal Directional Drill Contingency Plan. Per MSHCP Biological Opinion, Tiered Consultation with the FWS is required. Consultation is ongoing. Final consultation would be required prior to construction.
				Morgan, OH	NLAA in non-covered lands	Columbia Gas committed to implementation of FWS-recommended HDD crossings of the Muskingum River and BMPs, as well as adherence to their Horizontal Directional Drill Contingency Plan. Consultation is ongoing. Final consultation would be required prior to construction.

APPENDIX M
Federally Listed Species Potentially Affected by the Leach XPress and Rayne XPress Expansion Projects

Common Name (*Scientific Name*)	MSHCP / Non-MSHCP Species	Federal Status	Habitat Description	County, State	Determination	Rationale
Rayed bean (Villosa fabalis)	Non-MSHCP	E	Prefers small headwater creeks with sand or gravel substrate, but can also be found in large rivers. Found in or near shoal or riffle areas typically within or adjacent to vegetation.	Monroe and Lawrence, OH Wayne and Marshall, WV	NLAA Tiered consultation in covered lands	Columbia Gas committed to implementation of FWS-recommended HDD crossings of the Ohio River and BMPs, as well as adherence to their Horizontal Directional Drill Contingency Plan. Per MSHCP Biological Opinion, Tiered Consultation with the FWS is required. Consultation is ongoing. Final consultation would be required prior to construction.
				Morgan, OH	NLAA in non-covered lands	Columbia Gas committed to implementation of FWS-recommended HDD crossings of the Muskingum River and BMPs, as well as adherence to their Horizontal Directional Drill Contingency Plan. Consultation is ongoing. Final consultation would be required prior to construction.
Fanshell (Cyprogenia stegaria)	MSHCP	E	Found in both deep and shallow medium to large streams with strong currents. Prefers a gravel substrate.	Monroe and Lawrence, OH Wayne and Marshall, WV	MSHCP-Covered	Columbia Gas committed to implementation of AMMs, FWS- recommended HDD crossings, and adherence to Horizontal Directional Drill Contingency Plan. Consultation complete.
				Morgan, OH	NLAA in non-covered lands	Columbia Gas committed to implementation of FWS-recommended HDD crossings of the Ohio River and BMPs, as well as adherence to their Horizontal Directional Drill Contingency Plan. Consultation is ongoing. Final consultation would be required prior to construction.

APPENDIX M
Federally Listed Species Potentially Affected by the Leach XPress and Rayne XPress Expansion Projects

Common Name (*Scientific Name*)	MSHCP / Non-MSHCP Species	Federal Status	Habitat Description	County, State	Determination	Rationale
Snuffbox (Epioblasma triquetra)	Non-MSHCP	E	Small to medium-sized creeks and some larger rivers, in areas with a swift current.	Monroe and Lawrence, OH Wayne and Marshall, WV	NLAA Tiered consultation in covered lands	Columbia Gas committed to implementation of FWS-recommended HDD crossings of the Ohio River and BMPs, as well as adherence to their Horizontal Directional Drill Contingency Plan. Per MSHCP Biological Opinion, Tiered Consultation with the FWS is required. Consultation is ongoing. Final consultation would be required prior to construction.
				Morgan, OH	NLAA in non-covered lands	Columbia Gas committed to implementation of FWS-recommended HDD crossings of the Muskingum River and BMPs, as well as adherence to their Horizontal Directional Drill Contingency Plan. Consultation is ongoing. Final consultation would be required prior to construction.
Sheepnose (Plethobasus cyphyu)	MSHCP	E	Prefers riffles in large rivers with gravel or cobble substrates. Generally inhabits deep water and may be tolerant of reservoirs and mud or sand bottoms.	Monroe and Lawrence, OH Wayne and Marshall, WV	MSHCP-covered	Columbia Gas committed to implementation of FWS-recommended HDD crossings of the Ohio River and BMPs, as well as adherence to their Horizontal Directional Drill Contingency Plan.
				Morgan, OH	NLAA in non-covered lands	Columbia Gas committed to implementation of FWS-recommended HDD crossings of the Muskingum River and BMPs, as well as adherence to their Horizontal Directional Drill Contingency Plan. Consultation is ongoing. Final consultation would be required prior to construction.
Clubshell (Pleurobema clava)	MSHCP	E	Occurs in small streams to medium-sized rivers. Inhabits coarse sand and fine gravel substrates in shallow riffles and runs with moderate current. Typically found at depths of less than 3 feet.	Monroe and Lawrence, OH Wayne and Marshall, WV	MSHCP-covered	Columbia Gas committed to implementation of FWS-recommended HDD crossings of the Ohio River and BMPs, as well as adherence to their Horizontal Directional Drill Contingency Plan.
				Morgan, OH	NLAA in non-covered lands	Columbia Gas committed to implementation of FWS-recommended HDD crossings of the Muskingum River and BMPs, as well as adherence to their Horizontal Directional Drill Contingency Plan. Consultation is ongoing. Final consultation would be required prior to construction.

APPENDIX M
Federally Listed Species Potentially Affected by the Leach XPress and Rayne XPress Expansion Projects

Common Name (*Scientific Name*)	MSHCP / Non-MSHCP Species	Federal Status	Habitat Description	County, State	Determination	Rationale
Rabbitsfoot (Quadrula cylindrical cylindrical)	Non- MSHCP	T	Inhabits waters of the Muskingum River with moderate to swift currents. Occasionally inhabits small streams on gravel bars close to fast-moving currents Prefer sandy or gravel substrate.	Muskingum, OH	NLAA Tiered consultation in covered lands	The Muskingum River is not crossed by the Project in counties where rabbitsfoot is known to occur. Suitable habitat is not present in the Project area. Per MSHCP Biological Opinion, Tiered Consultation with the FWS is required. Consultation is ongoing. Final consultation would be required prior to construction.
American burying beetle (Nicrophorus americanus)	MSHCP	E	Generally prefers grasslands and open areas of oak hickory forests. Adults bury themselves in soil during winter and reproduce during warmer months, utilizing carrion as habitat.	Morgan and Perry, OH	MSHCP-covered	Suitable habitat not present in the Project area. Consultation complete.
Northern monkshood (Aconitum noveboracense)	Non- MSHCP	T	Typically grows on shaded to partially shaded cliffs, talus slopes, or along streams. It requires cool soil conditions, cold air drainage, or cold groundwater flowage.	Hocking, OH	NLAA	Project re-routed to avoid potential habitat. Only known population 2.3 miles from Project area. Consultation complete.
Running buffalo clover (Trifolium stoloniferum)	Non- MSHCP	E	Requires periodic disturbance and somewhat open habitat, but cannot tolerate full sun, full shade, or severe disturbance. Typically found in partially shaded woodlots, mowed areas, and along streams and trails.	Hocking, Lawrence, and Vinton, OH	NLAA in covered lands	No suitable habitat identified in Lawrence County. Field surveys within Hocking and Vinton Counties to-date did not identify any individuals. Un-surveyed route deviations require additional survey. Columbia Gas committed to implementation of MSHCP BMPs if species is identified in Project area. Consultation is pending completion of 1026 surveys.
				Vinton, OH	NLAA in non-covered lands	No species identified during field surveys. Consultation is ongoing. Final consultation would be required prior to construction.
Small whorled pogonia (Isotria medeoloides)	Non- MSHCP	T	Grows in deciduous-coniferous forests, typically with light to moderate leaf litter, an open herb layer, moderate to light shrub layer, and relatively open canopy. It frequently occurs on flats or slope bases near canopy breaks.	Greene, PA Hocking, OH	NLAA	No suitable habitat identified in Greene County. Field surveys within Hocking County to-date did not identify any individuals. Un-surveyed route deviations require additional survey. Columbia Gas committed to implementation of MSHCP BMPs if species is identified in Project area. Consultation is pending completion of 1026 surveys.

APPENDIX M
Federally Listed Species Potentially Affected by the Leach XPress and Rayne XPress Expansion Projects

Common Name (*Scientific Name*)	MSHCP / Non-MSHCP Species	Federal Status	Habitat Description	County, State	Determination	Rationale
White-Haired Goldenrod (Solidago albopilosa)	Non-MSHCP	T	Endemic to a single river gorge in Kentucky and restricted within this narrow range to sheltered, cave-like "rock house" habitats, which tend to receive intensive recreational use. Many populations have been significantly reduced or extirpated by trampling.	Menifee, KY	No Effect	MSHCP database did not identify suitable habitat in Project area. Consultation is complete.

APPENDIX M-2
Interagency Endangered Species Act Consultation Checklist for the Leach XPress Project

INTERAGENCY ENDANGERED SPECIES ACT CONSULTATION CHECKLIST FOR THE NISOURCE MULTI-SPECIES HABITAT CONSERVATION PLAN

APPLICANT SECTION

ACTION AGENCY (Recipient): **Federal Energy Regulatory Commission (FERC)**

OTHER INVOLVED FEDERAL AGENCIES: **U.S. Army Corps of Engineers, U.S. Fish and Wildlife Service (USFWS)**

PROJECT NAME: **Columbia Gas Transmission's, Leach XPress Project ("Project")**

PROJECT I.D. NO. (if applicable): **FERC Docket NO. CP15-514-000**

NiSource and Columbia Pipeline Group (Columbia) has provided the attached documentation to involved federal agencies in accordance with "Project Review and Documentation Protocols" of the NiSource/Columbia Pipeline MSHCP Consultation Implementation Guidance [4]. This documentation describes if and how the project is covered by the NiSource Multi-Species Habitat Conservation Plan (MSHCP), programmatic biological opinion (BO), and/or programmatic concurrence letters. In addition, the action agency could refer to the following sections and/or pages of the MSHCP, BO, and/or concurrence letters to verify that the activity is covered by the MSHCP and associated Section 7 consultation under the Endangered Species Act (ESA):

Reference:

- NiSource MSHCP Chapter 2.3 Covered Lands (pp 2-11)
- NiSource MSHCP Chapter 2.4 Covered Activities (pp 11- 25)
- NiSource/Columbia Pipeline MSHCP Consultation Implementation Guidance Quick Reference for Species Consultation Categories (pp 5-6)
- NiSource/Columbia Pipeline Group's, "Habitat Conservation Program Best Management Practices Guidebook", v.1.0, March 12, 2014 (specific pages for each species are referenced in the attached application material)

By signing below, Columbia certifies that its proposed activity, as outlined in the accompanying application or notification, is consistent with the MSHCP, BO, and/or concurrence letters.

_____ _____

Columbia Pipeline representative Date

☒ By checking the box, Columbia is notifying the involved federal agencies that the proposed activity will require additional ESA Section 7 consultation because part of the activity may include: (1) any of the 10 Likely to Adversely Affect (LAA) species that are not included in the MSHCP[5], (2) species not addressed in the MSHCP, BO, or concurrence letters[5], (3) non-covered activities, (4) activities outside of the covered lands, or (5) activities otherwise deviating from the MSHCP, BO, and/or concurrence letters. Additional biological information about the species, habitat, or effects of the action may be required. The federal agencies can contact the U.S. Fish and Wildlife Service's NiSource/Columbia MSHCP Implementation Coordinator (Karen Herrington, 850.348.6495, karen_herrington@fws.gov) for more information.

[4] See NiSource/Columbia Pipeline MSHCP Consultation Implementation Guidance. May 8, 2014. Pg 11.

[5] See NiSource/Columbia Pipeline MSHCP Consultation Implementation Guidance. May 8, 2014. Pg. 5.

FEDERAL AGENCY SECTION

This checklist serves as the official documentation that each action agency involved has completed its Section 7 responsibilities under the ESA for NiSource and Columbia Pipeline Group (Columbia) projects conducted as described in the MSHCP, BO, and/or concurrence letters. Every agency that receives a copy of this checklist should fill it out. The MSHCP, BO, and concurrence letters can be found on the U.S. Fish and Wildlife Service (FWS) NiSource website:

http://www.fws.gov/midwest/endangered/permits/hcp/nisource/index.html

Quick access to the required Avoidance and Minimization Measures (AMMs) and Best Management Practices (BMP) can be found in the Columbia BMP Guidebook, which is also posted on the above website.

1. Does the federal action occur entirely within the covered lands as described in the MSHCP?
   __X__Yes. Go to #2. **Potential impacts on Gray Bat and Virginia Big-Eared Bat are associated entirely with covered lands. Potential impacts on a number of species include both covered and non-covered lands. Within covered lands, the MSHCP was applied for the following species: Indiana Bat, Northern Long-Eared Bat, Eastern Massasauga, Northern Monkshood, Running Buffalo Clover, Small Whorled Pogonia, and White Haired Goldenrod, and the following mussels: Fanshell, Pink Mucket, Rabbitsfoot, Sheepnose, Snuffbox, Clubshell, and Rayed Bean.**
   __X__ No. Additional consultation is required because the action is not consistent with the MSHCP, BO, and/or concurrence letters. If the project may affect listed species, contact your local FWS Field Office. **Additional consultation is required for all non-covered lands.**

2. Is the proposed action as described in the MSHCP, programmatic BO, and/or concurrence letter?
   __X__Yes. Go to #3.
   _____ No. Additional consultation is required because the action is not consistent with the MSHCP, BO, and/or concurrence letters. If the project may affect listed species, contact your local FWS Field Office.

3. Does the proposed action pose any effects on species not included in the MSHCP, BO or concurrence letters[55]?
   _____Yes. Additional consultation is required because the species was not included in the MSHCP, BO, and/or concurrence letters. If the project may affect listed species not included in the consultation, contact your local FWS Field Office.
   __X__No. Go to #4. **The only species not included in the MSHCP are the eastern small-footed myotis and Rafinesque's big-eared bat, both federal species of management concern. Further consultation is not required for these species.**

4. Does the proposed action include MSHCP species[65] only?
   _____Yes. Go to #6.
   __X__No. Go to #5.

5. Does the proposed action include any of the 10 Likely to Adversely Affect (LAA) species that are not included in the MSHCP (i.e., LAA non-MSHCP species) as addressed in the BO?
   __X__Yes. Additional consultation is required. Enter into tiered consultation with your local FWS office for any LAA non-MSHCP species. **This is applicable to the following mussels: Fanshell, Pink Mucket, Rabbitsfoot, and Snuffbox.**

_____No. Go to #6.

6. Are all mandatory AMMs and/or BMPs for each species included in the action?[7]
   __X__Yes. Go to #7.
   _____ No. Additional consultation is required because the proposed action is not consistent with the MSHCP, BO, and/or concurrence letter. Request additional information from Columbia about AMMs.

7. Are all non-mandatory AMMs and/or BMPs for each species included in the action?
   __X_ Yes. Consultation is complete because the proposed action is consistent with the MSHCP, BO, and/or concurrence letter.
   _____No. Go to #8.

8. Are reasons provided for not including non-mandatory AMMs for each species?[8]
   __X__Yes. Consultation is complete.
   _____ No. Request justification from Columbia, and attach documentation here. Once justification is provided, consultation is complete.

It is the federal agency's responsibility to comply with ESA Section 7 requirements for this project. The programmatic BO and/or the concurrence letters cover most of Columbia's activities implemented under the MSHCP within the covered lands. By signing below, the federal agency verifies that the proposed action within the agency's authority complies with the programmatic BO, and/or concurrence letters. If additional Section 7 consultation is required, the U.S. Fish and Wildlife Service's supplemental concurrence letter or biological opinion will be attached to this documentation.

AGENCY COMMENTS:

_____See attached table for further details_____

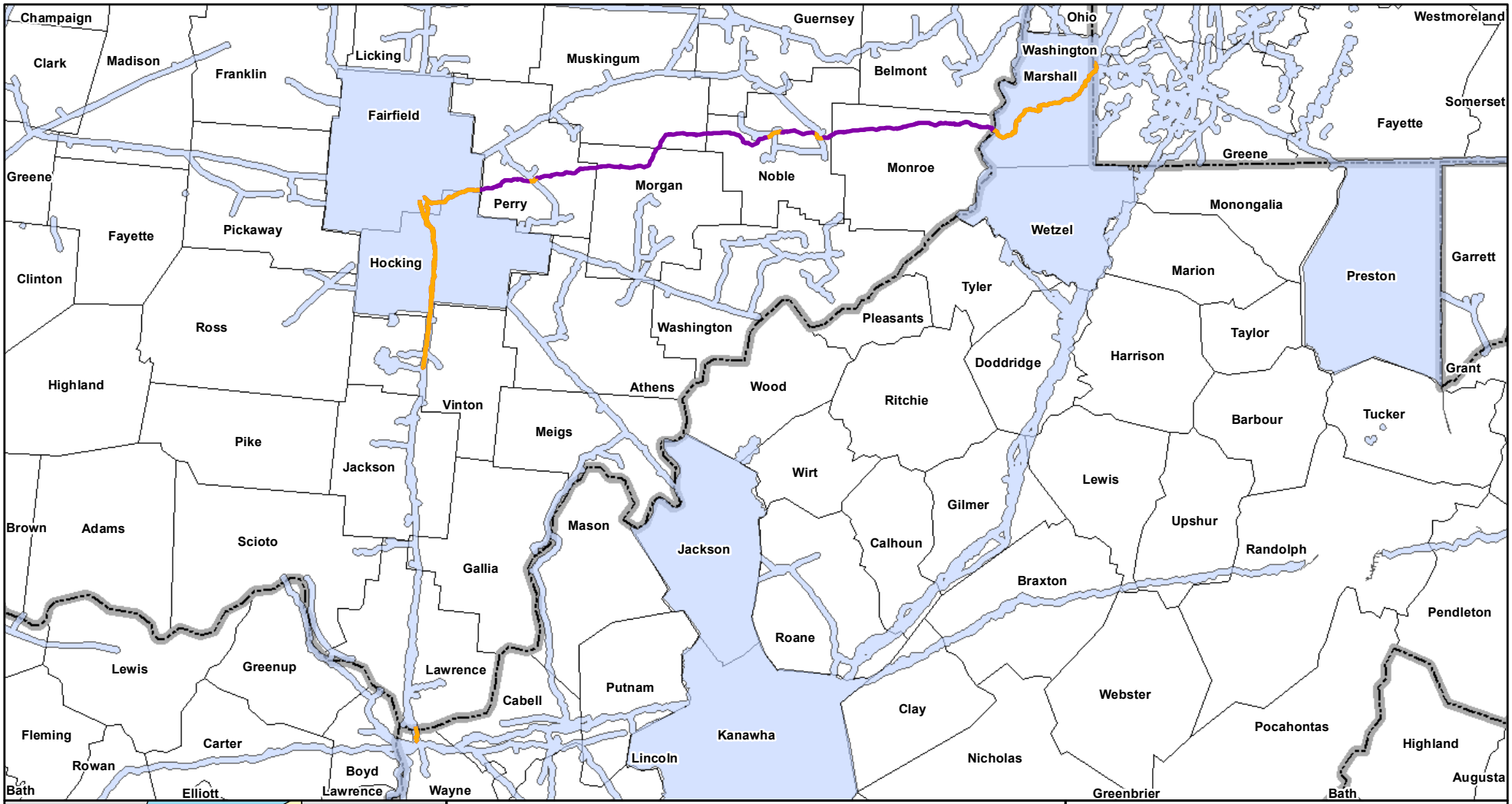
_____

_____

Joanne Wachholder_____ _____4/6/16_____
Federal Agency representative Date

[7] See NiSource/Columbia Pipeline Group's, "Habitat Conservation Program Best Management Practices Guidebook", v.1.0, March 12, 2014.
[8] Per the MSHCP, explanation for non-mandatory AMM use is not required for the Indiana Bat.

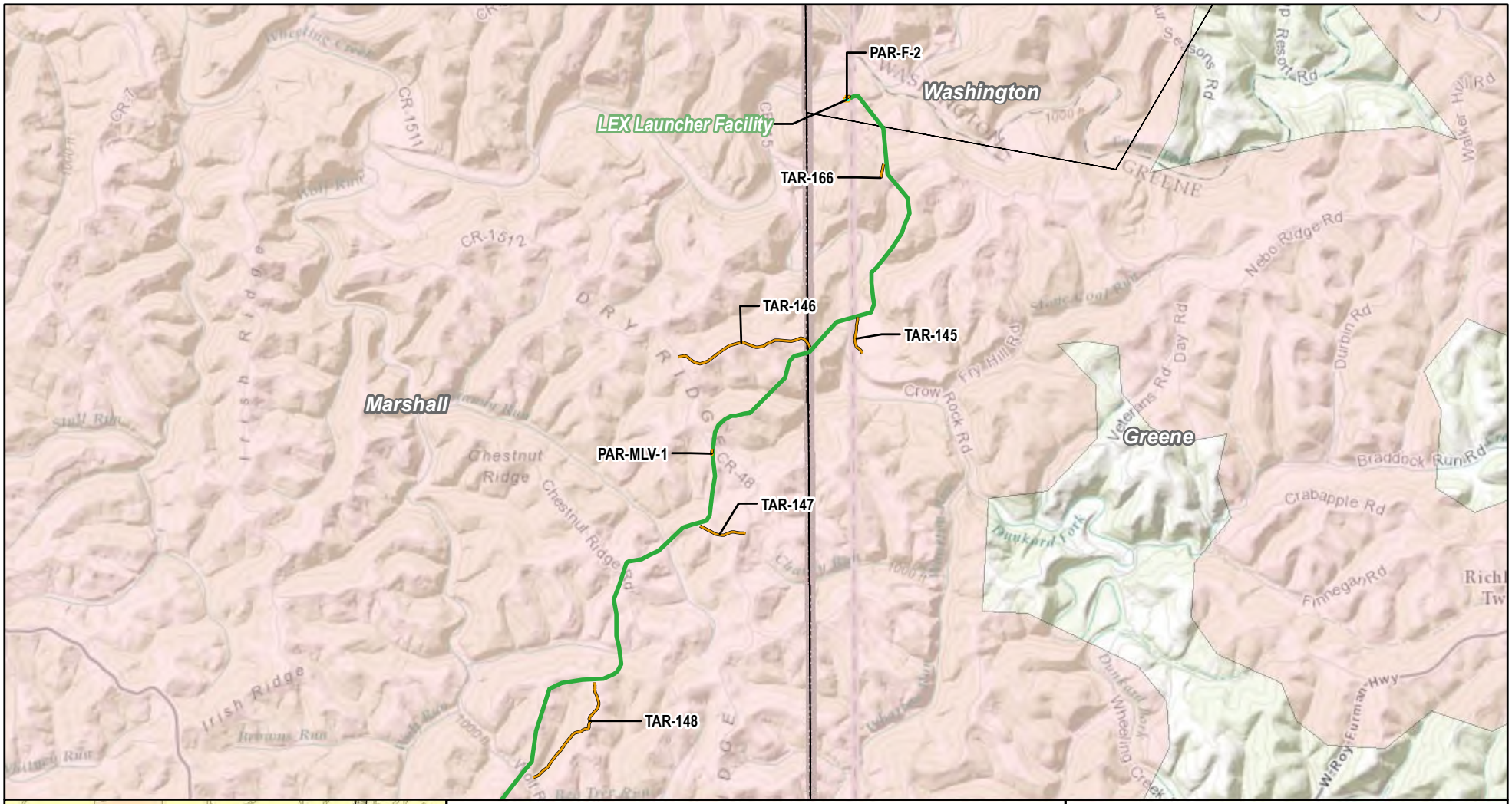
APPENDIX M-3
MSHCP Coverage Mapping for the Leach XPress Project

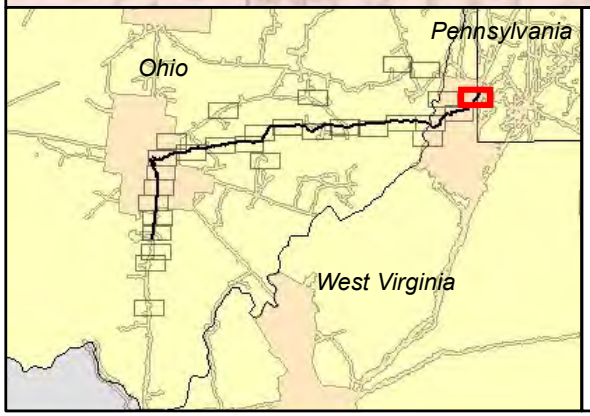


Map obtained from Columbia Gas

Appendix M-3
MSHCP Coverage Overview Map for the Leach XPress Project

Page M-3-1	Scale: 1:1,500,000
NAD 83 UTM 17 N	Date: March, 2016





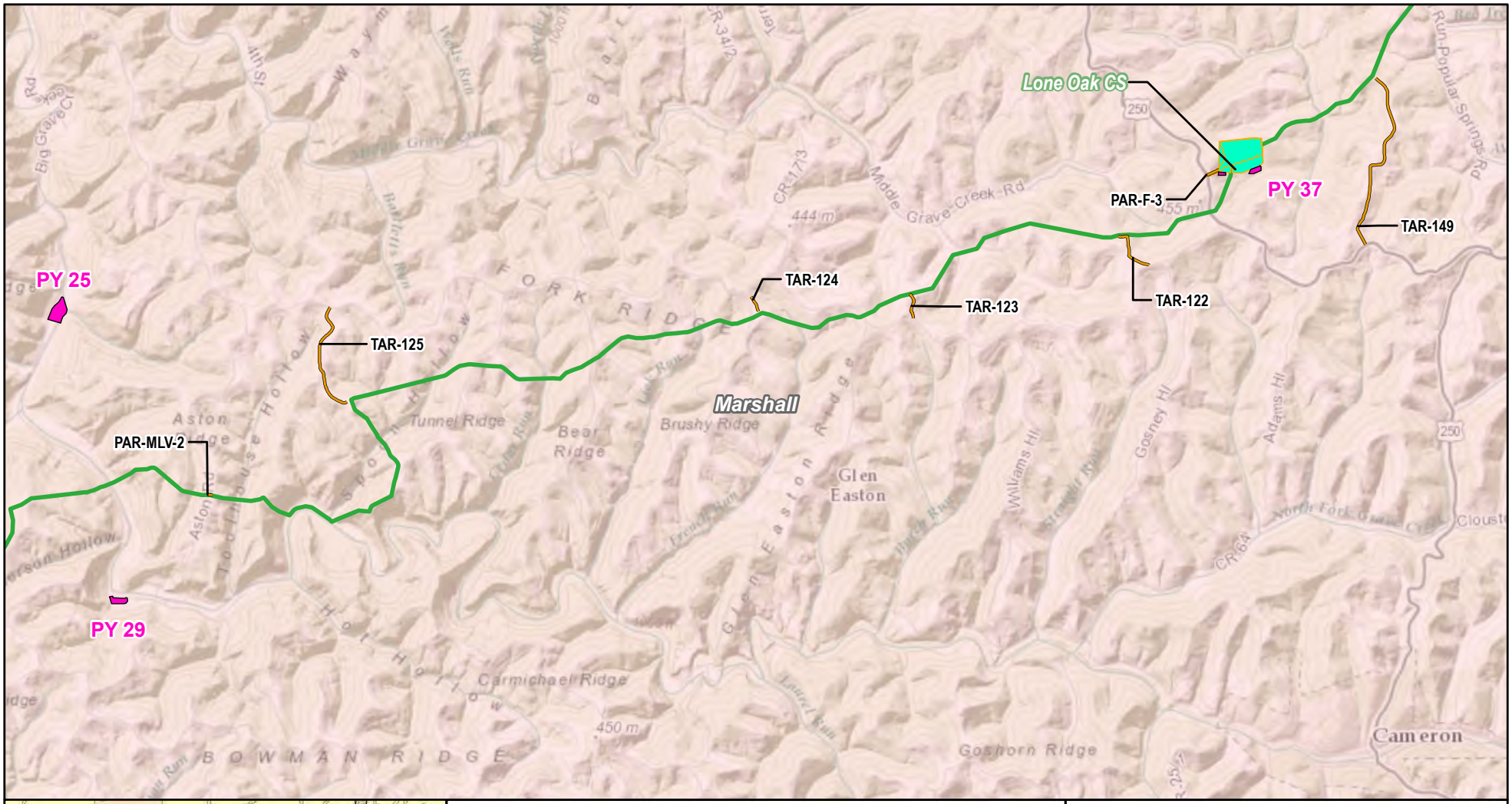
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

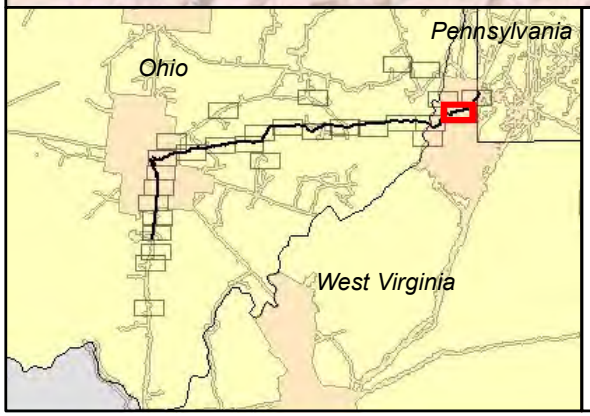
0 1 2 Miles

N

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 1 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016





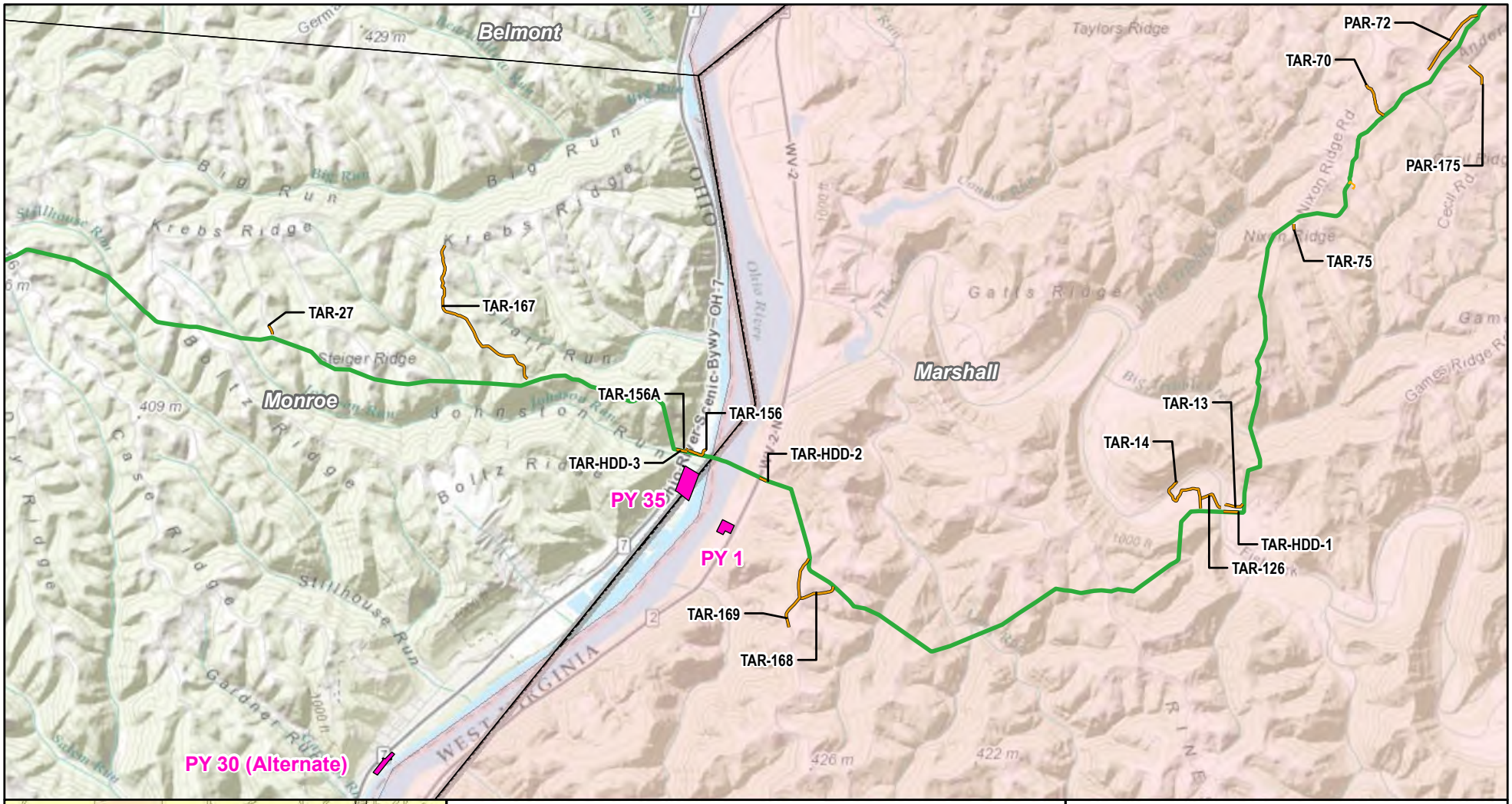
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

N

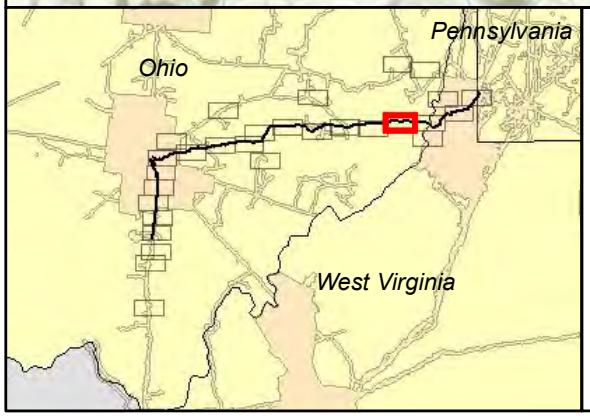
MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 2 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 3 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



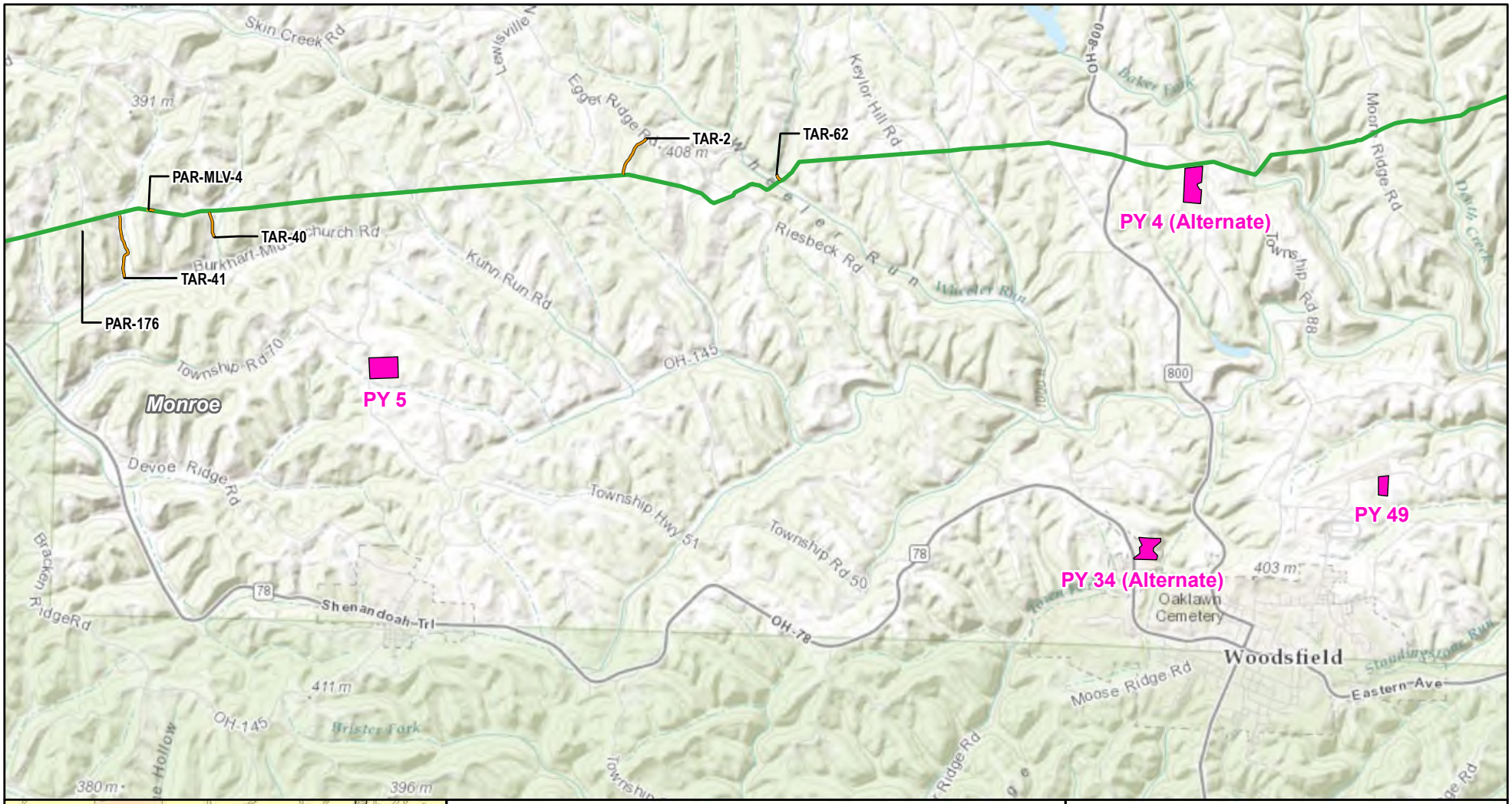
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

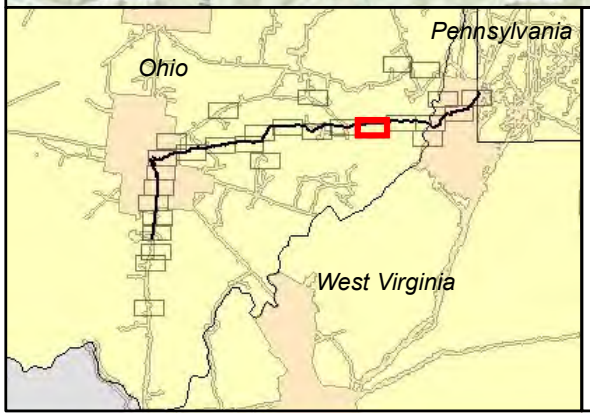
0 1 2 Miles

N

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 4 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016





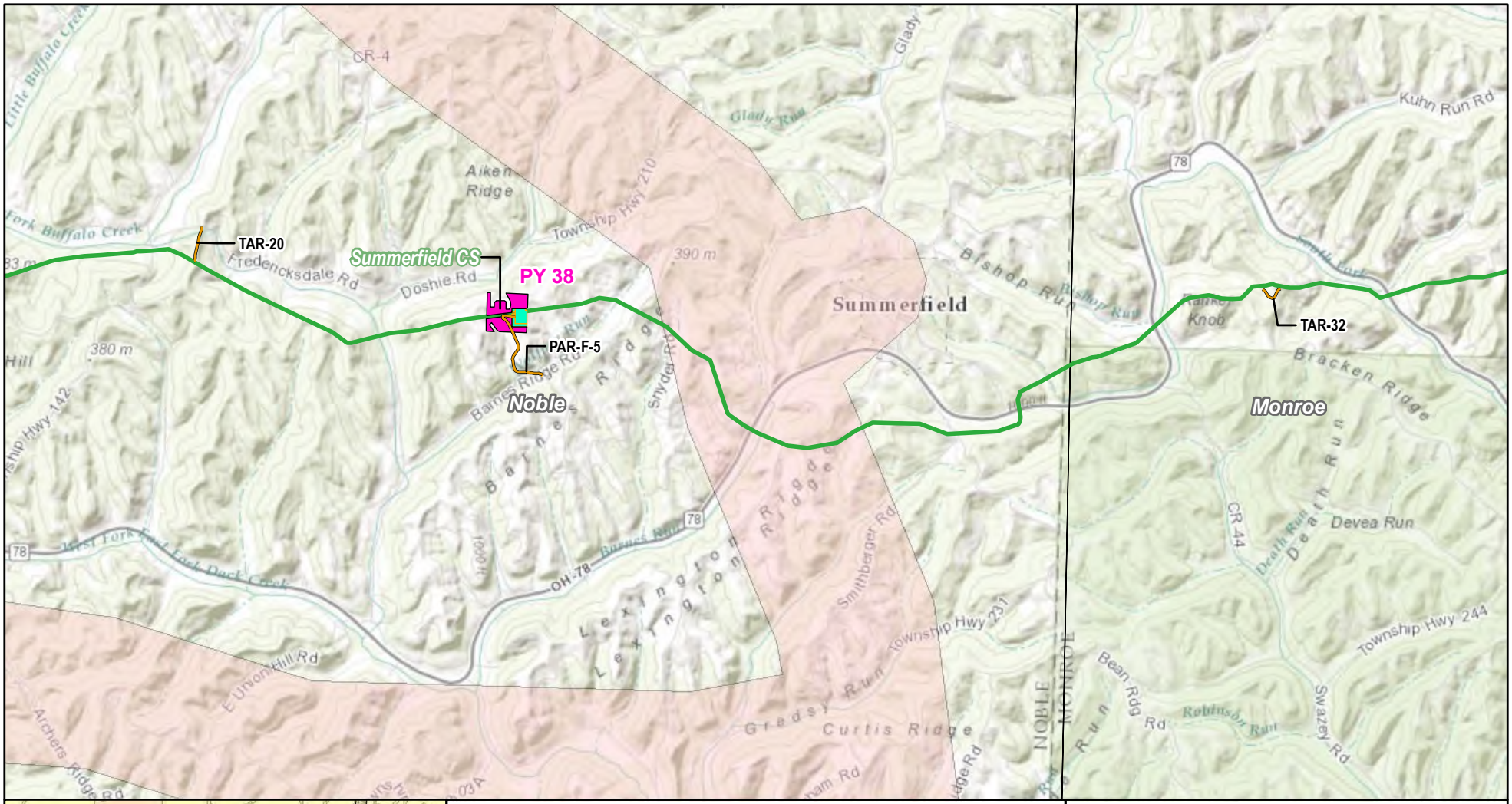
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

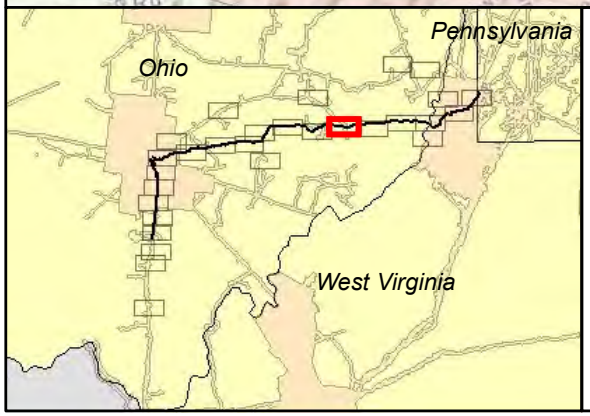
0 1 2 Miles

N

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 5 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



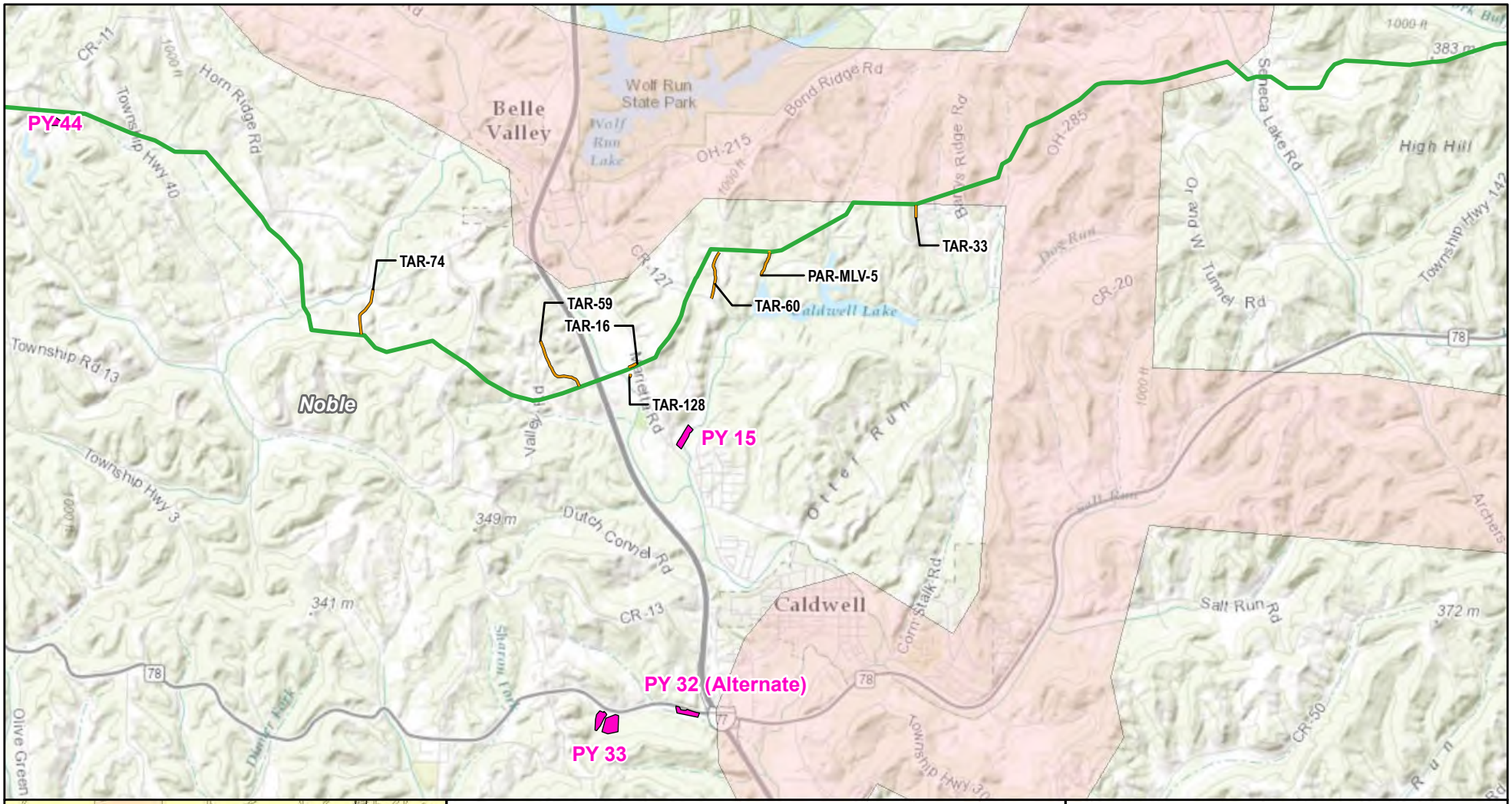


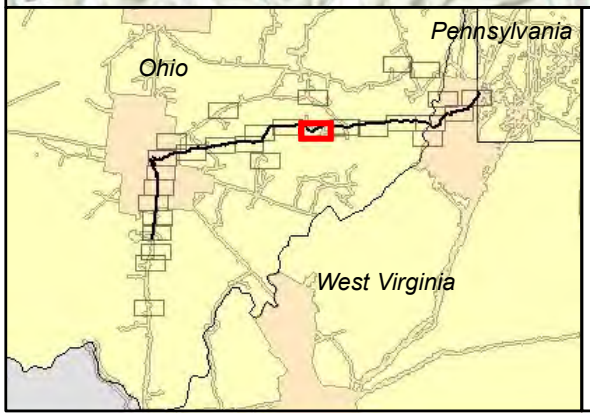
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 6 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016





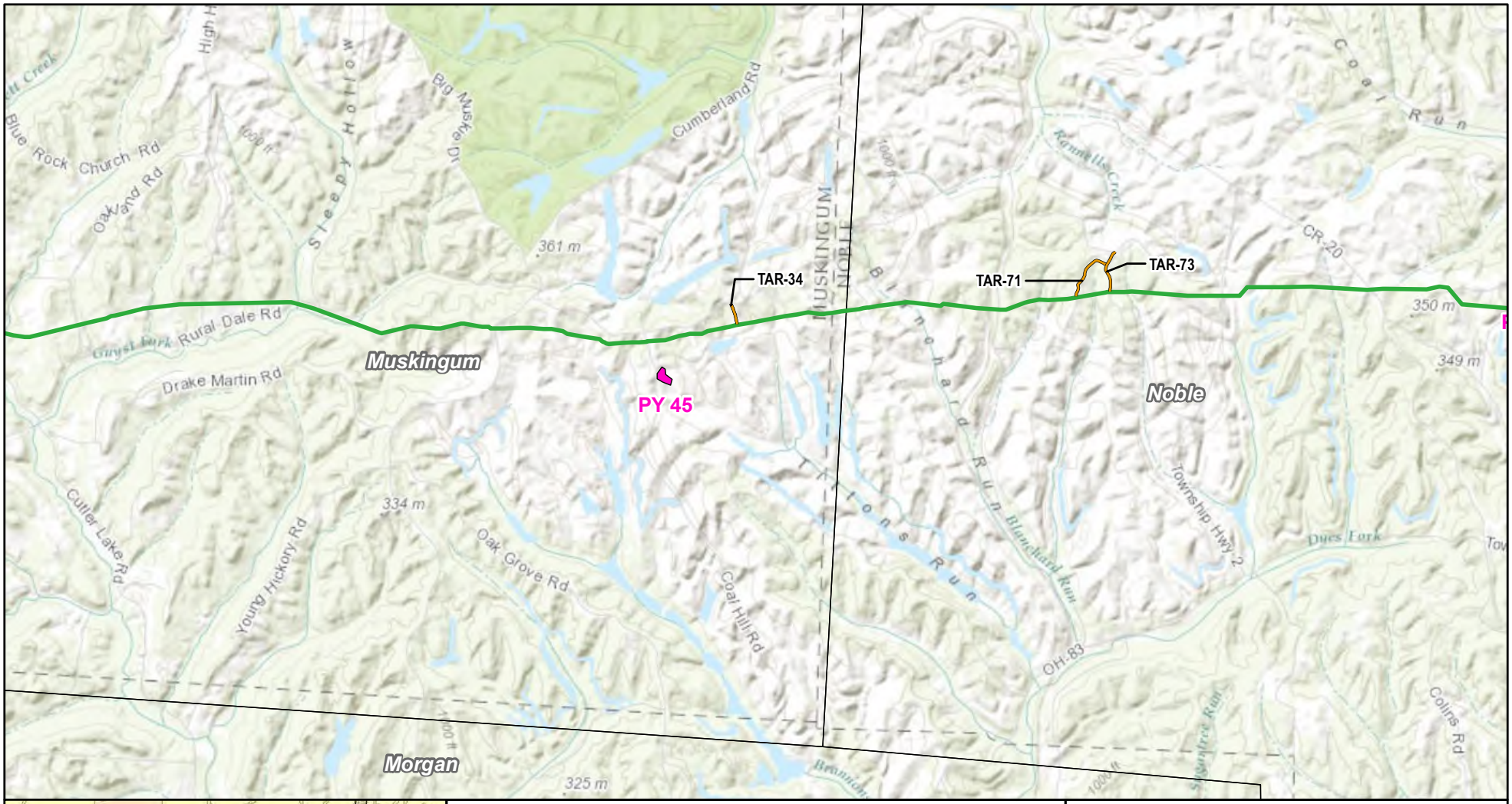
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

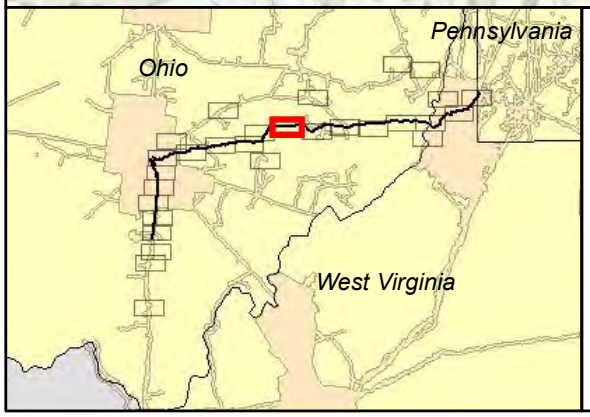
0 1 2 Miles

N

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 7 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



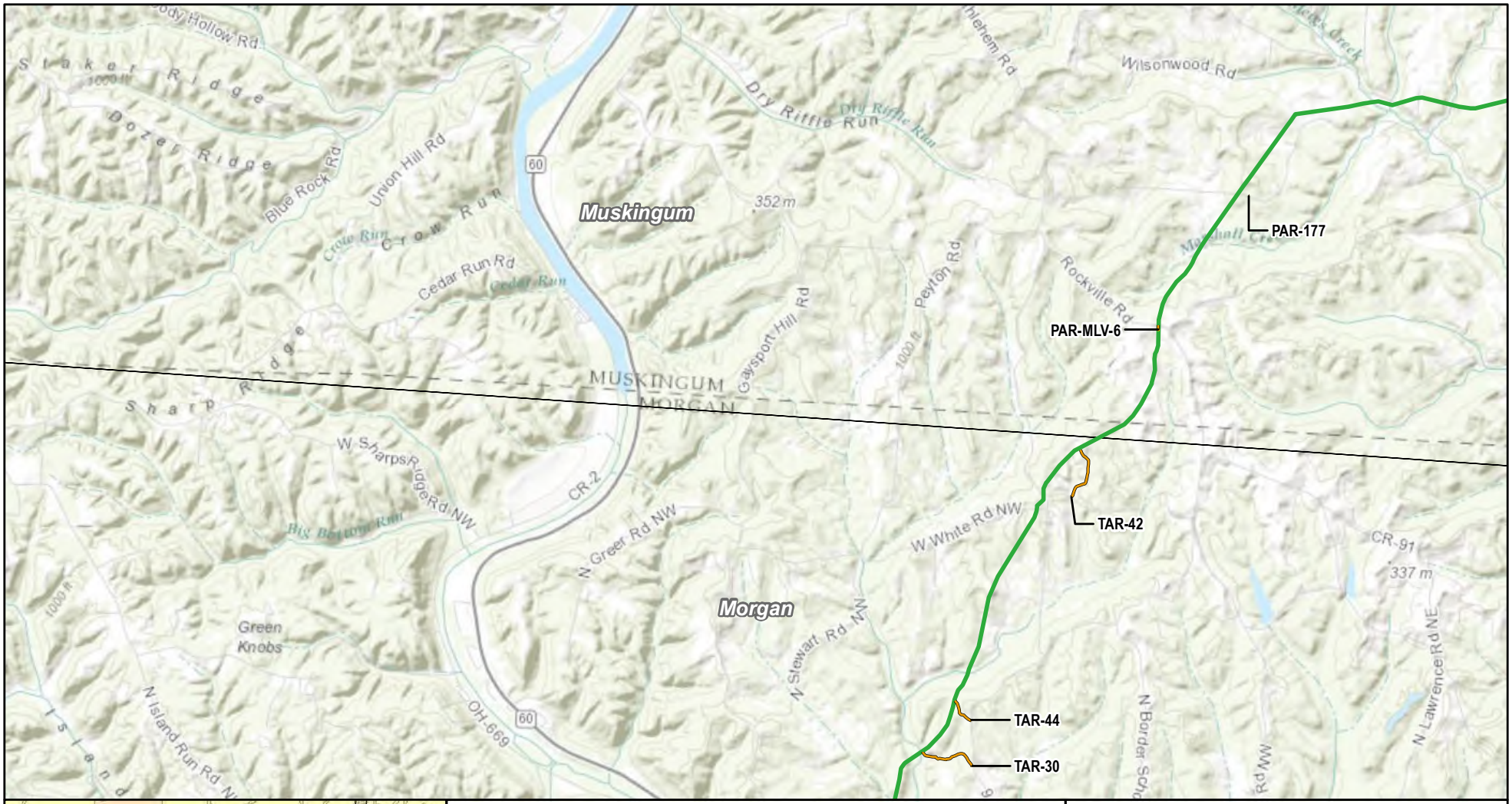


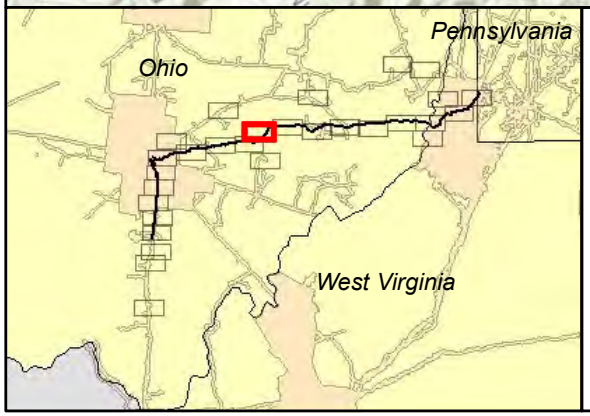
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 8 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



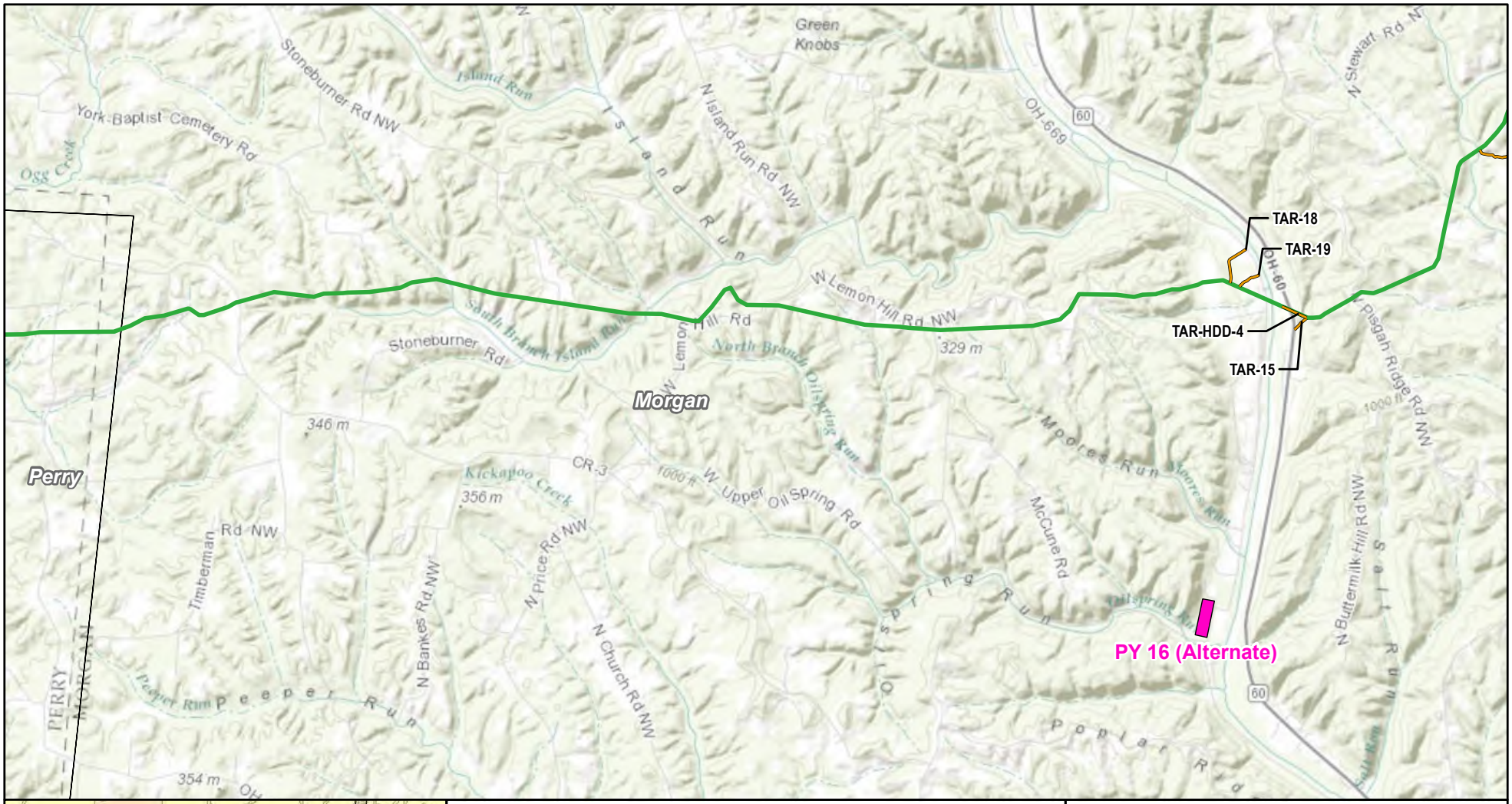


LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

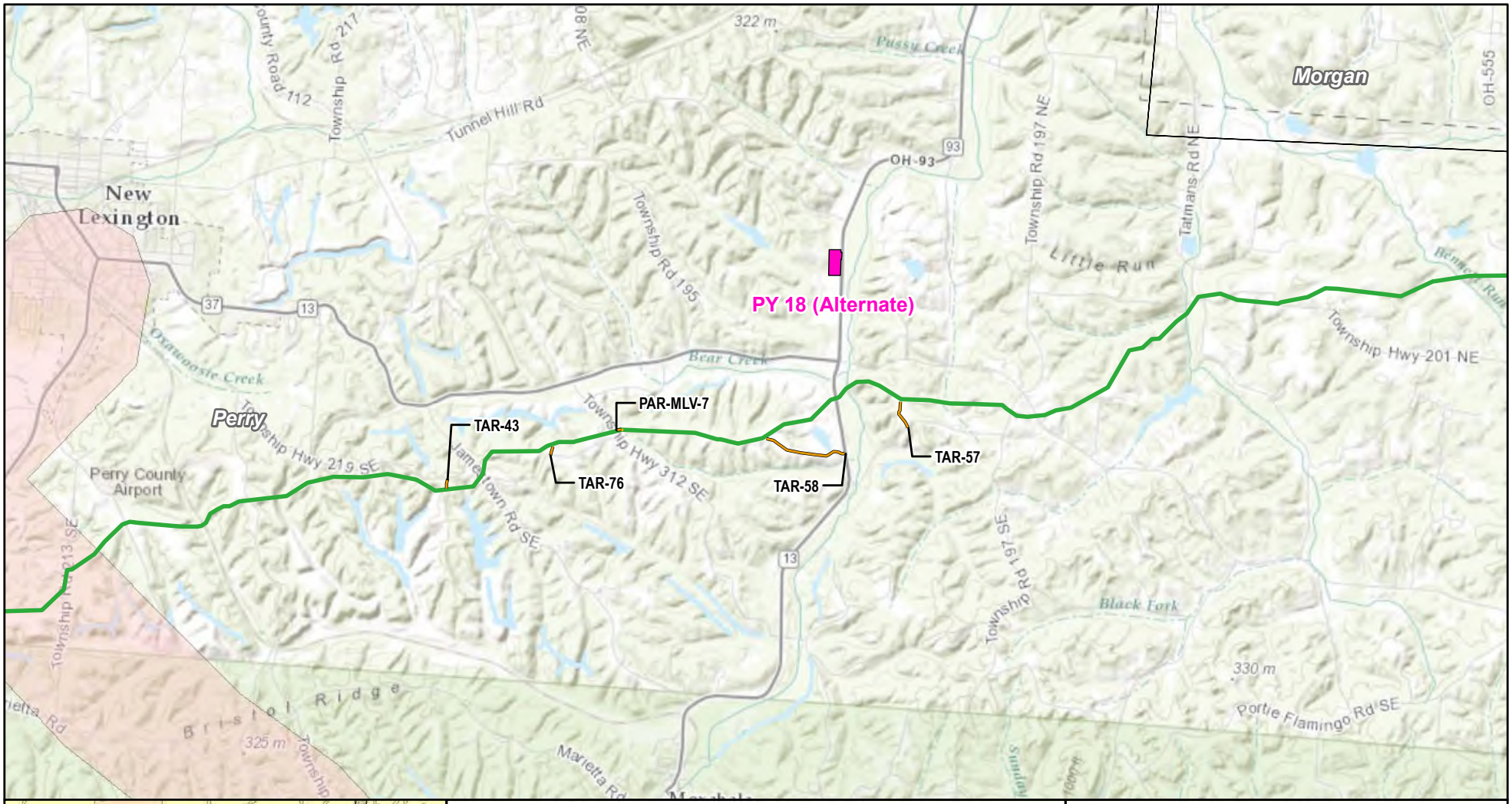
MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

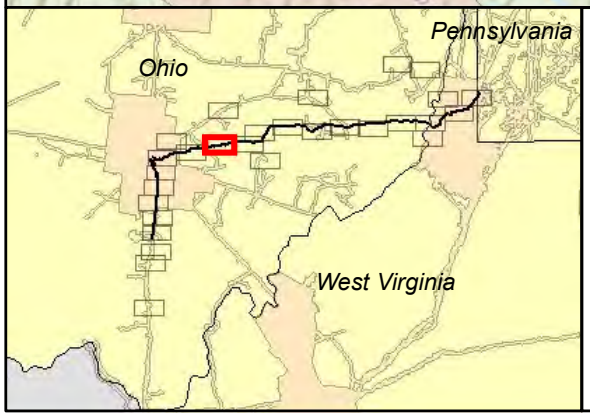
Page 9 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 10 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016





LEX
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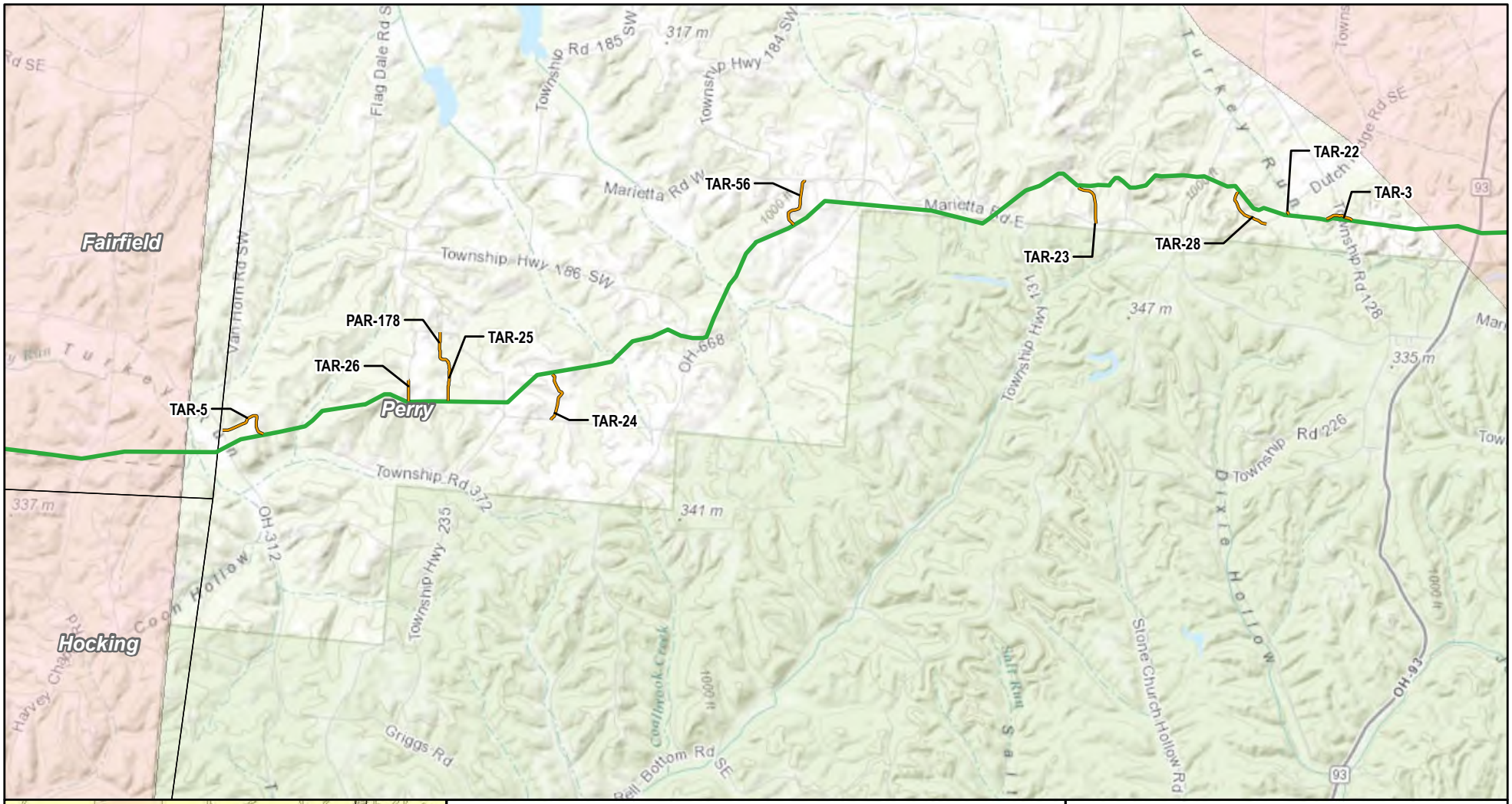
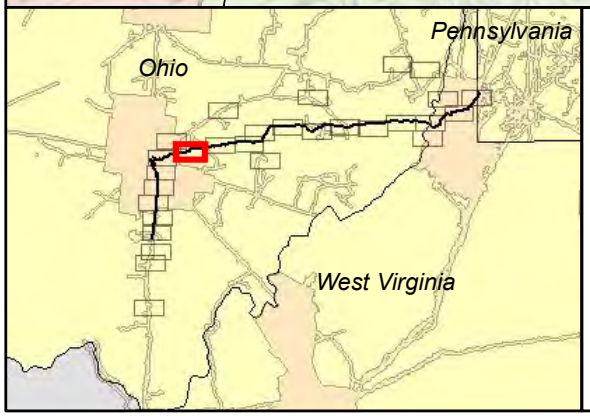
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 11 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



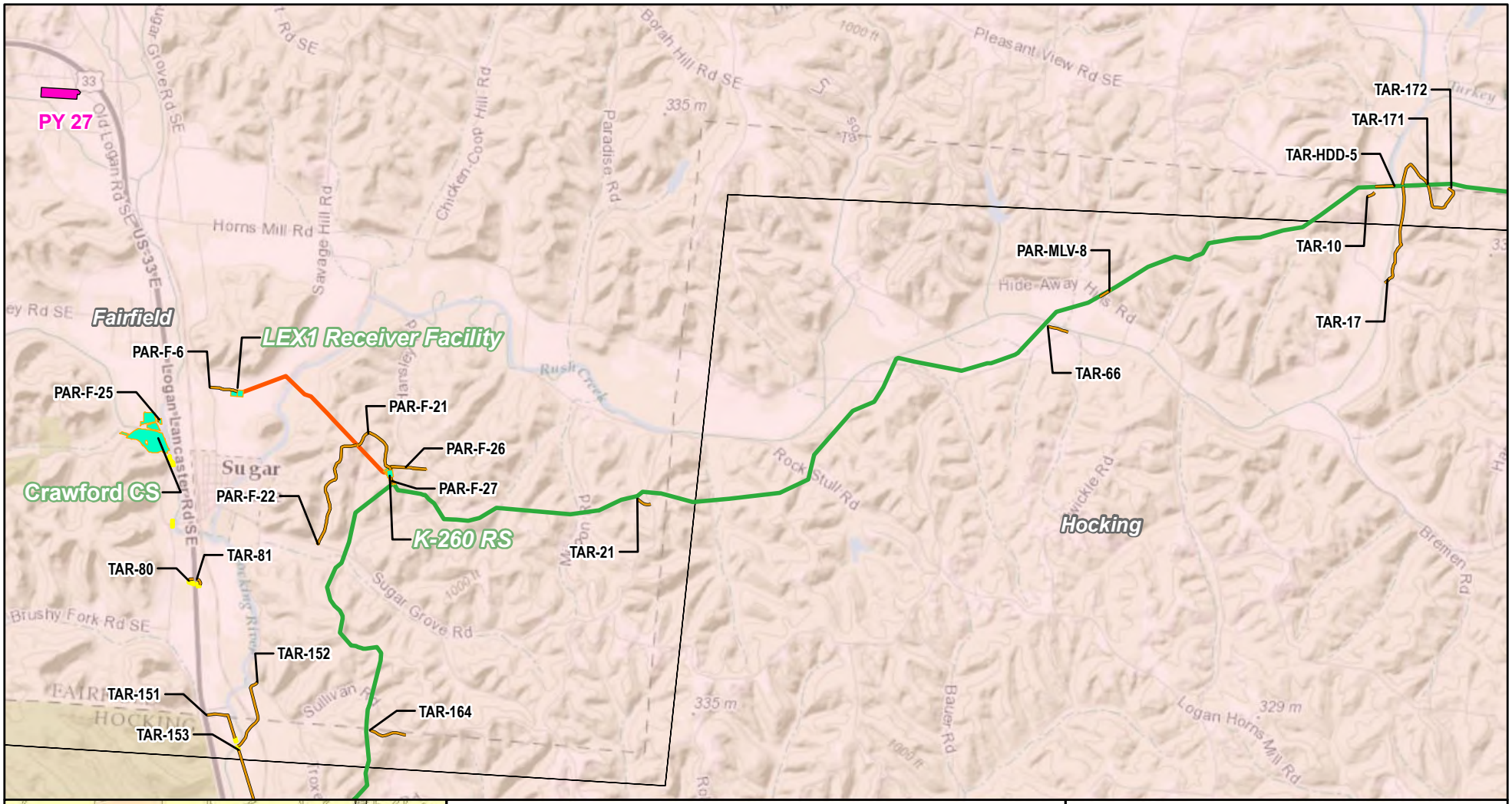


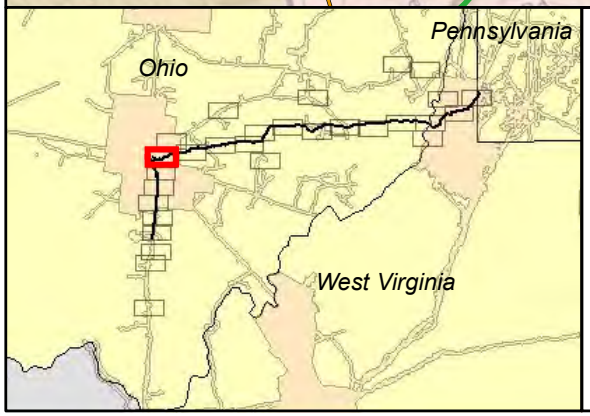
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 12 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



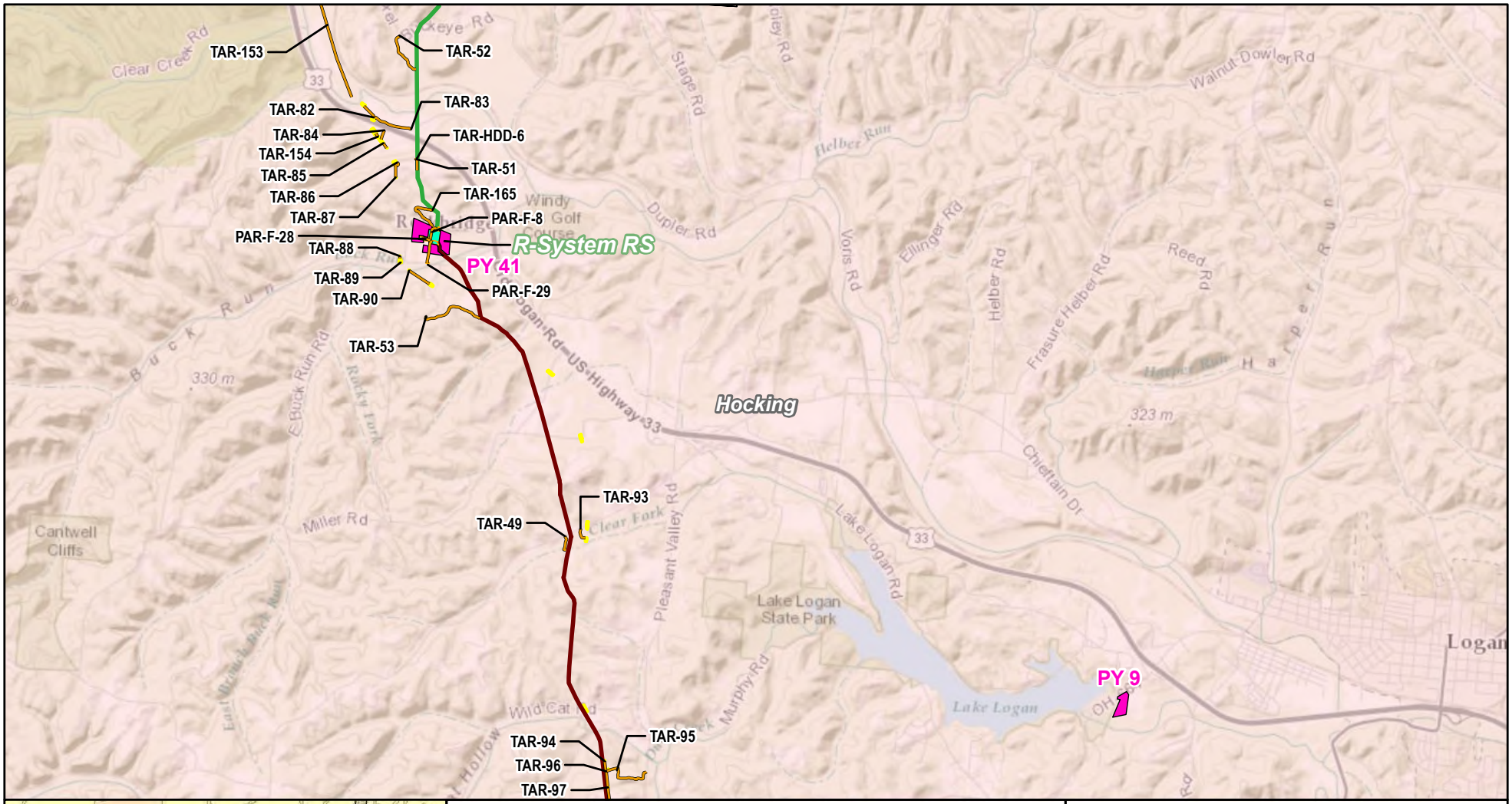


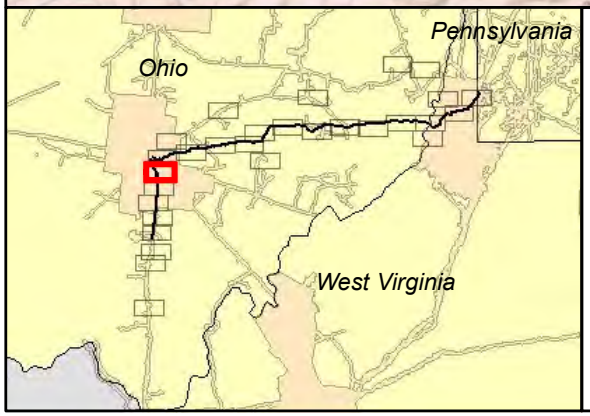
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 13 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



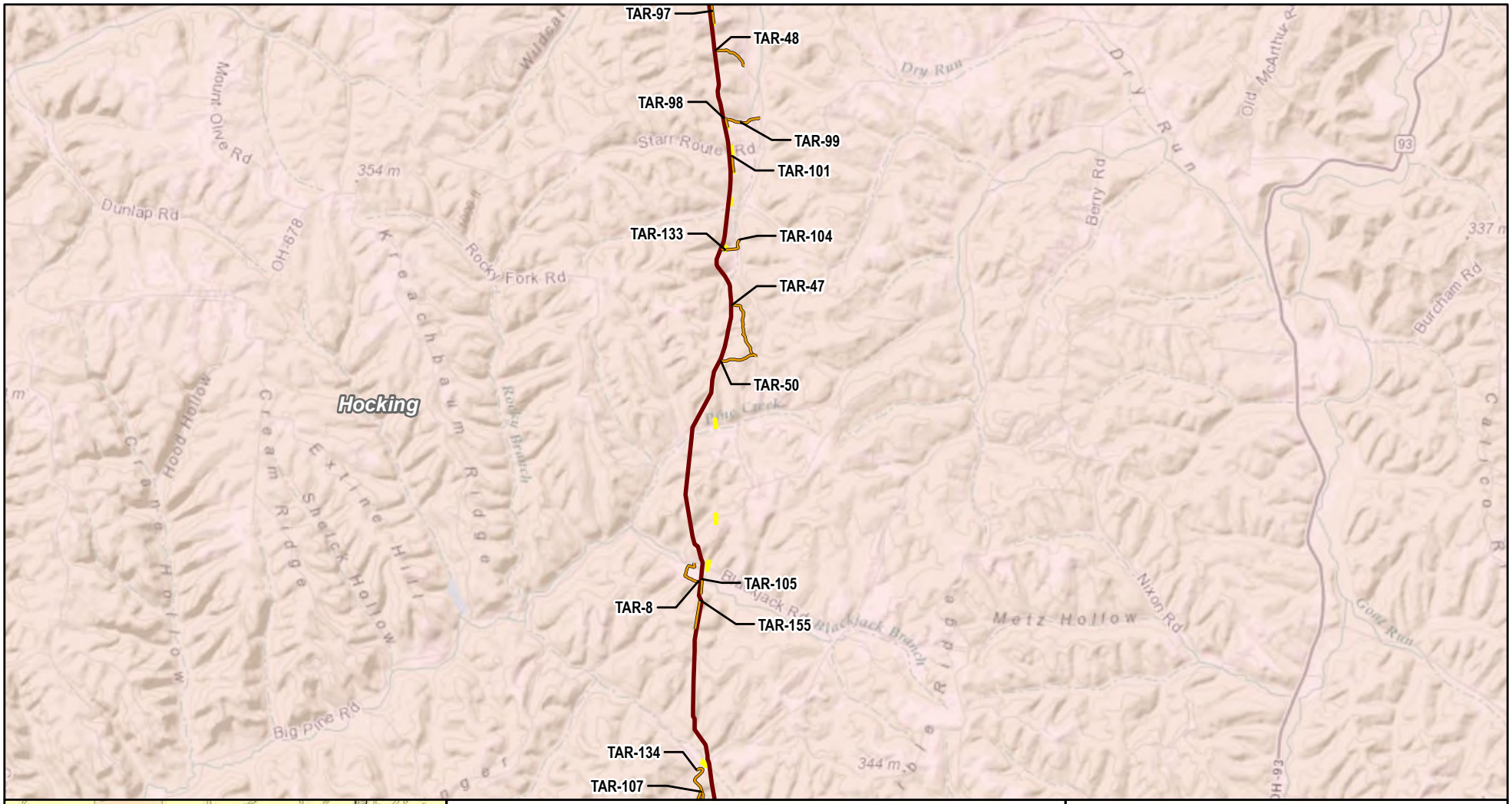


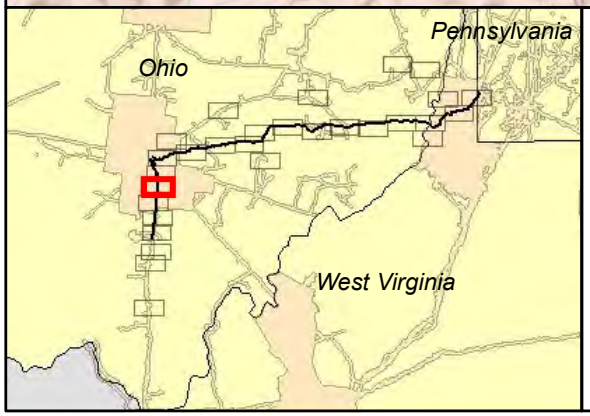
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 14 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016





LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

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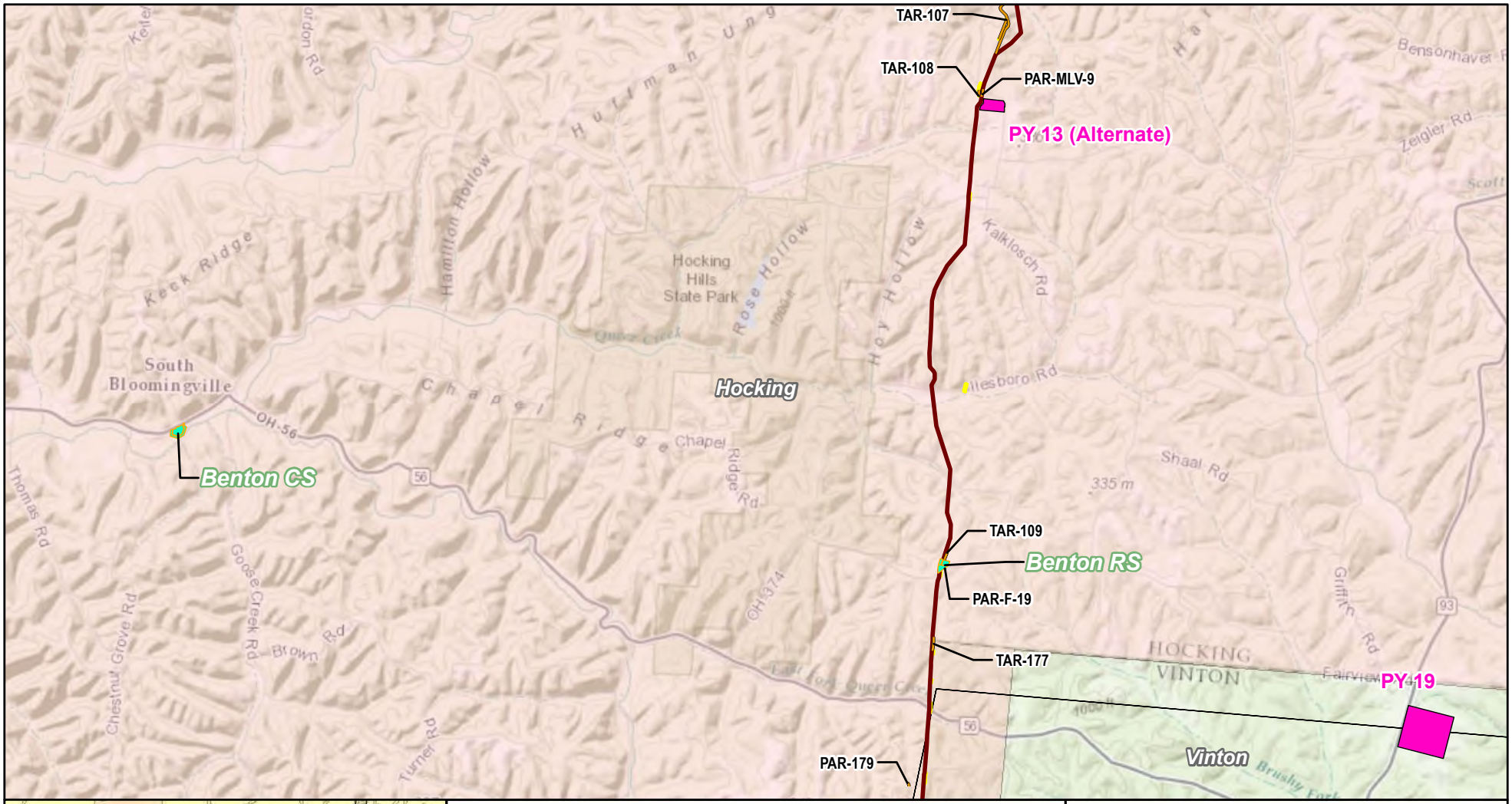
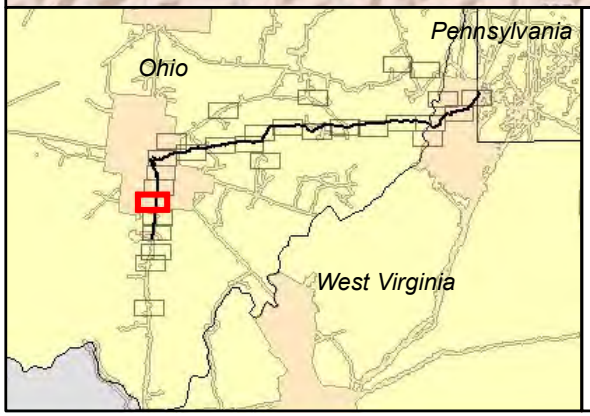
MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 15 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



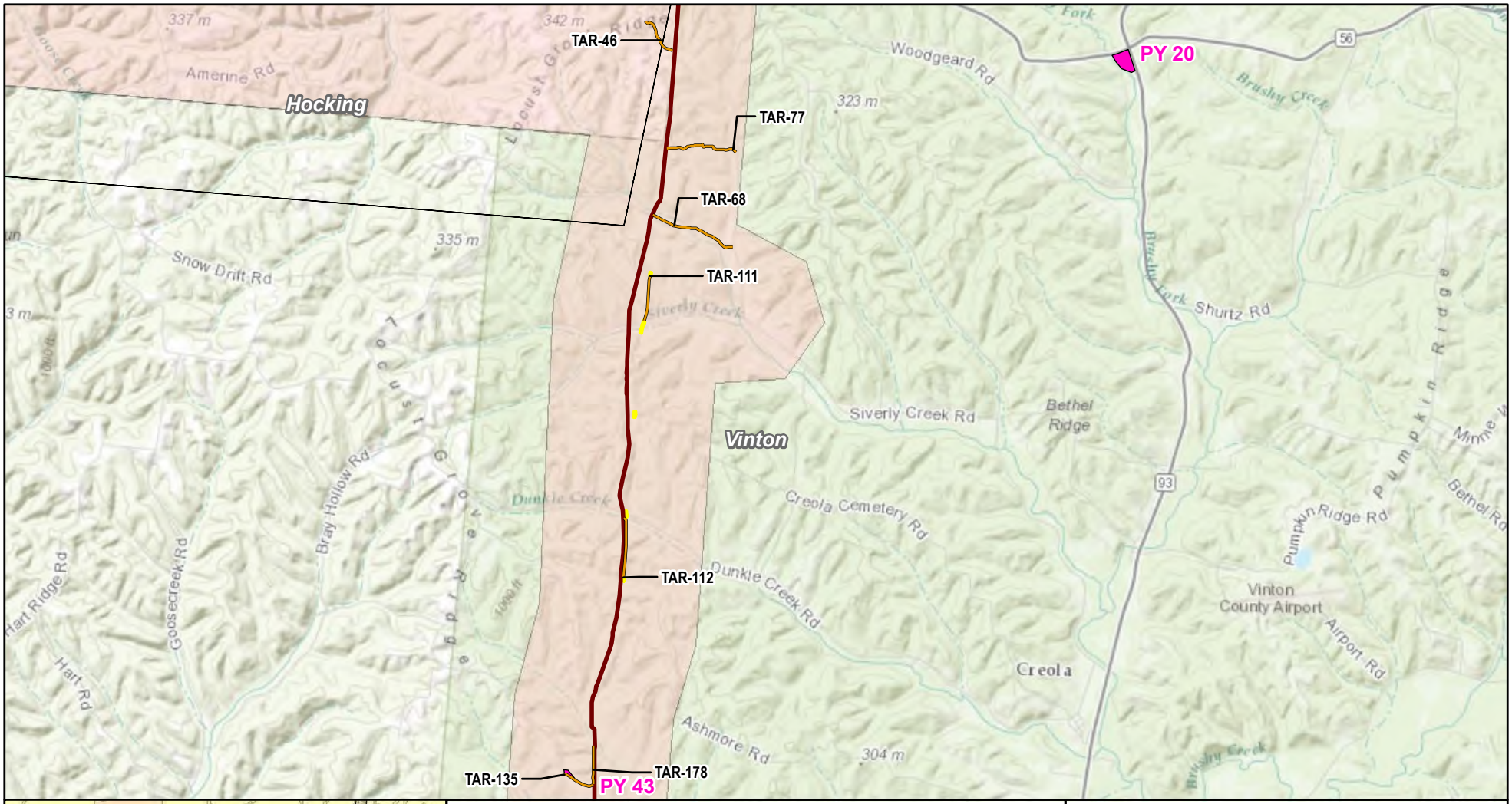


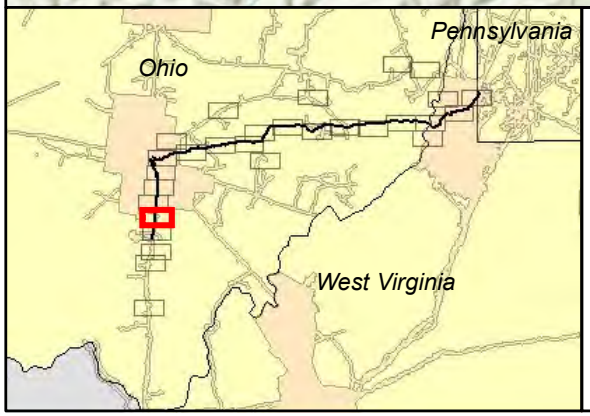
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 16 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016





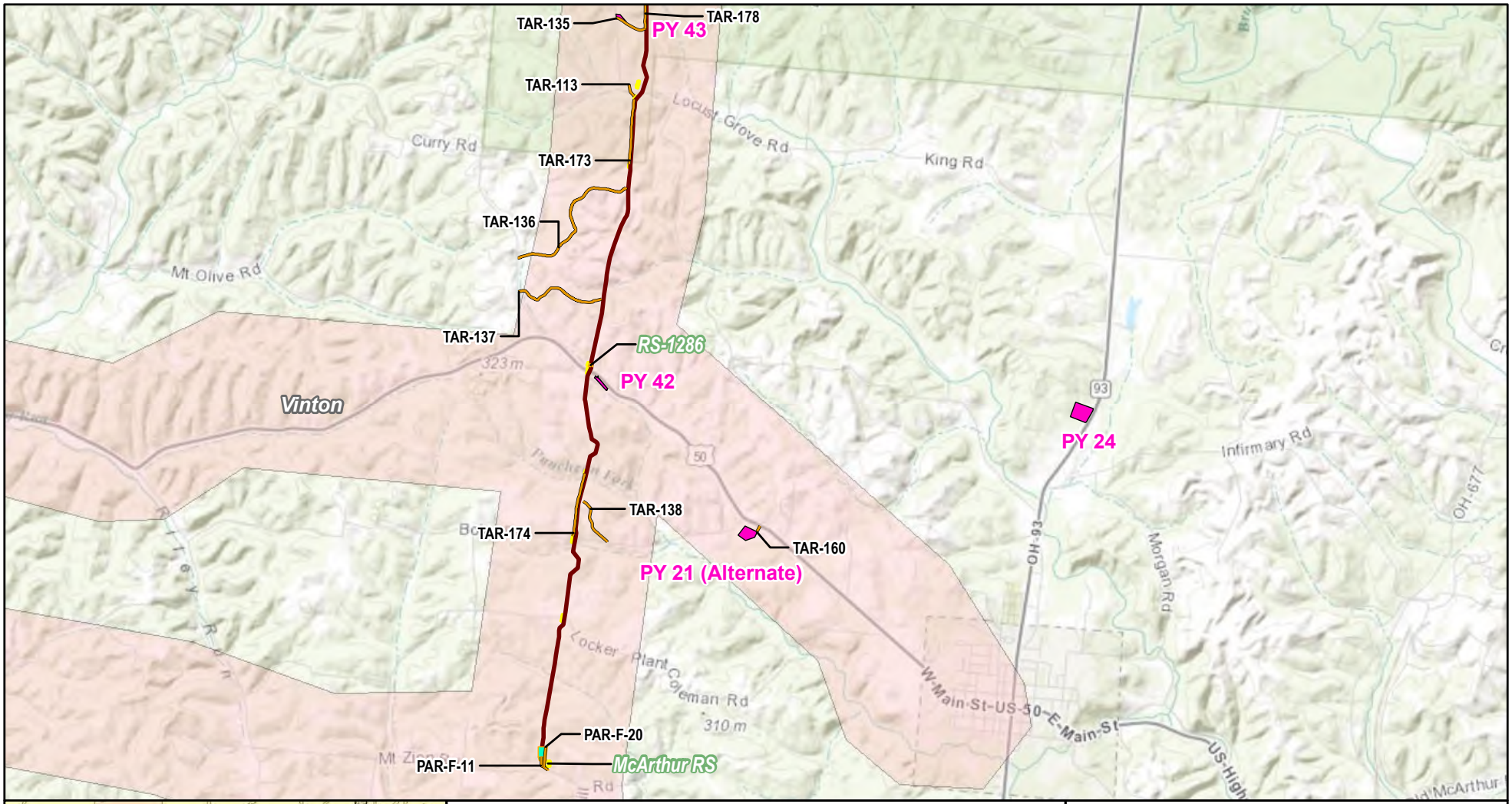
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

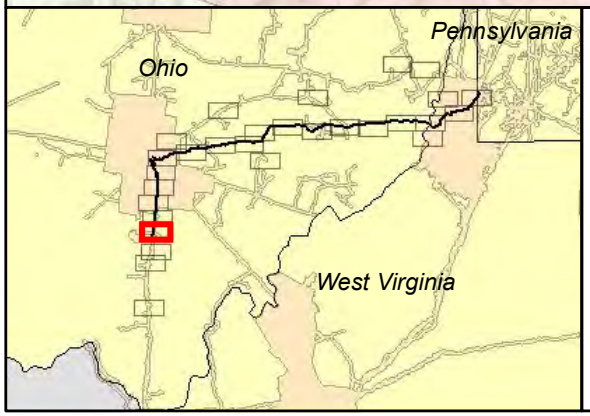
Miles
0 1 2

N

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 17 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



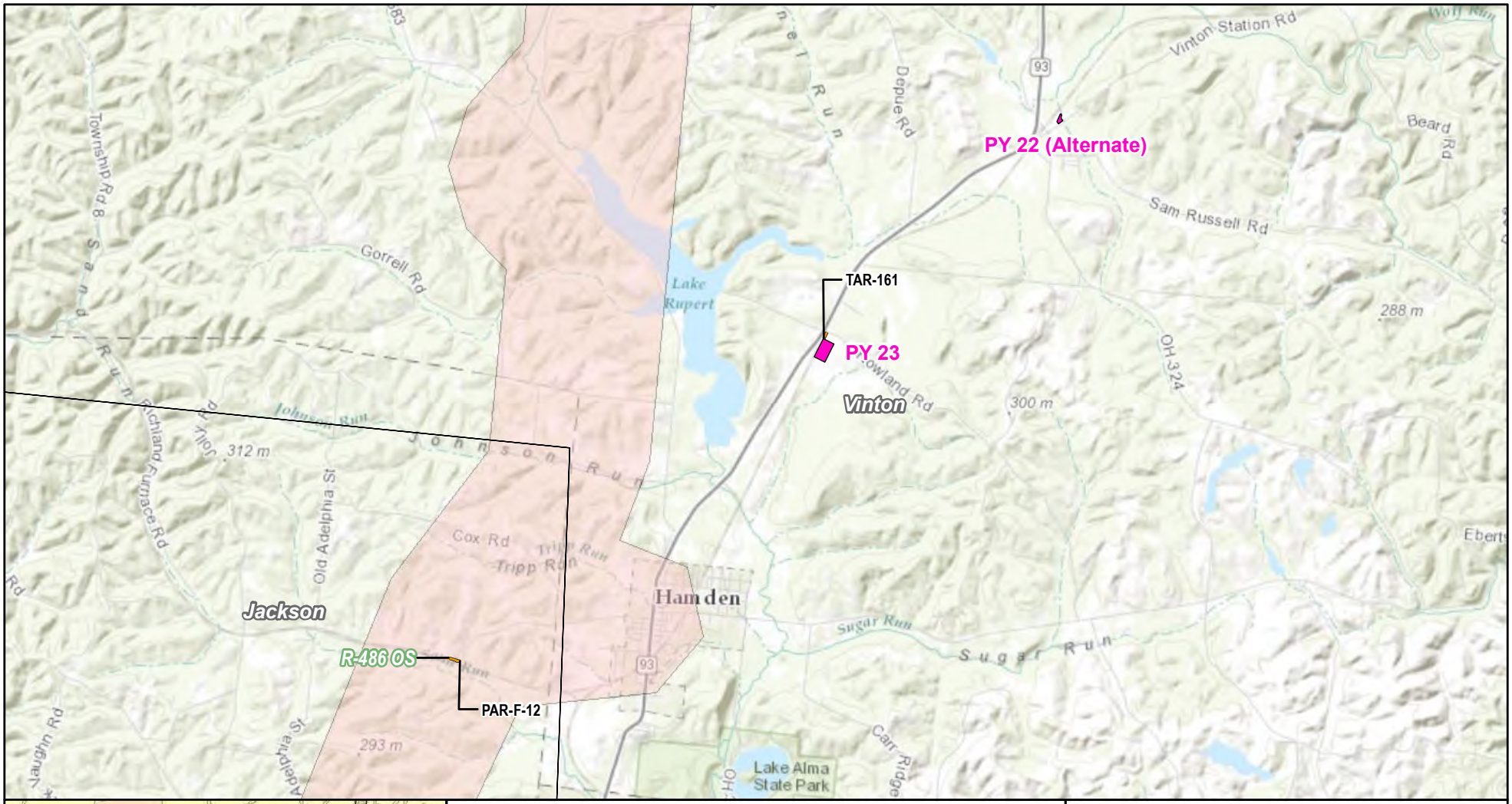


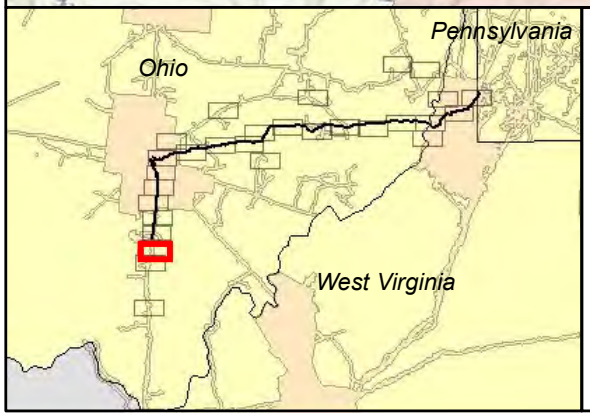
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 18 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



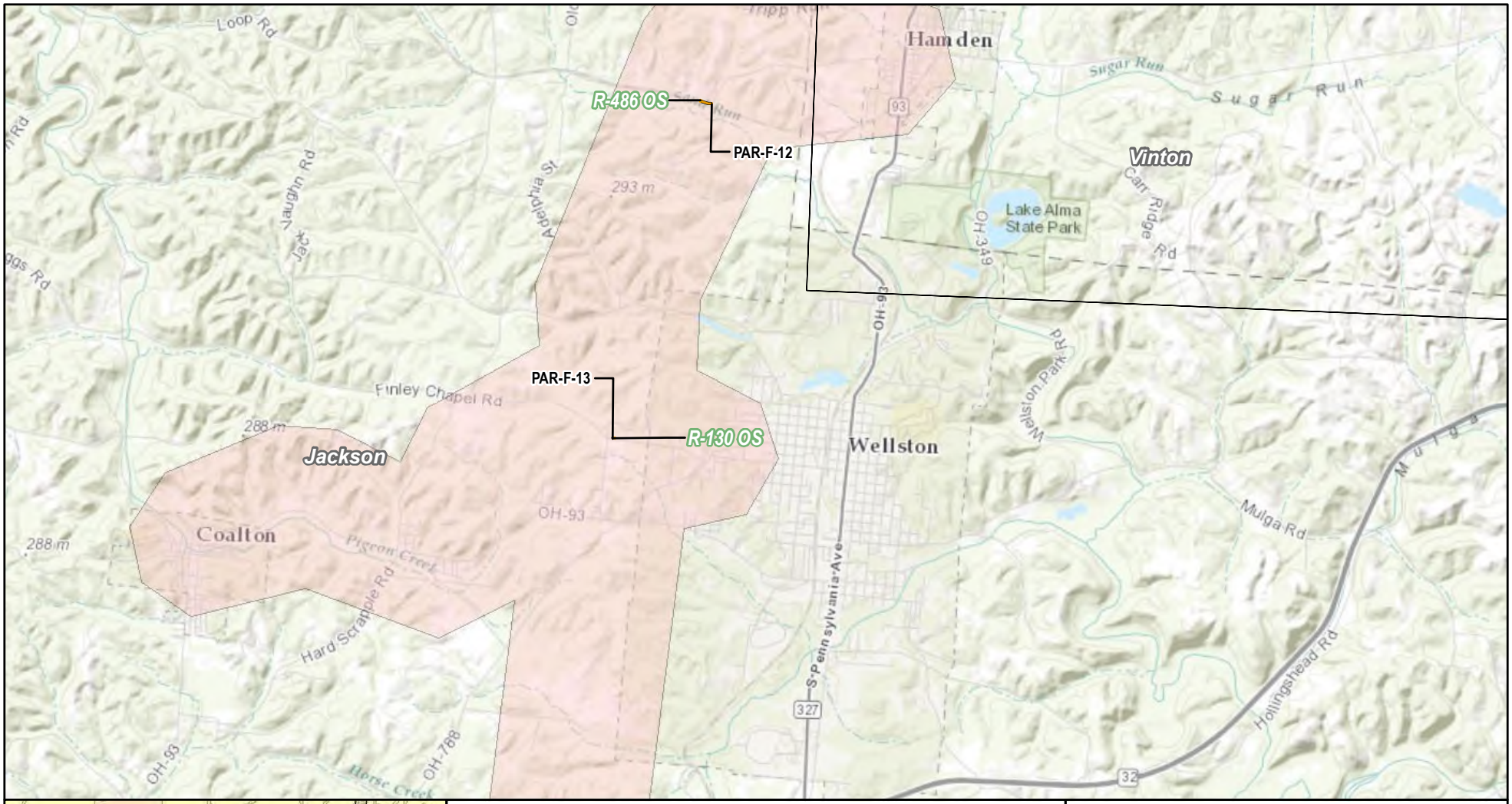


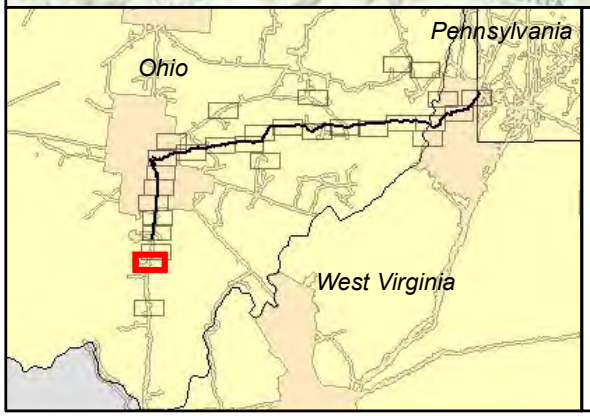
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 19 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



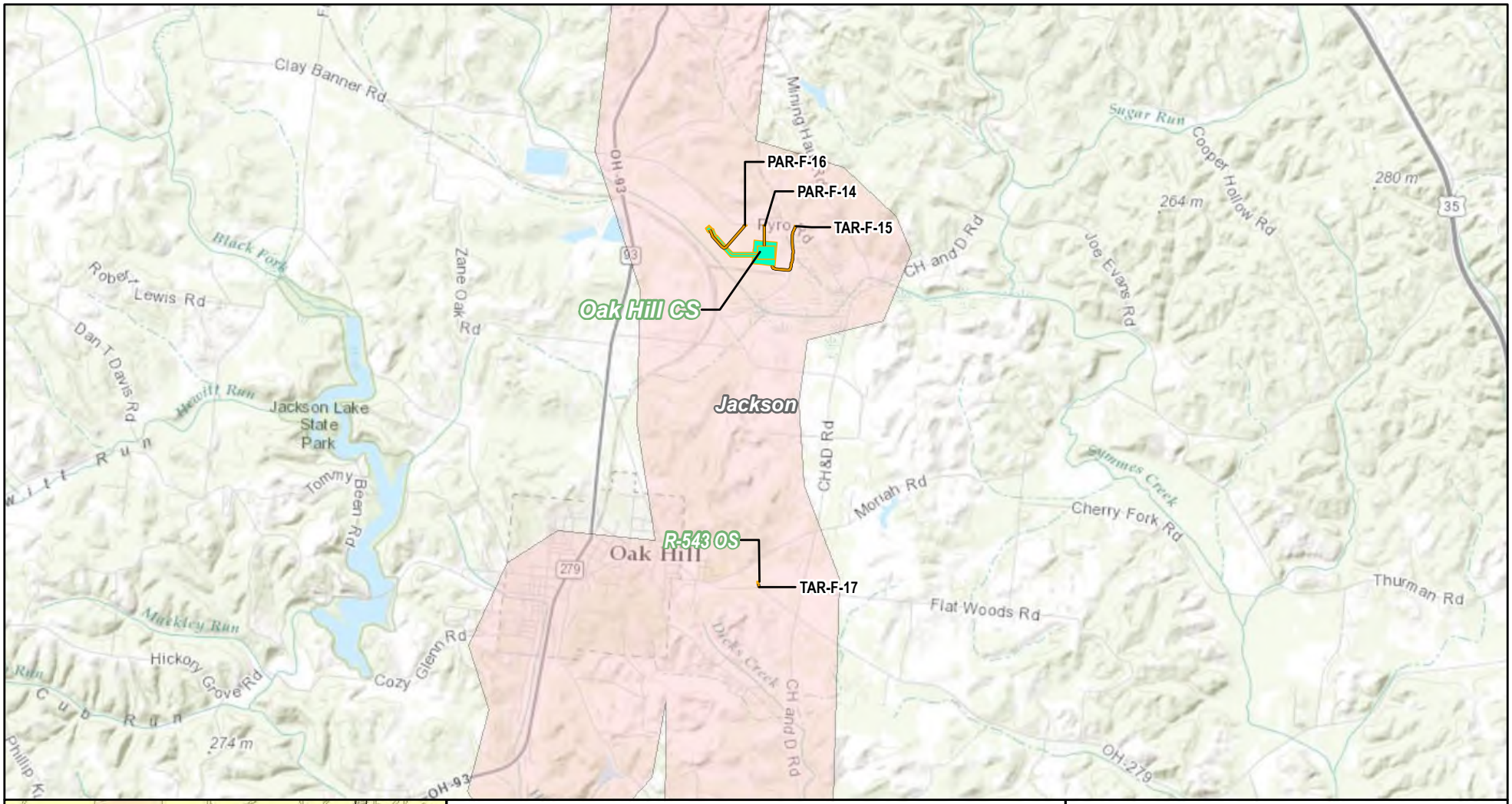


LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

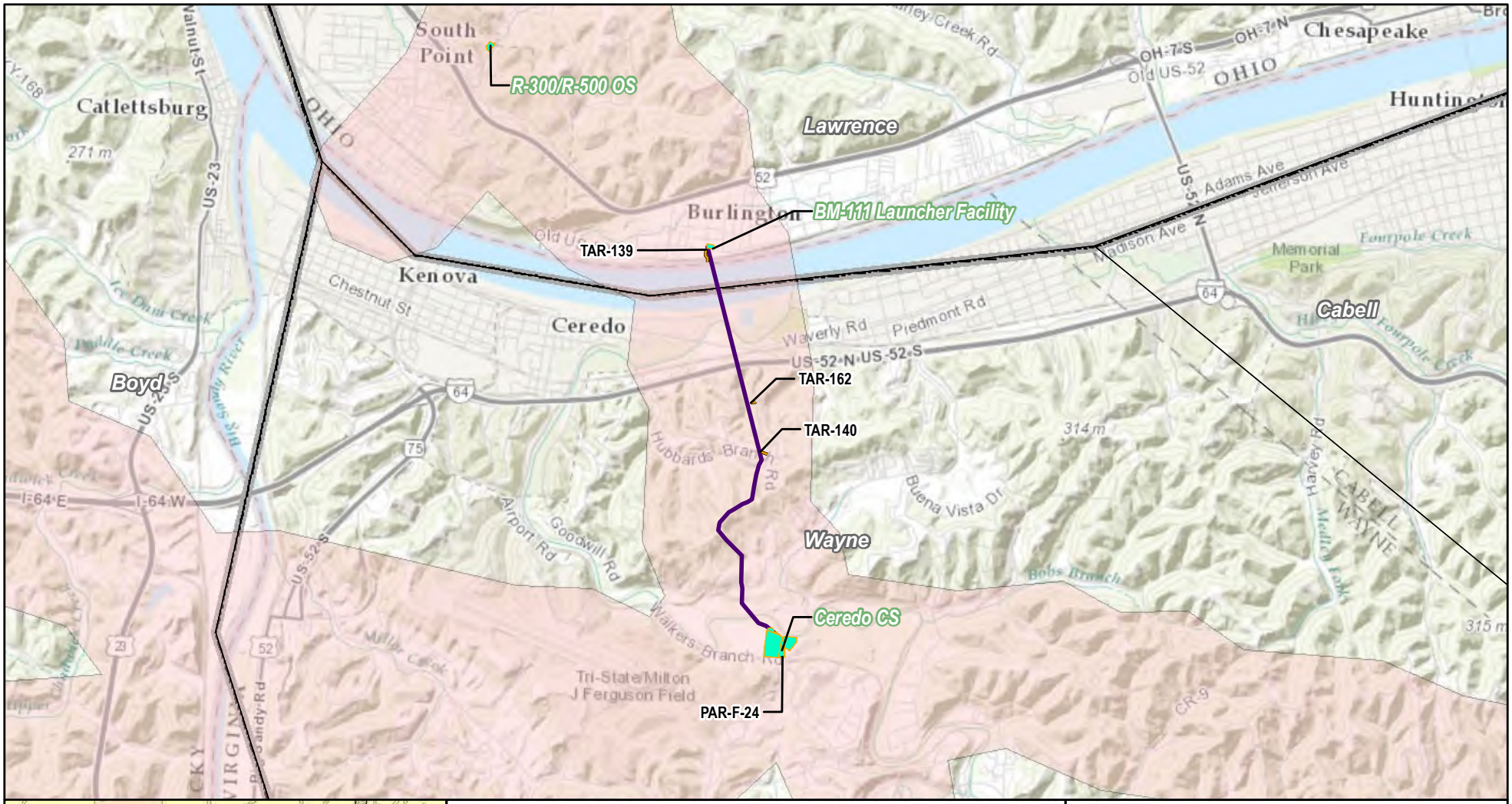
MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

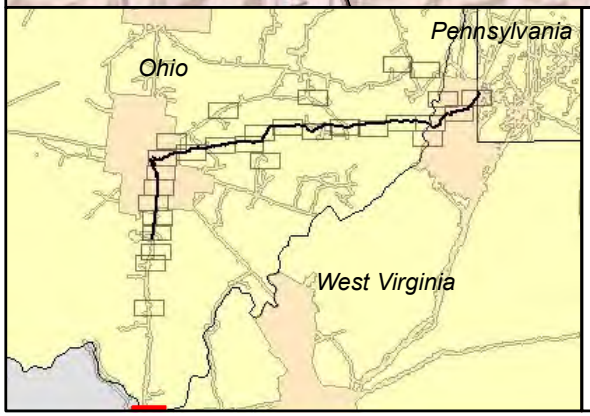
Page 20 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 21 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016





LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

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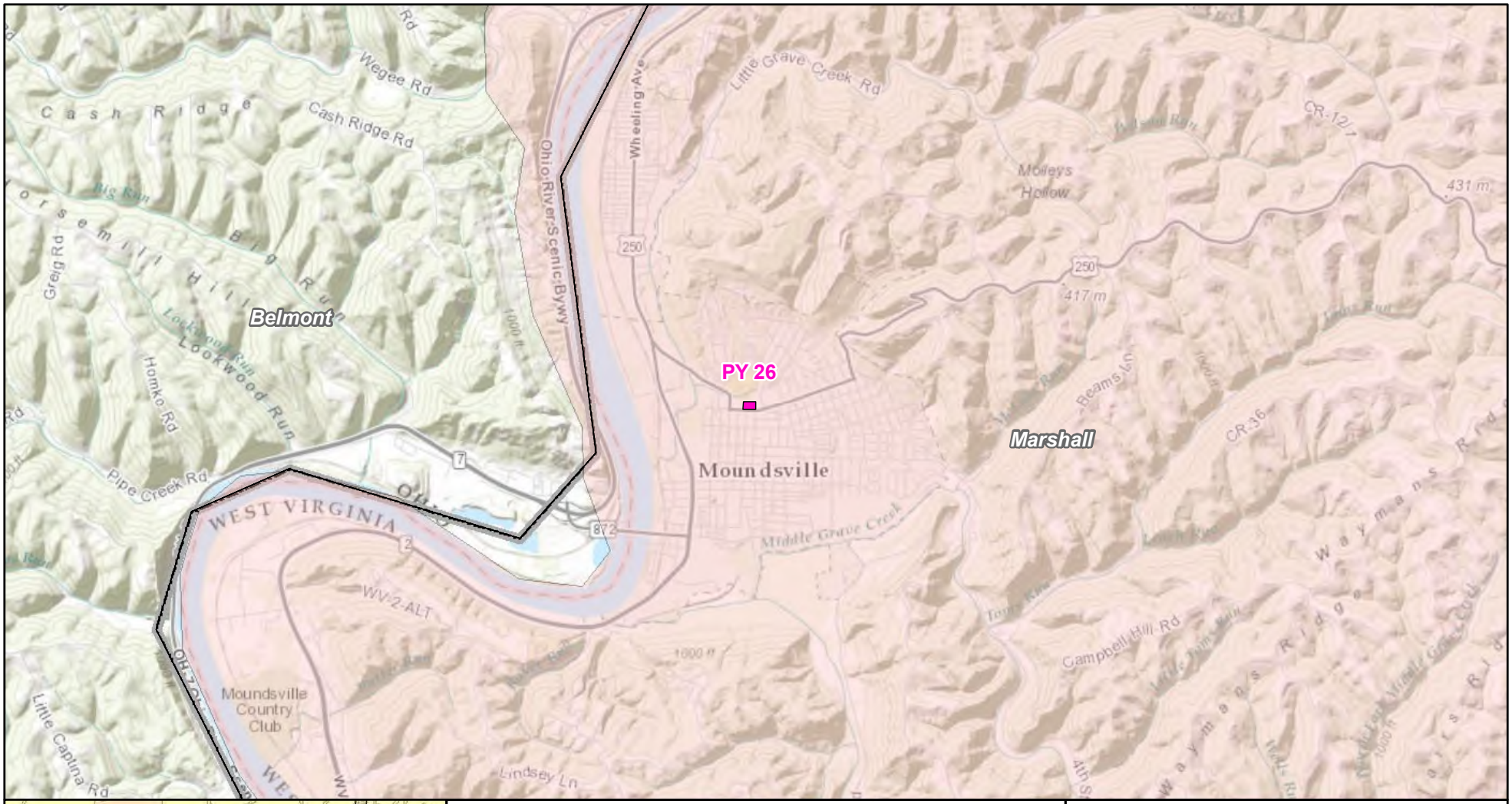
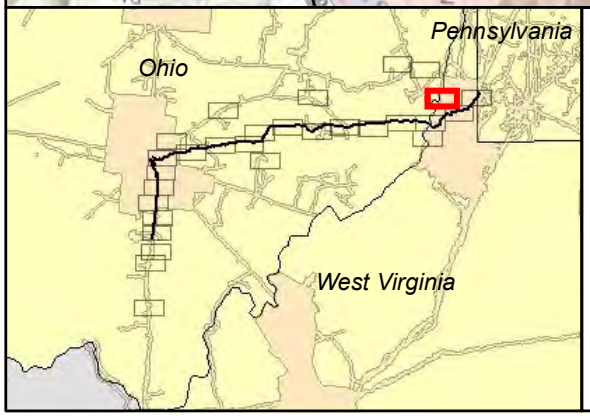
NAD 83 UTM 17 N	Date: March, 2016





LEX
LEX 1
BM-111 Loop
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Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

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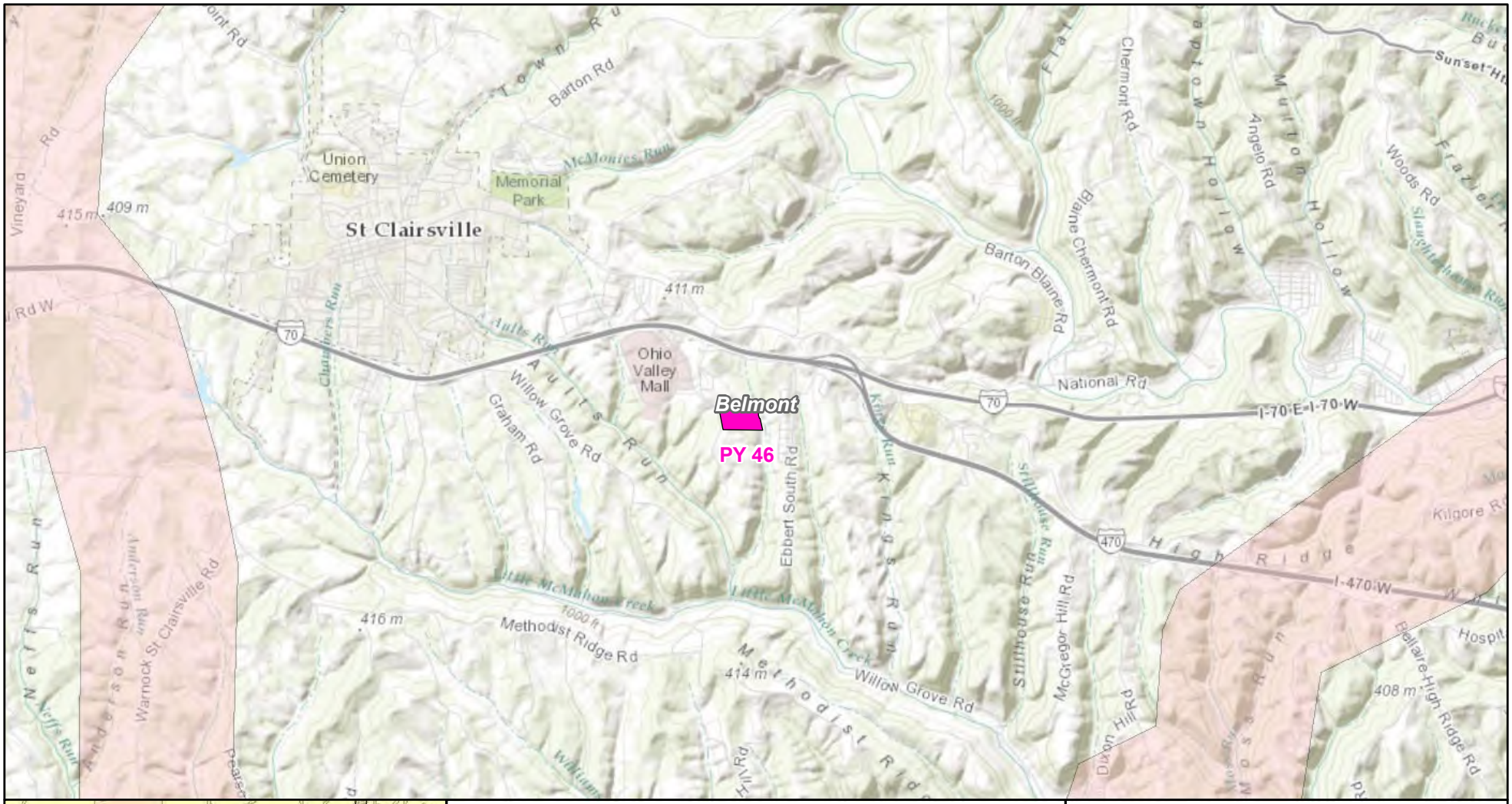
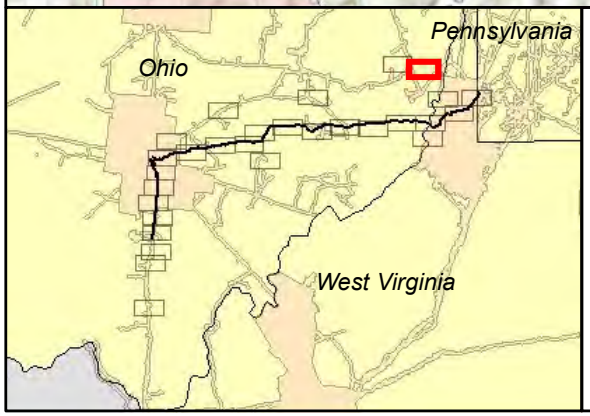
NAD 83 UTM 17 N	Date: March, 2016





LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

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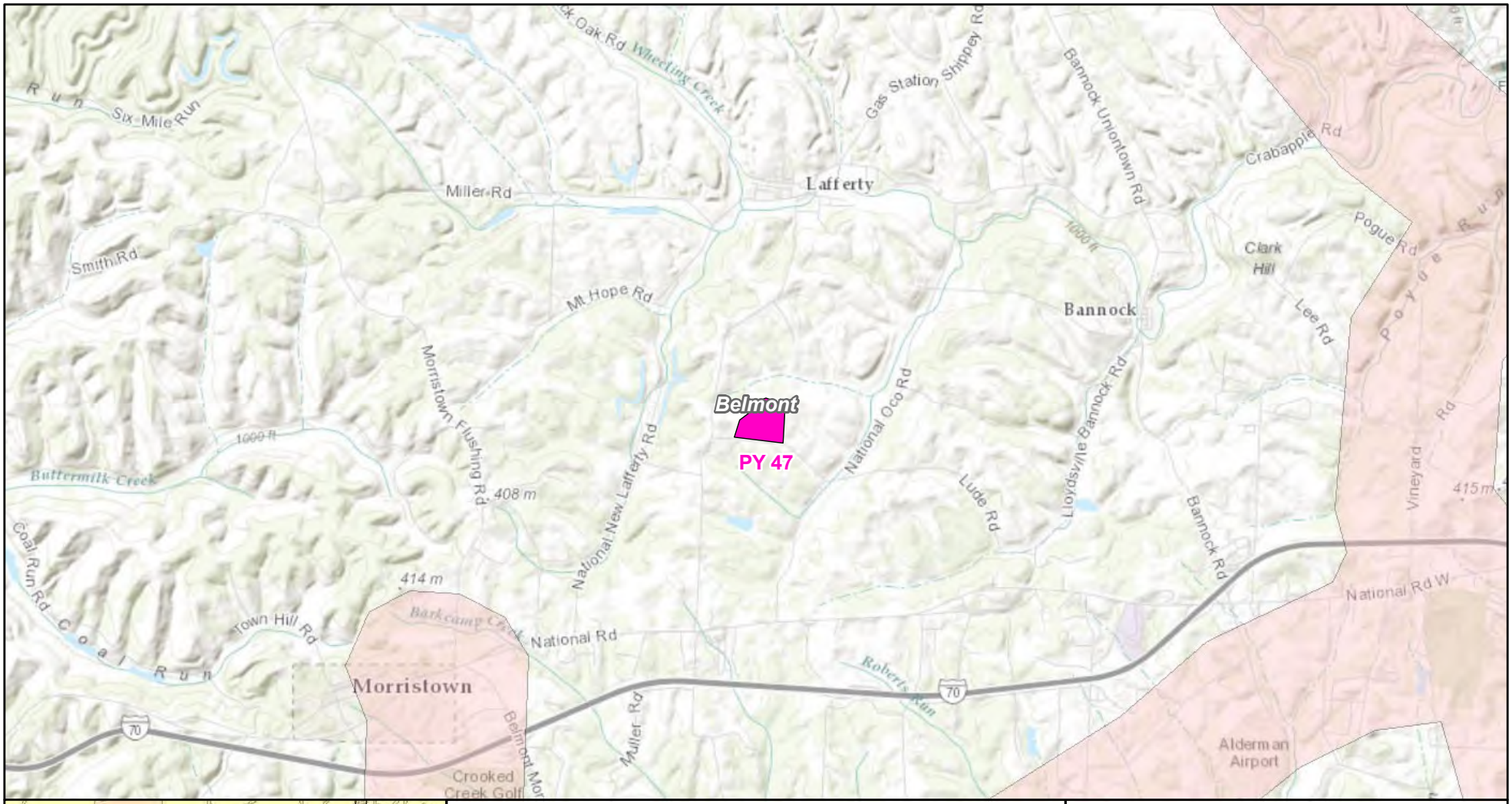
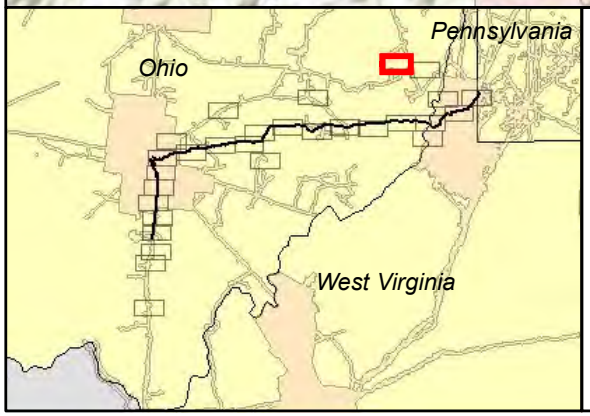
NAD 83 UTM 17 N	Date: March, 2016





LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

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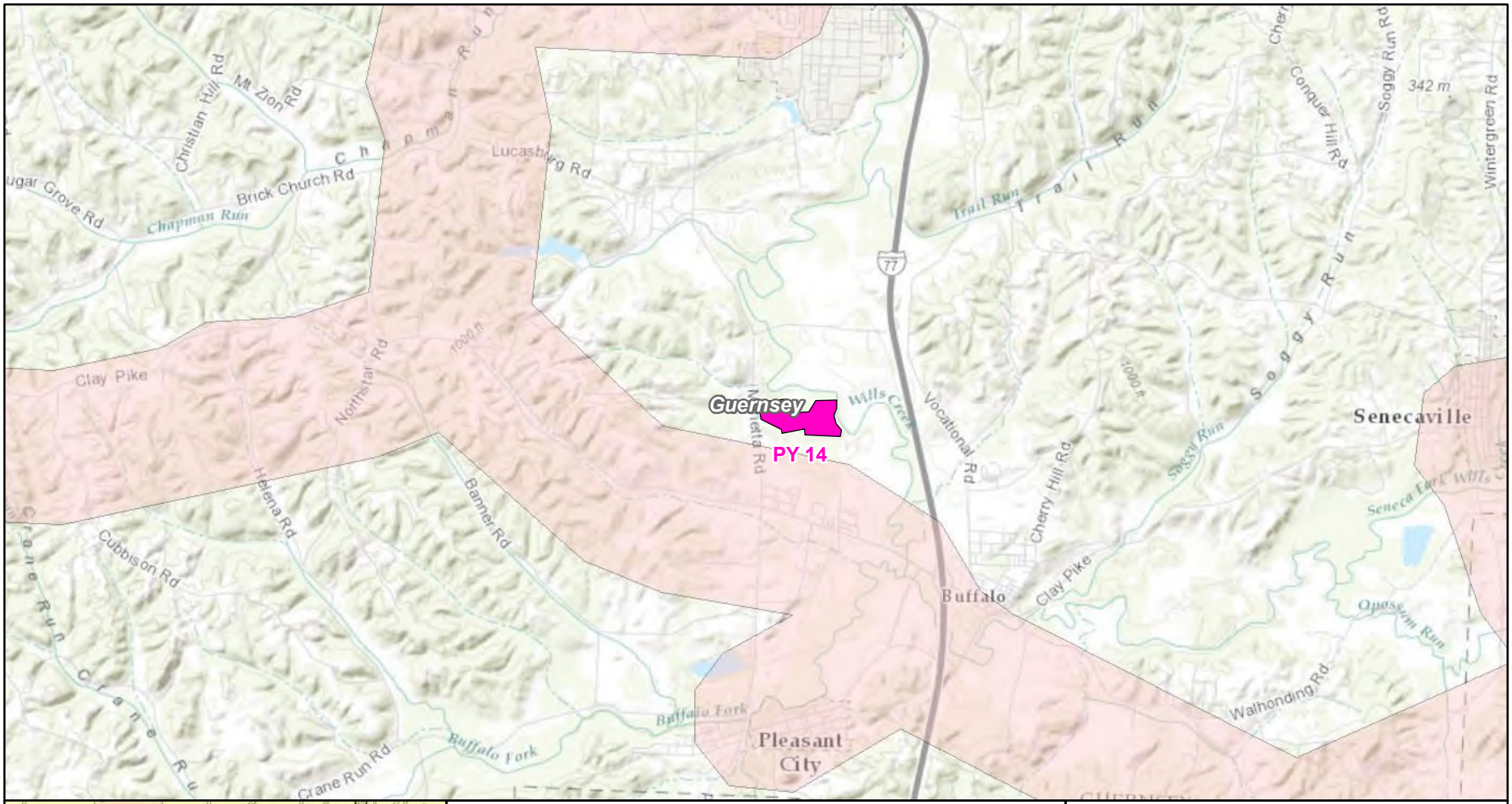

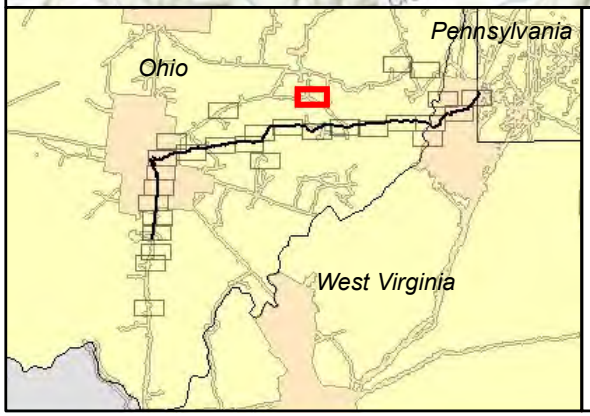

LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

N

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

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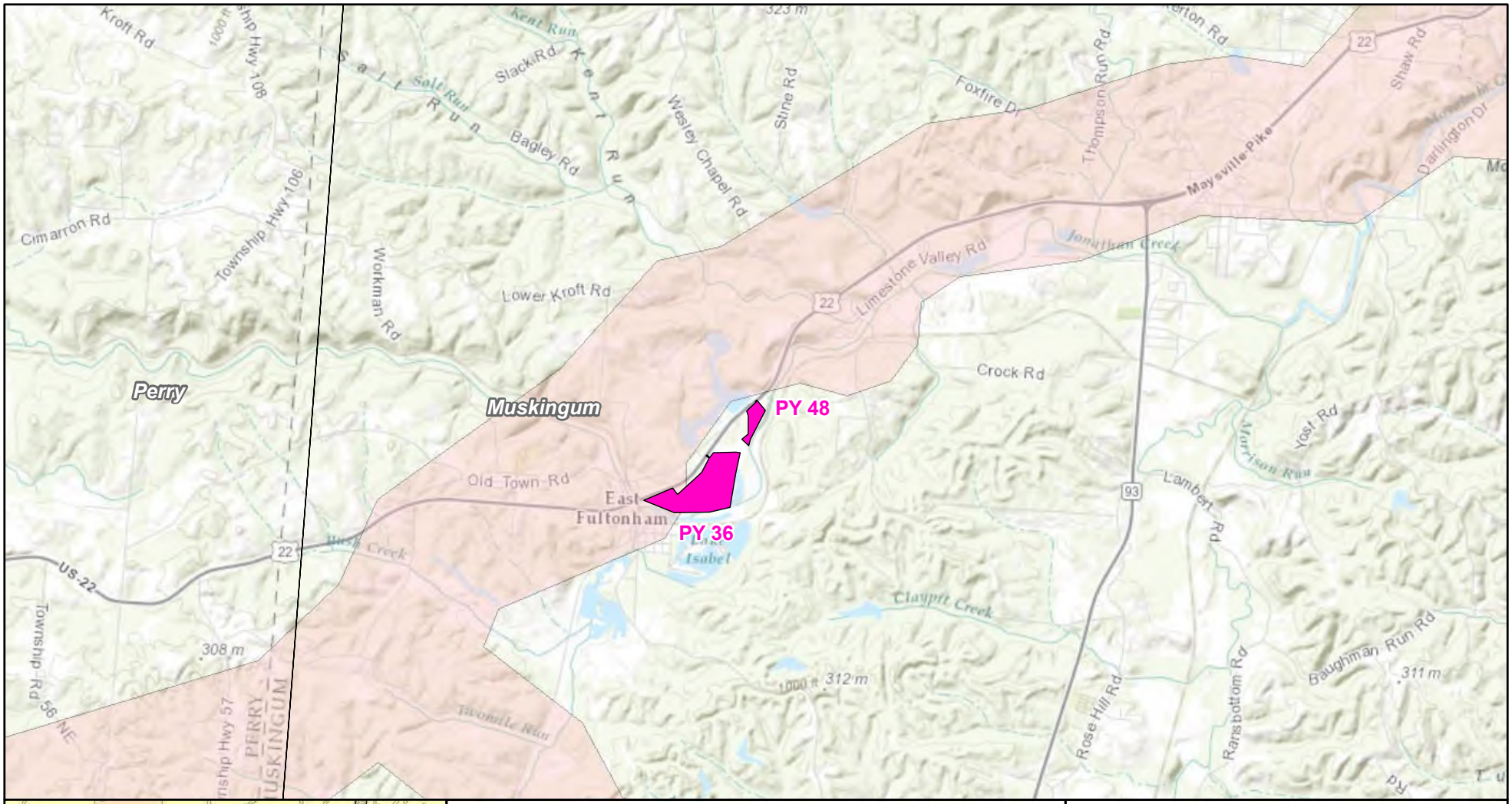
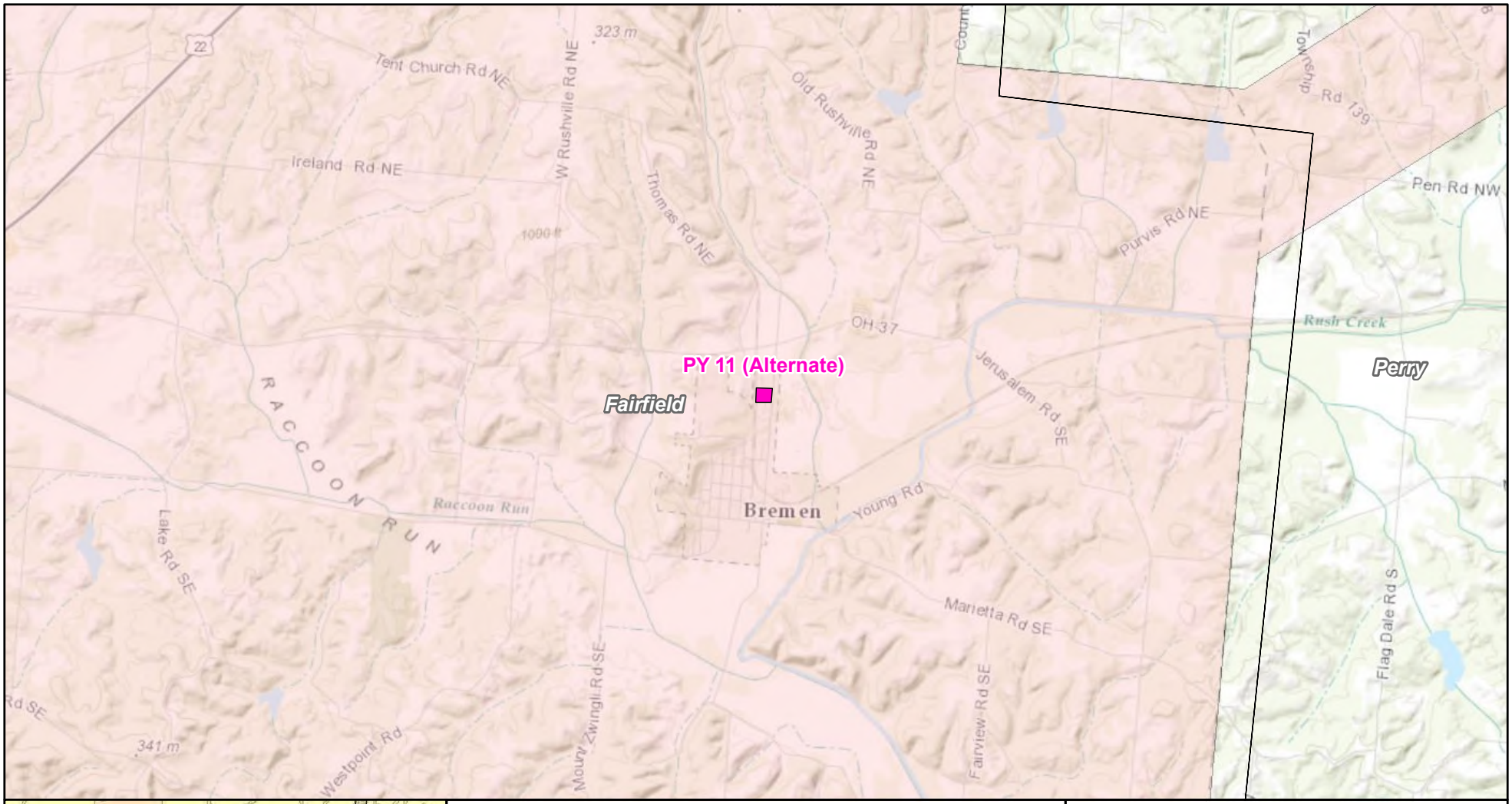
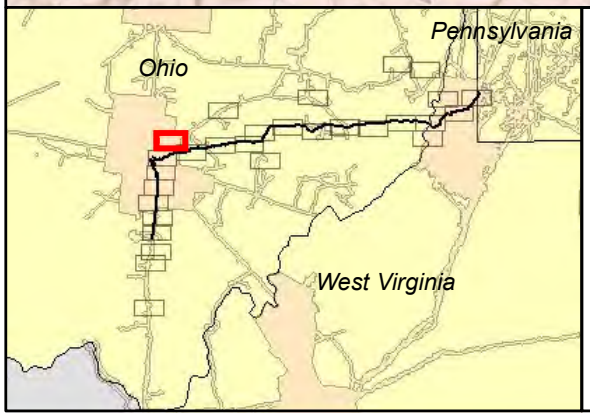
NAD 83 UTM 17 N	Date: March, 2016



MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 27 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016



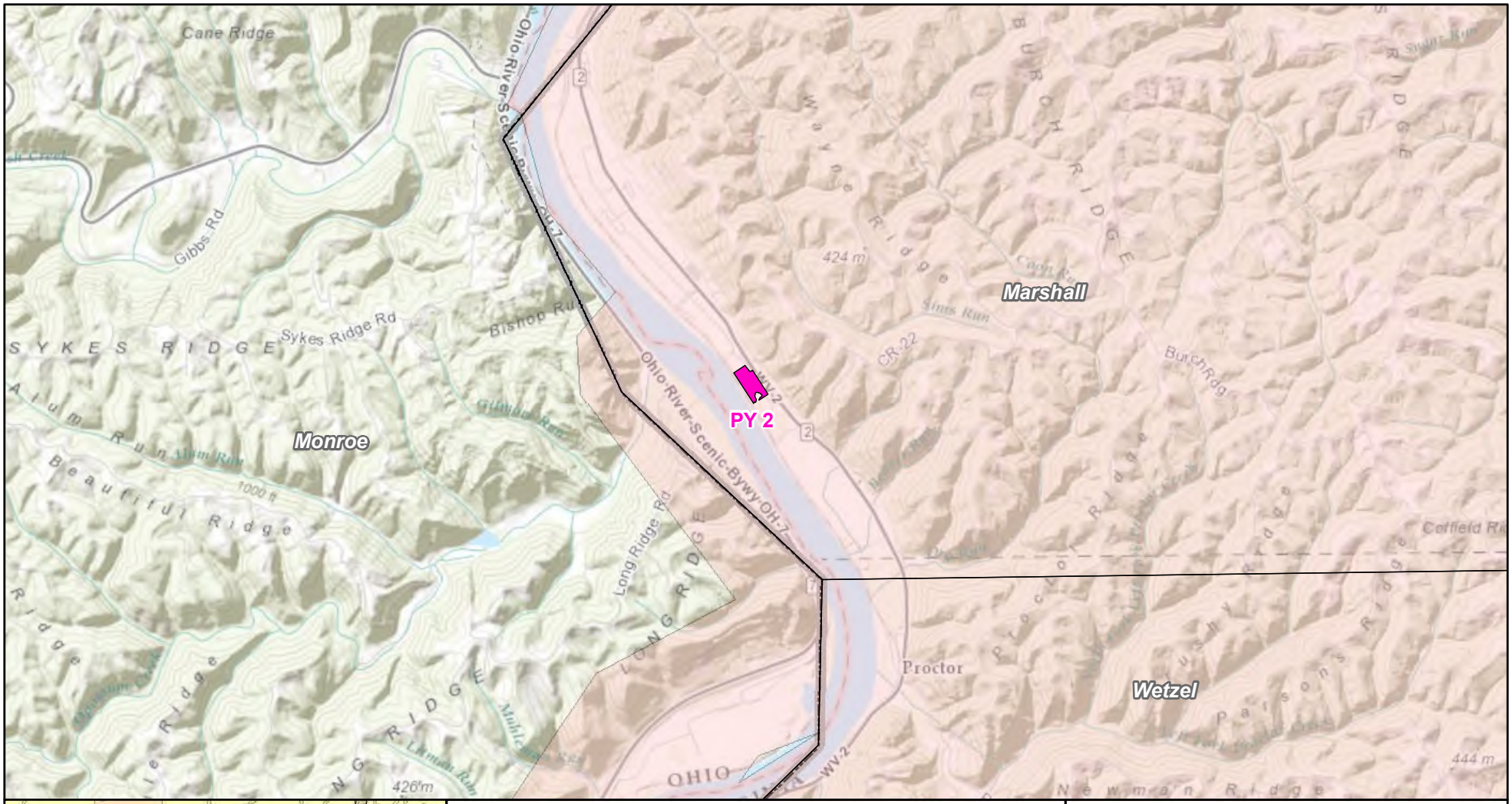


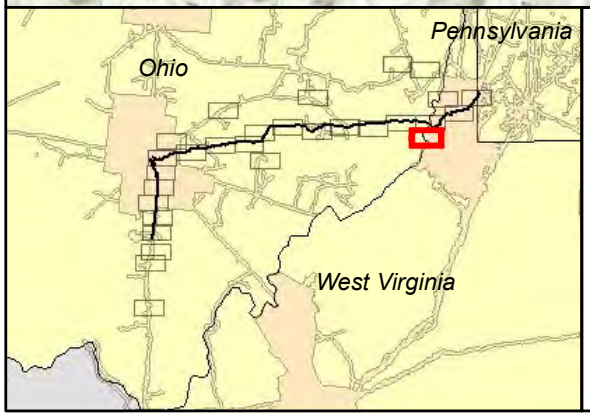
LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

Page 28 of 30	Scale: 1:60,000
NAD 83 UTM 17 N	Date: March, 2016





LEX
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BM-111 Loop
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Pipeyards
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MSHCP Covered Lands
County Boundary
State Boundary

Miles
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MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

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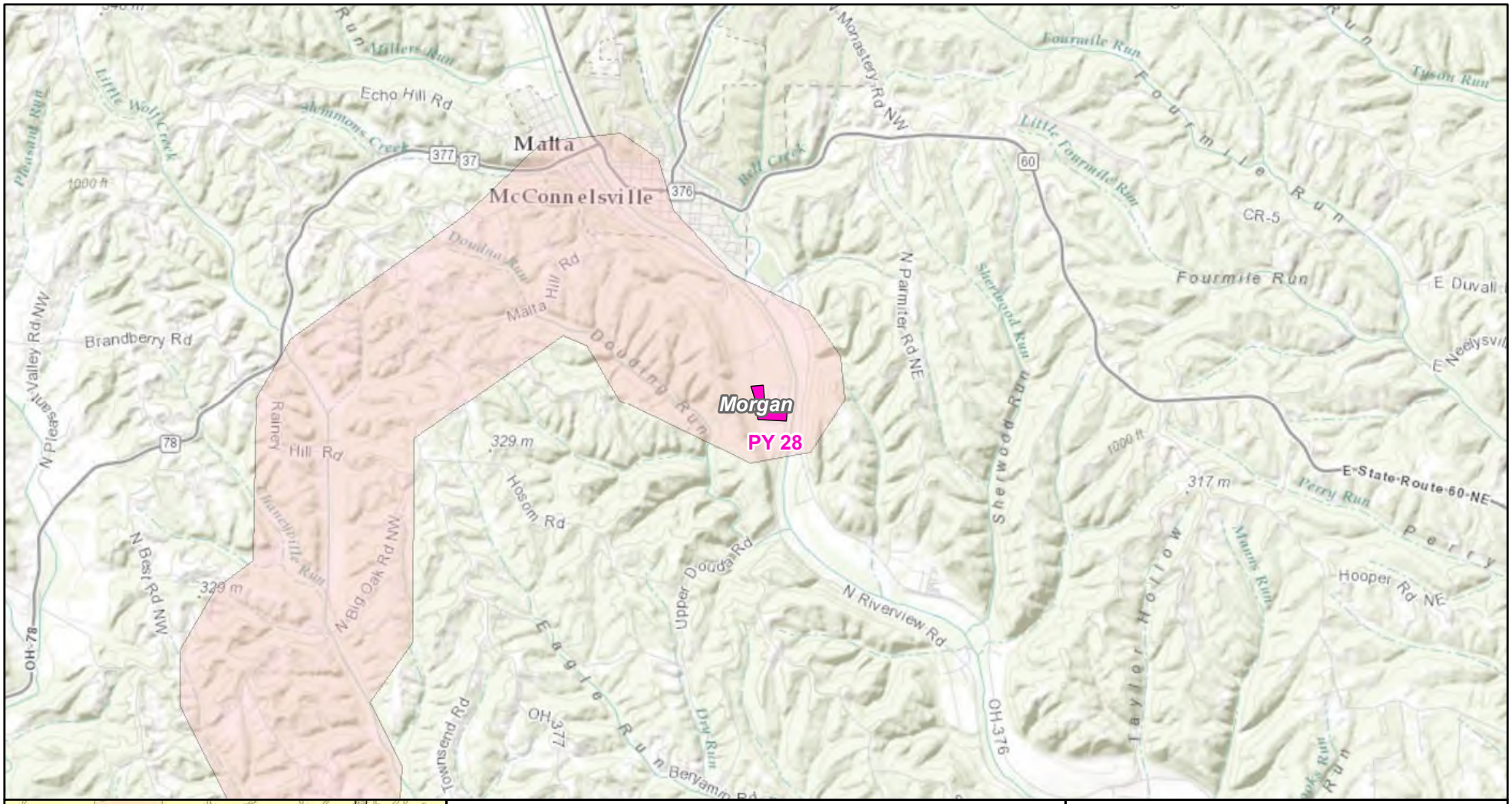
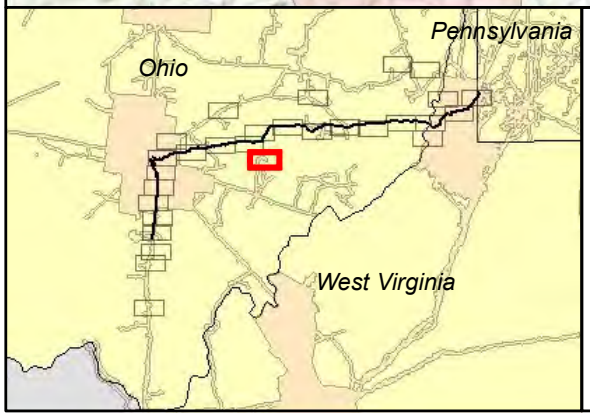
NAD 83 UTM 17 N	Date: March, 2016





LEX
LEX 1
BM-111 Loop
R-801 Loop
Access Roads
R-501 Abandonment Workspace
Pipeyards
Aboveground Facilities
MSHCP Covered Lands
County Boundary
State Boundary

0 1 2 Miles

MSHCP Coverage Map
Leach XPress Project
Columbia Gas Transmission, LLC
Pennsylvania, West Virginia, & Ohio

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APPENDIX M-4
Interagency Endangered Species Act Consultation Checklist for the Rayne XPress Expansion Project

INTERAGENCY ENDANGERED SPECIES ACT CONSULTATION CHECKLISTFOR THE NISOURCE MULTI-SPECIES HABITAT CONSERVATION PLAN

APPLICANT SECTION

ACTION AGENCY (Recipient): Federal Energy Regulatory Commission

OTHER INVOLVED FEDERAL AGENCIES: U.S. Army Corps of Engineers, and US Fish and Wildlife Service

PROJECT NAME: Rayne XPress Expansion

PROJECT I.D. NO. (if applicable): _____

NiSource and Columbia Pipeline Group (Columbia) has provided the attached documentation to involved federal agencies in accordance with "Project Review and Documentation Protocols" of the NiSource/Columbia Pipeline MSHCP Consultation Implementation Guidance [4]. This documentation describes if and how the project is covered by the NiSource Multi-Species Habitat Conservation Plan (MSHCP), programmatic biological opinion (BO), and/or programmatic concurrence letters. In addition, the action agency could refer to the following sections and/or pages of the MSHCP, BO, and/or concurrence letters to verify that the activity is covered by the MSHCP and associated Section 7 consultation under the Endangered Species Act (ESA):

Reference:

- NiSource MSHCP Chapter 2.3 Covered Lands (pp 2-11)
- NiSource MSHCP Chapter 2.4 Covered Activities (pp 11- 25)
- NiSource/Columbia Pipeline MSHCP Consultation Implementation Guidance Quick Reference for Species Consultation Categories (pp 5-6)
- NiSource/Columbia Pipeline Group's, "Habitat Conservation Program Best Management Practices Guidebook", v.1.0, March 12, 2014 (specific pages for each species are referenced in the attached application material)

By signing below, Columbia certifies that its proposed activity, as outlined in the accompanying application or notification, is consistent with the MSHCP, BO, and/or concurrence letters.

_____ _____

Columbia Pipeline representative Date

☐ By checking the box, Columbia is notifying the involved federal agencies that the proposed activity will require additional ESA Section 7 consultation because part of the activity may include: (1) any of the 10 Likely to Adversely Affect (LAA) species that are not included in the MSHCP[5], (2) species not addressed in the MSHCP, BO, or concurrence letters[5], (3) non-covered activities, (4) activities outside of the covered lands, or (5) activities otherwise deviating from the MSHCP, BO, and/or concurrence letters. Additional biological information about the species, habitat, or effects of the action may be required. The federal agencies can contact the U.S. Fish and Wildlife Service's NiSource/Columbia MSHCP Implementation Coordinator (Karen Herrington, 850.348.6495, karen_herrington@fws.gov) for more information.

[4] See NiSource/Columbia Pipeline MSHCP Consultation Implementation Guidance. February 13, 2014. Pg 11.

[5] See NiSource/Columbia Pipeline MSHCP Consultation Implementation Guidance. February 13, 2014. Pg. 5.

FEDERAL AGENCY SECTION

This checklist serves as the official documentation that each action agency involved has completed its Section 7 responsibilities under the ESA for NiSource and Columbia Pipeline Group (Columbia) projects conducted as described in the MSHCP, BO, and/or concurrence letters. Every agency that receives a copy of this checklist should fill it out. The MSHCP, BO, and concurrence letters can be found on the U.S. Fish and Wildlife Service (FWS) NiSourcewebsite:

http://www.fws.gov/midwest/endangered/permits/hcp/nisource/index.html

Quick access to the required Avoidance and Minimization Measures (AMMs) and Best Management Practices (BMP) can be found in the Columbia BMP Guidebook, which is also posted on the above website.

1. Does the federal action occur entirely within the covered lands as described in the MSHCP?

_X_____Yes. Go to #2.
_____No. Additional consultation is required because the action is not consistent with the MSHCP, BO, and/or concurrence letters. If the project may affect listed species, contact your local FWS Field Office.

2. Is the proposed action as described in the MSHCP, programmatic BO, and/or concurrence letter?

_X_____Yes. Go to #3.
_____No. Additional consultation is required because the action is not consistent with the MSHCP, BO, and/or concurrence letters. If the project may affect listed species, contact your local FWS Field Office.

3. Does the proposed action pose any effects on species not included in the MSHCP, BO or concurrence letters[5]?

_____Yes. Additional consultation is required because the species was not included in the MSHCP, BO, and/or concurrence letters. If the project may affect listed species not included in the consultation, contact your local FWS Field Office.
_X_____No. Go to #4.

4. Does the proposed action include MSHCP species[6]only?

_____Yes. Go to #6.
_X_____No. Go to #5.

5. Does the proposed action include any of the 10 Likely to Adversely Affect (LAA) species that are not included in the MSHCP (i.e., LAA non-MSHCP species) as addressed in the BO?

_____Yes. Additional consultation is required. Enter into tiered consultation with your local FWS office for any LAA non-MSHCP species.
__X_____No. Go to #6.

[6] See NiSource/Columbia Pipeline MSHCP Consultation Implementation Guidance. February 13, 2014. Pg. 5

6. Are all mandatory AMMs and/or BMPs for each species included in the action?[7]

_X_____Yes. Go to #7.

_____No. Additional consultation is required because the proposed action is not consistent with the MSHCP, BO, and/or concurrence letter. Request additional information from Columbia about AMMs.

7. Are all non-mandatory AMMs and/or BMPs for each species included in the action?

_X_Yes. Consultation is complete because the proposed action is consistent with the MSHCP, BO, and/or concurrenceletter.

_____No. Go to #8.

8. Are reasons provided for not including non-mandatory AMMs for each species?[8]

_____Yes. Consultation iscomplete.

_____No. Request justification from Columbia, and attach documentation here. Once justification is provided, consultation is complete.

It is the federal agency's responsibility to comply with ESA Section 7 requirements for this project. The programmatic BO and/or the concurrence letters cover most of Columbia's activities implemented under the MSHCP within the covered lands. By signing below, the federal agency verifies that the proposed action within the agency's authority complies with the programmatic BO, and/or concurrence letters. If additional Section 7 consultation is required, the U.S. Fish and Wildlife Service's supplemental concurrence letter or biological opinion will be attached to this documentation.

AGENCY COMMENTS:

_____

_____

_____

Joanne Wachholder_____ _____4/6/16___

Federal Agency representative Date

[7] See NiSource/Columbia Pipeline Group's, "Habitat Conservation Program Best Management Practices Guidebook", v.1.0, March 12, 2014.

[8] Per the MSHCP, explanation for non-mandatory AMM use is not required for the Indiana Bat.

APPENDIX N
Extra Workspaces Associated with the Leach XPress Project

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
			LEX			
2066	0.1	100	50	Road crossing	Industrial/ Forest	No
1992	0.1	100	50	Road crossing	Forest	No
2007	0.1	100	50	Stream	Forest	No
2008	0.2	100	50	Stream	Forest	No
1899	0.3	100	50	Stream	Forest	No
2069	0.5	100	50	Stream	Forest	No
2059	0.6	100	50	Parking	Agriculture	No
1993	0.7	100	50	Road crossing	Agriculture/ Industrial	No
1994	0.7	172	50	Road crossing/ Stream	Industrial/ Forest	No
2006	0.7	100	50	Stream	Forest	No
1995	1.3	100	50	Stream	Forest	No
1813	1.3	100	50	Stream/ Pipeline crossing	Forest/ Open land	No
1888	1.4	100	50	Stream	Forest	No
1889	1.4	100	50	Stream	Forest	No
1814	1.5	267	25	Side slope	Forest/ Open land	No
1943	1.5	100	50	Stream	Forest	No
1944	1.6	100	50	Stream	Forest	No
1892	1.6	437	25	Side slope	Forest	No
1815	1.7	250	125	Stream	Wetland (PEM)/ Open land	Yes
1816	1.8	250	125	Stream	Forest/ Open land	Yes
1866	2.2	100	50	Pipeline crossing	Agriculture	No
1817	2.2	450	25	Side slope	Agriculture/ Forest	No
1818	2.3	100	50	Stream	Forest	No
1819	2.3	100	50	Stream	Forest	No
2054	2.3	346	25	Side slope	Agriculture/ Forest	No
1867	2.4	125	50	Staging area	Agriculture/ Forest	No
1820	2.4	427	25	Side slope	Forest	No
1821	2.5	100	50	Stream	Forest	No
1822	2.6	100	50	Stream	Forest	No
1823	2.6	240	25	Side slope	Forest	No
2018	2.6	376	25	Side slope	Forest	No
1824	2.9	1108	25	Side slope	Agriculture/ Forest/ Open land	No
1825	3.1	100	50	Road crossing	Agriculture/ Industrial	No

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1826	3.1	125	50	Road crossing	Agriculture/ Industrial	No
1827	3.1	1146	15	TSS	Agriculture/ Forest	No
1828	3.4	200	15	TSS	Agriculture	No
1829	3.4	100	50	Stream	Agriculture	No
1830	3.5	100	50	Stream	Agriculture	No
1831	3.5	422	15	TSS	Agriculture/ Forest	No
1868	3.6	125	50	Staging area/ Parking	Agriculture	No
1869	3.6	113	15	TSS	Agriculture	No
1832	3.7	264	25	Side slope	Agriculture/ Forest	No
1893	3.7	529	25	Side slope	Forest	No
1833	3.8	100	50	Stream	Forest	No
1834	3.9	100	50	Stream	Forest/ Open land	No
1835	3.9	621	25	Side slope	Forest/ Open land	No
1836	4.0	100	50	Stream	Agriculture/ Forest	No
1837	4.1	535	15	TSS	Agriculture	No
1838	4.2	100	50	Road crossing	Agriculture/ Industrial	No
1839	4.2	100	50	Road crossing	Agriculture/ Industrial	No
1840	4.2	100	50	Stream	Agriculture/ Forest	No
1841	4.3	1278	15	TSS	Agriculture/ Forest	No
1894	4.5	100	50	Stream	Agriculture	No
1895	4.6	100	50	Stream	Agriculture	No
1896	4.6	672	15	TSS	Agriculture/ Forest	No
1842	4.7	100	50	Road crossing	Agriculture/ Industrial/ Forest	No
1843	4.7	117	50	Road crossing/ Stream	Industrial/ Forest	No
1844	4.9	100	50	Stream	Forest	No
1871	5.0	196	25	Side slope	Agriculture	No
1872	5.0	125	50	Staging area/ Parking	Agriculture	No
1846	5.1	261	25	Side slope	Agriculture/ Forest	No
1897	5.1	549	25	Side slope	Agriculture/ Forest	No
1898	5.3	278	25	Side slope	Agriculture/ Forest	No

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1847	5.3	880	15	TSS	Agriculture/ Forest	No
1848	5.6	349	15	TSS	Agriculture	No
1849	5.7	143	15	TSS	Agriculture	No
1850	5.8	175	50	Staging area	Agriculture/ Forest	No
1851	5.9	100	50	Road crossing	Industrial/ Forest	No
1852	5.9	100	50	Road crossing	Agriculture/ Industrial/ Forest	No
1853	6.0	100	50	Stream	Agriculture/ Forest	No
1854	6.0	198	15	TSS	Agriculture	No
1855	6.1	101	15	TSS	Agriculture	No
1856	6.2	393	15	TSS	Agriculture	No
1857	6.2	100	50	Stream	Agriculture	No
1858	6.4	100	50	Stream	Forest	No
1859	6.5	212	50	Road crossing	Forest/ Open land	No
1860	6.8	100	50	Stream	Forest	No
1861	6.8	110	50	Stream	Forest	No
1862	6.9	100	50	Stream	Forest	No
1863	7.0	100	50	Stream	Forest	No
1864	7.3	150	75	Staging area	Forest/ Open land	No
2073	7.8, RR-1	150	50	Stream	Forest	No
2074	7.9, RR-1	100	50	Stream	Forest	No
43	8.0, RR-1	209	50	Road crossing	Forest/ Open land	No
2123	8.0, RR-1	95	25	Road crossing	Open land	No
2124	8.0, RR-1	103	20	Road crossing	Residential/ Open land	No
2125	8.0, RR-1	146	50	Pipeline crossing	Open land	No
2126	8.1, RR-1	130	25	Pipeline crossing	Forest/ Open land	No
2128	8.3, RR-1	150	25	Stream	Forest	Yes
2129	8.4, RR-1	80	25	Stream	Forest	No
2130	8.4, RR-1	160	20	Stream	Forest	No
2131	8.5, RR-1	100	50	Stream	Forest	No
2132	8.5, RR-1	126	25	Side slope	Forest	No
2133	8.6, RR-1	134	50	Road crossing	Forest	No
2134	8.7, RR-1	131	50	Road crossing	Forest	No
2135	8.7, RR-1	178	15	TSS	Agriculture	No
2136	8.8, RR-1	100	50	Pipeline crossing	Forest	No
2137	8.8, RR-1	195	50	Stream	Forest	No

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
2138	9.0, RR-1	100	50	Pipeline crossing	Forest/ Open land	No
2139	9.0, RR-1	168	50	Stream	Forest	No
2140	9.1, RR-1	100	50	Stream	Forest	No
2141	9.2, RR-1	61	15	TSS	Agriculture	No
2142	9.2, RR-1	100	50	Bend	Agriculture	No
1226	9.2, RR-1	228	15	TSS	Agriculture/ Forest	No
1903	9.4, RR-1	100	50	Stream	Forest	No
1904	9.4, RR-1	100	50	Stream	Agriculture/ Forest	No
1227	9.4, RR-1	362	15	TSS	Agriculture / Forest	No
49	9.7	100	50	Road crossing	Wetland (PEM)/ Agriculture/ Industrial	Yes
1229	9.8	206	15	TSS	Agriculture/ Forest	No
1230	10.2	100	50	Pipeline crossing	Agriculture	No
1231	10.2	682	15	TSS	Agriculture	No
1232	10.4	100	50	Stream	Forest	No
1233	10.5	100	50	Stream	Forest	No
1234	10.5	112	15	TSS	Agriculture	No
1235	10.6	91	15	TSS	Agriculture/ Forest	No
51	10.6	100	100	Road crossing/ Parking	Agriculture/ Industrial	No
52	10.6	100	50	Road crossing	Industrial/ Forest/ Open land	No
1236	10.7	417	15	TSS	Agriculture/ Forest/ Open land	No
1237	10.9	559	25	Side slope	Forest/ Open land	No
53	11.1	280	25	Side slope	Forest	No
1238	11.2	100	50	Pipeline crossing	Forest/ Open land	No
1239	11.3	100	50	Pipeline crossing	Agriculture/ Forest	No
1240	11.3	294	15	TSS	Agriculture/ Industrial/ Forest	No
54	11.3	100	100	Road crossing/ Parking	Agriculture/ Industrial/ Forest	No
55	11.4	160	50	Road crossing/ Stream	Agriculture/ Industrial	No
1242	11.5	100	50	Wetland/ Stream	Forest	No
56	11.5	751	25	Side slope	Agriculture/ Forest	No
1243	11.7	100	50	Stream	Forest	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1244	11.7	100	50	Stream	Forest	No
1245	11.7	715	15	TSS	Agriculture/ Forest	No
1905	11.9	100	50	Stream	Agriculture	No
1906	11.9	100	50	Stream	Agriculture/ Forest	No
1246	11.9	424	15	TSS	Agriculture/ Forest	No
1247	12.0	100	50	Stream	Agriculture/ Forest	No
1248	12.1	100	50	Stream	Forest	No
57	12.1	726	25	Side slope	Forest	No
1249	12.3	213	15	TSS	Agriculture/ Forest	No
58	12.4	150	50	Road crossing	Industrial/ Forest	No
59	12.4	25	50	Road crossing	Agriculture/ Industrial/ Forest/ Open land	No
1907	12.5	229	50	Stream	Forest	No
1909	12.6	100	50	Stream	Forest	No
1250	12.6	47	25	Side slope	Forest	No
1252	12.8	100	50	Stream	Forest	No
1253	12.9	556	15	TSS	Agriculture	No
1254	13.1	533	15	TSS	Agriculture	No
1911	13.2	100	50	Stream	Agriculture/ Forest	No
1912	13.2	100	50	Stream	Agriculture/ Forest	No
1255	13.2	102	15	TSS	Agriculture/ Residential	No
62	13.3	100	50	Road crossing	Agriculture/ Industrial/ Residential	No
63	13.3	100	50	Road crossing	Agriculture/ Industrial	No
64	13.3	117	25	Side slope	Agriculture/ Forest	No
1256	13.3	100	50	Stream/ Wetland	Agriculture/ Forest	No
1257	13.4	100	50	Stream	Forest	No
1258	13.5	205	25	Side slope	Forest	No
1259	13.5	100	50	Stream	Forest	No
1260	13.6	100	50	Stream	Forest	No
1261	13.7	386	15	TSS	Agriculture	No
1262	13.9	100	50	Stream	Forest/ Open land	No
1263	14.0	100	50	Stream	Forest	No
2143	14.08	142	50	Pipeline crossing	Forest/	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
					Agriculture	
2159	14.1, RR-2	213	Variable	Bend	Agriculture	No
2144	14.2, RR-2	150	50	Pipeline crossing	Forest	No
2145	14.2, RR-2	200	50	Side slope	Forest	No
2146	14.4, RR-2	200	50	Side slope	Forest	No
2147	14.5, RR-2	300	50	Pipeline crossing	Forest/ Open land	No
2148	14.6, RR-2	200	50	Pipeline crossing	Agriculture	No
2149	14.6, RR-2	138	15	TSS	Agriculture	No
2150	14.7, RR-2	153	15	TSS	Agriculture/ Open land	No
2151	14.8, RR-2	100	50	Pipeline crossing	Agriculture	No
2152	14.8, RR-2	100	50	Pipeline crossing	Agriculture/ Forest	No
2153	14.8, RR-2	100	50	Side slope	Forest	No
2154	15.0, RR-2	150	50	Side slope	Forest	No
2155	15.2, RR-2	150	Variable	Side slope	Forest	No
2156	15.3, RR-2	125	50	Side slope	Forest	No
2157	15.6, RR-2	100	50	Side slope	Forest	No
2158	15.8, RR-2	118	50	Pipeline crossing	Forest	No
2167	15.1	100	50	Pipeline crossing	Open Land/ Forest	No
1264	15.2	526	25	Side slope	Forest	No
1265	15.2	100	50	Stream	Forest	No
1266	15.3	349	25	Side slope	Forest	No
1913	15.3	97	25	Side slope	Forest/ Open land	No
69	15.4	100	50	Road crossing	Forest/ Open land	No
70	15.4	73	50	Road crossing	Forest	Yes
1267	15.5	58	50	Stream	Forest	Yes
1268	15.6	220	50	Stream	Forest	Yes
1269	15.6	100	50	Stream	Agriculture/ Forest	No
1270	15.6	100	50	Pipeline crossing	Agriculture	No
1271	15.7	88	50	Stream	Forest	No
1272	15.7	100	50	Stream	Forest	Yes
1741	15.9	723	25	Side slope	Forest	No
1273	16.1	100	50	Stream/ Road crossing	Forest	No
72	16.1	215	50	Road crossing/ Stream	Industrial/ Forest	No
1275	16.3	100	50	Stream	Forest/ Open land	No
1742	16.3	245	15	TSS	Agriculture/ Open land	No
1276	16.4	100	50	Stream	Forest	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1277	16.6	100	50	Stream	Forest	No
2114	16.7, RR-3	83	50	Pipeline crossing	Agriculture	No
2115	16.7, RR-3	66	50	Road crossing	Agriculture	No
2116	16.7, RR-3	162	50	Road crossing	Agriculture	No
2117	16.8, RR-3	150	50	Side slope	Forest	No
2118	16.9, RR-3	125	50	Side slope	Agriculture	No
2119	16.9, RR-3	540	15	TSS	Agriculture	No
2120	17.0, RR-3	150	65	Pipeline crossing	Agriculture	No
2121	17.1, RR-3	240	50	Side slope	Agriculture/ Industrial	No
2122	17.1, RR-3	100	50	Side slope	Agriculture/ Industrial	No
1280	17.6	100	50	Parking	Industrial/ Open land	No
73	17.6	100	50	Road crossing	Industrial/ Open land	No
1281	17.6	671	15	TSS	Agriculture/ Industrial/ Open land/ Residential	No
1282	17.7	100	50	Stream	Open land	No
1283	17.8	100	50	Stream	Open land	No
1284	17.9	100	50	Stream	Agriculture/ Forest	No
1285	17.9	100	50	Stream	Forest	No
1996	18.1	100	50	Stream	Forest	No
1286	18.2	100	50	Stream	Forest	No
1287	18.2	100	50	Stream	Agriculture	No
1289	18.3	137	15	TSS	Agriculture	No
1917	18.3	100	50	Stream	Agriculture/ Forest	No
1290	18.3	100	50	Stream	Forest/ Open land	No
1291	18.4	100	50	Stream	Forest/ Open land	No
1292	18.5, RR-4	100	50	Stream	Agriculture/ Open land	No
1293	18.5, RR-4	119	15	Agriculture area	Agriculture	No
2082	18.5, RR-4	109	43	Grading	Agriculture/ Open land/ Forest	No
2083	18.6, RR-4	Variable	Variable	Grading	Agriculture	No
75	18.5	150	75	Road crossing/ Parking	Agriculture/ Industrial/ Open land	No
76	18.6	100	50	Road crossing	Industrial/ Forest/ Open land	No
1918	18.7	100	50	Stream	Forest	No
1294	18.8	100	50	Stream	Forest	No
1295	18.8	852	25	Side slope	Forest/ Open	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
					land	
1990	19.1	92	50	Road crossing	Industrial/ Forest	No
1991	19.1	100	50	Road crossing	Industrial/ Forest	No
80	19.2	270	50	Stream	Forest	No
81	19.3	100	50	Stream	Forest	No
1885	19.3	172	25	Side slope	Forest	No
1886	19.4	425	25	Side slope	Forest	No
1887	19.5	126	25	Side slope	Forest	No
1296	19.6	3367	25	Side slope	Agriculture/ Forest	No
1884	20.3	100	50	Staging area	Agriculture	No
1882	20.3	182	15	TSS	Agriculture	No
1300	20.3	112	25	Side slope	Agriculture/ Forest	No
1919	20.3	1074	25	Side slope	Forest	No
1298	20.6	100	50	Stream	Forest/ Open land	No
1299	20.6	671	50	Stream/ Steep Terrain	Forest	No
1883	20.9	125	50	Staging area	Forest	No
1920	21.0	100	50	Stream	Forest	No
1921	21.0	100	50	Stream	Agriculture	No
94	21.1	200	100	HDD	Wetland (PEM)/ Agriculture/ Open land	Yes
1178	21.1	1,225	50	HDD	Agriculture/ Forest	Yes
1301	21.2	100	50	Parking	Agriculture/ Industrial	Yes
1302	21.3	20	20	Water Uptake	Forest	Yes
1303	21.3	20	20	Water Uptake	Forest	Yes
95	21.4	200	100	HDD	Agriculture	No
1922	21.4	100	50	Wetland	Forest/ Open land	No
1923	21.5	100	50	Wetland	Forest	No
96	21.6	945	25	Side slope	Forest	No
1304	21.7	100	50	Stream	Forest	No
1305	21.8	100	50	Stream	Forest	No
1623	21.8	672	25	Side slope	Forest	No
1924	22.0	100	50	Stream	Forest	No
1925	22.0	118	50	Stream	Forest	No
1926	22.1	100	50	Stream	Forest	No
1927	22.1	827	25	Side slope	Forest/ Open land	No
98	22.3	100	50	Road crossing	Industrial/ Forest/ Open land	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
99	22.3	69	50	Road crossing	Industrial/ Forest/ Open land	No
1306	22.5	100	50	Stream	Forest	No
100	22.5	473	25	Side slope	Forest/ Open land	No
1307	22.6	100	50	Stream	Forest	No
1308	22.6	100	50	Stream	Forest	No
1624	22.6	384	25	Side slope	Agriculture/ Forest	No
1309	22.7	100	50	Stream/ Wetland	Forest	No
1310	22.8	100	50	Stream/ Wetland	Agriculture/ Forest	No
1311	22.8	1245	15	TSS	Agriculture/ Forest	No
101	23.0	622	25	Side slope	Forest	No
1312	23.2	100	50	Stream/ Wetland	Forest	No
1313	23.3	100	50	Stream	Forest	No
1626	23.3	1794	25	Side slope	Forest	No
1314	23.7	100	50	Stream	Forest	No
1315	23.7	100	50	Stream	Forest	No
1316	23.7	231	25	Side slope	Forest	No
1318	23.9	100	50	Stream	Forest	No
1317	24.0	100	50	Stream	Forest	No
2055	24.2	100	50	Pipeline crossing	Agriculture	No
1747	24.4	135	100	Staging area	Agriculture	No
1746	24.4	235	100	Staging area	Agriculture/ Forest	No
1325	24.4	448	25	Side slope	Agriculture	No
1928	24.5	100	50	Stream	Agriculture/ Forest	No
1929	24.6	100	50	Stream	Agriculture/ Open land	No
1324	24.6	383	15	TSS	Agriculture/ Forest	No
1322	25.0	106	25	Side slope	Forest	No
1321	25.0	100	50	Stream	Forest	No
1320	25.1	100	50	Stream	Forest	No
1930	25.1	128	50	Stream	Forest	No
105	25.2	201	100	HDD	Forest	Yes
106	25.8, RR-5	Variable	Variable	HDD	Forest/ Open land	Yes
2084	25.9, RR-5	Variable	Variable	HDD	Forest	Yes
2090	26.2, RR-5	200	50	Side slope	Forest	No
2091	26.8, RR-5	150	50	Side slope	Forest/ Open land	No
2092	27.1, RR-5	231	50	Side slope	Forest/ Open land	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1328	27.0	429	25	Side slope	Forest	No
1329	27.1	100	50	Stream	Forest	No
1332	27.2	100	50	Stream	Forest	No
1330	27.2	664	25	Side slope	Forest	No
1331	27.3	100	50	Stream	Forest	No
1333	27.4	100	50	Stream	Forest	No
1327	27.4	573	25	Side slope	Forest	No
110	27.6	164	25	Side slope	Agriculture/ Forest/ Open land	No
1334	27.7	214	15	TSS	Agriculture	No
1335	27.7	319	25	Side slope	Agriculture/ Forest	No
111	27.8	100	50	Stream	Forest	No
113	27.9	222	50	Road crossing/ Stream	Agriculture/ Industrial/ Forest	No
114	27.9	100	50	Road crossing	Agriculture/ Industrial	No
115	27.9	353	25	Side slope	Agriculture/ Forest	No
116	28.0	100	50	Stream	Agriculture/ Forest	No
117	28.1	271	25	Side slope	Forest/ Open land	No
1336	28.2	149	15	TSS	Agriculture	No
119	28.3	718	25	Side slope	Agriculture/ Forest/ Open land	No
120	28.4	100	50	Stream	Forest	No
121	28.4	100	50	Stream	Forest	No
122	28.5	84	25	Side slope	Forest	No
123	28.5	96	50	Stream	Forest	No
124	28.6	100	50	Stream	Forest	No
125	28.6	282	25	Side slope	Agriculture/ Industrial/ Forest	No
1931	28.7	100	50	Stream	Forest	No
1932	28.9	100	50	Stream	Forest	No
1933	28.9	100	50	Stream	Forest	No
130	29.1	146	50	Road crossing/ Stream	Agriculture/ Industrial	No
131	29.1	243	50	Road crossing/ Stream	Agriculture/ Industrial	No
1338	29.2	138	25	Side slope	Agriculture/ Forest	No
1339	29.2	647	15	TSS	Agriculture	No
1340	29.4	100	50	Stream	Agriculture/ Forest	No
1759	29.5	100	50	Stream	Forest	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1342	29.5	149	25	Side slope	Agriculture/ Forest	No
1343	29.5	791	15	TSS	Agriculture	No
1777	29.7	270	25	Side slope	Agriculture/ Forest	No
134	29.7	100	50	Stream	Forest	No
135	29.8	100	50	Stream	Forest	No
1345	29.8	257	25	Side slope	Forest	No
1764	29.8	773	15	TSS	Agriculture/ Forest	No
138	30.0	196	50	Stream	Agriculture/ Forest	No
1768	30.3	530	15	TSS	Agriculture/ Forest/ Open land	No
145	30.4	100	50	Road crossing	Agriculture/ Industrial	Yes
146	30.5	162	25	Road crossing/ Stream	Agriculture/ Industrial/ Forest	No
1766	30.5	100	50	Stream	Agriculture	No
1770	30.6	277	15	TSS	Agriculture	No
148	30.6	100	50	Road crossing	Agriculture/ Industrial	No
149	30.6	100	50	Road crossing	Industrial/ Forest	No
150	30.6	1565	25	Side slope	Forest	No
151	31.1	100	50	Wetland/ Stream	Forest	No
1772	31.3	229	15	TSS	Agriculture/ Forest	No
155	31.4	100	Varies	Road crossing	Agriculture/ Industrial	No
156	31.4	100	30	Road crossing/ Stream	Industrial/ Forest	No
1351	31.6	286	15	TSS	Agriculture/ Forest	No
1934	31.7	372	15	TSS	Agriculture/ Forest	No
161	31.7	100	50	Road crossing	Agriculture/ Industrial	No
162	31.7	100	50	Road crossing	Agriculture/ Industrial	No
167	31.9	100	50	Stream	Forest	No
168	31.9	1498	25	Side slope	Forest/ Open land	No
169	32.2	100	50	Stream	Forest	No
170	32.3	100	50	Stream	Forest	No
171	32.3	880	25	Side slope	Forest	No
172	32.4	100	50	Stream	Forest	No
173	32.5	185	50	Stream	Forest	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
174	32.6	100	50	Stream	Forest	No
1775	32.6	774	15	TSS	Agriculture/ Forest	No
175	32.8	100	50	Road crossing	Industrial/ Forest	No
176	32.8	239	50	Road crossing/ Stream	Industrial/ Forest	No
177	32.9	100	50	Stream	Forest	No
178	32.9	249	25	Side slope	Forest	No
179	33.0	100	50	Stream	Forest	No
181	33.1	100	50	Stream	Forest	No
1354	33.1	1428	25	Side slope	Forest	No
182	33.4	100	50	Stream	Forest	No
183	33.4	100	50	Stream	Forest	No
185	33.4	1201	25	Side slope	Forest	No
1749	33.7	2427	25	Side slope	Industrial/ Forest/ Open land	No
186	34.1	167	Varies	Road crossing	Agriculture/ Industrial	No
1778	34.3	390	15	TSS	Agriculture/ Industrial	No
190	34.4	227	25	Side slope	Agriculture/ Forest	No
1782	34.4	818	25	Side slope	Forest	No
192	34.6	100	50	Stream	Forest	No
193	34.6	100	50	Stream	Forest	No
1357	34.7	421	25	Side slope	Forest/ Open land	No
195	34.7	100	50	Stream	Forest	No
196	34.8	97	50	Stream	Forest/ Open land	No
199	35.1	100	50	Stream	Forest	No
201	35.2	183	50	Stream	Forest	No
1063	35.4	822	25	Side slope	Forest	No
1781	35.5	395	15	TSS	Agriculture/ Forest	No
203	35.6	100	50	Road crossing	Agriculture/ Industrial/ Forest	No
204	35.6	206	50	Road crossing	Agriculture/ Industrial	No
205	35.7	195	50	Road crossing	Industrial/ Open land	No
1064	35.8	246	25	Side slope	Open land	No
1750	35.9	242	15	TSS	Agriculture	No
1341	35.9	100	50	Stream	Agriculture	No
1755	36.0	100	50	Stream	Agriculture	No
1751	36.0	314	15	TSS	Agriculture/ Forest	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
206	36.1	100	50	Road crossing	Agriculture/ Forest	No
207	36.1	100	50	Road crossing	Agriculture	No
1776	36.1	207	15	TSS	Agriculture	No
1756	36.2	100	50	Stream	Agriculture	No
1765	36.3	100	50	Stream	Agriculture	No
1769	36.3	1115	15	TSS	Agriculture/ Forest/ Open land	Yes
1065	36.5	100	50	Road crossing	Agriculture/ Industrial	Yes
1066	36.5	100	50	Road crossing/ Stream	Agriculture	No
1767	36.6	650	15	TSS	Agriculture/ Open land	No
1771	36.7	120	50	Stream	Forest	No
1773	36.8	100	50	Stream	Agriculture	No
1760	36.8	120	15	TSS	Agriculture	No
1786	36.8	201	15	TSS	Agriculture	No
1353	36.9	80	50	Stream	Agriculture	No
2075	37.0	100	50	Stream	Agriculture	No
1763	37.0	821	15	TSS	Agriculture	No
1779	37.1	100	50	Stream	Forest	No
1783	37.2	100	50	Stream	Forest	No
208	37.2	100	50	Wetland/ Stream	Forest	No
209	37.4	100	50	Wetland/ Stream	Forest	No
1753	37.5	1178	15	TSS	Agriculture	No
210	37.8	100	50	Road crossing	Agriculture/ Industrial	No
211	37.8	100	50	Road crossing	Agriculture/ Industrial	No
1780	37.8	532	15	TSS	Agriculture	No
212	38.0	100	50	Stream	Agriculture/ Forest	No
213	38.0	302	50	Stream	Agriculture/ Forest	No
215	38.1	100	50	Stream	Forest	No
218	38.4	123	50	Road crossing/ Stream	Forest	No
219	38.4	414	25	Side slope	Forest	No
220	38.7	197	50	Stream	Forest	No
1787	39.0	256	15	TSS	Agriculture/ Forest	No
1744	39.0	144	50	Staging area	Agriculture	No
221	39.1	100	50	Stream	Forest	No
222	39.1	100	50	Stream	Forest	No
223	39.2	100	50	Stream	Forest	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
224	39.3	100	50	Stream	Forest	No
225	39.3	191	50	Stream/ Wetland	Forest	No
226	39.5	260	50	Road crossing/ Stream	Agriculture/ Industrial	No
227	39.6	100	50	Road crossing	Agriculture/ Industrial	No
1784	39.6	310	15	TSS	Agriculture	No
228	39.7	100	50	Stream	Forest	No
229	39.7	100	50	Stream	Forest	No
230	39.9	100	50	Stream	Forest	No
231	40.0	340	50	Stream	Agriculture/ Open land	No
234	40.1	100	50	Road crossing	Agriculture/ Industrial/ Forest	No
235	40.2	100	50	Road crossing	Agriculture/ Industrial/ Open land	No
1758	40.2	348	15	TSS	Agriculture/ Forest/ Open land	No
236	40.2	100	50	Stream	Forest	No
237	40.3	100	50	Stream	Forest	No
238	40.4	100	50	Stream	Forest	No
239	40.4	55	50	Stream	Forest	No
240	40.5	100	50	Stream	Forest	No
241	40.6	100	50	Stream	Forest	No
242	40.7	100	50	Stream	Forest	No
243	40.9	100	50	Stream	Forest	No
244	41.0	57	50	Stream	Forest	No
245	41.0	100	50	Stream	Forest	No
1754	41.1	284	15	TSS	Agriculture/ Forest	No
246	41.1	100	50	Road crossing	Agriculture/ Industrial	No
247	41.2	61	50	Road crossing	Industrial/ Open land	No
1785	41.2	746	15	TSS	Agriculture/ Forest	No
248	41.4	328	25	Side slope	Forest	No
249	41.4	100	50	Stream	Forest	No
250	41.5	100	50	Stream	Forest	No
251	41.7	100	50	Stream	Forest	No
252	41.7	100	50	Stream	Forest	No
253	41.9	100	50	Road crossing	Industrial/ Forest	No
254	42.0	100	50	Road crossing	Industrial/ Forest/ Open land	No
255	42.0	100	50	Stream	Forest	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
256	42.0	100	50	Stream	Agriculture/ Forest	No
1344	42.1	1232	15	TSS	Agriculture	No
258	42.3	100	50	Road crossing	Agriculture/ Industrial	No
259	42.3	100	50	Road crossing	Agriculture/ Industrial	No
1757	42.3	867	15	TSS	Agriculture	No
1346	42.6	599	15	TSS	Agriculture/ Forest	No
1347	42.7	710	15	TSS	Agriculture	No
262	42.8	100	50	Road crossing	Agriculture/ Industrial / Wetland (PEM)	Yes
263	42.8	100	50	Road crossing	Agriculture/ Industrial	Yes
1348	42.9	688	15	TSS	Agriculture	No
1349	43.1	987	15	TSS	Agriculture	No
268	43.4	100	50	Road crossing	Agriculture/ Forest	No
1350	43.4	210	15	TSS	Agriculture/ Forest	No
271	43.6	100	50	Stream	Forest	No
272	43.6	100	50	Stream	Forest	No
1802	43.7	126	30	Stream	Forest	No
274	43.7	100	50	Stream	Forest	No
1761	43.7	347	15	TSS	Agriculture/ Forest	No
275	43.8	100	50	Stream	Forest	No
276	43.9	100	50	Stream	Forest	No
1352	43.9	386	15	TSS	Agriculture/ Forest	No
277	44.0	100	50	Stream	Agriculture/ Forest	No
278	44.0	100	50	Stream	Agriculture/ Forest	No
1774	44.2	537	15	TSS	Agriculture	No
281	44.3	100	50	Road crossing	Agriculture/ Industrial	No
282	44.3	100	50	Road crossing	Agriculture/ Industrial	No
1762	44.3	166	15	TSS	Agriculture	No
1355	44.4	602	15	TSS	Agriculture	No
1356	44.6	267	15	TSS	Agriculture	No
288	44.7	100	50	Stream	Forest	No
289	44.7	100	50	Stream	Forest	No
1752	44.7	942	15	TSS	Agriculture/ Forest/ Open	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1797	45.0	340	15	TSS	land Agriculture	No
291	45.1	133	50	Road crossing/ Stream	Agriculture	No
293	45.3	827	15	TSS	Agriculture	No
294	45.4	100	50	Road crossing	Agriculture/ Industrial	No
295	45.4	100	50	Road crossing	Agriculture/ Industrial	No
296	45.5	1145	15	TSS	Agriculture	No
297	45.7	100	50	Road crossing	Agriculture/ Industrial	No
298	45.7	100	50	Road crossing/ Stream	Agriculture	No
299	45.8	366	25	Side slope	Agriculture	No
1358	45.8	546	15	TSS	Agriculture/ Forest	No
1359	46.1	98	50	Wetland	Forest/ Open land	No
1360	46.2	100	50	Wetland	Open land	No
1361	46.3	273	15	TSS	Agriculture	No
1362	46.4	100	50	Wetland	Agriculture/ Open land	No
1364	46.5	159	50	Stream	Open land	No
1743	46.6	100	50	Stream	Agriculture	No
1365	46.6	441	15	TSS	Agriculture	No
1795	47.0	177	15	TSS	Agriculture	No
320	47.8	100	50	Road crossing	Agriculture/ Industrial/ Forest	No
1890	47.8	100	50	Road crossing	Industrial/ Forest	No
322	48.4	100	50	Stream	Forest	No
323	48.4	100	50	Stream	Forest	No
324	48.8	100	50	Road crossing	Industrial/ Forest	No
325	48.8	244	50	Road crossing/ Stream	Agriculture/ Industrial	No
1366	48.9	88	15	TSS	Agriculture/ Forest	No
328	49.0	617	25	Side slope	Forest	No
330	49.3	100	50	Road crossing	Agriculture/ Industrial	No
1367	49.3	175	15	TSS	Agriculture	No
331	49.4	100	50	Stream	Open land	No
332	49.5	100	50	Stream	Forest/ Open land	No
1368	49.7	241	15	TSS	Agriculture	No
333	49.7	118	50	Road crossing	Agriculture/ Forest	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
334	49.8	50	50	Road crossing/ Stream	Industrial/ Forest	No
335	49.8	100	50	Stream	Forest	No
336	50.0	100	50	Stream	Forest	No
337	50.0	100	50	Stream	Agriculture/ Forest	No
1369	50.1	119	15	TSS	Agriculture	No
1370	50.1	324	15	TSS	Agriculture	No
338	50.3	100	50	Stream	Forest	No
339	50.4	100	50	Stream	Forest	No
2160	50.6	151	50	Induction bend/ Side slope	Open land/ Forest	No
2163	50.8, RR-6	146	Variable	Staging area/ Parking	Agriculture/ Industrial/ Open land	Yes
342	50.9, RR-6	Variable	Variable	Road crossing	Agriculture/ Industrial/ Forest	Yes
343	50.9, RR-6	100	50	Road crossing	Agriculture/ Industrial/ Open land	No
2164	50.9, RR-6	195	50	Stream	Forest	No
2165	51.0, RR-6	150	50	Pipeline crossing	Forest	No
2166	51.1	100	50	Pipeline crossing	Forest	No
1371	51.1	100	50	Stream	Forest	No
1372	51.2	100	50	Stream	Forest	No
345	51.2	238	25	Side slope	Forest	No
346	51.3	100	50	Stream	Forest	No
347	51.3	100	50	Stream	Agriculture	No
1373	51.4	516	15	TSS	Agriculture	No
348	51.5	100	30	Road crossing	Agriculture/ Industrial	No
1374	51.5	100	50	Road crossing	Industrial/ Forest	No
1375	51.6	249	15	TSS	Agriculture/ Forest/ Open land	No
350	51.7	100	50	Stream	Forest	No
1935	52.2	100	50	Wetland	Forest	No
1936	52.3	100	50	Stream	Agriculture	No
1376	52.4	501	15	TSS	Agriculture/ Forest	No
354	52.5	100	50	Road crossing	Agriculture/ Forest	No
355	52.5	100	50	Road crossing	Agriculture/ Industrial	No
356	52.6	1094	25	Side slope	Forest	No
1803	52.8	450	25	Side slope	Forest/ Open land	No
1378	52.9	100	50	Pipeline crossing	Forest/ Open	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
					land	
1379	52.9	305	25	Side slope	Forest	No
1380	52.9	100	50	Stream	Forest	No
1788	53.0	996	25	Side slope	Forest	No
357	53.2	100	50	Wetland	Forest	No
1381	53.3	100	50	Stream	Forest	No
359	53.4	281	25	Side slope	Forest	No
1937	53.4	100	50	Stream	Forest	No
360	53.5	225	50	Road crossing/ Stream	Forest/ Open land	No
361	53.6	100	50	Road crossing	Industrial/ Forest/ Open land	No
362	53.6	439	25	Side slope	Forest	No
1955	53.7	100	50	Stream/ Wetland	Forest	No
1956	53.7	100	50	Stream/ Wetland	Forest	No
1957	53.7	577	25	Side slope	Forest	No
1958	53.8	100	50	Stream	Forest	No
1959	53.9	100	50	Stream	Forest/ Open land	No
1960	53.9	795	25	Side slope	Forest/ Open land	No
363	54.0	100	50	Road crossing/ Stream	Forest	No
364	54.1	100	50	Road crossing	Agriculture/ Industrial	Yes
2100	54.6, RR-7	100	50	Stream	Forest	No
2101	54.7, RR-7	74	15	TSS	Open land	No
2102	54.7, RR-7	100	50	Stream	Open land	No
2103	54.7, RR-7	96	15	TSS	Open land	No
2104	54.8, RR-7	100	50	Stream	Open land	No
2105	54.8, RR-7	100	50	Stream	Open land	No
2106	54.8, RR-7	1,447	15	TSS	Open land/ Forest	Yes
2107	55.2, RR-7	150	50	Road crossing	Forest	No
2108	55.2, RR-7	150	50	Road crossing	Open land/ Industrial	No
2109	55.3, RR-7	552	15	TSS	Open land/ Forest	No
2110	55.4, RR-7	125	50	Road crossing/ Stream	Forest/ Open land	No
2111	55.5, RR-7	274	50	Road crossing	Open land/ Forest/ Industrial	No
2112	55.5, RR-7	1,195	15	TSS	Agriculture	No
1801	55.9, RR-7	274	15	TSS	Agriculture	No
2113	55.8	125	50	Stream	Agriculture	No
1386	55.8	323	15	TSS	Agriculture	No
1387	55.9	223	15	TSS	Agriculture	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
369	56.1	100	50	Road crossing	Industrial/ Open land	Yes
1388	56.1	100	50	Road crossing/ Stream	Agriculture	No
371	56.4	100	50	Road crossing/ Stream	Industrial/ Forest/ Open land	No
372	56.4	100	50	Road crossing	Agriculture/ Industrial/ Forest	No
1389	56.5	100	50	Stream	Agriculture	No
1390	56.6	100	50	Stream	Agriculture	No
1391	56.7	636	15	TSS	Agriculture	No
1392	56.8	1,635	15	TSS	Agriculture	No
1393	57.7	100	50	Stream	Agriculture	No
1394	57.8	100	50	Stream	Forest	No
1395	57.8	100	50	Stream	Forest	No
1396	57.9	100	50	Stream	Forest	No
375	58.0	100	50	Road crossing	Forest	No
1397	58.1	100	50	Stream	Forest	No
1940	58.3	100	50	Staging area/ Parking	Forest	No
2076	58.8	100	50	Stream	Forest	No
2077	58.8	100	50	Stream	Forest	No
2078	59.1	100	50	Stream	Open land	No
2079	59.2	125	50	Stream	Forest/ Open land	No
2080	59.2	100	50	Stream	Agriculture/ Forest	No
1403	59.2	147	15	TSS	Agriculture	No
1404	59.3	334	15	TSS	Agriculture/ Forest	No
377	59.7	52	50	Road crossing/ Stream	Industrial/ Open land	No
378	59.7	100	50	Road crossing	Agriculture/ Industrial	No
379	60.3	100	50	Stream	Forest	No
381	60.4	100	50	Stream	Forest	No
382	60.4	100	50	Stream	Forest	No
383	60.7	79	50	Road crossing	Industrial/ Forest	No
384	60.7	100	50	Road crossing	Industrial/ Forest	No
385	60.9	1,051	25	Side slope	Forest	No
1405	61.5	240	15	TSS	Agriculture/ Forest	No
1406	61.7	587	15	TSS	Agriculture	No
1407	61.8	100	50	Wetland	Agriculture	No
390	61.9	100	50	Road crossing/ Stream	Agriculture/ Industrial	Yes
391	62.0	100	50	Stream	Agriculture/	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
					Forest	
1167	62.0	715	15	TSS	Agriculture/ Forest	No
1408	62.2	279	15	TSS	Agriculture	No
394	62.5	100	50	Stream	Forest	No
395	62.5	100	50	Stream	Forest	No
1168	62.8	444	15	TSS	Agriculture	No
1169	62.9	340	15	TSS	Agriculture/ Industrial	No
396	62.9	66	50	Road crossing	Agriculture/ Industrial	No
397	63.0	100	50	Road crossing	Agriculture/ Industrial	No
1170	63.0	1,023	15	TSS	Agriculture	No
1171	63.2	100	50	Pipeline crossing	Agriculture	No
398	63.3	100	50	Stream	Forest/ Open land	No
399	63.4	100	50	Stream	Agriculture/ Open land	No
1791	63.4	396	15	TSS	Agriculture	No
1789	63.8	100	50	Stream	Forest	No
1790	63.9	100	50	Stream	Agriculture	No
1172	64.0	879	15	TSS	Agriculture/ Forest	No
400	64.2	100	50	Road crossing	Forest	No
401	64.3	100	50	Road crossing	Agriculture/ Industrial	No
1173	64.3	455	15	TSS	Agriculture	No
2081	64.4	100	50	Stream	Agriculture	No
2082	64.4	100	50	Stream	Agriculture	No
2083	64.4	93	15	TSS	Agriculture	No
402	64.6	100	50	Road crossing	Industrial/ Forest	No
403	64.6	250	50	Road crossing/ Stream	Agriculture/ Industrial	No
1412	64.8	100	50	Stream	Forest	No
1413	64.8	100	50	Stream	Forest	No
1414	65.0	513	15	TSS	Agriculture/ Forest	No
404	65.1	100	50	Stream	Forest	No
1796	65.4	615	15	TSS	Agriculture/ Forest	No
408	65.5	100	50	Stream	Agriculture	No
409	65.6	85	50	Stream	Forest	No
410	65.6	178	15	TSS	Agriculture	No
411	65.6	100	50	Stream	Agriculture	No
414	65.7	100	50	Stream	Forest	No
417	65.9	1606	15	TSS	Agriculture/	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
					Forest/ Open land	
2061	66.3	759	15	TSS	Open land	No
2060	66.5	100	50	Stream	Agriculture	No
2062	66.5	143	15	TSS	Agriculture	No
1416	66.7	608	15	TSS	Agriculture/ Forest	No
421	66.8	100	50	Road crossing	Forest	No
422	66.9	319	100	HDD/ Road crossing	Agriculture/ Wetland (PEM)	Yes
1417	66.9	20	20	Water Uptake	Agriculture/ Open land	Yes
423	67.3	100	200	HDD/ Road crossing	Agriculture/ Forest	Yes
1419	67.3	409	15	TSS	Agriculture/ Forest	No
424	67.4	100	50	Stream	Open land	No
428	67.7	230	50	Stream	Forest/ Open land	No
430	67.9	100	50	Stream	Open land	No
1420	68.0	548	15	TSS	Agriculture/ Forest	No
431	68.1	100	50	Road crossing	Agriculture/ Industrial	No
432	68.1	188	50	Road crossing/ Stream	Agriculture/ Industrial/ Forest/ Open land	No
434	68.3	147	50	Stream	Forest/ Open land	No
435	68.4	100	50	Stream	Forest	No
438	68.6	190	50	Stream	Forest/ Open land	No
1421	68.9	178	15	TSS	Open land	No
1422	68.9	64	50	Stream	Forest	No
1423	68.9	63	50	Stream	Forest	No
1424	69.0	100	50	Stream	Forest	No
442	69.2	100	50	Stream	Open land	No
443	69.3	82	50	Stream/ Road crossing	Agriculture	No
1876	69.3	141	100	Staging area	Agriculture	No
445	69.4	100	50	Road crossing	Open land	No
1875	69.4	150	100	Staging area	Agriculture/ Open land	No
1425	69.5	697	15	TSS	Agriculture	No
1426	69.6	100	50	Stream	Forest	No
1427	69.7	100	50	Stream	Forest	No
1428	69.7	100	50	Stream	Agriculture/ Forest	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1429	69.8	100	50	Stream	Agriculture	No
1430	69.8	472	15	TSS	Agriculture	No
448	69.9	100	100	Road crossing/ Parking	Agriculture/ Industrial	No
449	69.9	100	50	Road crossing	Agriculture/ Industrial	No
1431	70.0	548	15	TSS	Agriculture	No
1432	70.1	100	50	Stream	Agriculture/ Forest	No
1433	70.1	100	50	Stream	Agriculture	No
1434	70.1	106	15	TSS	Agriculture	No
1435	70.2	100	50	Stream	Agriculture	No
1436	70.2	100	50	Stream	Agriculture	No
1437	70.2	522	15	TSS	Agriculture	No
1438	70.3	100	50	Stream	Agriculture	No
1439	70.4	100	50	Stream	Forest	No
1440	70.4	100	50	Stream	Forest	No
1441	70.6	100	50	Stream	Agriculture/ Open land	No
1442	70.6	100	50	Stream	Agriculture/ Forest	No
1443	70.7	100	50	Stream	Agriculture	No
451	70.9	100	50	Road crossing	Agriculture	No
1444	70.9	395	15	TSS	Agriculture	No
452	71.0	100	50	Road crossing	Industrial/ Open land	No
453	71.0	100	50	Road crossing	Industrial/ Open land	No
454	71.1	100	50	Wetland	Open land	No
455	71.2	100	50	Wetland	Open land	No
457	71.2	100	50	Stream	Open land	No
458	71.3	100	50	Stream	Forest/ Open land	No
460	71.6	151	50	Road crossing	Industrial/ Open land	No
461	71.7	100	50	Road crossing	Industrial/ Open land	No
1446	71.7	1120	15	TSS	Open land	No
462	72.1	100	50	Road crossing	Industrial/ Open land	No
463	72.1	100	50	Road crossing	Industrial/ Forest	No
464	72.3	100	50	Stream/ Wetland	Open land	No
466	72.6	100	50	Road crossing	Industrial/ Forest/ Open land	No
467	72.6	100	50	Road crossing	Industrial/ Forest	No
468	73.3	100	50	Stream	Forest/ Open land	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
471	73.4	298	50	Stream	Forest/ Open land	No
473	73.5	385	50	Road crossing	Industrial/ Forest/ Open land	No
474	73.6	100	50	Road crossing	Industrial/ Forest	No
479	74.4	100	50	Stream	Forest	No
480	74.5	100	50	Stream	Forest	No
481	74.6	100	50	Stream	Industrial/ Open land	No
485	74.9	100	50	Stream	Forest	No
486	74.9	100	50	Stream	Forest	No
487	75.1	100	50	Road crossing	Industrial/ Forest/ Open land	No
488	75.1	209	50	Road crossing/ Stream	Industrial/ Forest	No
489	75.1	100	50	Road crossing/ Stream	Forest/ Open land	No
490	75.3	100	50	Stream	Forest	No
491	75.4	100	50	Stream	Forest/ Open land	No
1447	75.8	100	50	Stream	Open land	No
503	76.9	250	50	Stream	Forest/ Open land	No
504	77.0	100	50	Stream	Forest/ Open land	No
505	77.2	100	50	Stream	Forest	No
507	77.3	100	50	Stream	Forest	No
508	77.3	100	50	Road crossing	Industrial/ Forest	Yes
511	77.5	100	50	Stream	Forest	No
512	77.7	100	50	Wetland	Open land	No
513	77.8	88	50	Road crossing	Industrial/ Open land	No
514	77.8	100	50	Wetland	Open land	No
516	78.1	100	50	Stream	Forest/ Open land	No
517	78.2	100	50	Stream	Forest	No
518	78.3	119	50	Stream/ Wetland	Forest/ Open land	No
519	78.3	167	50	Road crossing	Industrial/ Open land	No
520	78.4	100	50	Road crossing	Open land	No
521	78.5	100	50	Stream	Forest	No
522	78.5	100	50	Stream	Forest	No
523	78.8	100	50	Stream	Forest	No
524	78.9	98	50	Stream	Forest	No
525	78.9	1,609	25	Side slope	Agriculture/ Forest	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
526	79.2	100	50	Stream	Agriculture	No
527	79.4	125	50	Stream	Agriculture	No
530	79.7	92	50	Road crossing	Forest/ Open land	No
531	79.7	100	50	Road crossing	Industrial/ Forest	No
532	80.0	100	50	Stream	Forest/ Open land	No
533	80.0	100	50	Stream	Forest/ Open land	No
534	80.2	100	50	Stream	Open land	No
535	80.3	44	50	Road crossing	Industrial/ Forest/ Open land	No
536	80.3	100	50	Road crossing	Industrial/ Forest/ Open land	No
538	80.4	100	50	Stream	Forest/ Open land	No
1448	80.5	206	15	TSS	Agriculture/ Forest	No
540	80.6	100	50	Stream	Agriculture/ Forest	No
1449	80.7	162	15	TSS	Agriculture	No
541	80.7	100	50	Stream	Agriculture/ Forest	No
542	80.8	100	50	Stream	Agriculture	No
545	81.0	100	50	Stream	Forest	No
546	81.1	224	50	Road crossing/ Stream	Industrial/ Forest	No
547	81.1	100	50	Road crossing	Industrial/ Forest	No
1941	81.2	100	50	Stream	Forest/ Open land	No
2057	81.2	100	50	Stream	Forest	No
1450	81.3	598	15	TSS	Agriculture/ Forest	No
548	81.6	100	50	Stream	Forest	No
550	81.6	100	50	Road crossing	Industrial/ Forest	No
551	81.7	626	15	TSS	Agriculture	No
552	81.8	100	50	Road crossing	Agriculture/ Industrial	No
553	81.8	100	50	Road crossing	Agriculture/ Industrial	No
554	81.8	514	15	TSS	Agriculture/ Forest	No
555	81.9	100	50	Road crossing	Industrial/ Forest	No
557	82.0	207	15	TSS	Agriculture	No
558	82.1	300	50	Stream	Agriculture/ Forest	No
559	82.2	100	50	Stream	Forest	No
560	82.3	452	15	TSS	Agriculture	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1963	82.4	100	50	Wetland	Forest/ Open land/ Agriculture	No
1964	82.5	100	50	Wetland	Open land/ Agriculture	No
1451	82.5	261	15	TSS	Agriculture	No
1452	82.6	100	50	Pipeline crossing	Open land	No
1453	82.6	100	50	Pipeline crossing	Open land	No
562	82.8	62	50	Stream	Open land	No
563	82.8	90	50	Stream	Agriculture/ Forest	No
1454	82.8	162	15	TSS	Agriculture/ Residential	No
2072	83.2	51	50	Road Crossing	Forest	No
566	83.2	15	50	Road crossing	Industrial/ Forest	No
567	83.2	100	50	Road crossing	Industrial/ Forest/ Open land	No
569	83.5	100	50	Stream	Agriculture/ Forest	No
570	83.5	100	50	Stream	Agriculture	No
571	83.6	100	50	Stream	Agriculture	No
572	83.6	100	50	Stream	Agriculture/ Forest	No
575	84.0	100	50	Stream	Forest	No
1455	84.1	211	15	TSS	Agriculture/ Forest/ Open land	No
578	84.2	100	50	Road crossing	Industrial/ Forest/ Open land	No
579	84.2	100	50	Road crossing	Agriculture/ Industrial	No
1456	84.6	100	50	Stream	Agriculture	No
1457	84.6	100	50	Stream	Agriculture	No
1458	84.9	100	50	Stream	Agriculture	No
1459	85.0	139	50	Stream	Forest	No
1460	85.1	100	50	Stream	Forest	No
1461	85.3	100	50	Staging area/ Parking	Open land	No
1462	85.3	100	50	Wetland	Open land	No
1963	85.5	100	50	Stream	Open land/ Forest	No
1964	85.5	100	50	Stream	Open land	No
586	85.6	100	50	Road crossing	Forest/ Open land	No
587	85.7	130	50	Road crossing	Agriculture/ Industrial	No
1463	85.7	306	15	TSS	Agriculture	No
588	85.7	100	Varies	Road crossing	Agriculture	No
589	85.8	100	Varies	Road crossing	Agriculture/	No

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Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
					Industrial	
590	85.8	171	15	TSS	Agriculture	No
1464	85.8	344	15	TSS	Agriculture	No
1465	85.9	100	50	Stream	Agriculture/ Forest/ Open land	No
591	86.1	91	15	TSS	Agriculture/ Open land	No
1466	86.1	100	50	Stream	Agriculture	No
1467	86.2	100	50	Stream	Agriculture	No
1878	86.4	100	50	Staging area/ Parking	Agriculture	No
1468	86.5	100	50	Stream	Open land	No
1469	86.6	100	50	Stream	Open land	No
593	86.9	100	50	Stream	Forest/ Open land	No
594	86.9	100	50	Stream	Forest/ Open land	No
1965	87.1	100	50	Wetland	Agriculture	No
1966	87.2	100	50	Wetland	Forest/ Open land	No
1470	87.5	100	50	Stream	Forest	No
600	87.5	100	50	Stream	Forest	No
1471	87.9	100	50	Stream	Forest	No
1472	87.9	100	50	Stream	Forest/ Open land	No
603	88.3	100	50	Stream	Forest/ Open land	No
604	88.3	100	50	Stream	Forest/ Open land	No
605	88.4	100	50	Stream	Forest	No
608	88.5	100	50	Pipeline crossing	Forest	No
609	88.6	100	50	Stream	Forest	No
610	88.6	100	50	Stream	Forest	No
1473	88.8	95	15	TSS	Agriculture	No
1474	88.8	83	15	TSS	Agriculture	No
614	88.9	100	50	Wetland	Agriculture	No
1475	88.9	218	15	TSS	Agriculture	No
615	88.9	100	50	Road crossing	Agriculture/ Industrial	No
616	88.9	100	50	Road crossing	Agriculture/ Industrial/ Forest/ Open land	No
1476	89.2	418	50	HDD	Forest	No
619	89.2	200	100	HDD	Forest	No
620	89.7	200	100	HDD	Agriculture	No
1479	89.8	536	15	TSS	Agriculture	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
681	89.8	1831	50	HDD	Agriculture/ Forest/ Wetland (PFO)	Yes
1480	89.9	333	15	TSS	Agriculture	No
1481	90.0	100	50	Stream	Agriculture	No
1482	90.3	100	50	Stream	Forest	No
1483	90.3	100	50	Stream	Forest	No
1484	90.4	100	50	Stream	Forest	No
621	90.7	100	50	Road crossing	Industrial/ Open land	No
622	90.8	113	50	Road crossing	Industrial/ Open land	No
623	91.1	100	50	Road crossing	Open land	No
624	91.1	100	50	Road crossing	Agriculture/ Industrial	No
1485	91.1	83	15	TSS	Agriculture	No
1967	91.1	100	50	Wetland	Agriculture	No
1968	91.2	100	50	Wetland	Agriculture	No
1486	91.2	657	15	TSS	Agriculture/ Forest	No
1969	91.3	100	50	Wetland	Agriculture/ Forest	No
1487	91.4	105	50	Stream	Open land	No
1488	91.7	100	50	Stream	Forest	No
625	91.8	100	50	Road crossing	Agriculture/ Industrial/ Residential	No
626	91.8	100	50	Road crossing	Industrial/ Forest	No
1489	92.0	177	15	TSS	Agriculture	No
1490	92.1	385	15	TSS	Agriculture/ Forest	No
629	92.2	100	50	Stream	Agriculture/ Forest/ Open land	No
630	92.2	213	50	Stream/ Road crossing	Forest/ Open land	No
631	92.3	100	50	Stream	Forest	No
1491	92.4	1296	15	TSS	Agriculture/ Forest	No
632	92.7	100	50	Stream	Agriculture/ Forest	No
633	92.7	100	50	Stream	Agriculture/ Forest	No
1492	92.7	334	15	TSS	Agriculture/ Open land	No
1493	92.8	220	15	TSS	Agriculture/ Forest/ Open land	No
636	92.9	100	50	Road crossing	Agriculture	No

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
637	92.9	138	50	Road crossing/ Stream	Industrial/ Forest	No
638	93.0	181	50	Stream	Forest	No
639	93.1	100	50	Stream	Forest	No
1494	93.2	100	50	Stream	Forest	No
1495	93.3	100	50	Stream	Forest	No
1496	93.3	100	50	Stream	Forest	No
641	93.7	527	25	Side slope	Forest	No
1497	93.8	100	50	Stream	Forest/ Open land	No
1498	93.8	100	50	Stream	Forest/ Open land	No
642	93.9	597	25	Side slope	Forest/ Open land	No
1970	94.0	291	25	Side slope	Forest	No
1971	94.1	67	25	Side slope	Forest	No
1972	94.1	100	50	Stream	Forest	No
1973	94.2	100	50	Stream	Forest	No
1974	94.3	100	50	Stream	Forest	No
643	94.4	100	50	Road crossing	Forest	No
644	94.4	100	50	Road crossing	Agriculture	No
1068	94.4	548	15	TSS	Agriculture	No
1499	94.6	100	50	Stream	Forest	No
1500	94.6	100	50	Stream	Forest	No
1501	94.7	100	50	Stream	Forest	No
1502	94.7	100	50	Stream	Forest	No
1503	94.8	100	50	Stream	Forest	No
1504	94.9	100	50	Stream	Forest	No
1505	94.9	100	50	Stream	Forest	No
1506	94.9	100	50	Stream	Forest	No
645	95.0	100	50	Stream/ Wetland	Forest	No
646	95.1	100	50	Stream/ Wetland	Forest	No
647	95.4	100	50	Stream	Forest	No
648	95.4	100	50	Stream	Forest	No
649	95.5	100	50	Stream	Forest	No
650	95.6	100	50	Stream	Forest	No
651	95.8	100	50	Stream	Forest	No
652	95.8	100	50	Stream	Forest	No
653	95.9	85	50	Stream	Forest	No
654	96.0	100	50	Stream	Forest	No
657	96.2	100	50	Stream	Forest	No
659	96.3	100	50	Stream	Forest	No
660	96.3	100	50	Stream	Agriculture/ Forest	No
661	96.4	218	15	TSS	Agriculture	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
662	96.4	225	50	Road crossing/ Stream	Agriculture/ Forest	No
663	96.5	100	50	Road crossing	Agriculture/ Industrial	No
1507	96.5	423	15	TSS	Agriculture	No
1508	96.7	100	50	Stream	Forest	No
1509	96.7	100	50	Stream	Forest	No
664	96.8	100	50	Stream	Forest	No
665	96.9	100	50	Stream	Agriculture/ Forest	No
666	96.9	79	30	Stream	Forest	No
667	97.0	100	50	Stream	Industrial/ Forest	No
1510	97.4	1354	15	TSS	Agriculture/ Forest	No
668	97.7	100	50	Road crossing	Agriculture/ Industrial	No
669	97.7	100	50	Road crossing	Agriculture/ Industrial	No
1511	97.7	519	15	TSS	Agriculture	No
670	97.8	100	50	Stream	Agriculture/ Forest	No
1879	97.9	100	50	Creek Crossing	Forest	No
1512	98.0	954	15	TSS	Agriculture/ Forest/ Open land	No
1880	98.2	325	15	TSS	Agriculture/ Forest	No
673	98.3	100	50	Stream	Forest	No
674	98.3	100	50	Stream	Agriculture/ forest/ Open land	No
1515	98.4	393	15	TSS	Agriculture	No
675	98.6	100	50	Stream	Forest	No
678	98.7	100	50	Stream	Forest	No
680	98.9	100	50	Wetland	Open land	No
1516	99.1	100	50	Wetland	Agriculture	No
1800	99.3	949	15	TSS	Agriculture	No
682	99.5	100	50	Road crossing	Agriculture/ Industrial	No
683	99.5	100	50	Road crossing	Agriculture/ Industrial/ Open land	No
1517	99.6	117	15	TSS	Agriculture	No
1518	99.6	113	15	TSS	Agriculture	No
1519	99.6	100	50	Stream	Agriculture/ Forest	No
1520	99.6	100	50	Stream	Agriculture/ Forest	No
1521	99.7	422	15	TSS	Agriculture	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
684	99.8	41	50	Road crossing	Industrial/ Forest	No
685	99.8	162	50	Road crossing	Industrial/ Forest	No
687	100.0	67	100	Road crossing/ Parking	Industrial/ Open land	No
1522	100.2	100	50	Stream	Forest	No
1523	100.4	309	15	TSS	Agriculture/ Forest	No
1524	100.5	1133	15	TSS	Agriculture/ Forest	No
1793	100.8	1005	15	TSS	Agriculture/ Forest	No
691	101.0	100	50	Road crossing/ Stream	Forest/ Open land	No
1525	101.1	139	15	TSS	Agriculture/ Forest	No
692	101.2	52	50	Stream	Forest/ Open land	No
693	101.2	100	50	Stream	Agriculture/ Forest	No
1526	101.2	711	15	TSS	Agriculture	No
694	101.4	100	50	Road crossing	Agriculture/ Industrial/ Forest	No
695	101.4	100	50	Road crossing	Agriculture/ Industrial/ Forest/ Open land	No
1527	101.4	772	15	TSS	Agriculture	No
696	101.5	46	50	Road crossing	Open land	No
697	101.6	75	50	Road crossing	Industrial/ Open land	No
698	101.6	866	15	TSS	Agriculture	No
701	101.8	571	15	TSS	Agriculture	No
703	102.1	100	50	Stream	Forest	No
704	102.2	100	50	Stream	Forest	No
705	102.2	240	50	Stream	Agriculture	No
1528	102.3	189	15	TSS	Agriculture/ Forest	No
1529	102.7	100	50	Stream	Forest/ Open land	No
706	102.8	127	50	Road crossing	Forest	No
707	102.8	100	50	Road crossing	Agriculture/ Industrial	No
1794	102.8	558	15	TSS	Agriculture	No
1069	103.0	2542	15	TSS	Residential	No
1071	103.7	692	15	TSS	Agriculture/ Forest/ Open land	No
1975	104.0	100	50	Stream	Forest	No
1976	104.0	100	50	Stream	Forest	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
708	104.3	100	50	Road crossing	Agriculture	No
709	104.3	136	50	Road crossing/ Wetland	Agriculture/ Industrial/ Open land	No
1072	104.3	724	15	TSS	Agriculture	No
713	104.6	100	50	Stream	Agriculture/ Forest	No
1073	104.6	124	15	TSS	Agriculture	No
714	104.6	98	50	Stream	Agriculture/ Forest	No
715	104.7	89	50	Stream	Agriculture	No
1530	104.7	2,478	15	TSS	Agriculture/ Forest/ Open land	Yes
1076	105.2	206	15	TSS	Agriculture	No
718	105.3	100	50	Road crossing	Agriculture/ Industrial/ Open land	No
719	105.3	100	50	Road crossing	Agriculture/ Industrial	No
1077	105.3	226	15	TSS	Agriculture	No
722	105.9	100	50	Stream	Forest	No
723	105.9	100	50	Stream	Forest	No
724	106.2	100	50	Stream	Forest	No
725	106.3	106	50	Stream	Forest	No
726	106.4	100	50	Road crossing	Industrial/ Forest/ Open land	No
727	106.4	100	50	Road crossing	Forest/ Open land	No
730	106.8	100	50	Road crossing	Industrial/ Forest	No
731	106.8	93	50	Road crossing/ Stream	Industrial/ Open land	No
735	107.2	100	50	Railroad Crossing	Forest	No
736	107.3	350	25	Side slope	Forest	No
738	107.4	100	50	Stream	Agriculture	No
739	107.4	839	15	TSS	Agriculture	No
1977	107.6	100	50	Stream	Agriculture/ Forest	No
1978	107.6	100	50	Stream	Agriculture	No
1531	107.6	370	15	TSS	Agriculture	No
740	107.7	100	50	Road crossing	Agriculture/ Industrial/ Forest	Yes
741	107.7	100	50	Road crossing	Agriculture/ Forest	Yes
1532	107.7	1,163	15	TSS	Agriculture/ Forest	Yes
1533	108.1	537	15	TSS	Agriculture	No
742	108.2	100	50	Road crossing	Agriculture/	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
					Industrial/ Forest	
743	108.2	280	50	Road crossing/ Stream	Agriculture/ Industrial/ Forest	No
1534	108.4	100	50	Stream	Forest	No
1535	108.5	100	50	Stream	Forest	No
1536	108.5	1,876	15	TSS	Agriculture	No
1537	108.9	100	50	Road crossing	Agriculture/ Industrial	Yes
747	108.9	100	50	Road crossing	Industrial/ Open land/ Wetland (PEM)	Yes
1877	108.9	150	100	Staging area	Agriculture/ Industrial/ Forest	No
1538	109.0	163	15	TSS	Agriculture	No
1539	109.1	202	15	TSS	Agriculture	No
1540	109.2	499	15	TSS	Agriculture/ Forest	No
1541	109.3	1843	15	TSS	Agriculture/ Forest	No
750	109.8	100	50	Road crossing	Industrial/ Forest	No
751	109.8	100	50	Road crossing	Forest	No
1542	110.0	100	50	Stream	Forest	No
1543	110.1	100	50	Stream	Forest	No
752	110.2	100	50	Road crossing	Industrial/ Forest	No
1979	110.2	100	50	Wetland	Agriculture	No
1980	110.4	100	50	Wetland	Forest	No
1544	110.5	100	50	Wetland	Forest	No
754	110.5	119	50	Stream	Forest	No
755	110.6	125	50	Stream	Forest	No
756	110.7	100	50	Road crossing	Forest	No
757	110.7	214	50	Road crossing/ Stream	Industrial/ Forest	No
760	110.9	100	50	Stream	Forest	No
761	111.3	100	50	Road crossing	Industrial/ Forest	No
762	111.3	100	50	Road crossing	Forest	No
763	111.3	100	50	Stream	Forest	No
764	111.4	174	50	Stream	Forest	Yes
766	111.5	100	50	Wetland	Forest	No
767	111.6	302	50	Road crossing/ Wetland	Forest/ Open land	No
769	111.7	82	15	Road crossing	Forest	No
770	111.7	100	50	Stream	Forest	No
771	111.8	100	50	Stream	Forest/ Open land	No
772	112.3	132	50	Road crossing	Industrial/ Open land	Yes
773	112.3	100	50	Road crossing	Forest/ Wetland	Yes

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
					(PEM)	
1545	112.5	100	50	Stream	Forest	No
1546	112.6	100	50	Stream	Forest	No
1547	112.7	100	50	Stream	Forest/ Open land	No
1548	112.7	100	50	Stream	Forest	No
1549	112.8	1,798	15	TSS	Agriculture	No
1550	113.1	100	50	Stream	Agriculture	No
1551	113.1	100	50	Stream	Agriculture/ Forest	No
1552	113.2	235	15	TSS	Agriculture/ Open land	No
774	113.2	90	50	Road crossing	Industrial/ Open land	No
775	113.2	181	50	Road crossing/ Stream	Industrial/ Forest/ Open land	No
1553	113.3	1140	15	TSS	Agriculture/ Forest	No
778	113.5	100	50	Stream	Agriculture/ Open land	No
779	113.6	100	50	Stream	Agriculture	No
1554	113.6	497	15	TSS	Agriculture	No
1555	113.7	1063	15	TSS	Agriculture	No
1556	114.0	324	15	TSS	Agriculture/ Forest	No
781	114.1	100	50	Stream	Agriculture	No
782	114.3	100	50	Stream	Forest/ Open land	No
2065	114.7	341	15	TSS	Agriculture	No
784	114.8	100	50	Road crossing	Agriculture/ Industrial	No
785	114.8	100	50	Road crossing	Agriculture/ Industrial	No
1557	114.8	2469	15	TSS	Agriculture	No
787	115.3	100	50	Stream	Open land	No
789	115.4	86	50	Stream	Forest	No
790	115.5	100	50	Stream	Forest	No
1799	115.6	447	15	TSS	Agriculture	No
1558	115.7	138	15	TSS	Agriculture	No
793	115.7	100	50	Stream	Agriculture	No
1559	115.8	678	15	TSS	Agriculture	No
1560	115.9	795	15	TSS	Agriculture	No
794	116.1	100	50	Road crossing	Agriculture/ Industrial	No
795	116.1	100	50	Road crossing	Agriculture/ Industrial	No
1561	116.1	722	15	TSS	Agriculture/	No

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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
					Forest	
1562	116.3	138	15	TSS	Agriculture/ Forest	No
1563	116.4	217	15	TSS	Agriculture	No
1564	116.4	368	15	TSS	Agriculture/ Forest	No
1565	116.6	661	15	TSS	Agriculture	No
1566	116.7	120	15	TSS	Agriculture	No
1567	116.7	453	15	TSS	Agriculture/ Forest	No
1568	117.0	100	50	Stream	Forest	No
796	117.0	845	25	Side slope	Forest	No
1569	117.2	100	50	Stream	Forest	No
797	117.3	130	50	Stream	Forest	No
798	117.3	100	50	Stream	Forest	No
799	117.3	100	50	Stream	Forest	No
800	117.5	100	50	Stream	Forest	No
1798	117.6	406	15	TSS	Agriculture/ Forest	No
1570	117.6	100	50	Stream	Agriculture/ Forest	No
1571	117.7	100	50	Stream	Forest	No
1572	117.8	605	15	TSS	Agriculture	No
801	117.9	100	50	Road crossing	Agriculture	No
802	118.0	100	50	Road crossing	Industrial/ Open land	No
1573	118.0	117	15	TSS	Agriculture	No
1574	118.0	199	15	TSS	Agriculture	No
1575	118.1	87	50	Stream	Agriculture/ Forest	No
1576	118.1	106	50	Stream	Open land	No
1981	118.3	100	50	Wetland	Forest	No
1577	118.3	100	50	Stream	Forest	No
1578	118.4	100	50	Stream	Forest	No
803	118.5	500	15	TSS	Agriculture/ Forest	No
805	118.7	100	50	Stream	Forest	No
806	118.8	100	50	Road crossing	Industrial/ Forest	Yes
807	118.9	100	50	Road crossing/ Stream	Agriculture/ Forest	No
908	119.3	150	50	Stream	Forest	No
810	119.3	100	50	Stream	Agriculture/ Forest	No
811	119.6	100	50	Stream	Agriculture	No
813	119.6	200	100	HDD	Forest	Yes
1579	120.0	20	20	Water Uptake	Open land	Yes

APPENDIX N
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ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
814	120.1	200	100	HDD	Agriculture	Yes
816	120.2	100	50	Road crossing	Forest	No
1580	120.3	968	15	TSS	Agriculture	No
1583	120.5	497	15	TSS	Agriculture	No
819	120.7	369	25	Side slope	Forest	No
820	120.8	100	50	Stream	Forest	No
821	120.8	100	50	Stream	Forest	No
1584	120.9	209	15	TSS	Agriculture	No
823	121.2	100	50	Stream	Forest	No
825	121.4	151	50	Stream/ Road crossing	Agriculture/ Industrial	No
826	121.4	100	50	Stream/ Wetland	Forest	No
827	121.5	100	50	Stream	Forest	No
828	121.6	100	50	Stream	Forest	No
829	122.1	100	50	Road crossing	Industrial/ Forest	No
830	122.1	100	50	Road crossing	Agriculture/ Industrial	No
1585	122.1	949	15	TSS	Agriculture	No
1586	122.3	534	15	TSS	Agriculture	No
1587	122.4	200	100	Stream	Agriculture	No
1176	122.4	100	50	Stream	Agriculture	No
1177	122.5	100	50	Stream	Agriculture	No
1588	122.5	200	100	Stream	Agriculture/ Forest	No
1589	122.5	901	15	TSS	Agriculture	No
1590	122.7	100	50	Stream	Agriculture	No
1591	122.7	100	50	Stream	Agriculture	No
1592	122.7	2155	15	TSS	Agriculture	No
833	123.1	100	50	Road crossing	Agriculture/ Open land	No
834	123.1	100	50	Road crossing	Agriculture/ Open land	No
1982	123.3	100	50	Wetland/ Stream	Agriculture	No
1593	123.6	100	50	Stream	Agriculture/ Forest	No
835	123.7	100	50	Road crossing	Agriculture/ Industrial	No
836	123.7	100	50	Road crossing	Agriculture/ Industrial	No
1594	123.7	71	15	TSS	Agriculture	No
1983	123.7	100	50	Stream	Agriculture	No
1984	123.8	100	50	Stream	Agriculture	No
1595	123.8	300	15	TSS	Agriculture/ Forest	No
1596	123.9	446	15	TSS	Agriculture	No
1597	124.1	100	50	Stream	Forest	No

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Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1598	124.2	100	50	Stream	Forest	No
1600	124.4	100	50	Wetland	Agriculture/ Residential	No
837	124.5	100	50	Road crossing/ Creek	Agriculture/ Industrial/ Open land	Yes
838	124.5	100	50	Road crossing	Industrial/ Open land	Yes
1986	124.6	100	50	Stream	Open land	No
1987	124.6	100	50	Stream	Forest	No
1601	124.8	100	50	Stream	Forest	No
1602	124.9	100	50	Stream	Forest	No
1603	125.1	100	50	Stream	Forest/ Open land	No
1604	125.3	100	50	Stream	Forest	No
1988	125.5	100	50	Stream	Forest	No
1989	125.6	100	50	Stream	Forest	No
839	125.6	100	50	Road crossing	Industrial/ Forest	No
840	125.6	75	50	Road crossing	Industrial/ Forest	No
1606	125.7	100	50	Stream	Forest	No
1607	126.0	100	50	Stream/ Road crossing	Forest	No
1608	126.2	100	50	Stream/ Road crossing	Forest	No
1609	126.4	100	50	Stream	Forest	No
1610	126.4	100	50	Stream	Forest	No
1611	126.5	100	50	Stream	Forest	No
1612	126.6	100	50	Stream	Forest	No
549	126.7	100	50	Pipeline crossing	Forest	No
841	127.0	100	50	Road crossing	Industrial/ Forest	No
842	127.1	100	50	Road crossing	Forest/ Open land	No
1613	127.2	100	50	Stream	Forest	No
1614	127.3	100	50	Stream	Forest	No
2011	127.5	98	50	Stream	Forest	No
2012	127.6	100	50	Stream	Forest	No
2013	127.7	100	50	Stream	Agriculture/ Forest	No
2014	127.8	119	15	TSS	Agriculture	No
2015	127.9	181	15	TSS	Agriculture	No
2016	127.9	153	15	TSS	Agriculture/ Residential	No
2017	128.0	100	75	Road crossing	Agriculture/ Industrial/ Residential	No
2019	128.1	100	50	Blasting	Agriculture/ Forest	No

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
2020	128.7	892	25	Side slope	Forest	No
2021	128.8	100	50	Pipeline crossing	Forest/ Open land	No
2022	129.0	100	50	Stream	Forest	No
2023	129.0	100	50	Stream	Forest	No
2024	129.1	125	50	Road crossing	Industrial/ Forest	No
2025	129.2	125	50	Road crossing	Industrial/ Forest	No
2026	129.4	100	50	Staging area	Forest/ Open land	No
2027	129.5	100	50	Stream	Forest	No
2028	129.5	100	50	Stream	Forest	No
2029	129.7	787	15	TSS	Agriculture	No
2030	129.9	100	50	Road crossing	Agriculture	No
2031	129.9	100	50	Road crossing	Industrial/ Open land	Yes
2068	130.0	140	50	HDD	Industrial/ Open land	No
859	130.2	200	100	HDD	Open land/ Wetland (PSS)	Yes
2067	130.9	141	30	HDD	Open land/ Residential	No
860	130.9	383	69	HDD	Forest/ Open land/ Residential	No
LEX1						
2003	0.2	175	15	TSS	Agriculture/ Forest	No
2004	0.3	147	15	TSS	Agriculture	No
2001	0.4	100	50	Stream	Open land	No
2002	0.5	100	50	Stream	Forest/ Open land	No
2070	0.8	100	50	Stream	Forest	No
2071	0.9	105	50	Stream	Agriculture	No
2000	0.9	1479	15	TSS	Agriculture	No
R-801 Loop						
864	0.2	100	50	Road crossing	Industrial/ Forest	No
865	0.3	530	25	Blasting	Agriculture/ Forest	No
2005	0.6	100	50	Pipeline crossing	Forest	No
1632	0.6	100	50	Pipeline crossing	Forest	No
866	0.9	100	50	Road crossing/ Stream	Forest/ Open land	No
867	0.9	100	50	Road crossing/ Stream	Forest	No
868	1.1	666	15	TSS	Agriculture/ Forest/ Open land	No
869	1.2	100	50	Road crossing	Agriculture	No

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
870	1.2	100	50	Road crossing	Agriculture	No
871	1.2	514	15	TSS	Agriculture	No
1633	1.3	100	50	Stream	Agriculture	No
872	1.3	173	50	Road crossing/ Stream	Agriculture/ Industrial	No
873	1.4	100	50	Road crossing	Agriculture/ Industrial	No
874	1.4	792	15	TSS	Agriculture	No
875	1.5	100	50	Road crossing	Agriculture/ Industrial	No
876	1.6	100	50	Road crossing	Agriculture/ Industrial	No
877	1.6	1332	15	TSS	Agriculture	No
878	1.8	1056	25	Side slope	Agriculture/ Forest	No
879	2.0	191	15	TSS	Agriculture	No
1634	2.1	100	50	Stream	Agriculture	No
880	2.2	141	50	Road crossing/ Stream	Industrial/ Residential	No
881	2.2	204	50	Road crossing/ Stream	Industrial/ Open land	No
1635	2.4	100	50	Stream	Forest/ Open land	No
1636	2.4	100	50	Stream	Forest/ Open land	No
1637	2.5	100	50	Stream	Forest	No
1638	2.6	100	50	Stream	Forest	No
1639	2.8	100	50	Stream	Forest	No
1640	2.9	100	50	Stream	Forest	No
1641	2.9	100	50	Stream	Forest	No
1642	3.0	100	50	Stream	Forest	No
1643	3.0	100	50	Stream	Forest	No
1644	3.1	100	50	Stream	Forest	No
1645	3.2	100	50	Stream	Forest	No
882	3.2	388	25	Side slope	Forest	No
883	3.4	100	50	Road crossing	Agriculture/ Industrial	No
884	3.4	109	50	Road crossing	Agriculture	Yes
1647	3.5	153	50	Stream	Agriculture/ Forest	No
1648	3.6	100	50	Stream	Forest	No
1649	3.8	100	50	Parking	Open land	No
1650	4.0	100	50	Stream	Forest/ Open land	No
1651	4.1	100	50	Stream	Forest	No
1652	4.2	219	15	TSS	Agriculture/ Forest	No

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1653	4.2	100	50	Stream	Forest	No
1654	4.3	71	50	Stream	Forest	No
1655	4.4	100	50	Stream	Forest	No
1656	4.6	100	50	Stream	Forest	No
1657	4.6	100	50	Stream	Forest/ Open land	No
885	4.8	100	50	Road crossing	Forest	No
886	4.9	100	50	Road crossing	Forest	No
1658	4.9	100	50	Stream	Forest/ Residential	No
1659	5.0	100	50	Stream	Forest	No
887	5.1	100	50	Road crossing/ Stream	Forest/ Residential	No
888	5.2	100	50	Road crossing/ Stream	Forest/ Residential	No
1660	5.4	100	50	Stream	Forest	No
1661	5.5	100	50	Stream	Forest	No
1662	5.6	100	50	Stream	Forest	No
1663	5.7	100	50	Stream	Forest	No
1664	5.9	100	50	Stream	Forest	No
1665	6.0	100	50	Stream	Forest	No
1666	6.1	100	50	Stream	Forest	No
1667	6.1	100	50	Stream	Forest	No
1668	6.1	100	50	Stream	Forest	No
1669	6.2	100	50	Stream	Forest	No
1670	6.4	100	50	Stream	Open land	No
1671	6.6	100	50	Stream	Open land	No
1672	6.6	360	15	TSS	Agriculture	No
889	6.7	100	50	Road crossing	Agriculture/ Industrial	No
890	6.7	100	50	Road crossing	Industrial/ Forest/ Open land	Yes
1673	6.9	100	50	Stream	Forest	No
1674	6.9	100	50	Stream	Forest	No
891	7.0	100	50	Stream	Forest	No
892	7.1	100	50	Stream	Forest	No
2009	7.2	100	50	Stream	Forest	No
2010	7.2	100	50	Stream	Forest	No
893	7.3	100	50	Road crossing/ Stream	Forest	No
894	7.4	100	50	Road crossing/ Stream	Forest	No
895	7.6	100	50	Road crossing/ Stream	Forest/ Open land	No
896	7.7	100	50	Road crossing/ Stream	Open land	No

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1675	7.7	100	50	Stream	Forest	No
2032	7.8	100	50	Stream	Forest	No
2033	7.9	100	50	Stream	Forest	No
1676	8.0	100	50	Stream	Forest	No
1677	8.1	100	50	Stream	Forest	No
850	8.6	100	50	Pipeline crossing	Forest	No
1680	8.6	100	50	Stream	Forest	No
1681	8.7	209	50	Stream	Forest	No
1682	8.8	100	50	Stream	Forest	No
897	8.9	100	50	Road crossing	Industrial/ Open land	Yes
898	8.9	210	25	Road crossing	Industrial/ Residential	No
1683	9.0	242	50	Wetland/ Stream	Forest	No
1881	9.1	100	50	Stream	Forest	No
1938	9.2	100	50	Stream	Forest	No
1939	9.2	100	50	Stream	Forest	No
902	9.3	100	50	Stream	Forest	No
1870	9.4	100	50	Stream	Forest	No
903	9.6	100	50	Road crossing	Industrial/ Forest	No
904	9.6	100	50	Road crossing	Industrial/ Forest	No
1140	9.7	100	50	Pipeline crossing	Agriculture	No
906	9.9	100	50	Stream	Forest	No
907	9.9	100	50	Stream	Forest	No
1891	10.1	100	50	Stream	Open land	No
909	10.2	100	50	Stream	Open land	No
910	10.3	100	50	Road crossing	Industrial/ Open land	No
911	10.3	100	50	Road crossing	Agriculture/ Industrial	No
913	10.5	100	50	Stream	Forest	No
914	10.6	124	50	Stream	Forest	No
915	10.6	100	50	Stream	Forest/ Open land	No
916	10.6	449	25	Side slope	Agriculture/ Forest	No
917	11.1	100	50	Stream	Agriculture/ Forest	No
918	11.1	100	50	Stream	Forest	No
921	11.3	100	50	Stream	Forest	No
922	11.3	100	50	Stream	Forest	No
923	11.3	922	15	TSS	Agriculture/ Forest	No
2063	11.5	100	50	Pipeline crossing	Agriculture	No
2064	11.6	100	50	Pipeline crossing	Agriculture	No

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1684	11.6	221	15	TSS	Agriculture	No
924	11.6	100	50	Road crossing	Agriculture/ Industrial	No
925	11.7	100	50	Road crossing	Agriculture/ Industrial	No
1685	11.7	254	15	TSS	Agriculture	No
926	11.7	100	50	Stream	Agriculture	No
927	11.8	100	50	Stream	Forest	No
929	12.0	100	50	Stream	Agriculture/ Forest	No
930	12.1	100	50	Stream	Forest/ Open land	No
931	12.2	100	50	Stream	Forest	No
932	12.3	100	50	Stream	Forest	No
933	12.4	100	50	Stream	Forest	No
934	12.4	100	50	Stream	Forest	No
935	12.6	100	50	Stream	Forest	No
936	12.8	114	50	Stream	Forest	No
939	12.9	36	50	Road crossing	Industrial/ Forest	No
940	12.9	100	50	Road crossing	Industrial/ Forest	No
941	13.0	100	50	Stream	Forest	No
942	13.0	100	50	Stream	Forest	No
944	13.1	100	50	Stream	Forest	No
945	13.2	100	50	Stream	Forest	No
946	13.3	100	50	Stream	Forest	No
947	13.3	100	50	Stream	Forest	No
948	13.4	222	50	Stream	Forest	No
950	13.5	216	50	Stream	Forest	No
953	13.6	100	50	Stream	Forest	No
954	13.7	100	50	Road crossing	Forest	No
955	13.7	100	50	Road crossing	Forest	No
956	13.9	100	50	Stream	Forest	No
957	14.0	100	50	Stream	Forest	No
959	14.1	220	50	Stream	Forest	No
962	14.2	100	50	Road crossing/ Stream	Forest/ Open land	No
963	14.2	100	50	Road crossing	Forest	No
964	14.4	100	50	Stream	Forest	No
965	14.5	133	50	Stream	Forest	No
966	14.6	100	50	Stream	Forest	No
967	14.7	100	50	Stream	Forest	No
968	14.8	100	50	Stream	Forest	No
1686	15.0	100	50	Pipeline crossing	Forest	No
969	15.4	107	50	Stream	Forest	No
970	15.4	102	30	Stream	Forest	No

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
972	15.6	100	50	Stream	Industrial/ Forest	No
973	16.1	100	50	Stream	Forest	No
974	16.2	100	50	Stream	Forest/ Open land	No
1687	16.3	100	50	Stream	Open land	No
975	16.3	149	50	Road crossing	Industrial/ Open land	No
977	16.4	100	50	Stream	Forest	No
978	16.5	100	50	Stream	Forest	No
979	16.6	100	50	Stream	Forest	No
980	16.6	102	25	Side slope	Forest	No
1688	16.7	100	50	Stream	Forest	No
981	16.7	205	50	Stream	Forest	No
1689	16.8	100	50	Stream	Forest	No
982	16.9	114	25	Side slope	Forest	No
983	16.9	100	50	Wetland	Forest/ Open land	No
984	17.0	100	50	Stream	Forest/ Open land	No
985	17.5	100	50	Road crossing	Industrial/ Forest	No
986	17.6	100	50	Road crossing/ Stream	Forest	No
987	17.6	100	50	Stream	Forest	No
988	17.7	100	50	Stream	Forest	No
989	17.7	181	25	Side slope	Forest	No
990	18.0	100	50	Stream	Forest	No
991	18.0	100	50	Stream	Forest	No
992	18.2	364	25	Side slope	Forest	No
993	18.3	181	25	Side slope	Forest	No
994	18.4	100	50	Stream	Forest	No
995	18.5	263	50	Stream	Forest	No
997	18.6	100	50	Stream	Forest	No
1691	18.8	99	50	Stream	Forest	No
1692	18.9	100	50	Pipeline crossing	Forest	No
1693	19.0	235	20	Pipeline crossing	Forest	No
1694	19.1	73	50	Stream	Forest	No
1695	19.2	100	50	Stream	Forest	No
2034	19.2	100	50	Stream	Forest	No
2035	19.3	100	50	Stream	Forest	No
1697	19.7	100	50	Road crossing	Agriculture/ Industrial	No
1698	19.7	100	20	Road crossing	Agriculture/ Industrial	No
1700	20.0	100	50	Stream	Forest	No
1701	20.0	100	50	Stream	Forest	No

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
1702	20.2	100	50	Stream	Forest	No
1703	20.3	100	50	Stream	Forest	No
2036	20.3	100	50	Stream	Forest	No
2037	20.4	100	50	Stream	Forest	No
1704	20.4	100	50	Parking	Agriculture	No
1706	20.7	100	50	Stream	Forest/ Open land	No
2038	20.7	100	50	Stream	Forest	No
1708	20.9	100	50	Stream	Agriculture	No
1709	20.9	100	50	Stream	Agriculture/ Forest	No
1711	21.0	100	50	Stream	Open land	No
1712	21.1	100	50	Stream	Forest	No
1713	21.1	100	40	Parking	Forest/ Open land	No
1714	21.6	100	50	Road crossing	Agriculture	No
2039	21.6	100	50	Stream	Open land	No
2040	21.7	100	50	Stream	Open land	No
2041	21.8	95	50	Stream	Open land	No
2042	22.1	100	50	Stream	Forest	No
2043	22.2	100	50	Stream	Forest	No
1716	22.3	100	50	Stream	Forest	No
1717	22.3	100	50	Stream	Open land	No
1718	22.5	100	50	Parking	Open land	No
2044	22.6	100	50	Stream	Agriculture	No
2045	22.6	100	50	Stream	Forest/ Open land	No
1719	22.7	100	50	Road crossing	Industrial/ Forest/ Open land	No
1720	22.8	89	50	Road crossing	Forest	No
1721	22.8	100	50	Stream	Forest	No
2046	23.1	100	50	Stream	Agriculture	No
2047	23.1	100	50	Stream	Agriculture	No
1722	23.3	100	50	Road crossing	Agriculture/ Industrial/ Forest	No
1723	23.3	93	50	Road crossing/ Pipeline crossing	Industrial/ Forest/ Open land	No
1724	23.4	104	20	Pipeline crossing	Forest/ Open land	No
1725	23.5	100	50	Stream	Forest	No
1726	23.6	100	50	Stream	Forest	No
1727	23.7	100	50	Stream	Forest	No
2048	23.8	100	50	Stream	Forest	No
2049	23.8	100	50	Stream	Forest	No
2050	23.9	100	50	Stream	Forest	No

APPENDIX N
Extra Workspace Associated with the Leach XPress Project

ATWS ID	Milepost	Dimensions (feet) Length	Dimensions (feet) Width	Justification	Land Use	Deviation to the FERC Plan and Procedures[a]
2051	24.0	100	50	Stream	Forest	No
2052	24.0	100	50	Stream	Forest	No
2053	24.1	100	50	Stream	Forest	No
			BM-111 Loop			
1050	1.0	250	100	HDD	Forest	Yes
1181	1.1	1387	65	Side slope	Industrial/ Forest/ Open land	Yes
1052	1.4	100	35	Road crossing/ Stream	Open land/ Residential	No
1730	1.4	1027	50	HDD	Forest/ Open land	Yes
1729	1.5	100	50	Stream	Forest/ Open land	No
1985	1.5	100	50	Stream	Forest	No
1054	1.7	100	50	Stream	Forest	No
1055	1.8	100	50	Stream	Forest	No
1731	2.2	100	50	Stream	Open land	No
1732	2.3	100	50	Stream	Forest	No
1056	2.4	100	50	Road crossing	Open land	No
1057	2.4	138	50	Road crossing	Industrial/ Open land	No
1058	2.4	100	50	Road crossing	Residential	No
1059	2.5	100	50	Stream	Residential	No
1060	2.5	100	50	Stream	Agriculture	No
1734	2.6	200	200	Stream	Agriculture/ Forest	No
1733	2.6	100	50	Stream	Agriculture/ Forest	No
459	2.6	43	50	Stream	Forest	No
1061	2.7	100	25	Stream	Forest/ Open land	No

TSS – topsoil segregation
HDD – horizontal directional drill
[a] Site-specific deviations to the FERC Plan and Procedures are identified and further detailed in Appendix E.

APPENDIX O
Site-Specific Plans for Residences Within Construction of the Leach XPress Project

HOCKING COUNTY, OHIO

DESCRIPTION

THIS DRAWING DOCUMENTS MITIGATION MEASURES THAT WILL BE IMPLEMENTED FOR ALL RESIDENCES WITHIN 50 FEET OF THE PROPOSED CONSTRUCTION WORK AREA. CONTRACTOR SHALL COMPLY WITH THE FOLLOWING CONSTRUCTION MITIGATION REQUIREMENTS IN ADDITION TO THOSE LISTED IN THE CONSTRUCTION SPECIFICATIONS.

CONSTRUCTION REQUIREMENTS

1. CONTRACTOR SHALL ERECT AND MAINTAIN A SAFETY FENCE BETWEEN THE CONSTRUCTION ZONE AND THE ADJACENT RESIDENCES EXTENDING 100 FEET ON EITHER SIDE OF THE RESIDENCE TO ENSURE THAT EQUIPMENT, MATERIALS AND SPOIL REMAIN WITHIN THE CONSTRUCTION WORK AREA.
2. A MINIMUM OF 25 FEET WILL BE MAINTAINED BETWEEN THE RESIDENCE AND CONSTRUCTION WORK AREA FOR A DISTANCE OF 100 FEET ON EITHER SIDE OF THE RESIDENCE. IF THE FACILITY MUST BE WITHIN 25 FEET OF A RESIDENCE, IT MUST BE INSTALLED SUCH THAT THE TRENCH DOES NOT REMAIN OPEN OVERNIGHT.
3. MATURE TREES AND LANDSCAPING WILL NOT BE REMOVED FROM WITHIN THE EDGE OF THE CONSTRUCTION WORK AREA UNLESS NECESSARY FOR SAFE OPERATION OF CONSTRUCTION EQUIPMENT OR AS SPECIFIED IN LANDOWNER AGREEMENTS.
4. OTHER EXISTING PHYSICAL FEATURES THAT NEED TO BE PROTECTED WILL BE ENCLOSED IN SAFETY FENCE TO AVOID DISTURBANCE DURING CONSTRUCTION.
5. TRENCH SHALL NOT BE EXCAVATED UNTIL PIPELINE IS READY FOR INSTALLATION AND SHALL BE BACKFILLED IN SAME DAY AS PIPE INSTALLATION IN THIS AREA. ALL OPEN DITCHES SHALL BE BARRICADED/FENCED OFF OR PLATED WHEN CONSTRUCTION ACTIVITIES ARE NOT IN PROGRESS.
6. IMMEDIATELY AFTER BACKFILLING THE TRENCH, ALL LAWN AND LANDSCAPING WILL BE RESTORED TO FINAL RESTORATION, OR TEMPORARY RESTORATION PENDING WEATHER AND SOIL CONDITIONS. IF SEASONAL OR WEATHER CONDITIONS PREVENT COMPLIANCE WITH THESE TIME FRAMES, TEMPORARY EROSION CONTROLS MUST BE MONITORED AND MAINTAINED UNTIL CONDITIONS ALLOW COMPLETION OF RESTORATION.
7. CONTRACTOR SHALL UTILIZE WATER TRUCKS AS NECESSARY TO MINIMIZE FUGITIVE DUST FROM CONSTRUCTION ACTIVITIES NEAR RESIDENCES/BUSINESSES.
8. ACCESS TO RESIDENCES BY CAR WILL BE MAINTAINED AT ALL TIMES, OR OTHER ACCOMMODATIONS WILL BE MADE WITH EACH RESPECTIVE LANDOWNER.
9. CONTRACTOR SHALL MAINTAIN AGREED UPON ACCESS TO THE IMPACTED AREA DURING CONSTRUCTION.
10. CONTRACTOR SHALL LIMIT WORK IN THIS AREA TO DAYLIGHT HOURS, UNLESS OTHERWISE AGREED UPON WITH LANDOWNER/OCCUPANT.
11. LANDOWNER/OCCUPANT SHALL BE NOTIFIED OF PROPOSED CONSTRUCTION ACTIVITIES PRIOR TO CONSTRUCTION WORK.

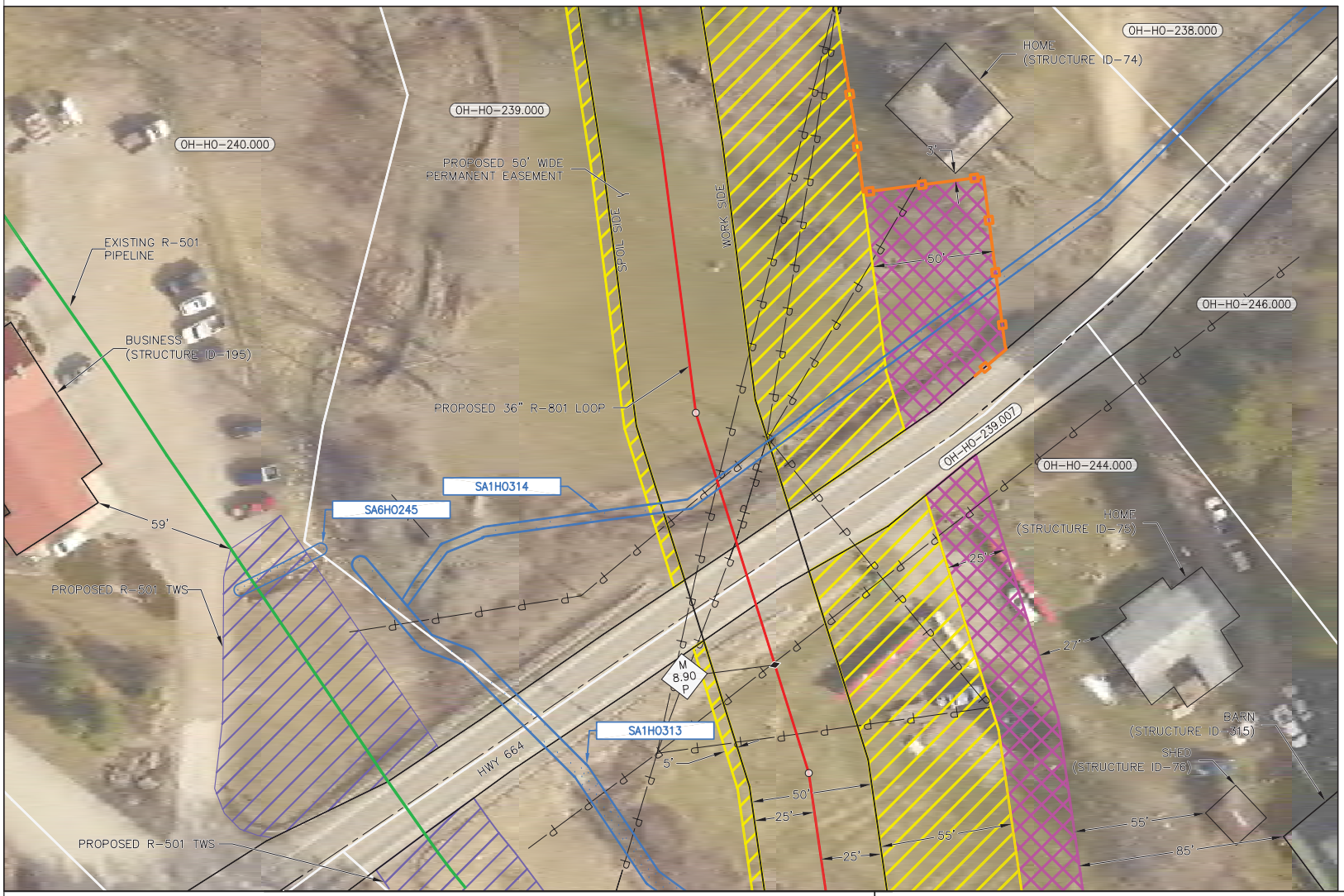
PRELIMINARY NOT
FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-1
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

HOCKING COUNTY, OHIO



DESCRIPTION

THIS DRAWING DOCUMENTS MITIGATION MEASURES THAT WILL BE IMPLEMENTED FOR ALL RESIDENCES WITHIN 50 FEET OF THE PROPOSED CONSTRUCTION WORK AREA. CONTRACTOR SHALL COMPLY WITH THE FOLLOWING CONSTRUCTION MITIGATION REQUIREMENTS IN ADDITION TO THOSE LISTED IN THE CONSTRUCTION SPECIFICATIONS.

CONSTRUCTION REQUIREMENTS

1. CONTRACTOR SHALL ERECT AND MAINTAIN A SAFETY FENCE BETWEEN THE CONSTRUCTION ZONE AND THE ADJACENT RESIDENCES EXTENDING 100 FEET ON EITHER SIDE OF THE RESIDENCE TO ENSURE THAT EQUIPMENT, MATERIALS AND SPOIL REMAIN WITHIN THE CONSTRUCTION WORK AREA.
2. A MINIMUM OF 25 FEET WILL BE MAINTAINED BETWEEN THE RESIDENCE AND CONSTRUCTION WORK AREA FOR A DISTANCE OF 100 FEET ON EITHER SIDE OF THE RESIDENCE. IF THE FACILITY MUST BE WITHIN 25 FEET OF A RESIDENCE, IT MUST BE INSTALLED SUCH THAT THE TRENCH DOES NOT REMAIN OPEN OVERNIGHT.
3. MATURE TREES AND LANDSCAPING WILL NOT BE REMOVED FROM WITHIN THE EDGE OF THE CONSTRUCTION WORK AREA UNLESS NECESSARY FOR SAFE OPERATION OF CONSTRUCTION EQUIPMENT OR AS SPECIFIED IN LANDOWNER AGREEMENTS.
4. OTHER EXISTING PHYSICAL FEATURES THAT NEED TO BE PROTECTED WILL BE ENCLOSED IN SAFETY FENCE TO AVOID DISTURBANCE DURING CONSTRUCTION.
5. TRENCH SHALL NOT BE EXCAVATED UNTIL PIPELINE IS READY FOR INSTALLATION AND SHALL BE BACKFILLED IN SAME DAY AS PIPE INSTALLATION IN THIS AREA. ALL OPEN DITCHES SHALL BE BARRICADED/FENCED OFF OR PLATED WHEN CONSTRUCTION ACTIVITIES ARE NOT IN PROGRESS.
6. IMMEDIATELY AFTER BACKFILLING THE TRENCH, ALL LAWN AND LANDSCAPING WILL BE RESTORED TO FINAL RESTORATION, OR TEMPORARY RESTORATION PENDING WEATHER AND SOIL CONDITIONS. IF SEASONAL OR WEATHER CONDITIONS PREVENT COMPLIANCE WITH THESE TIME FRAMES, TEMPORARY EROSION CONTROLS MUST BE MONITORED AND MAINTAINED UNTIL CONDITIONS ALLOW COMPLETION OF RESTORATION.
7. CONTRACTOR SHALL UTILIZE WATER TRUCKS AS NECESSARY TO MINIMIZE FUGITIVE DUST FROM CONSTRUCTION ACTIVITIES NEAR RESIDENCES/BUSINESSES.
8. ACCESS TO RESIDENCES BY CAR WILL BE MAINTAINED AT ALL TIMES, OR OTHER ACCOMMODATIONS WILL BE MADE WITH EACH RESPECTIVE LANDOWNER.
9. CONTRACTOR SHALL MAINTAIN AGREED UPON ACCESS TO THE IMPACTED AREA DURING CONSTRUCTION.
10. CONTRACTOR SHALL LIMIT WORK IN THIS AREA TO DAYLIGHT HOURS, UNLESS OTHERWISE AGREED UPON WITH LANDOWNER/OCCUPANT.
11. LANDOWNER/OCCUPANT SHALL BE NOTIFIED OF PROPOSED CONSTRUCTION ACTIVITIES PRIOR TO CONSTRUCTION WORK.

PRELIMINARY NOT FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

N

Appendix O-2
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

HOCKING COUNTY, OHIO

DESCRIPTION

THIS DRAWING DOCUMENTS MITIGATION MEASURES THAT WILL BE IMPLEMENTED FOR ALL RESIDENCES WITHIN 50 FEET OF THE PROPOSED CONSTRUCTION WORK AREA. CONTRACTOR SHALL COMPLY WITH THE FOLLOWING CONSTRUCTION MITIGATION REQUIREMENTS IN ADDITION TO THOSE LISTED IN THE CONSTRUCTION SPECIFICATIONS.

CONSTRUCTION REQUIREMENTS

1. CONTRACTOR SHALL ERECT AND MAINTAIN A SAFETY FENCE BETWEEN THE CONSTRUCTION ZONE AND THE ADJACENT RESIDENCES EXTENDING 100 FEET ON EITHER SIDE OF THE RESIDENCE TO ENSURE THAT EQUIPMENT, MATERIALS AND SPOIL REMAIN WITHIN THE CONSTRUCTION WORK AREA.
2. A MINIMUM OF 25 FEET WILL BE MAINTAINED BETWEEN THE RESIDENCE AND CONSTRUCTION WORK AREA FOR A DISTANCE OF 100 FEET ON EITHER SIDE OF THE RESIDENCE. IF THE FACILITY MUST BE WITHIN 25 FEET OF A RESIDENCE, IT MUST BE INSTALLED SUCH THAT THE TRENCH DOES NOT REMAIN OPEN OVERNIGHT.
3. MATURE TREES AND LANDSCAPING WILL NOT BE REMOVED FROM WITHIN THE EDGE OF THE CONSTRUCTION WORK AREA UNLESS NECESSARY FOR SAFE OPERATION OF CONSTRUCTION EQUIPMENT OR AS SPECIFIED IN LANDOWNER AGREEMENTS.
4. OTHER EXISTING PHYSICAL FEATURES THAT NEED TO BE PROTECTED WILL BE ENCLOSED IN SAFETY FENCE TO AVOID DISTURBANCE DURING CONSTRUCTION.
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9. CONTRACTOR SHALL MAINTAIN AGREED UPON ACCESS TO THE IMPACTED AREA DURING CONSTRUCTION.
10. CONTRACTOR SHALL LIMIT WORK IN THIS AREA TO DAYLIGHT HOURS, UNLESS OTHERWISE AGREED UPON WITH LANDOWNER/OCCUPANT.
11. LANDOWNER/OCCUPANT SHALL BE NOTIFIED OF PROPOSED CONSTRUCTION ACTIVITIES PRIOR TO CONSTRUCTION WORK.

PRELIMINARY NOT FOR CONSTRUCTION

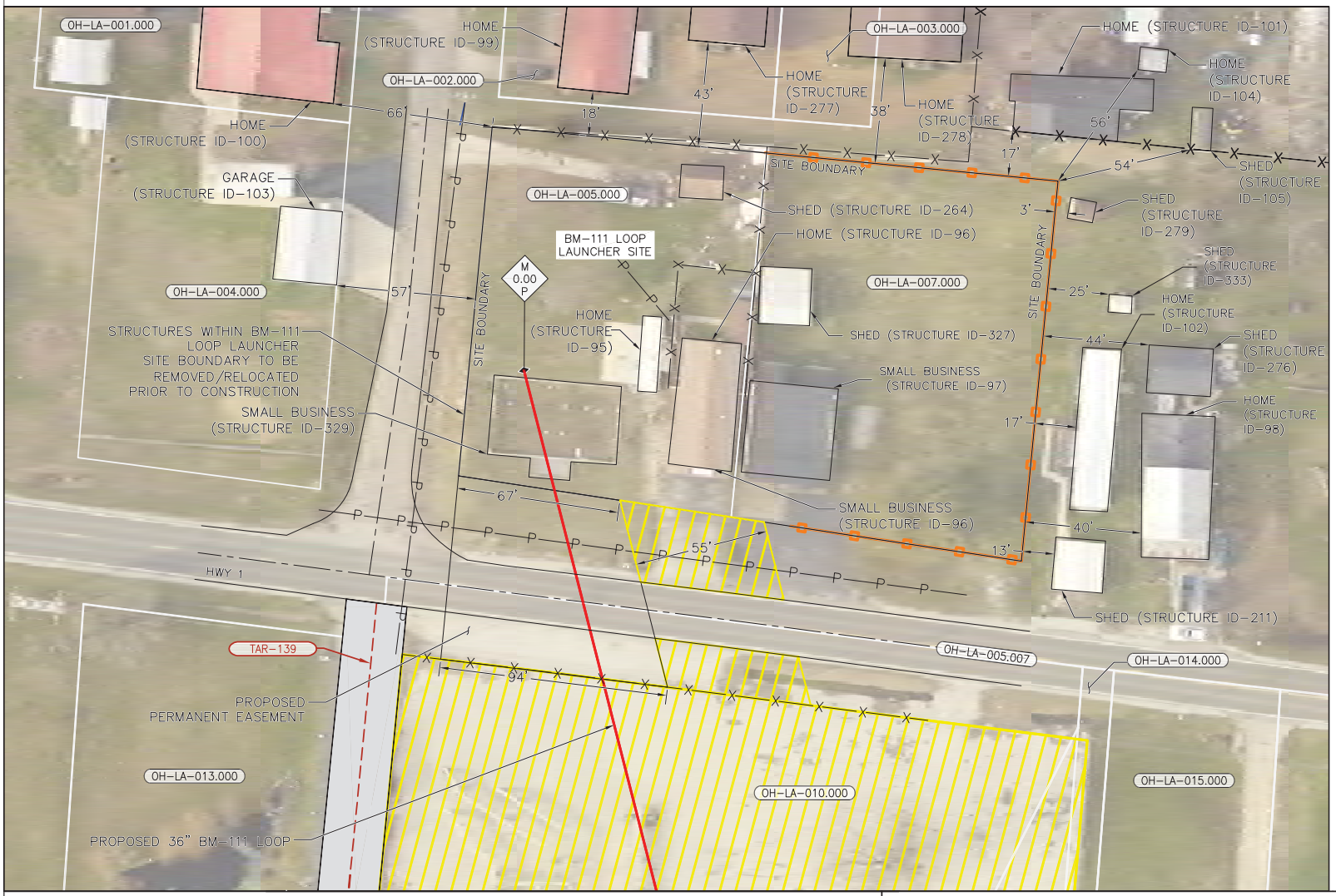
MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

N

Appendix O-3
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

LAWRENCE COUNTY, OHIO



DESCRIPTION

THIS DRAWING DOCUMENTS MITIGATION MEASURES THAT WILL BE IMPLEMENTED FOR ALL RESIDENCES WITHIN 50 FEET OF THE PROPOSED CONSTRUCTION WORK AREA. CONTRACTOR SHALL COMPLY WITH THE FOLLOWING CONSTRUCTION MITIGATION REQUIREMENTS IN ADDITION TO THOSE LISTED IN THE CONSTRUCTION SPECIFICATIONS.

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11. LANDOWNER/OCCUPANT SHALL BE NOTIFIED OF PROPOSED CONSTRUCTION ACTIVITIES PRIOR TO CONSTRUCTION WORK.

PRELIMINARY NOT FOR CONSTRUCTION

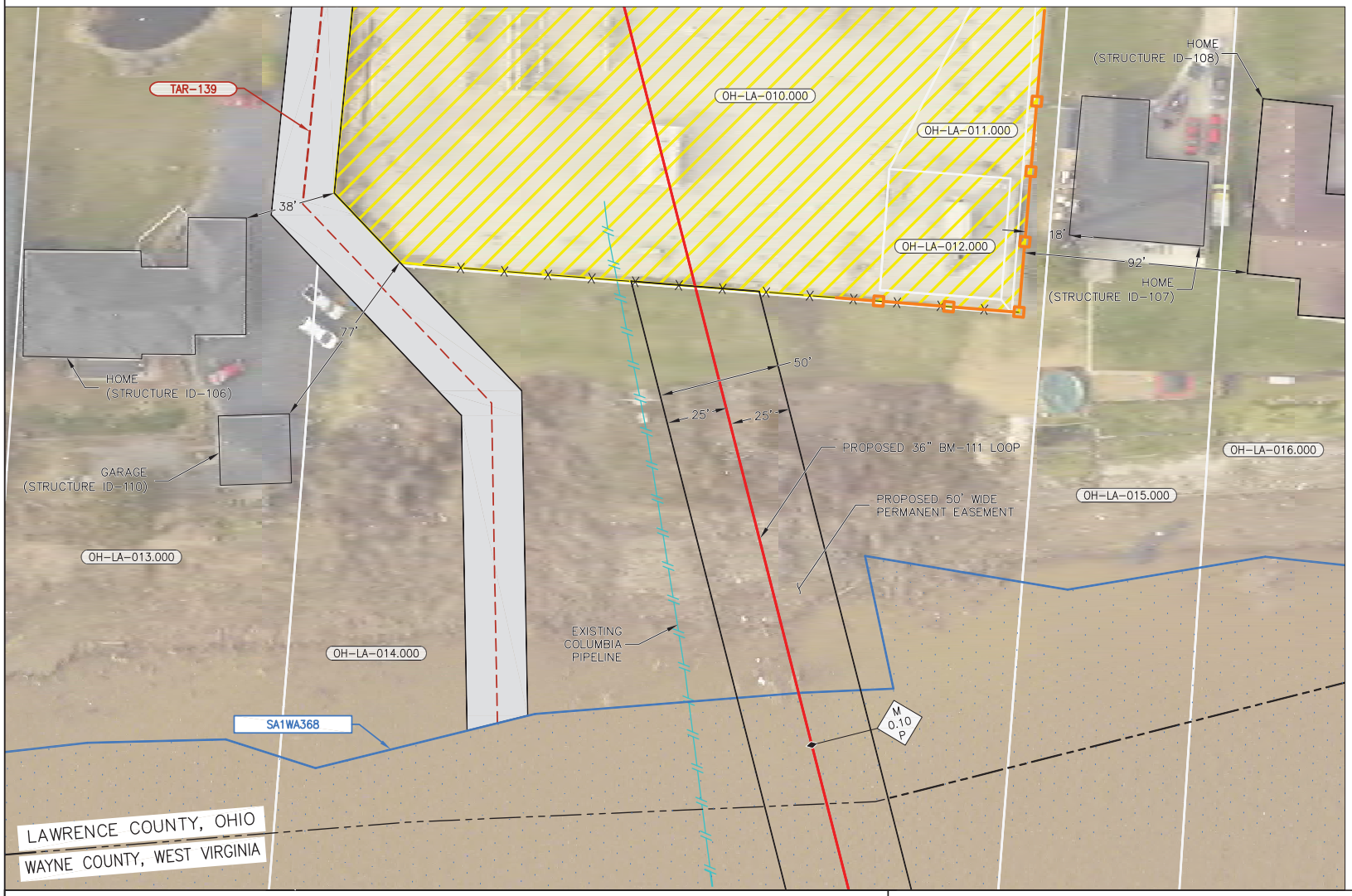
MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WFAD/C002 WETLAND ID
SPAD/C002 WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

N

Appendix O-4
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

LAWRENCE COUNTY, OHIO



DESCRIPTION

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11. LANDOWNER/OCCUPANT SHALL BE NOTIFIED OF PROPOSED CONSTRUCTION ACTIVITIES PRIOR TO CONSTRUCTION WORK.

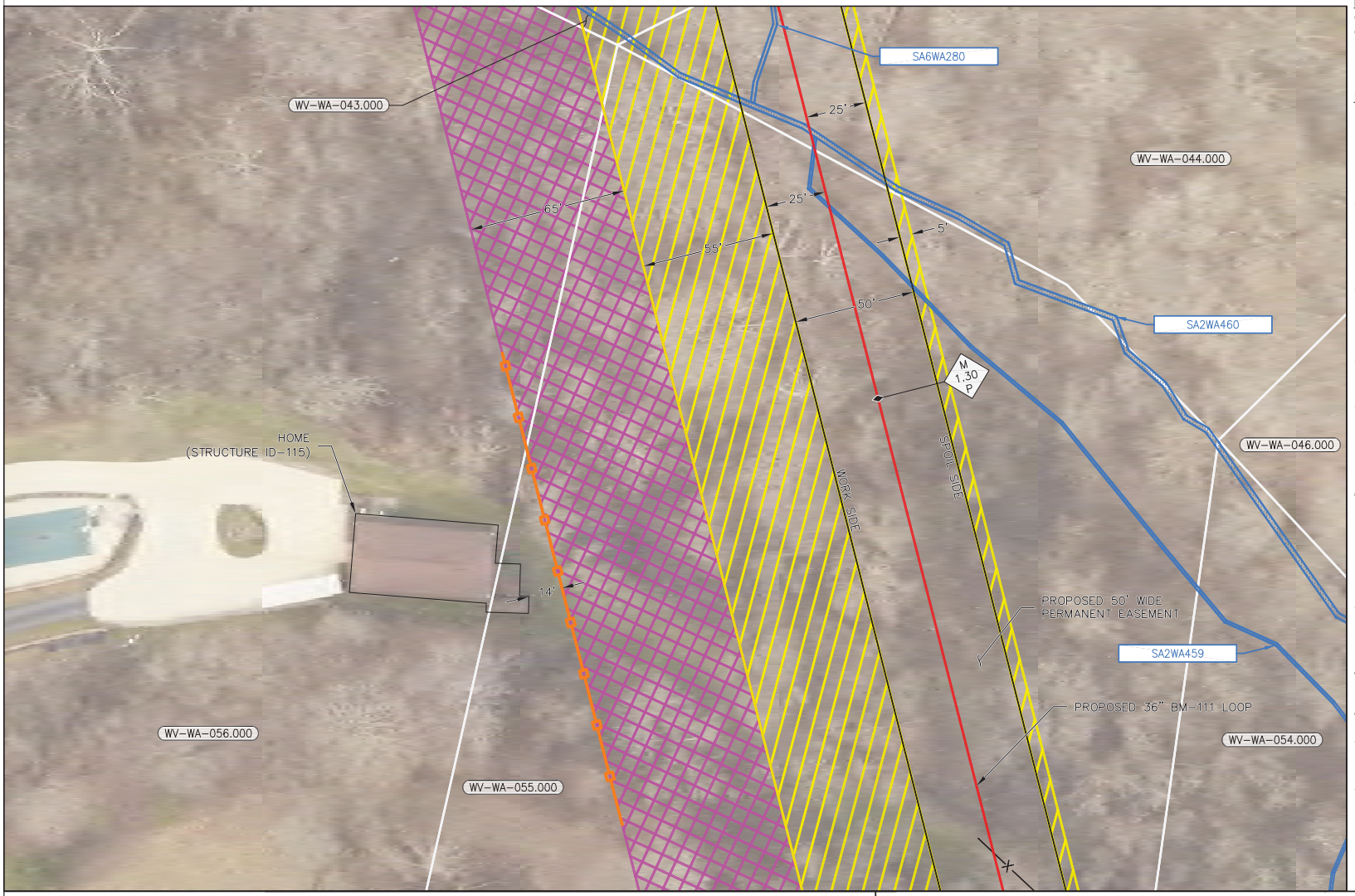
PRELIMINARY NOT
FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-5
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

WAYNE COUNTY, WEST VIRGINIA



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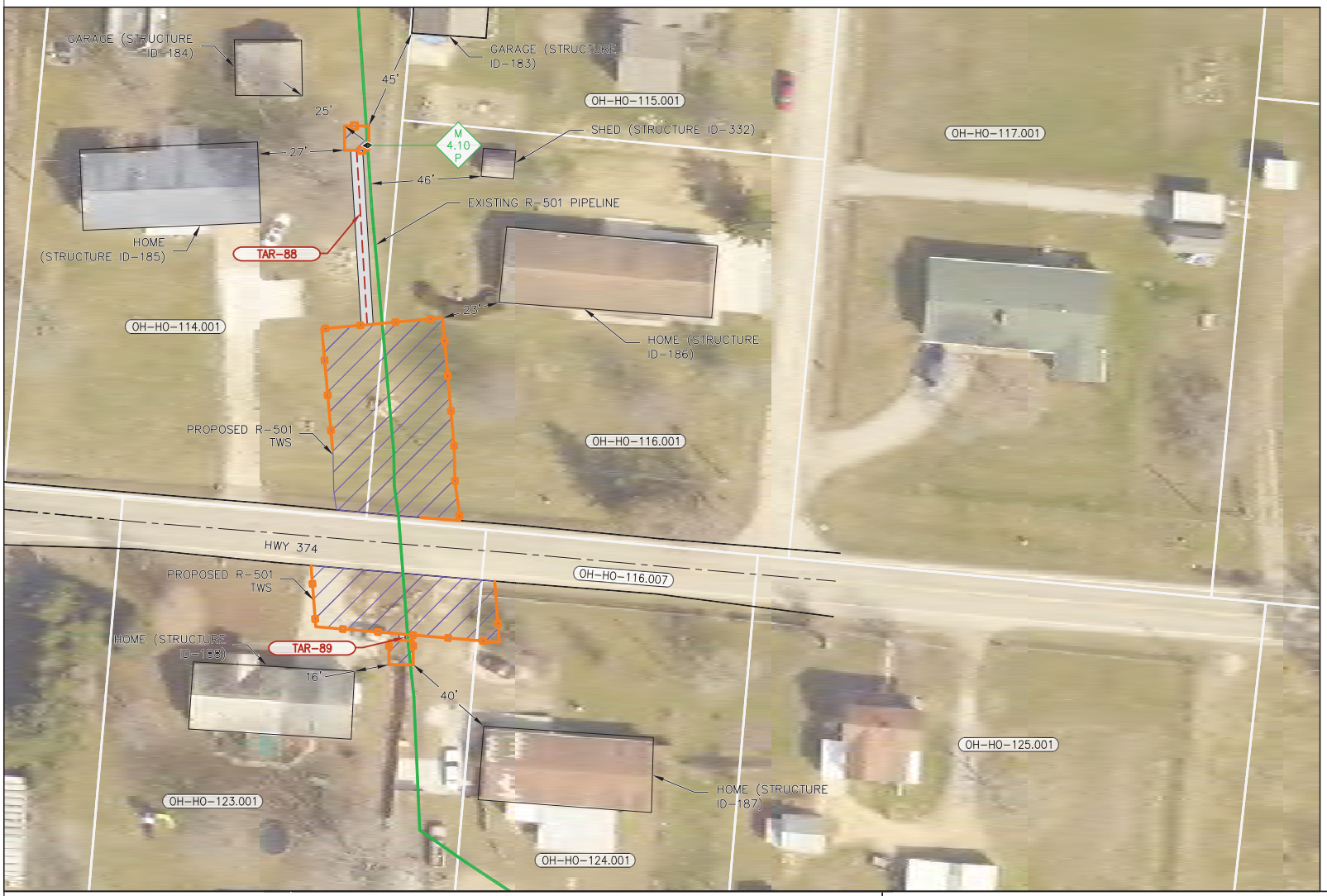
PRELIMINARY NOT FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WPADJC002 WETLAND ID
SPADJC002 WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-6
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

HOCKING COUNTY, OHIO



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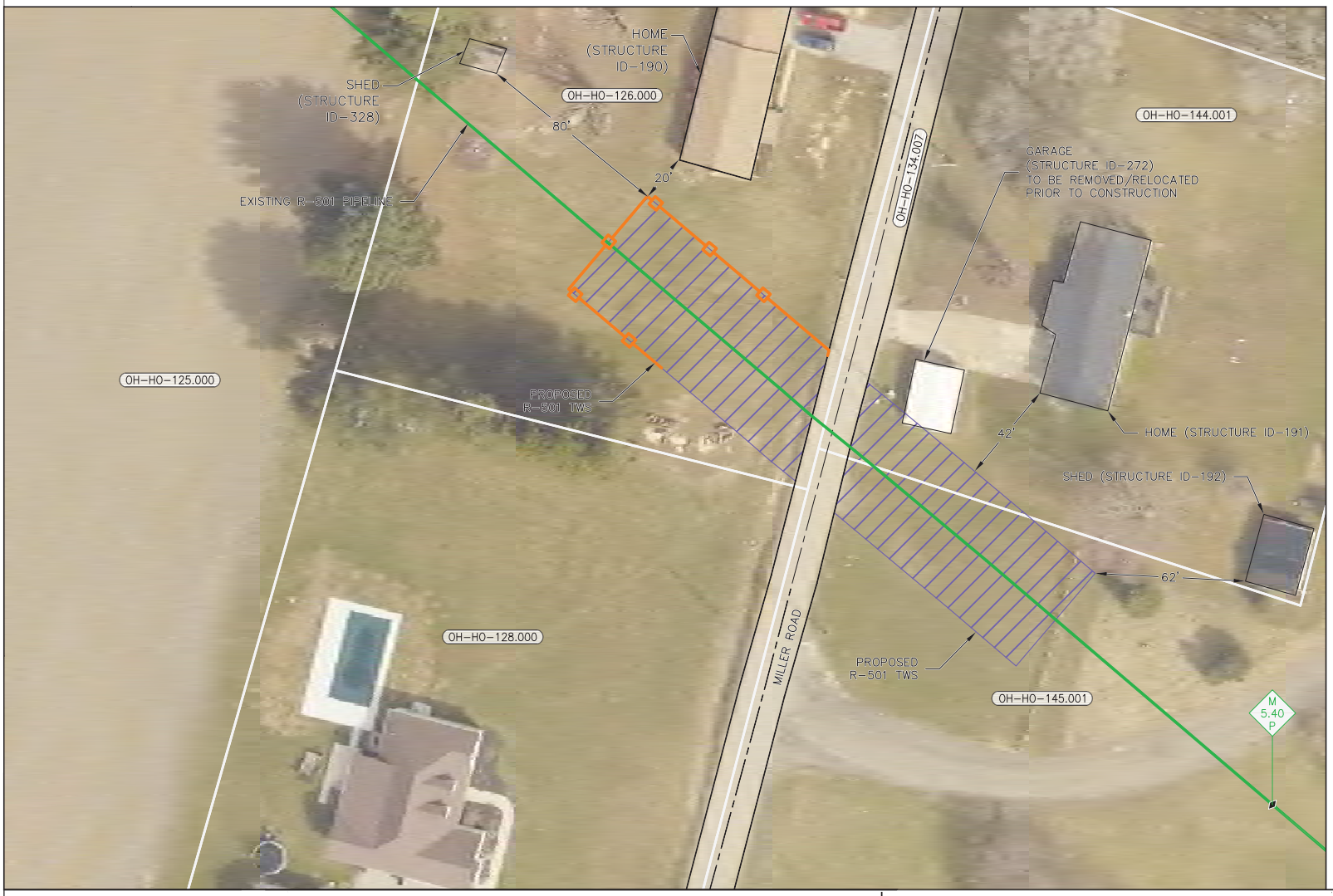
PRELIMINARY NOT FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WPADJC002 WETLAND ID
SPADJC002 WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-7
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

HOCKING COUNTY, OHIO



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PRELIMINARY NOT FOR CONSTRUCTION

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ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-8
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

VINTON COUNTY, OHIO

DESCRIPTION

THIS DRAWING DOCUMENTS MITIGATION MEASURES THAT WILL BE IMPLEMENTED FOR ALL RESIDENCES WITHIN 50 FEET OF THE PROPOSED CONSTRUCTION WORK AREA. CONTRACTOR SHALL COMPLY WITH THE FOLLOWING CONSTRUCTION MITIGATION REQUIREMENTS IN ADDITION TO THOSE LISTED IN THE CONSTRUCTION SPECIFICATIONS.

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7. CONTRACTOR SHALL UTILIZE WATER TRUCKS AS NECESSARY TO MINIMIZE FUGITIVE DUST FROM CONSTRUCTION ACTIVITIES NEAR RESIDENCES/BUSINESSES.
8. ACCESS TO RESIDENCES BY CAR WILL BE MAINTAINED AT ALL TIMES, OR OTHER ACCOMMODATIONS WILL BE MADE WITH EACH RESPECTIVE LANDOWNER.
9. CONTRACTOR SHALL MAINTAIN AGREED UPON ACCESS TO THE IMPACTED AREA DURING CONSTRUCTION.
10. CONTRACTOR SHALL LIMIT WORK IN THIS AREA TO DAYLIGHT HOURS, UNLESS OTHERWISE AGREED UPON WITH LANDOWNER/OCCUPANT.
11. LANDOWNER/OCCUPANT SHALL BE NOTIFIED OF PROPOSED CONSTRUCTION ACTIVITIES PRIOR TO CONSTRUCTION WORK.

PRELIMINARY NOT FOR CONSTRUCTION

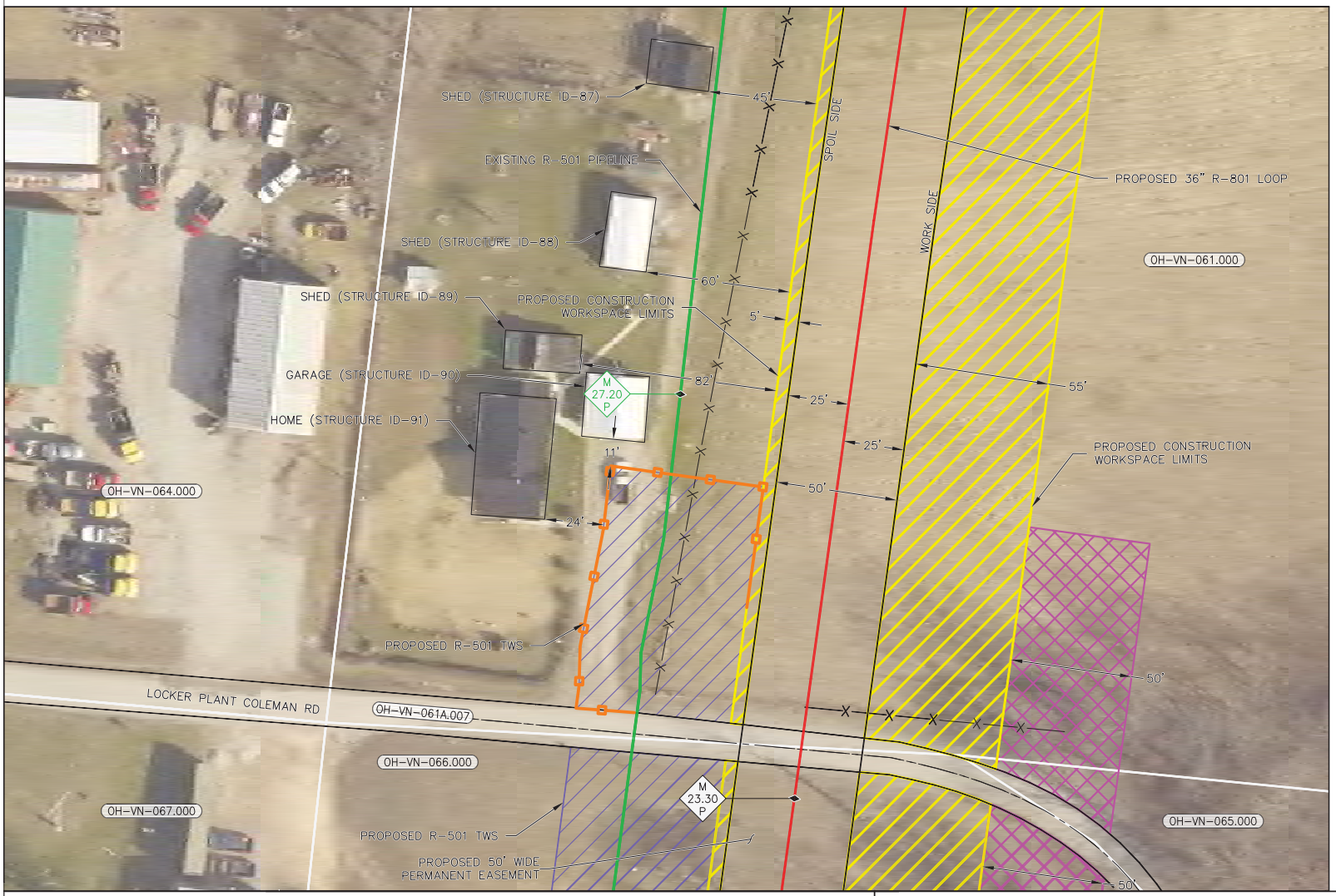
MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

N

Appendix O-9
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

VINTON COUNTY, OHIO



DESCRIPTION

THIS DRAWING DOCUMENTS MITIGATION MEASURES THAT WILL BE IMPLEMENTED FOR ALL RESIDENCES WITHIN 50 FEET OF THE PROPOSED CONSTRUCTION WORK AREA. CONTRACTOR SHALL COMPLY WITH THE FOLLOWING CONSTRUCTION MITIGATION REQUIREMENTS IN ADDITION TO THOSE LISTED IN THE CONSTRUCTION SPECIFICATIONS.

CONSTRUCTION REQUIREMENTS

1. CONTRACTOR SHALL ERECT AND MAINTAIN A SAFETY FENCE BETWEEN THE CONSTRUCTION ZONE AND THE ADJACENT RESIDENCES EXTENDING 100 FEET ON EITHER SIDE OF THE RESIDENCE TO ENSURE THAT EQUIPMENT, MATERIALS AND SPOIL REMAIN WITHIN THE CONSTRUCTION WORK AREA.
2. A MINIMUM OF 25 FEET WILL BE MAINTAINED BETWEEN THE RESIDENCE AND CONSTRUCTION WORK AREA FOR A DISTANCE OF 100 FEET ON EITHER SIDE OF THE RESIDENCE. IF THE FACILITY MUST BE WITHIN 25 FEET OF A RESIDENCE, IT MUST BE INSTALLED SUCH THAT THE TRENCH DOES NOT REMAIN OPEN OVERNIGHT.
3. MATURE TREES AND LANDSCAPING WILL NOT BE REMOVED FROM WITHIN THE EDGE OF THE CONSTRUCTION WORK AREA UNLESS NECESSARY FOR SAFE OPERATION OF CONSTRUCTION EQUIPMENT OR AS SPECIFIED IN LANDOWNER AGREEMENTS.
4. OTHER EXISTING PHYSICAL FEATURES THAT NEED TO BE PROTECTED WILL BE ENCLOSED IN SAFETY FENCE TO AVOID DISTURBANCE DURING CONSTRUCTION.
5. TRENCH SHALL NOT BE EXCAVATED UNTIL PIPELINE IS READY FOR INSTALLATION AND SHALL BE BACKFILLED IN SAME DAY AS PIPE INSTALLATION IN THIS AREA. ALL OPEN DITCHES SHALL BE BARRICADED/FENCED OFF OR PLATED WHEN CONSTRUCTION ACTIVITIES ARE NOT IN PROGRESS.
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8. ACCESS TO RESIDENCES BY CAR WILL BE MAINTAINED AT ALL TIMES, OR OTHER ACCOMMODATIONS WILL BE MADE WITH EACH RESPECTIVE LANDOWNER.
9. CONTRACTOR SHALL MAINTAIN AGREED UPON ACCESS TO THE IMPACTED AREA DURING CONSTRUCTION.
10. CONTRACTOR SHALL LIMIT WORK IN THIS AREA TO DAYLIGHT HOURS, UNLESS OTHERWISE AGREED UPON WITH LANDOWNER/OCCUPANT.
11. LANDOWNER/OCCUPANT SHALL BE NOTIFIED OF PROPOSED CONSTRUCTION ACTIVITIES PRIOR TO CONSTRUCTION WORK.

PRELIMINARY NOT FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-10
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

VINTON COUNTY, OHIO

DESCRIPTION

THIS DRAWING DOCUMENTS MITIGATION MEASURES THAT WILL BE IMPLEMENTED FOR ALL RESIDENCES WITHIN 50 FEET OF THE PROPOSED CONSTRUCTION WORK AREA. CONTRACTOR SHALL COMPLY WITH THE FOLLOWING CONSTRUCTION MITIGATION REQUIREMENTS IN ADDITION TO THOSE LISTED IN THE CONSTRUCTION SPECIFICATIONS.

CONSTRUCTION REQUIREMENTS

1. CONTRACTOR SHALL ERECT AND MAINTAIN A SAFETY FENCE BETWEEN THE CONSTRUCTION ZONE AND THE ADJACENT RESIDENCES EXTENDING 100 FEET ON EITHER SIDE OF THE RESIDENCE TO ENSURE THAT EQUIPMENT, MATERIALS AND SPOIL REMAIN WITHIN THE CONSTRUCTION WORK AREA.
2. A MINIMUM OF 25 FEET WILL BE MAINTAINED BETWEEN THE RESIDENCE AND CONSTRUCTION WORK AREA FOR A DISTANCE OF 100 FEET ON EITHER SIDE OF THE RESIDENCE. IF THE FACILITY MUST BE WITHIN 25 FEET OF A RESIDENCE, IT MUST BE INSTALLED SUCH THAT THE TRENCH DOES NOT REMAIN OPEN OVERNIGHT.
3. MATURE TREES AND LANDSCAPING WILL NOT BE REMOVED FROM WITHIN THE EDGE OF THE CONSTRUCTION WORK AREA UNLESS NECESSARY FOR SAFE OPERATION OF CONSTRUCTION EQUIPMENT OR AS SPECIFIED IN LANDOWNER AGREEMENTS.
4. OTHER EXISTING PHYSICAL FEATURES THAT NEED TO BE PROTECTED WILL BE ENCLOSED IN SAFETY FENCE TO AVOID DISTURBANCE DURING CONSTRUCTION.
5. TRENCH SHALL NOT BE EXCAVATED UNTIL PIPELINE IS READY FOR INSTALLATION AND SHALL BE BACKFILLED IN SAME DAY AS PIPE INSTALLATION IN THIS AREA. ALL OPEN DITCHES SHALL BE BARRICADED/FENCED OFF OR PLATED WHEN CONSTRUCTION ACTIVITIES ARE NOT IN PROGRESS.
6. IMMEDIATELY AFTER BACKFILLING THE TRENCH, ALL LAWN AND LANDSCAPING WILL BE RESTORED TO FINAL RESTORATION, OR TEMPORARY RESTORATION PENDING WEATHER AND SOIL CONDITIONS. IF SEASONAL OR WEATHER CONDITIONS PREVENT COMPLIANCE WITH THESE TIME FRAMES, TEMPORARY EROSION CONTROLS MUST BE MONITORED AND MAINTAINED UNTIL CONDITIONS ALLOW COMPLETION OF RESTORATION.
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10. CONTRACTOR SHALL LIMIT WORK IN THIS AREA TO DAYLIGHT HOURS, UNLESS OTHERWISE AGREED UPON WITH LANDOWNER/OCCUPANT.
11. LANDOWNER/OCCUPANT SHALL BE NOTIFIED OF PROPOSED CONSTRUCTION ACTIVITIES PRIOR TO CONSTRUCTION WORK.

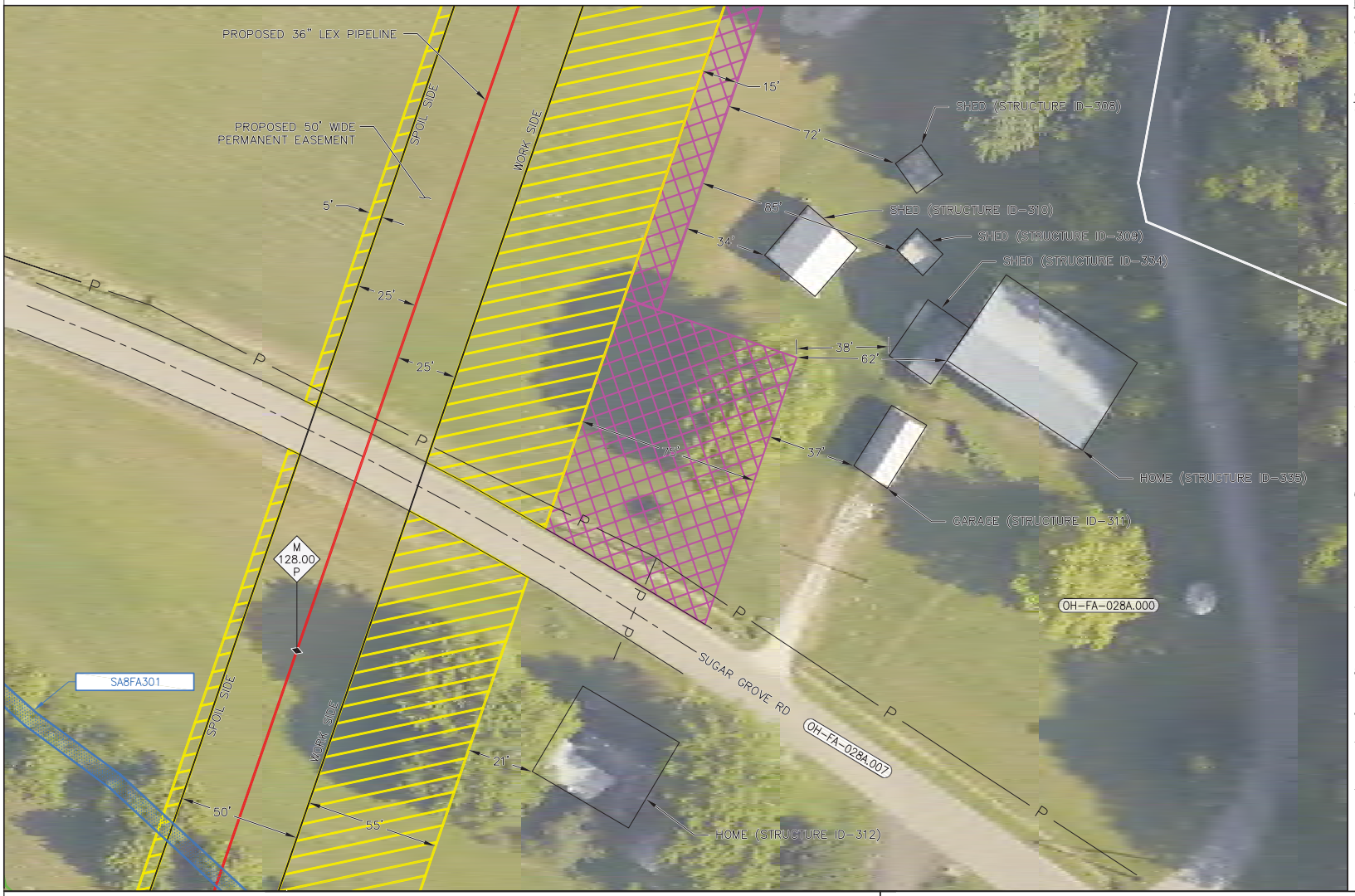
PRELIMINARY NOT FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
PAR-0001 ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WPAGJC002 WETLAND ID
SPAGJC002 WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-11
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

FAIRFIELD COUNTY, OHIO



DESCRIPTION

THIS DRAWING DOCUMENTS MITIGATION MEASURES THAT WILL BE IMPLEMENTED FOR ALL RESIDENCES WITHIN 50 FEET OF THE PROPOSED CONSTRUCTION WORK AREA. CONTRACTOR SHALL COMPLY WITH THE FOLLOWING CONSTRUCTION MITIGATION REQUIREMENTS IN ADDITION TO THOSE LISTED IN THE CONSTRUCTION SPECIFICATIONS.

CONSTRUCTION REQUIREMENTS

1. CONTRACTOR SHALL ERECT AND MAINTAIN A SAFETY FENCE BETWEEN THE CONSTRUCTION ZONE AND THE ADJACENT RESIDENCES EXTENDING 100 FEET ON EITHER SIDE OF THE RESIDENCE TO ENSURE THAT EQUIPMENT, MATERIALS AND SPOIL REMAIN WITHIN THE CONSTRUCTION WORK AREA.
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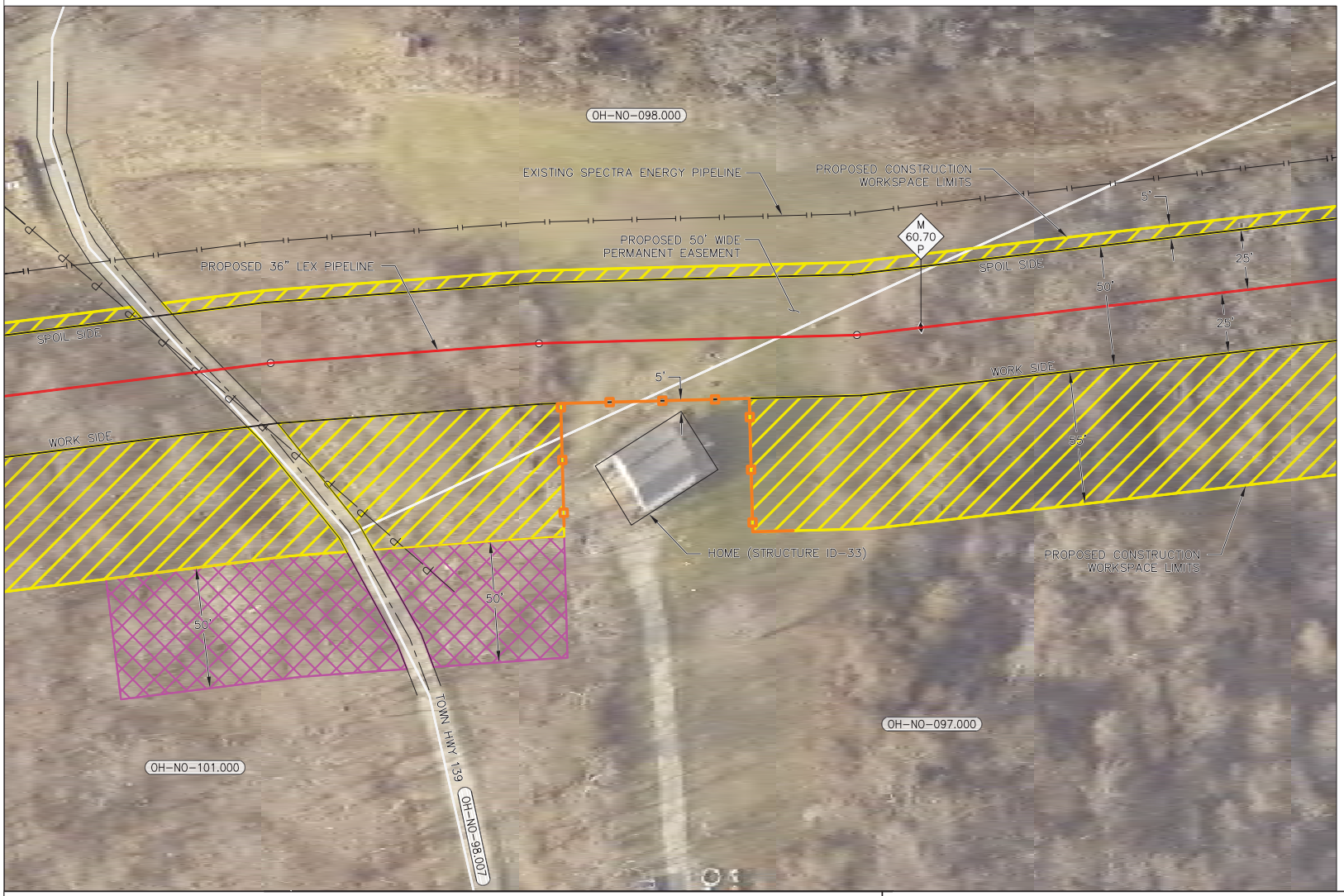
PRELIMINARY NOT FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-12
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

NOBLE COUNTY, OHIO



DESCRIPTION

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11. LANDOWNER/OCCUPANT SHALL BE NOTIFIED OF PROPOSED CONSTRUCTION ACTIVITIES PRIOR TO CONSTRUCTION WORK.

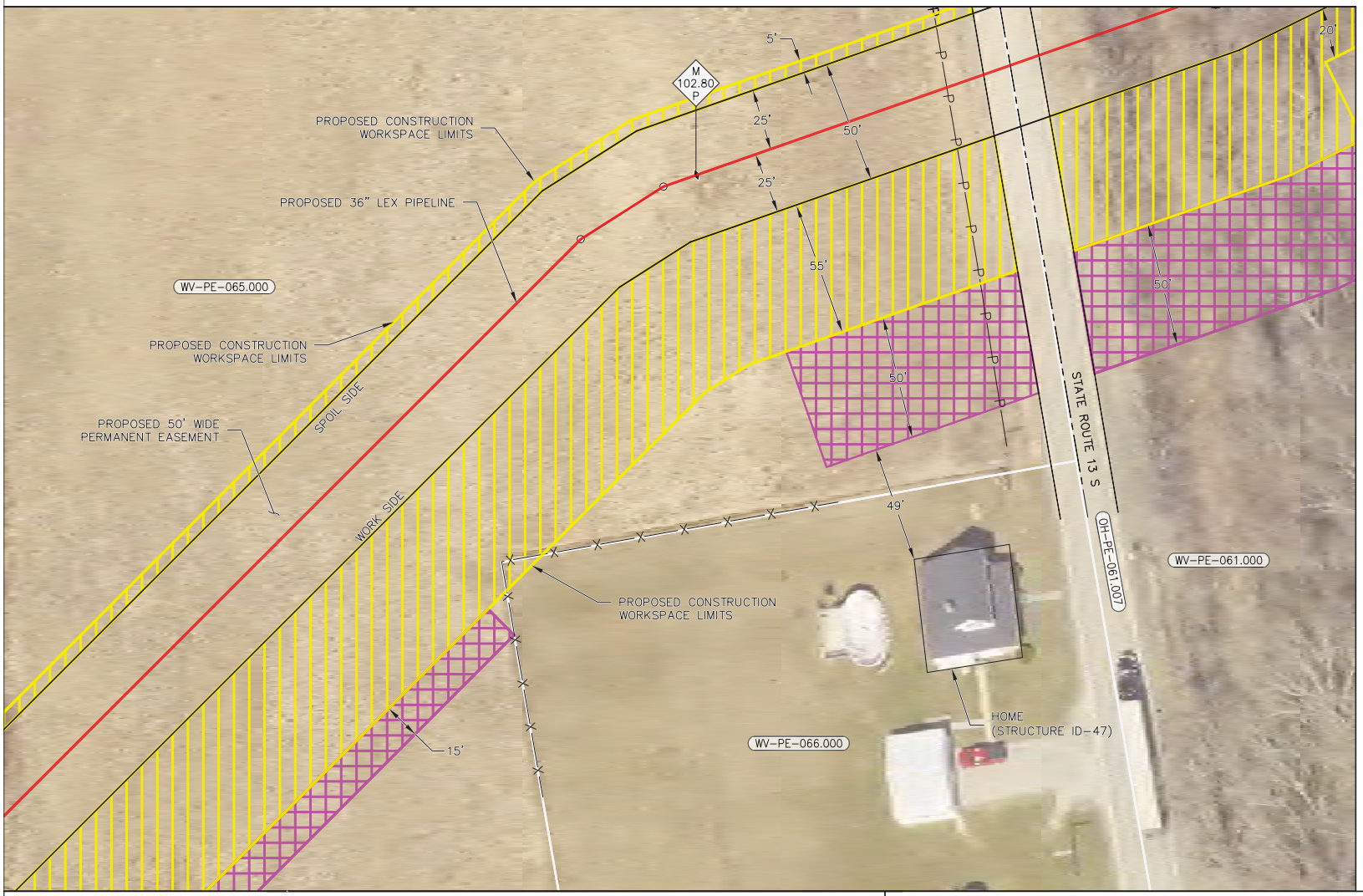
PRELIMINARY NOT FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-13
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

PERRY COUNTY, OHIO



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11. LANDOWNER/OCCUPANT SHALL BE NOTIFIED OF PROPOSED CONSTRUCTION ACTIVITIES PRIOR TO CONSTRUCTION WORK.

PRELIMINARY NOT FOR CONSTRUCTION

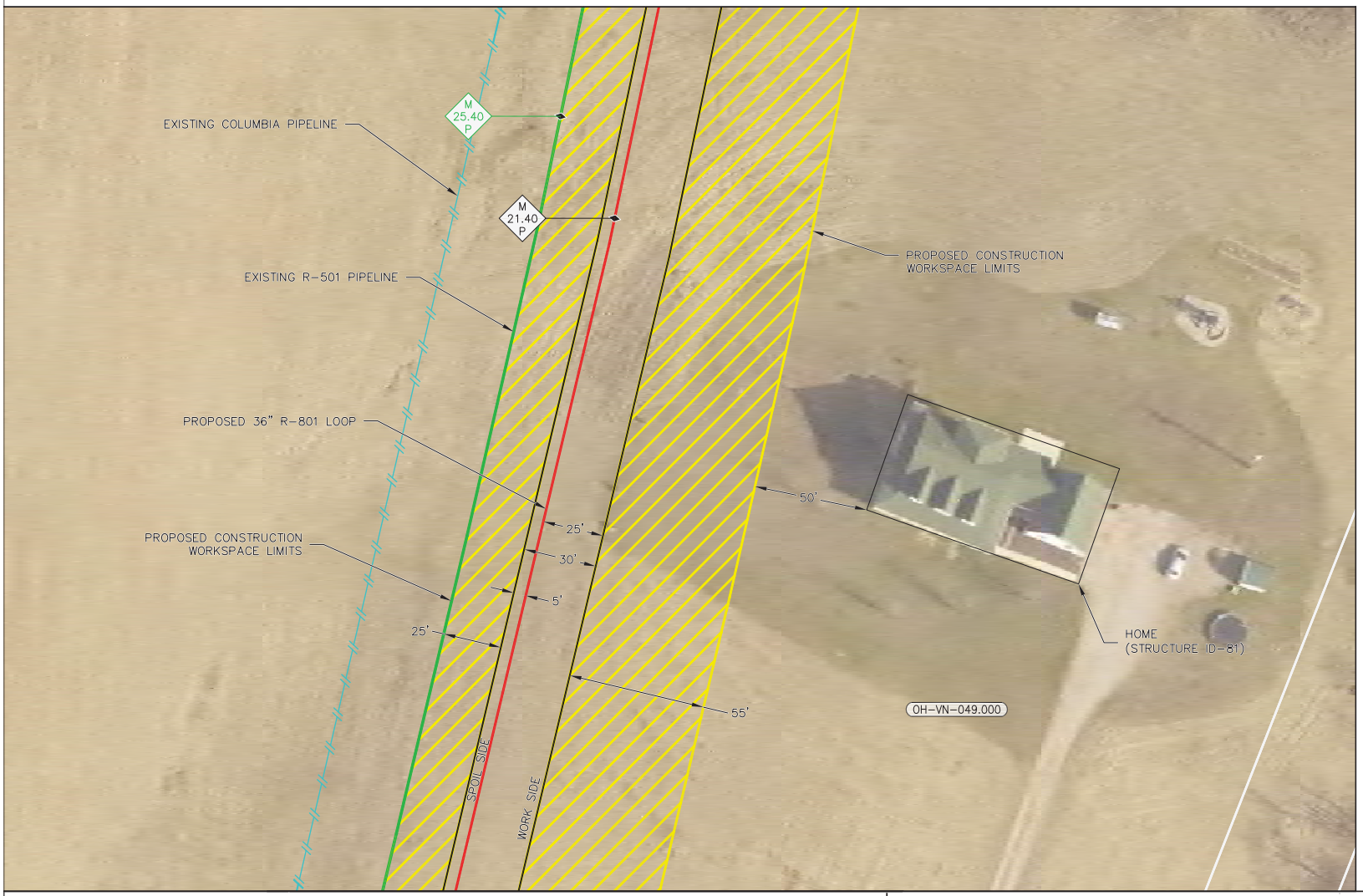
MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
PAR-0001 ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

N

Appendix O-14
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

VINTON COUNTY, OHIO



DESCRIPTION

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CONSTRUCTION REQUIREMENTS

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PRELIMINARY NOT FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-15
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

HOCKING COUNTY, OHIO

DESCRIPTION

THIS DRAWING DOCUMENTS MITIGATION MEASURES THAT WILL BE IMPLEMENTED FOR ALL RESIDENCES WITHIN 50 FEET OF THE PROPOSED CONSTRUCTION WORK AREA. CONTRACTOR SHALL COMPLY WITH THE FOLLOWING CONSTRUCTION MITIGATION REQUIREMENTS IN ADDITION TO THOSE LISTED IN THE CONSTRUCTION SPECIFICATIONS.

CONSTRUCTION REQUIREMENTS

1. CONTRACTOR SHALL ERECT AND MAINTAIN A SAFETY FENCE BETWEEN THE CONSTRUCTION ZONE AND THE ADJACENT RESIDENCES EXTENDING 100 FEET ON EITHER SIDE OF THE RESIDENCE TO ENSURE THAT EQUIPMENT, MATERIALS AND SPOIL REMAIN WITHIN THE CONSTRUCTION WORK AREA.
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11. LANDOWNER/OCCUPANT SHALL BE NOTIFIED OF PROPOSED CONSTRUCTION ACTIVITIES PRIOR TO CONSTRUCTION WORK.

PRELIMINARY NOT FOR CONSTRUCTION

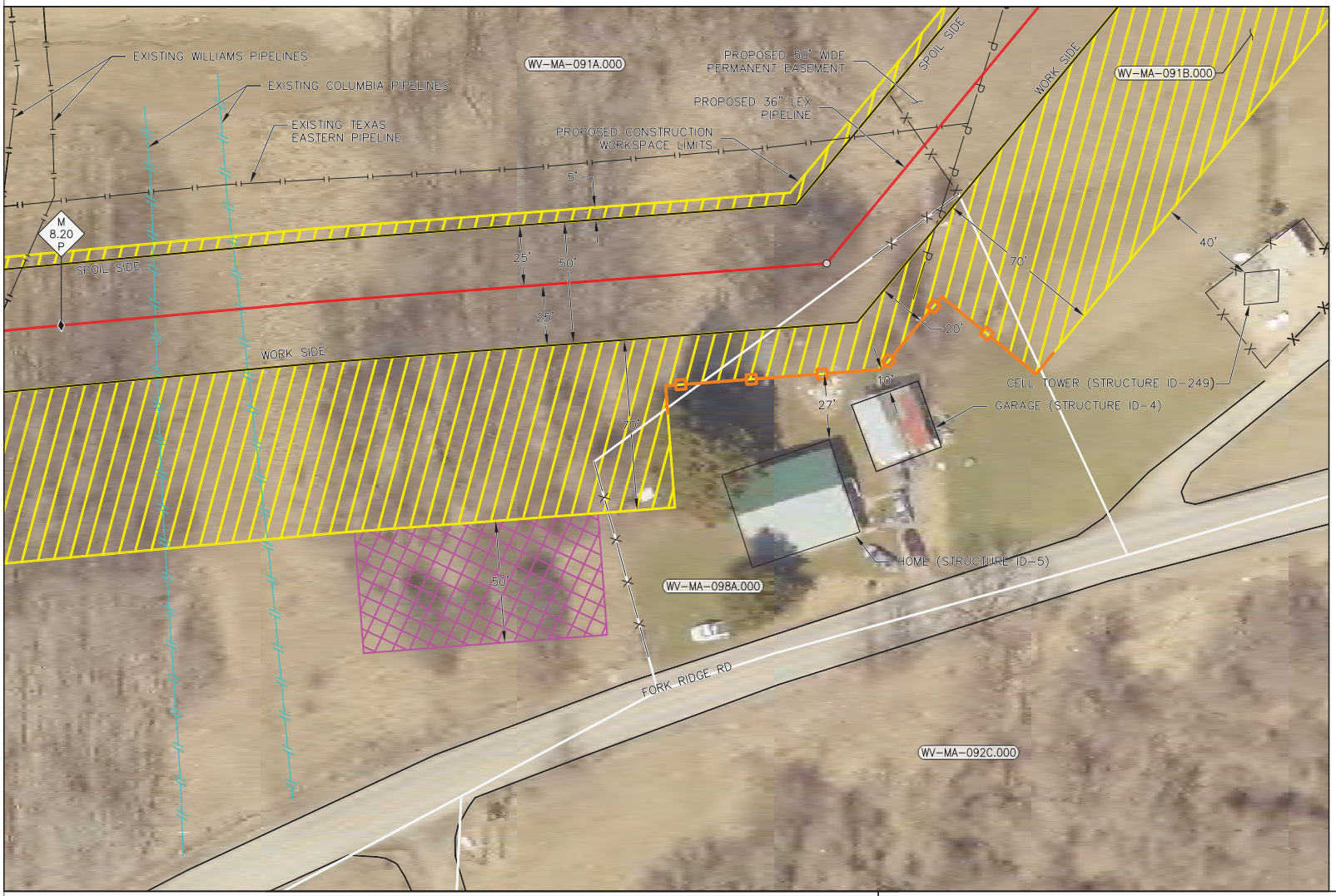
MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
PAR-0001 ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WPAD/C002 WETLAND ID
SPAD/C002 WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

N

Appendix O-16
Site-Specific Plans For Residences
Within 50 Feet of Construction Areas

MARSHALL COUNTY, WEST VIRGINIA



DESCRIPTION

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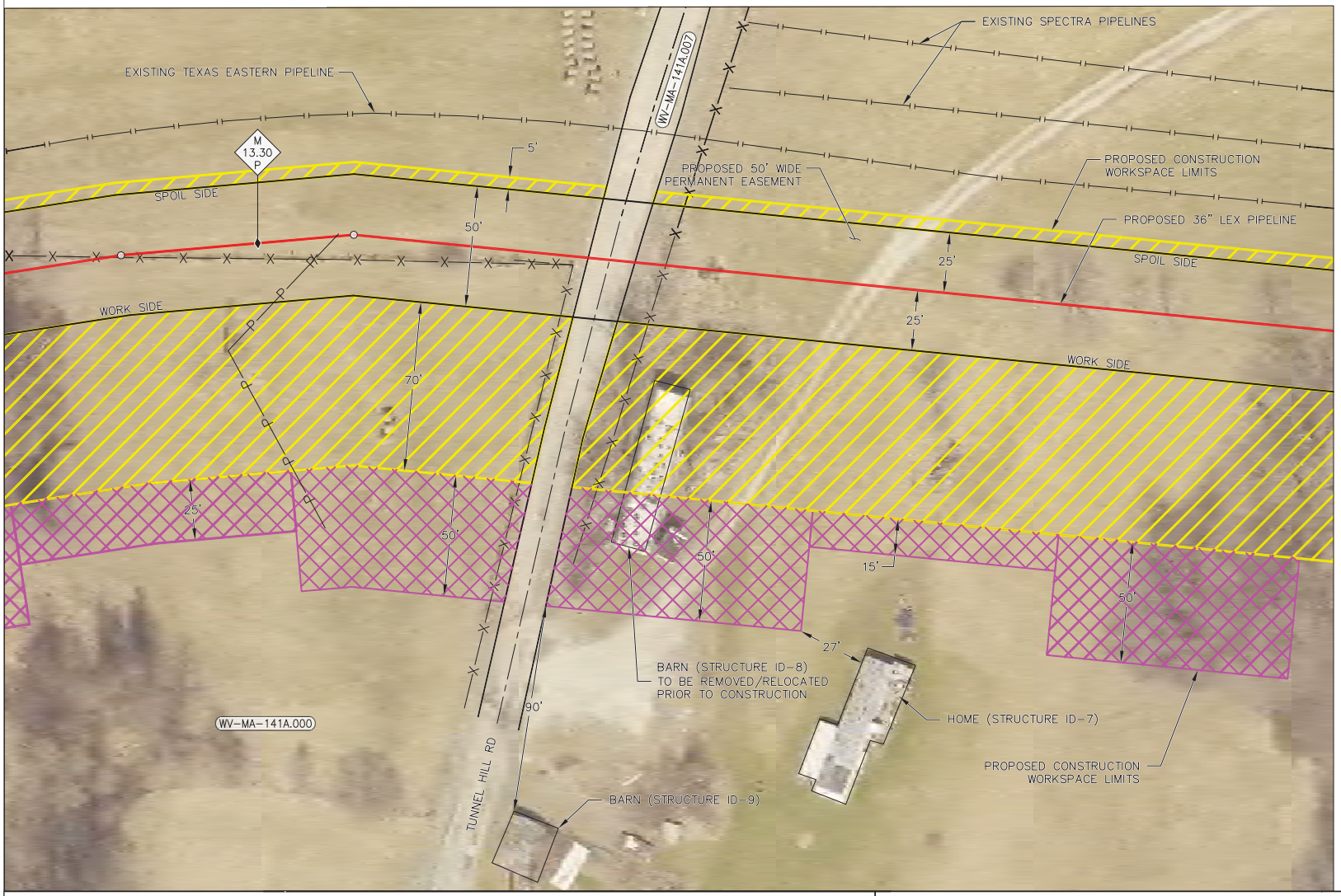
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-17
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

MARSHALL COUNTY, WEST VIRGINIA



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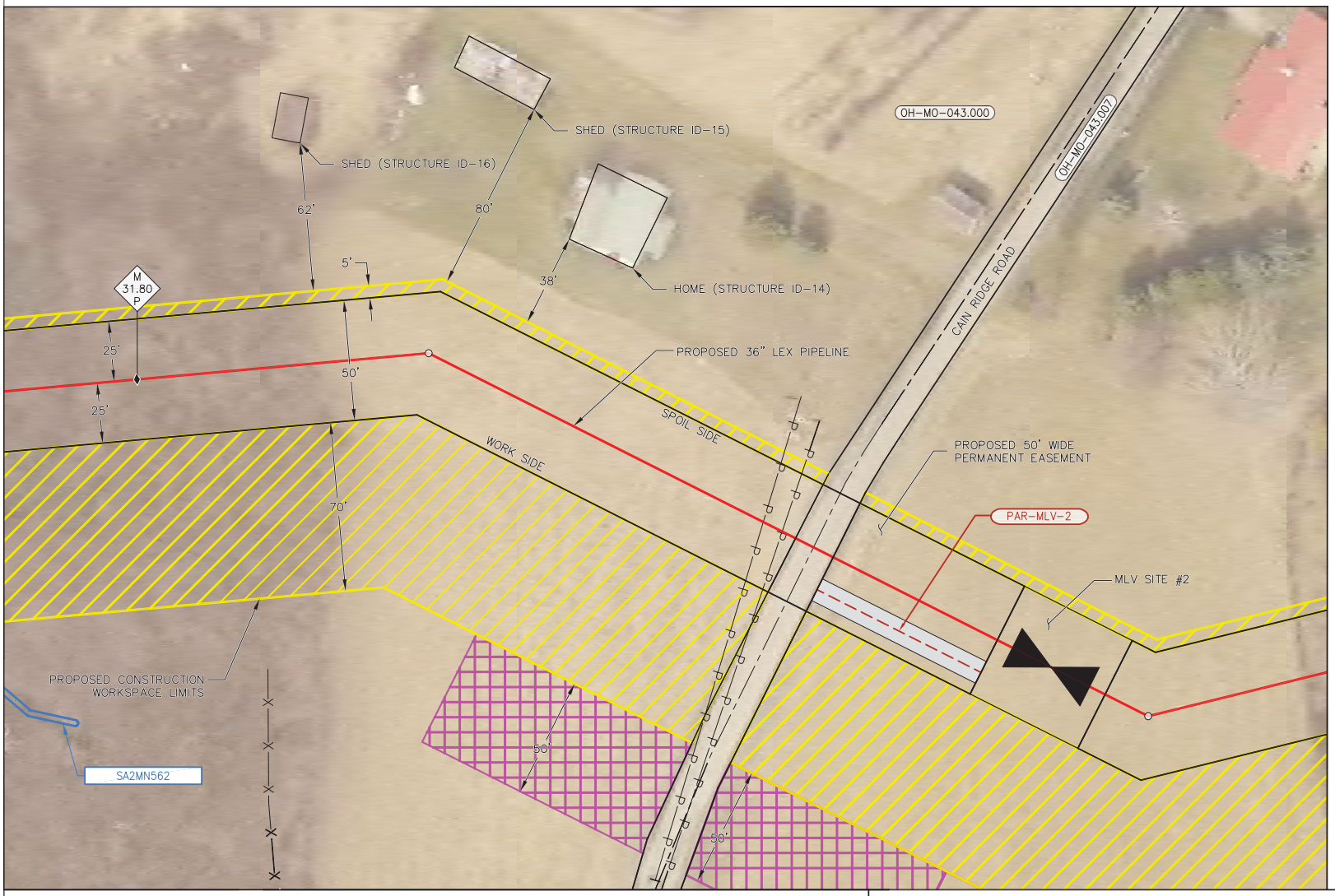
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-18
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

MONROE COUNTY, OHIO



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ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-19
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

MONROE COUNTY, OHIO

DESCRIPTION

THIS DRAWING DOCUMENTS MITIGATION MEASURES THAT WILL BE IMPLEMENTED FOR ALL RESIDENCES WITHIN 50 FEET OF THE PROPOSED CONSTRUCTION WORK AREA. CONTRACTOR SHALL COMPLY WITH THE FOLLOWING CONSTRUCTION MITIGATION REQUIREMENTS IN ADDITION TO THOSE LISTED IN THE CONSTRUCTION SPECIFICATIONS.

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PRELIMINARY NOT FOR CONSTRUCTION

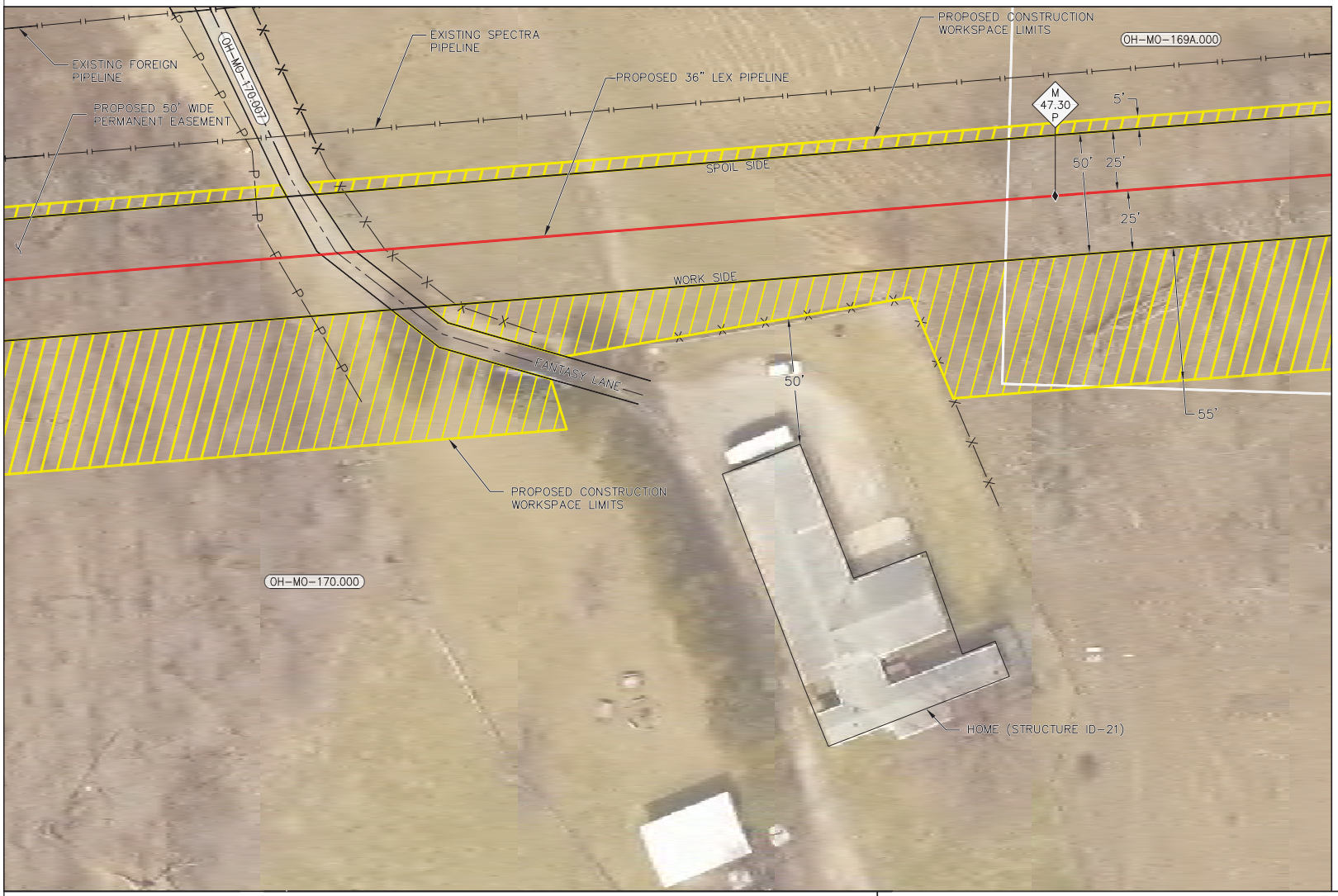
MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

N

Appendix O-20
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

MONROE COUNTY, OHIO



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PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
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ACCESS ROAD
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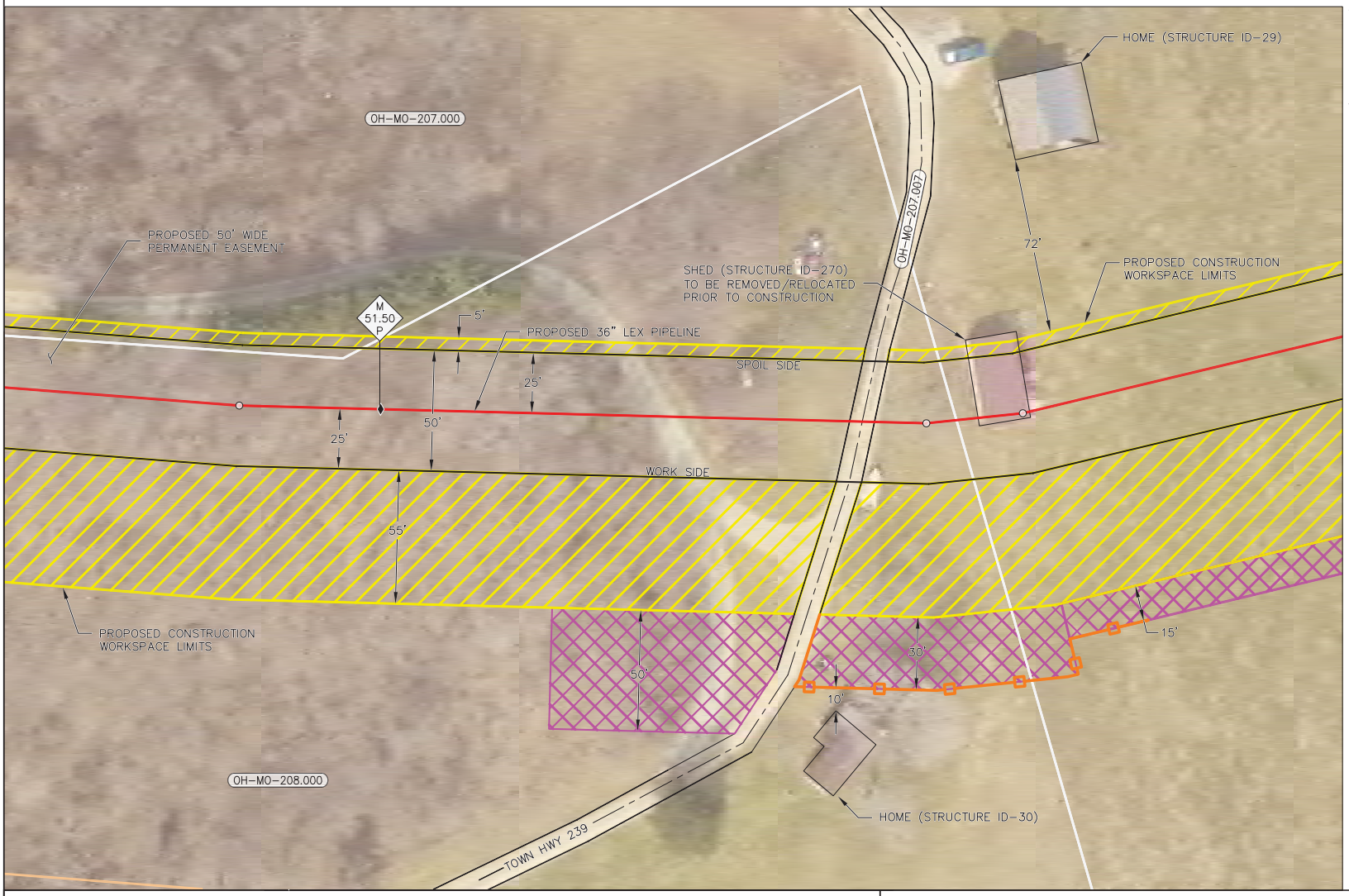
CONTRACTOR / PIPE YARD
PAR-001 ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WPADJC002 WETLAND ID
SPADJC002 WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

N

Appendix O-21
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

MONROE COUNTY, OHIO



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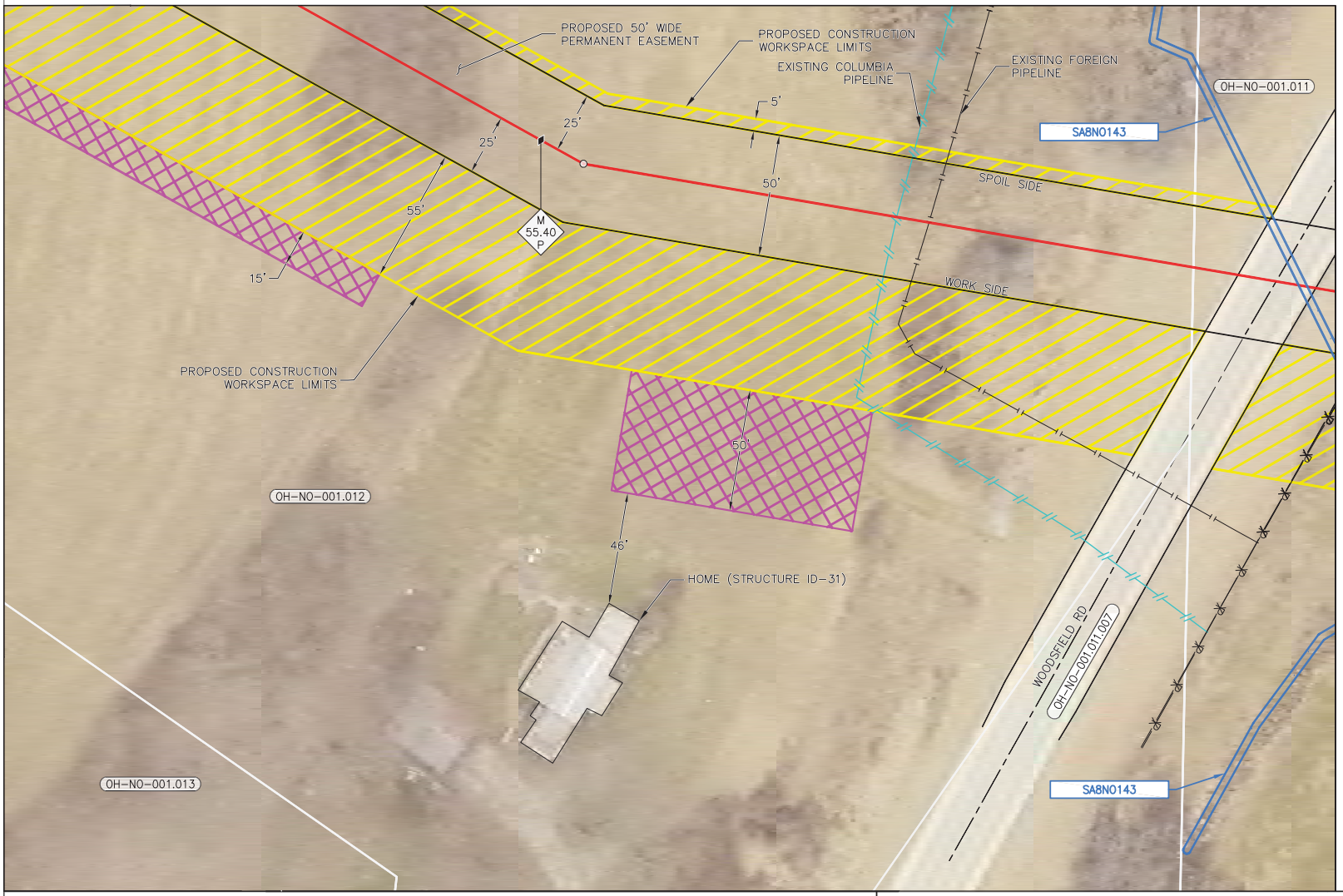
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-22
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

NOBLE COUNTY, OHIO



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10. CONTRACTOR SHALL LIMIT WORK IN THIS AREA TO DAYLIGHT HOURS, UNLESS OTHERWISE AGREED UPON WITH LANDOWNER/OCCUPANT.
11. LANDOWNER/OCCUPANT SHALL BE NOTIFIED OF PROPOSED CONSTRUCTION ACTIVITIES PRIOR TO CONSTRUCTION WORK.

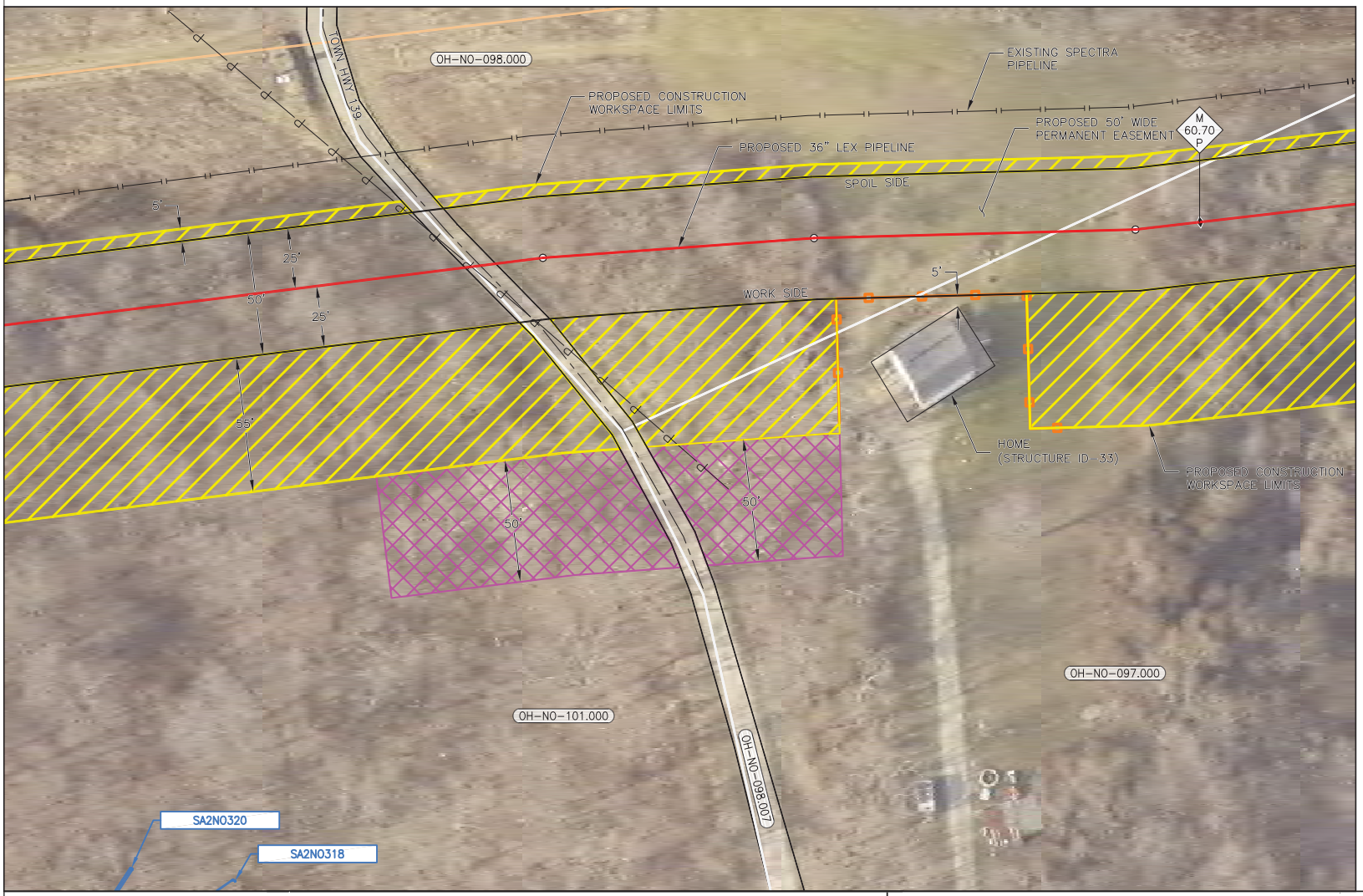
PRELIMINARY NOT FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-23
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

NOBLE COUNTY, OHIO



DESCRIPTION

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CONSTRUCTION REQUIREMENTS

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PRELIMINARY NOT FOR CONSTRUCTION

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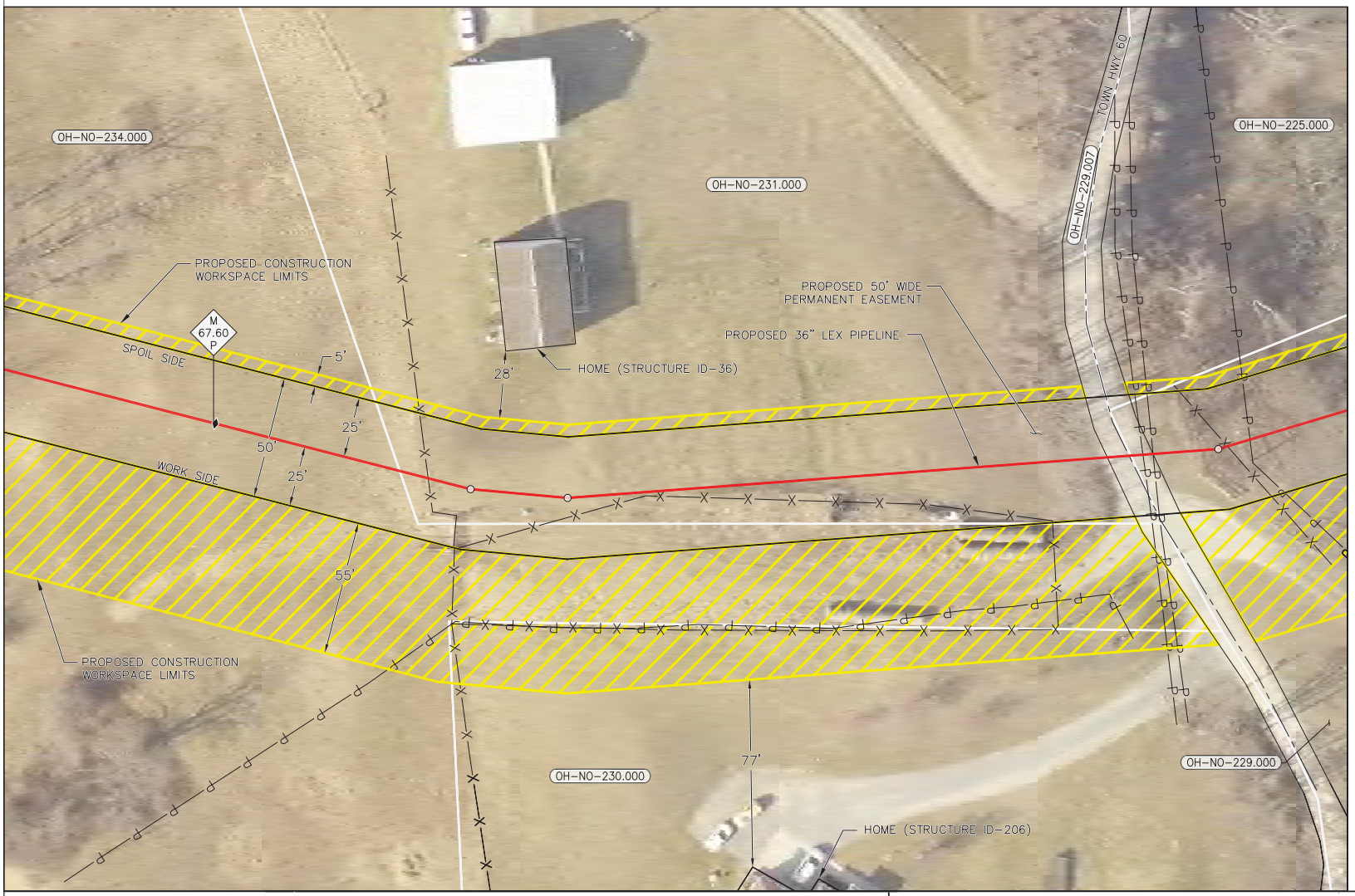
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WPAD/C002 WETLAND ID
SPAD/C002 WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-24
Site-Specific Plans For Residences
Within 50 Feet of Construction Areas

NOBLE COUNTY, OHIO



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EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WPAOJC002 WETLAND ID
SPAOJC002 WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

N

Appendix O-25
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

MUSKINGUM COUNTY, OHIO

DESCRIPTION

THIS DRAWING DOCUMENTS MITIGATION MEASURES THAT WILL BE IMPLEMENTED FOR ALL RESIDENCES WITHIN 50 FEET OF THE PROPOSED CONSTRUCTION WORK AREA. CONTRACTOR SHALL COMPLY WITH THE FOLLOWING CONSTRUCTION MITIGATION REQUIREMENTS IN ADDITION TO THOSE LISTED IN THE CONSTRUCTION SPECIFICATIONS.

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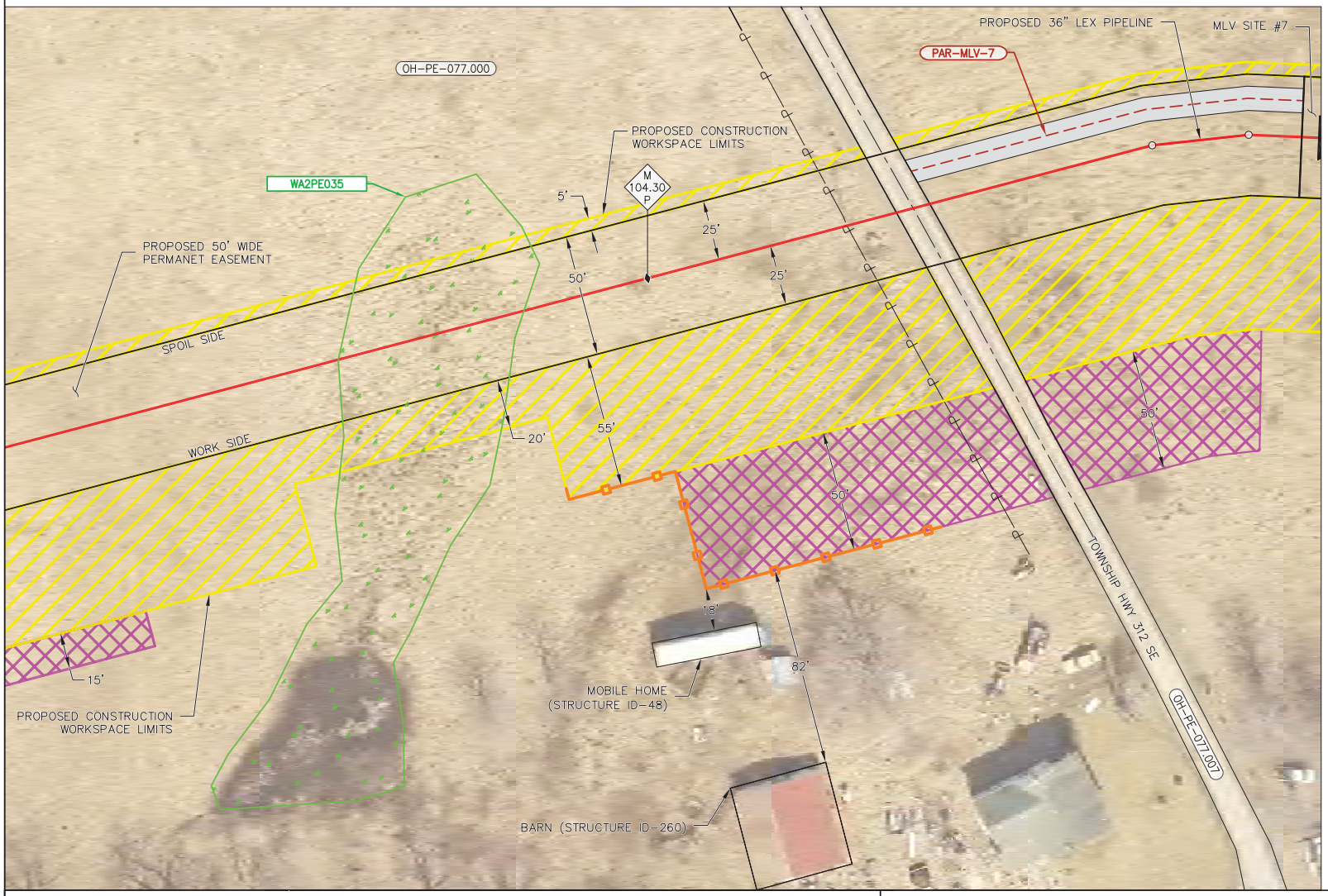
PRELIMINARY NOT FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-26
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

PERRY COUNTY, OHIO



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PRELIMINARY NOT FOR CONSTRUCTION

MILEPOST
ROUTE
EXISTING R-501 PIPELINE
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-27
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

PERRY COUNTY, OHIO

DESCRIPTION

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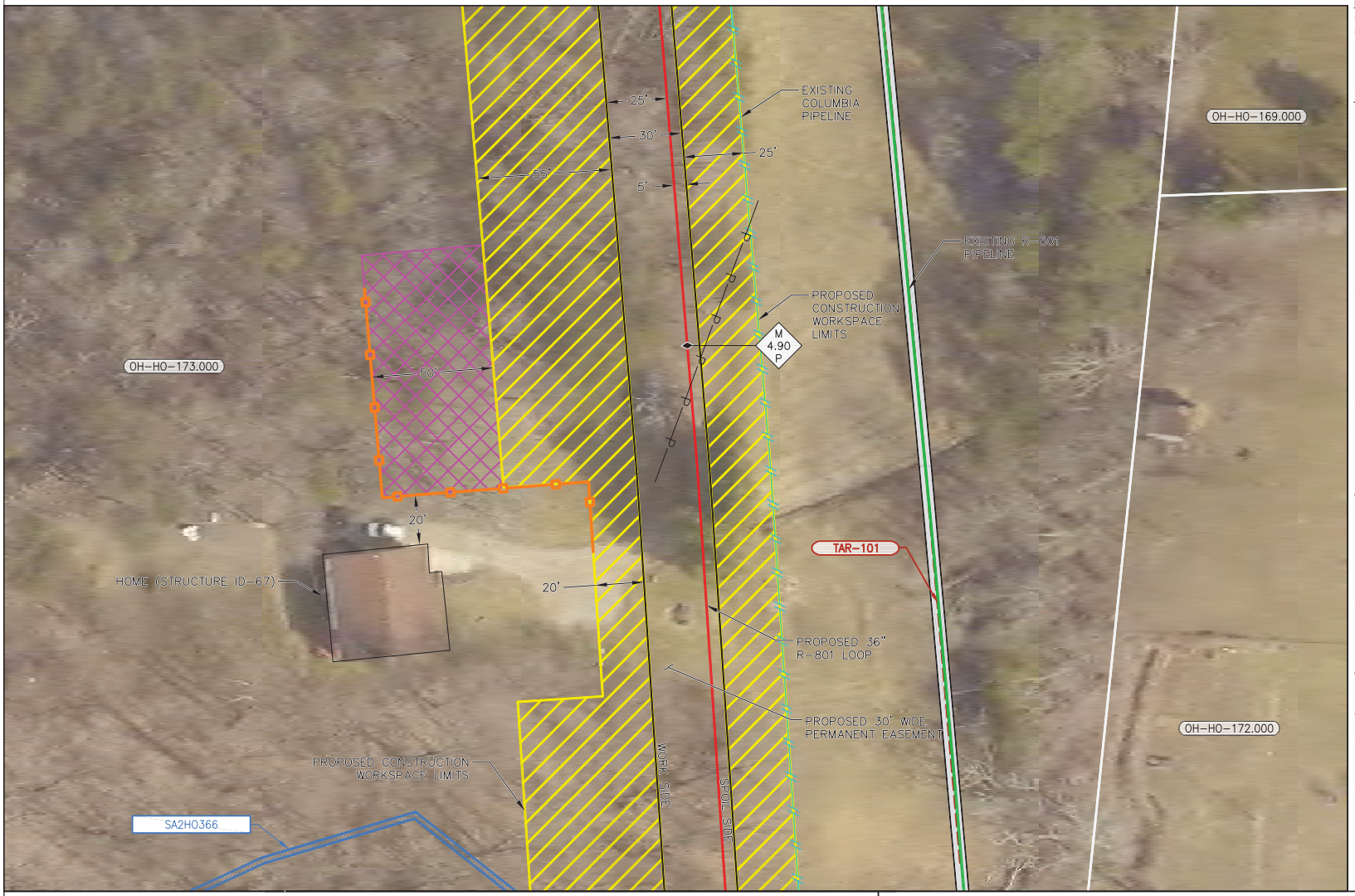
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
ST-CO-001.000 PROPERTY TRACT NUMBER
WPA0JC002 WETLAND ID
SPA0JC002 WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-28
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

HOCKING COUNTY, OHIO



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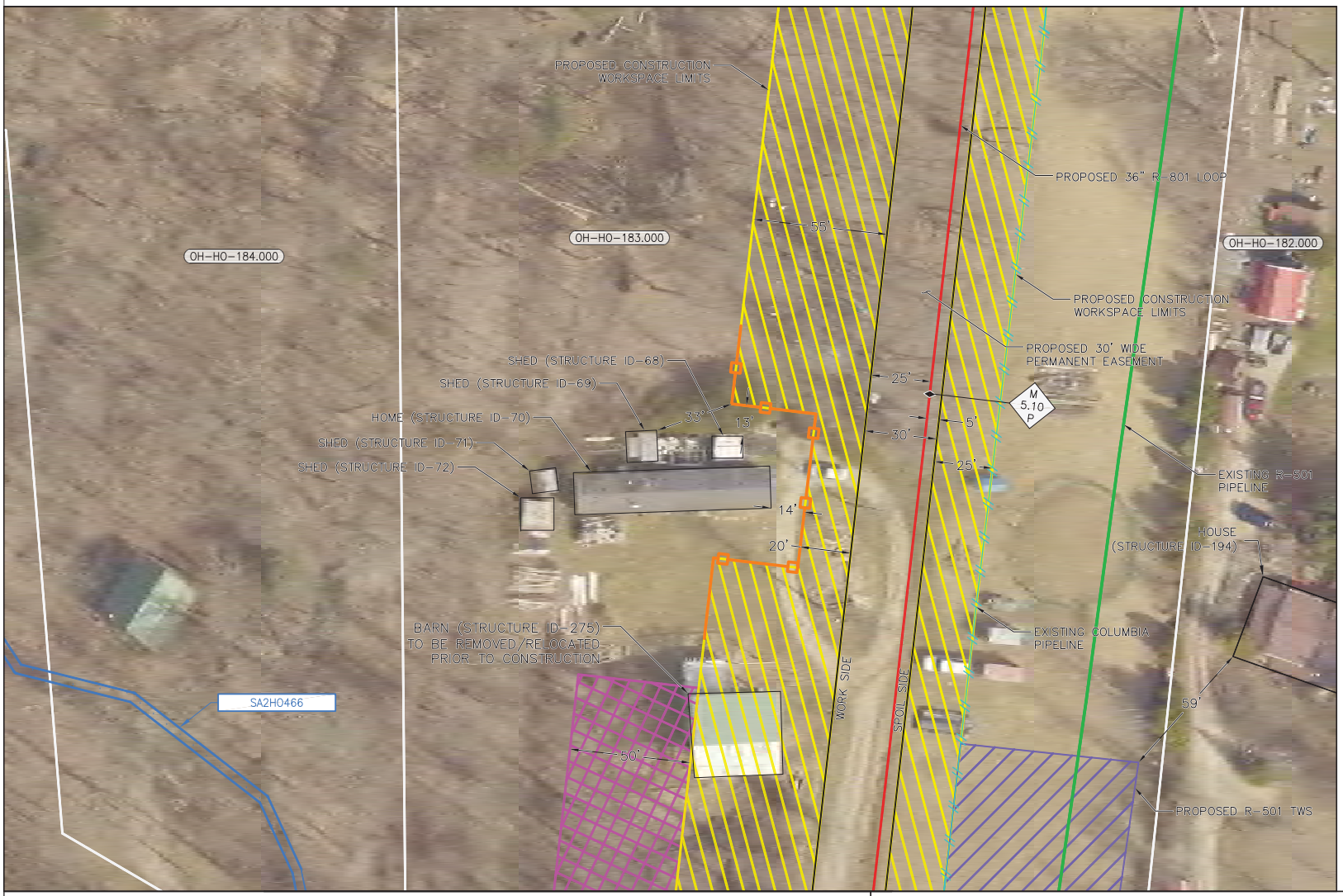
EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
ADDITIONAL TEMPORARY WORKSPACE
ACCESS ROAD
R-501 ABANDONMENT TEMPORARY WORKSPACE
CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

N

Appendix O-29
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

HOCKING COUNTY, OHIO



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EXISTING COLUMBIA PIPELINE
FOREIGN PIPELINE
PERMANENT ROW
FENCE
TEMPORARY WORKSPACE
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ACCESS ROAD
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CONTRACTOR / PIPE YARD
ACCESS ROAD NUMBER
PROPERTY TRACT NUMBER
WETLAND ID
WATERBODY ID
UNDERGROUND CABLE
OVERHEAD POWER LINE
WATERLINE
COUNTY BORDER
WETLAND
WATERBODY
CONSTRUCTION TAPE

20' 10' 0' 20' 40'

Appendix O-30
Site-Specific Plans For Residences Within 50 Feet of Construction Areas

APPENDIX P
Tribal Correspondence

FERC Correspondence

20150603-3026 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Governor Edwina Butler-Wolfe
Absentee-Shawnee Tribe of Oklahoma
2025 South Gordon Cooper Drive
Shawnee, OK 74801

Re: Leach XPress Project

Dear Governor Butler-Wolfe:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Absentee-Shawnee Tribe of Oklahoma in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3026 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Absentee-Shawnee Tribe of Oklahoma are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Joseph Blanchard
Tribal Historic Preservation Officer
Absentee-Shawnee Tribe of Oklahoma
2025 South Gordon Cooper Drive
Shawnee, OK 74801

20150603-3027 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chairwoman Christina Danforth
Oneida Tribe of Indians of Wisconsin
P.O. Box 365
Oneida, WI 54155

Re: Leach XPress Project

Dear Chairwoman Danforth:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Oneida Tribe of Indians of Wisconsin in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3027 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Oneida Tribe of Indians of Wisconsin are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Corina Williams
Tribal Historic Preservation Officer
Oneida Tribe of Indians of Wisconsin
P.O. Box 365
Oneida, WI 54155

20150603-3004 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chief John Froman
Peoria Tribe of Oklahoma
118 S. Eight Tribes Trail
Miami, OK 74355

Re: Leach XPress Project

Dear Chief Froman:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Peoria Tribe of Oklahoma in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3004 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Peoria Tribe of Oklahoma are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

20150603-3005 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chief Billy Friend
Wyandotte Nation
64700 East Highway 60
Wyandotte, OK 74370

Re: Leach XPress Project

Dear Chief Friend:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Wyandotte Nation in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3005 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Wyandotte Nation are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Sherri Clemons
Tribal Historic Preservation Officer
Wyandotte Nation
64700 East Highway 60
Wyandotte, OK 74370

20150603-3006 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chief Roger Hill
Tonawanda Band of Seneca Indians
7027 Meadville Road
Basom, NY 14013

Re: Leach XPress Project

Dear Chief Hill:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Tonawanda Band of Seneca Indians in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3006 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Tonawanda Band of Seneca Indians are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

20150603-3007 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chief William Fisher
Seneca-Cayuga Tribe of Oklahoma
23701 South 655 Road
Grove, OK 74344

Re: Leach XPress Project

Dear Chief Fisher:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Seneca-Cayuga Tribe of Oklahoma in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3007 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Seneca-Cayuga Tribe of Oklahoma are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Paul Barton
Tribal Historic Preservation Officer
Seneca-Cayuga Tribe of Oklahoma
23701 South 655 Road
Grove, OK 74344

20150603-3008 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chief Douglas Lankford
Miami Tribe of Oklahoma
202 South Eight Tribes Trail
Miami, OK 74355

Re: Leach XPress Project

Dear Chief Lankford:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Miami Tribe of Oklahoma in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3008 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Miami Tribe of Oklahoma are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

George Strack
Tribal Historic Preservation Officer
Miami Tribe of Oklahoma
202 South Eight Tribes Trail
Miami, OK 74355

20150603-3009 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chief Chester Brooks
Delaware Tribe of Indians
170 North East Barbara
Bartlesville, OK 74006

Re: Leach XPress Project

Dear Chief Brooks:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Delaware Tribe of Indians in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3009 FERC PDF (Unofficial) 06/03/2015

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We are interested in receiving your comments on the project to ensure that the concerns of the Delaware Tribe of Indians are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

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The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Susan Bachor/Blair Fink
Tribe Historic Preservation Representative
Delaware Tribe of Indians
Temple University
1115 West Polett Walk
Philadelphia, PA 19122

20150603-3010 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chief Glenna Wallace
Eastern Shawnee Tribe of Oklahoma
P.O. Box 350
Seneca, MO 64865

Re: Leach XPress Project

Dear Chief Wallace:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Eastern Shawnee Tribe of Oklahoma in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

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20150603-3010 FERC PDF (Unofficial) 06/03/2015

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We are interested in receiving your comments on the project to ensure that the concerns of the Eastern Shawnee Tribe of Oklahoma are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

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We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Robin Dushane
Tribal Historic Preservation Officer
Eastern Shawnee Tribe of Oklahoma
12705 E. 705 Road
Wyandotte, OK 74370

20150603-3011 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chief Irving Powless, Jr.
Onondaga Nation
P.O. Box 319-B
Nedrow, NY 13120

Re: Leach XPress Project

Dear Chief Powless:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Onondaga Nation in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

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20150603-3011 FERC PDF (Unofficial) 06/03/2015

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We are interested in receiving your comments on the project to ensure that the concerns of the Onondaga Nation are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

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We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Tony Gonyea
Faithkeeper
Onondaga Nation
P.O. Box 245
Nedrow, NY 13120

20150603-3012 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
President Maurice John
Seneca Nation of Indians
90 Ohiyo Way
Salamanca, NY 14779

Re: Leach XPress Project

Dear President John:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Seneca Nation of Indians in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

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20150603-3012 FERC PDF (Unofficial) 06/03/2015

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We are interested in receiving your comments on the project to ensure that the concerns of the Seneca Nation of Indians are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Scott Abrams
Acting Tribal Historic Preservation Officer
Seneca Nation of Indians
90 Ohiyo Way
Salamanca, NY 14779

20150603-3013 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chief Paul Thompson
St. Regis Mohawk Tribe
412 State Route 37
Akwesasne, NY 13655

Re: Leach XPress Project

Dear Chief Thompson:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the St. Regis Mohawk Tribe in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

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20150603-3013 FERC PDF (Unofficial) 06/03/2015

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We are interested in receiving your comments on the project to ensure that the concerns of the St. Regis Mohawk Tribe are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

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The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Arnold Printup
Tribal Historic Preservation Officer
St. Regis Mohawk Tribe
412 State Route 37
Akwesasne, NY 13655

20150603-3014 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chief Ronald LaFrance, Jr.
St. Regis Mohawk Tribe
412 State Route 37
Akwesasne, NY 13655

Re: Leach XPress Project

Dear Chief LaFrance:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the St. Regis Mohawk Tribe in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

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20150603-3014 FERC PDF (Unofficial) 06/03/2015

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We are interested in receiving your comments on the project to ensure that the concerns of the St. Regis Mohawk Tribe are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

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The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Arnold Printup
Tribal Historic Preservation Officer
St. Regis Mohawk Tribe
412 State Route 37
Akwesasne, NY 13655

20150603-3019 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chief Beverly Cook
St. Regis Mohawk Tribe
412 State Route 37
Akwesasne, NY 13655

Re: Leach XPress Project

Dear Chief Cook:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the St. Regis Mohawk Tribe in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3019 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the St. Regis Mohawk Tribe are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Arnold Printup
Tribal Historic Preservation Officer
St. Regis Mohawk Tribe
412 State Route 37
Akwesasne, NY 13655

20150603-3020 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chief Leo Henry
Tuscarora Nation
2006 Mount Hope Road
Lewiston NY 14092

Re: Leach XPress Project

Dear Chief Henry:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Tuscarora Nation in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

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20150603-3020 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Tuscarora Nation are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

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We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Bryan Printup
Tuscarora Nation
5226 Walmore Road
Lewiston, NY 14092

20150603-3021 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Nation Representative
Cayuga Nation
P.O. Box 110
Versailles, NY 14168

Re: Leach XPress Project

Dear Nation Representative:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Cayuga Nation in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3021 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Cayuga Nation are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

20150603-3022 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Tribal President Wallace Miller
Stockbridge-Munsee Band of the Mohican Nation
P.O. Box 70 Route 1
Bowler, WI 54416

Re: Leach XPress Project

Dear President Miller:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Stockbridge-Munsee Band of the Mohican Nation in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

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20150603-3022 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Stockbridge-Munsee Band of the Mohican Nation are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Sherry White
Tribal Historic Preservation Officer
Stockbridge-Munsee Band of the Mohican Nation
P.O. Box 70
W13447 Camp 14 Road
Bowler, WI 54416

20150603-3022 FERC PDF (Unofficial) 06/03/2015

Bonney Hartley
Tribal Historic Preservation Assistant
Stockbridge-Munsee Band of the Mohican Nation
P.O. Box 718
Troy, NY 12181

20150603-3023 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Chairman Ron Sparkman
Shawnee Tribe of Oklahoma
P.O. Box 189
Miami, OK 74354

Re: Leach XPress Project

Dear President Sparkman:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Shawnee Tribe of Oklahoma in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3023 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Shawnee Tribe of Oklahoma are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Kim Jumper (Enclosure)
Shawnee Tribe of Oklahoma
P.O. Box 189
Miami, OK 74354

20150603-3024 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
Representative Raymond Halbritter
Oneida Indian Nation
5218 Patrick Road
Verona, NY 13421

Re: Leach XPress Project

Dear Representative Halbritter:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Oneida Indian Nation in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3024 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Oneida Indian Nation are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

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We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Jesse Bergevin
Historian
Oneida Indian Nation
P. O. Box 662
1256 Union Street
Oneida, NY 13421-0662

20150603-3025 FERC PDF (Unofficial) 06/03/2015

FEDERAL ENERGY REGULATORY COMMISSION
WASHINGTON, D.C. 20426

OFFICE OF ENERGY PROJECTS

In Reply Refer To:
OEP/DG2E/Gas Branch 2
Columbia Gas Transmission, LLC
Leach XPress Project
Docket No. PF14-23-000

June 3, 2015
President Clifford Peacock
Delaware Nation
P.O. Box 825
Anadarko, OK 73005

Re: Leach XPress Project

Dear President Peacock:

The Federal Energy Regulatory Commission (FERC or Commission) invites the participation of the Delaware Nation in its review of the Leach XPress Project planned by Columbia Gas Transmission, LLC (Columbia). Columbia plans to construct 127 miles of 36-inch-diameter pipeline, two 36-inch-diameter looping pipelines totaling 30 miles, and one 30-inch-diameter lateral that is approximately 0.5 mile in length, as well as the abandonment in-place of approximately 27 miles of existing 20-inch-diameter pipeline along Columbia's pipeline system in Pennsylvania, Ohio, and West Virginia. The planned Project would involve five compressor stations, consisting of the construction and operation of three new stations and modifications at two existing stations. The planned Project would also include five regulator stations, consisting of the construction and operation of four new stations and modifications at one existing station.

On October 9, 2014, FERC approved Columbia's request to begin the Commission's pre-filing process, which enables review of the project to begin before an application is filed with FERC. The purpose of the pre-filing process is to seek public and agency input early in the project planning phase and encourage involvement by interested stakeholders in a manner that allows for the early identification and resolution of environmental issues.

You should have received notification of the project when the FERC issued a *Notice of Intent to Prepare an Environmental Assessment for the Planned Leach XPress Project, Request for Comments on Environmental Issues, and Notice of Public Scoping Meeting* (NOI) on January 13, 2015. The NOI included a brief description of the project and the Commission's decision-making process. It was published in the *Federal Register*, sent to various Indian tribes, and placed in the Commission's public record under docket number PF14-23-000.[1]

[1] Project information is available on the FERC website (www.ferc.gov) using the eLibrary link. Click on the eLibrary link, click on "General Search" and enter the docket number, excluding the last three digits in the Docket Number field (i.e., PF14-12). Be sure you have selected an appropriate date range. For assistance, please contact FERC Online Support at FercOnlineSupport@ferc.gov or toll free at (866) 208-3676, or for TTY, contact (202) 502-8659. The eLibrary link also provides access to the texts of formal documents issued by the Commission, such as orders, notices, and rulemakings.

20150603-3025 FERC PDF (Unofficial) 06/03/2015

You may have also been contacted about the project by Columbia or their consultants, R. Christopher Goodwin & Associates, Inc. Although the company does not represent the FERC, they can assist us in completing the process of complying with section 106 of the National Historic Preservation Act by gathering information, in accordance with the Advisory Council on Historic Preservation's implementing regulations at 36 CFR 800.2(a)(3).

We are interested in receiving your comments on the project to ensure that the concerns of the Delaware Nation are identified and properly considered in our environmental analysis. We also request your assistance in identifying the Tribe's properties of traditional, religious, or cultural importance that may be affected by the proposed Project. Please be assured that we will keep any sensitive tribal information strictly confidential.

You may file a response either electronically or with a paper copy; however, with either method please reference the project docket number (PF14-23-000) with your submission. If you choose the internet, use the eFiling feature on the FERC's web page at www.ferc.gov under the "Documents & Filings" link. To file a paper copy, send a letter addressed to: Kimberly D. Bose, Secretary; Federal Energy Regulatory Commission; 888 First Street NE, Washington DC 20426.

Please note, if you file sensitive tribal information it should be marked "Contains Privileged Information - Do Not Release".

We would very much appreciate receiving your response within 30 days of the date of this letter. If you would like to discuss our process, get further information, or meet with Commission staff, please feel free to contact either the Environmental Project Manager, Juan Polit (at 202-502-8652 or juan.polit@ferc.gov) or the Project Archaeologist, Eric Howard (at 202-502-6263 or eric.howard@ferc.gov).

The Commission welcomes your participation in our environmental review process for the project.

Sincerely,

Terry L. Turpin, Director
Division of Gas-Environment
and Engineering

cc: Public File, Docket No. PF14-23-000

Nekole Alligood
Director of Cultural Preservation
Delaware Nation
31064 State Highway 281
Anadarko, OK 73005

Tribe Responses

Catawba Indian Nation
Tribal Historic Preservation Office
1536 Tom Steven Road
Rock Hill, South Carolina 29730

Office 803-328-2427
Fax 803-328-5791

July 22, 2015

Attention: Zane T. Daniels
Columbia Pipeline Group
290 W. Nationwide Blvd.
Columbus, Ohio 43215

Re. THPO #	TCNS #	Project Description
2015-860-1		Construction of Leach Xpress – proposed project for Ohio, Pennsylvania & W. Virginia

Mr. Daniels,

The Catawba have no immediate concerns with regard to traditional cultural properties, sacred sites or Native American archaeological sites within the boundaries of the proposed project areas. **However, the Catawba are to be notified if Native American artifacts and / or human remains are located during the ground disturbance phase of this project.**

If you have questions please contact Caitlin Totherow at 803-328-2427 ext. 226, or e-mail caitlinh@ccppcrafts.com.

Sincerely,

Caitlin Totherow for

Wenonah G. Haire
Tribal Historic Preservation Officer

7/10/14

Delaware Tribe Historic Preservation Office
1200 Commercial St.
Roosevelt Hall, RM 212
Emporia State University
Emporia, KS 66801
(620) 341-6699
bobermeyer@delawaretribe.org

June 27, 2014

R. Christopher Goodwin & Associates
Attn: Michael B. Hornum
241 East 4th St.
Suite 100
Frederick, MD 21701

Re: Columbia Gas Transmission, LLC Leach Xpress Project

Dear Michael B. Hornum,

Thank you for informing the Delaware Tribe on the proposed construction associated with the above referenced project. **Our review indicates that the project is located in the vicinity of significant archaeological resources that hold cultural and religious significance to the Delaware Tribe.** Given the location of the proposed project, we request that you conduct a Phase I archaeological survey that includes background research, surface survey and subsurface testing of the project area.

We wish to continue as a consulting party on this project and look forward to receiving a copy of the Phase I survey report so we may reevaluate the project and its' potential threat to culturally significant resources. If human remains are discovered during the survey, we request that you immediately halt all ground disturbing activities and contact the Delaware Tribe before moving forward with the survey or project construction. We respectfully request that all construction for the proposed project is not initiated until after we are able to review the Phase I survey report and provide our written comments.

If you have any questions, feel free to contact this office by phone at (620) 341-6699 or by e-mail at bobermeyer@delawaretribe.org.

Sincerely,

Brice Obermeyer

Brice Obermeyer
Delaware Tribe Historic Preservation Office
1200 Commercial St
Roosevelt Hall, RM 212
Emporia State University
Emporia, KS 66801

20160317-5002 FERC PDF (Unofficial) 3/16/2016 5:03:54 PM

Diane Hunter, Fort Wayne, IN.
March 16, 2016

Re: Columbia Gas Transmission - Leach Xpress Project - CP15-514-000

To Whom It May Concern:

Aya, kikwehsitoole. My name is Diane Hunter, and I am the Acting Tribal Historic Preservation Officer for the Federally Recognized Miami Tribe of Oklahoma. In this capacity, I am the Miami Tribe's point of contact for all Section 106 issues.

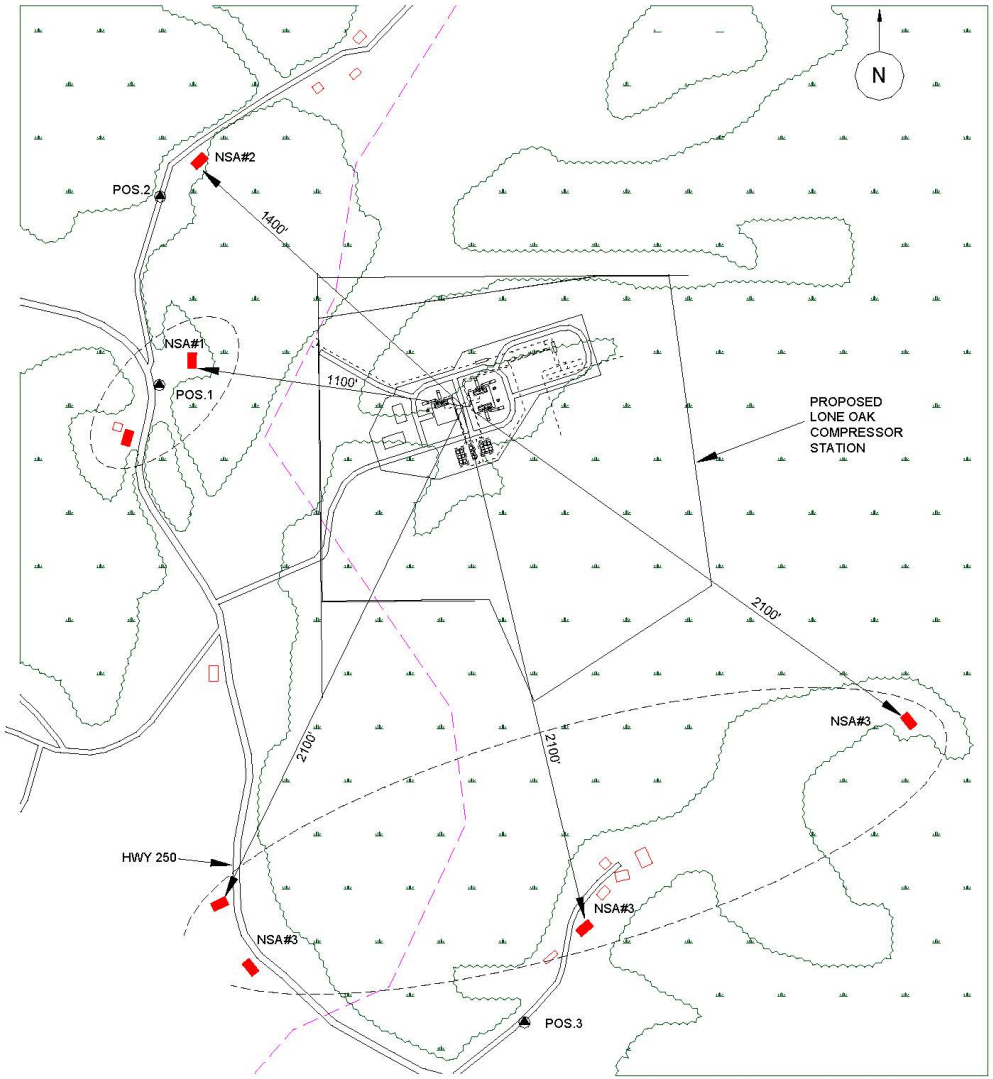
The Miami Tribe offers no objection to the proposed project at this time, as we are not currently aware of existing documentation directly linking a specific Miami cultural or historic site to the project site. However, as this site is within the aboriginal homelands of the Miami Tribe, if any human remains or Native American cultural items falling under the Native American Graves Protection and Repatriation Act (NAGPRA) or archaeological evidence is discovered during any phase of this project, the Miami Tribe requests immediate consultation with the entity of jurisdiction for the location of discovery. In such a case, please contact me at 918-541-8966, by email at dhunter@miamination.com, or by mail at the address listed below to initiate consultation.

The Miami Tribe wants to serve as a consulting party to the above-mentioned project. In my capacity as Acting Tribal Historic Preservation Officer I am the point of contact for consultation.

Sincerely,

Diane Hunter
Acting Tribal Historic Preservation Officer
Miami Tribe of Oklahoma
P.O. Box 1326
Miami, OK 74355

APPENDIX Q
Noise Sensitive Areas Associated with the Projects



APPROXIMATE SCALE IN FEET

0 300 600 1200

Leach XPress Project

Non-Residential Building

House or Mobile Home

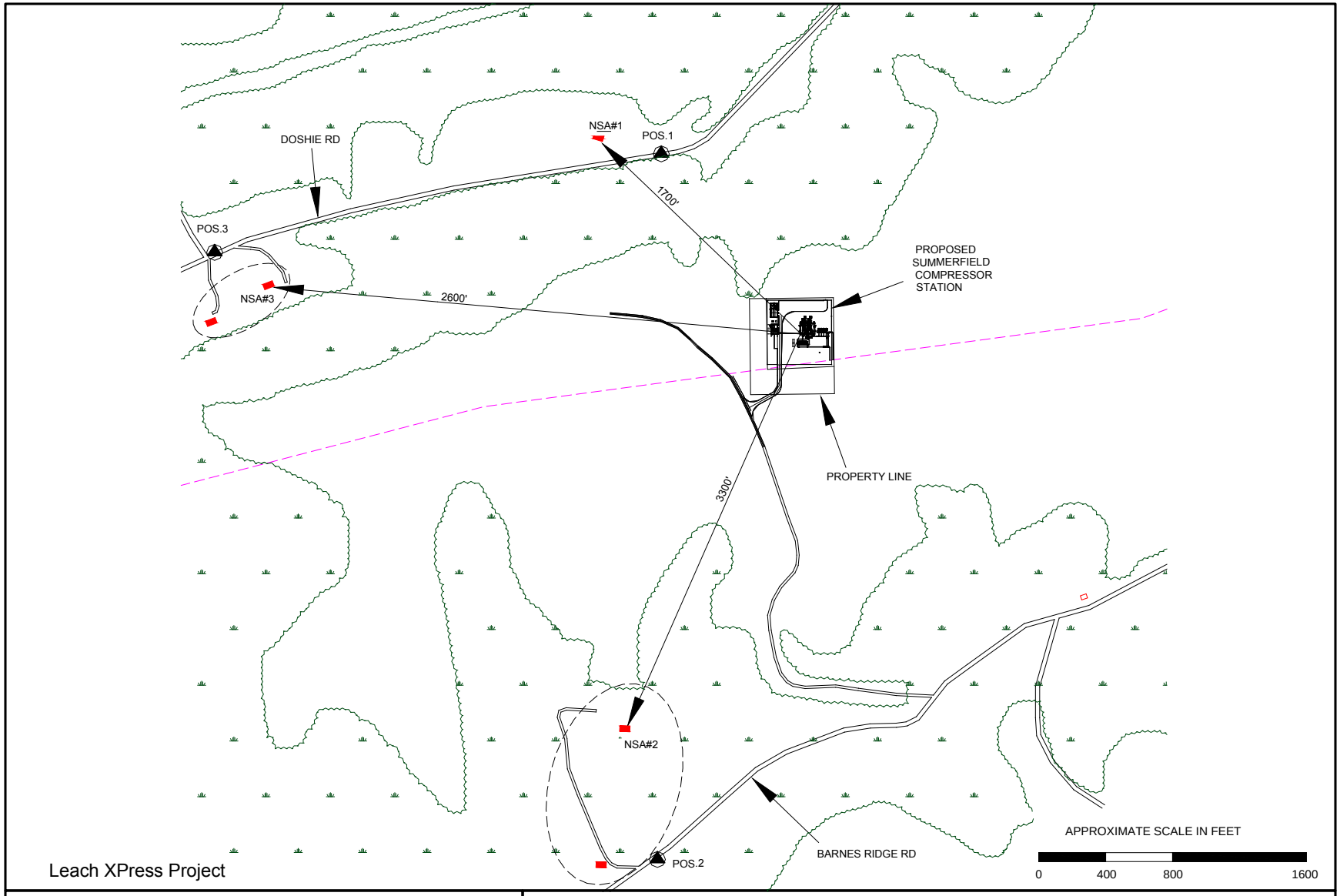
NSA Noise Sensitive Area

Measurement Position

Trees or Heavy Foliage

Appendix Q-1
Proposed Lone Oak Compressor Station and Immediate Area

Marshall County, WV



Non-Residential Building

House or Mobile Home

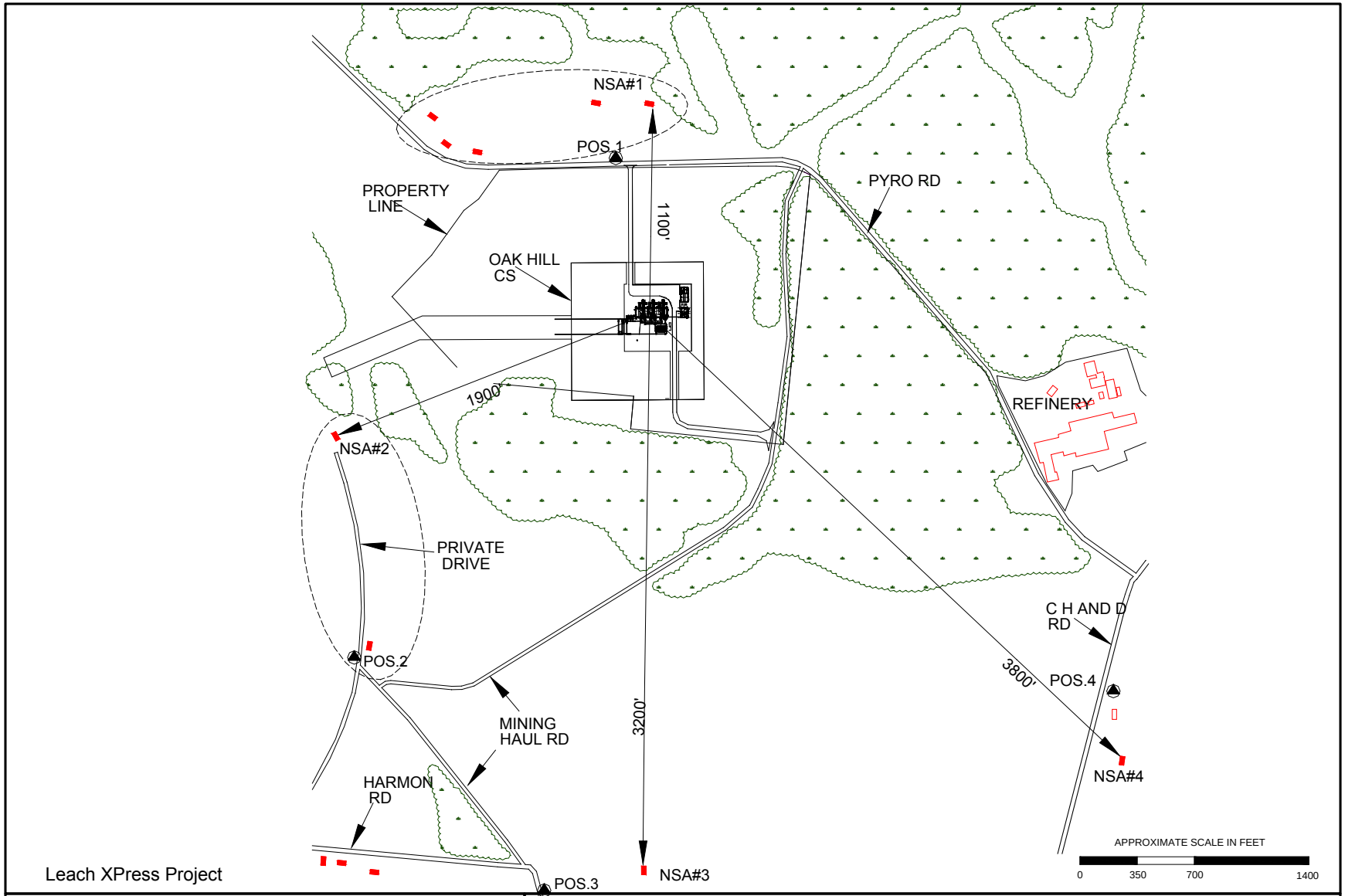
NSA Noise Sensitive Area

Measurement Position

Trees or Heavy Foliage

Appendix Q-2
Proposed Summerfield Compressor Station and Immediate Area

Noble County, OH



Non-Residential Building

House or Mobile Home

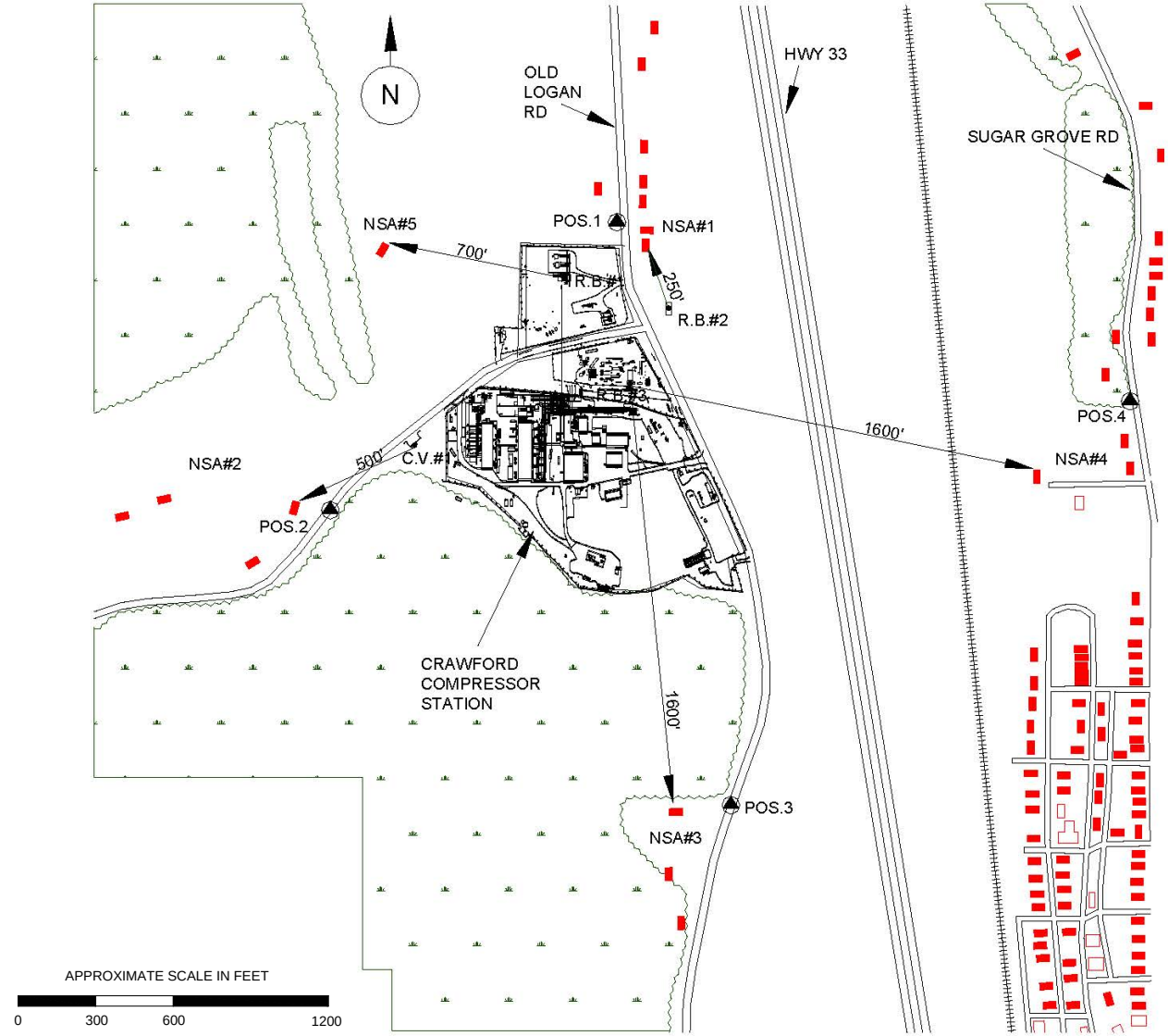
NSA Noise Sensitive Area

Measurement Position

Trees or Heavy Foliage

Appendix Q-3
Proposed Oak Hill Compressor Station and Immediate Area

Jackson County, OH



Leach XPress Project

Non-Residential Building

House or Mobile Home

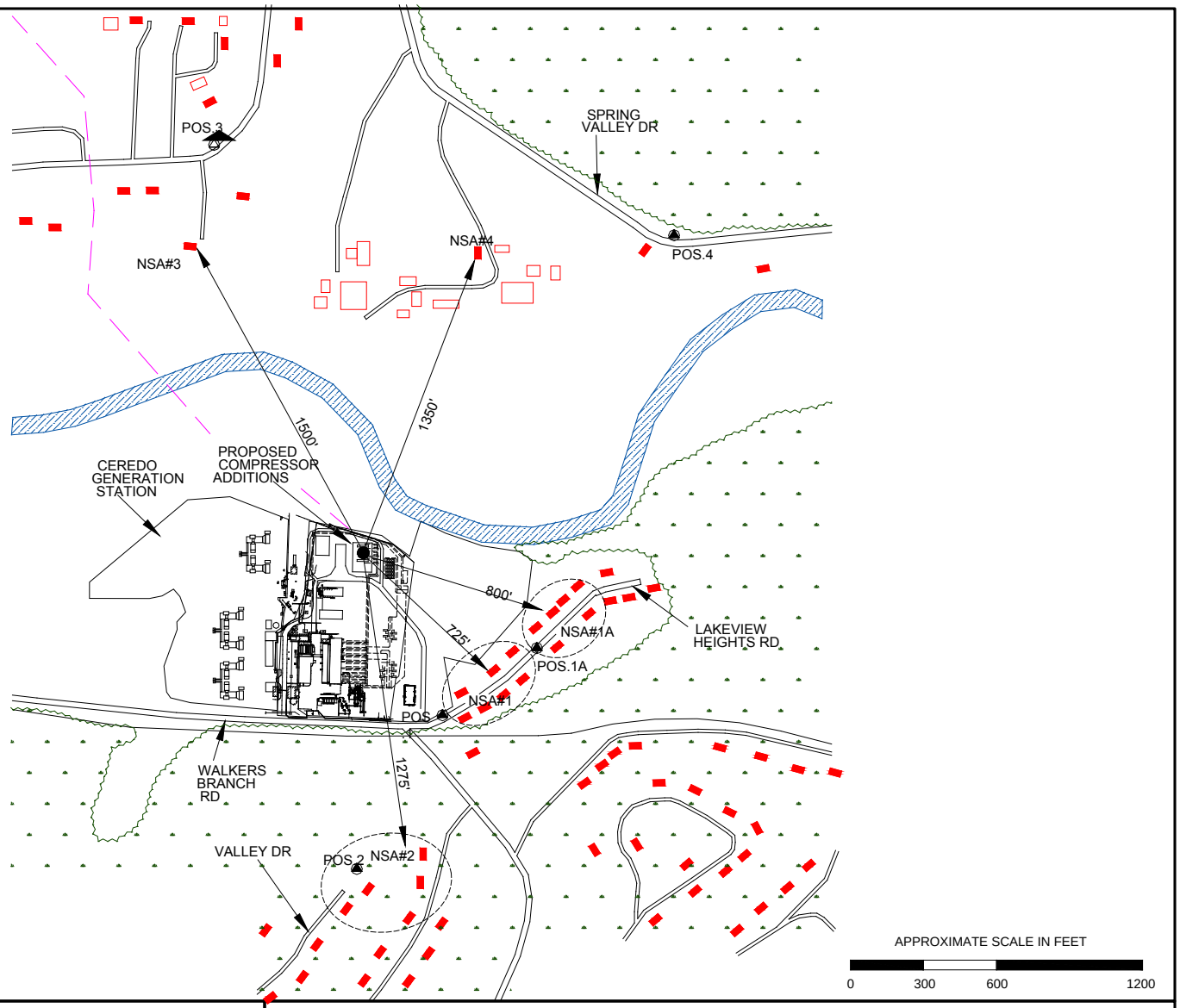
NSA Noise Sensitive Area

Measurement Position

Trees or Heavy Foliage

Appendix Q-4
Crawford Compressor Station and Immediate Area

Fairfield County, OH



Leach XPress Project

Non-Residential Building

House or Mobile Home

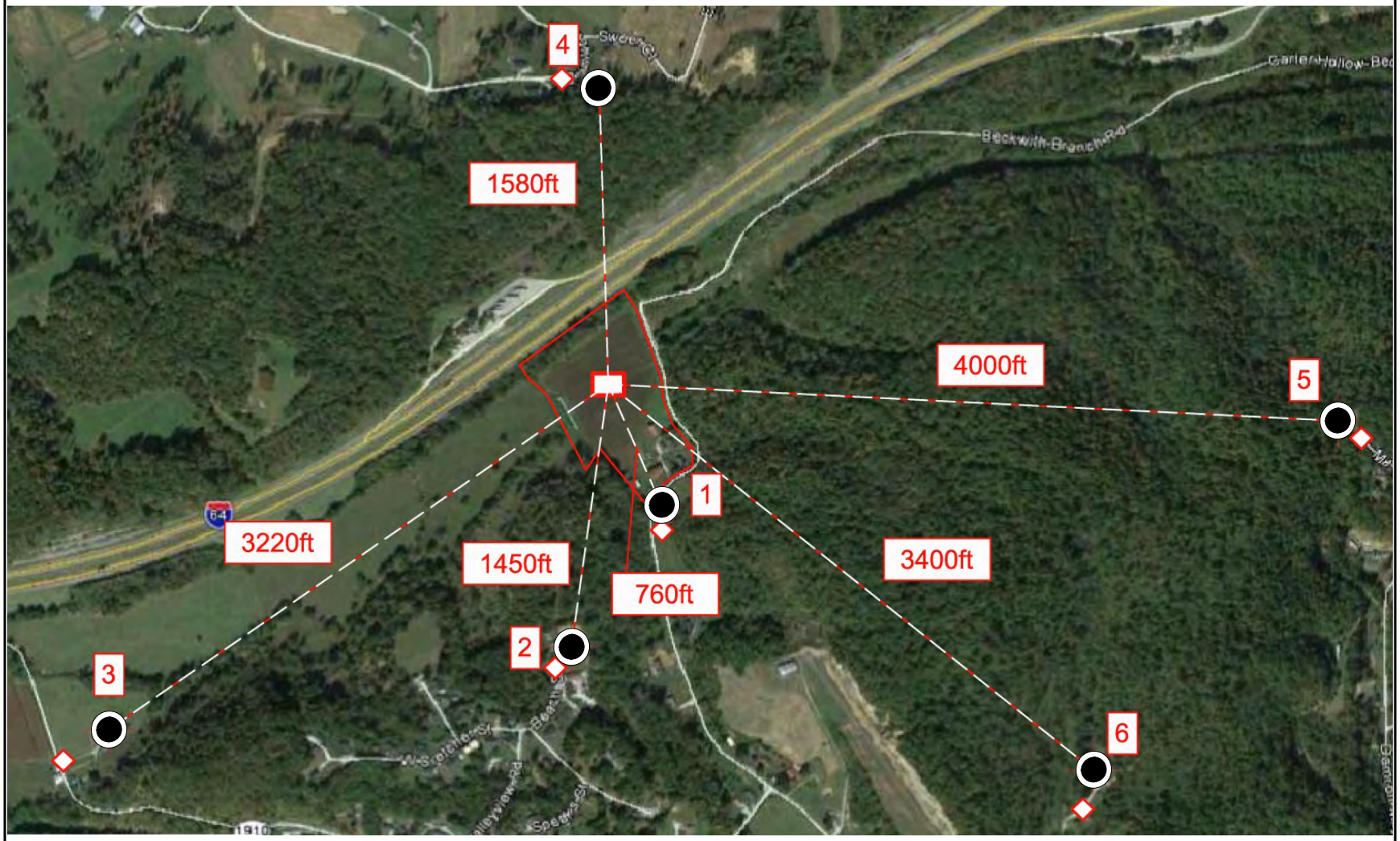
NSA Noise Sensitive Area

Measurement Position

Trees or Heavy Foliage

Appendix Q-5
Ceredo Compressor Station and Immediate Area

Wayne County, WV



Rayne XPress Project

APPROXIMATE SCALE IN FEET

0 400 800 1600

Noise Sensitive Area

Compressor Station Location

Appendix Q-6
Grayson
Compressor Station
and Immediate Area

Carter County, KY

Rayne XPress Project

APPROXIMATE SCALE IN FEET

0 400 800 1600

Noise Sensitive Area

Compressor Station Location

Appendix Q-7
Means
Compressor Station and Immediate Area

Menifee County, KY

APPENDIX R
Summary of Soils Within the Leach XPress Project Area

APPENDIX R
Summary of Soils within the Leach XPress Project Area

Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
Pipeline Facilities Marshall County, WV										
BrC	708	Farmland of statewide importance	No	Severe	High	0.37	Moderate	Yes	No	Moderate
BrD	3,743	Farmland of statewide importance	No	Severe	Moderate	0.37	Moderate	Yes	No	Moderate
BrE	1,881	No	No	Severe	Moderate	0.37	High	Yes	No	Low
CaA	821	Yes	Yes	Severe	High	0.37	Low	No	No	Moderate
ClC	2,399	Farmland of Statewide Importance	No	Severe	Moderate	0.24	Moderate	Yes	Yes	Moderate
CkA	1,544	Yes	Yes	Severe	Moderate	0.37	Low	No	No	Moderate
CmC	5,576	Farmland of Statewide Importance	No	Severe	Moderate	0.24	Moderate	Yes	Yes	High
CmD	31,651	Farmland of Statewide Importance	No	Severe	Moderate	0.20	Moderate	Yes	Yes	High
CpC	1,386	Farmland of statewide importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
CpD	4,266	Farmland of statewide importance	No	Severe	Moderate	0.20	Moderate	Yes	Yes	Moderate
CpE	2,636	No	No	Severe	Moderate	0.20	High	Yes	Yes	Low
CrF	10,957	No	No	Severe	Moderate	0.20	Low	Yes	Yes	Moderate
CuC	123	No	No	Severe	Moderate	0.24	Moderate	Yes	Yes	Moderate
DoC	465	Farmland of statewide importance	No	Severe	Moderate	0.37	Moderate	Yes	No	Moderate
DoD	729	Farmland of statewide importance	No	Severe	Moderate	0.37	Moderate	Yes	No	Moderate
DoE	1,205	No	No	Severe	Moderate	0.37	High	Yes	No	Low
DrE	26,087	No	No	Severe	Moderate	0.37	High	Yes	Yes	Low
DsF	26,026	No	No	Severe	Moderate	0.37	High	Yes	No	Low
FaC	199	Farmland of Statewide Importance	No	Severe	Moderate	0.28	Moderate	Yes	Yes	High
GuC	82	Farmland of Statewide Importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
GuD	1,879	Farmland of Statewide Importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
LoA	228	Yes	Yes	Severe	High	0.37	Low	No	No	Moderate

APPENDIX R
Summary of Soils within the Leach XPress Project Area

Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
MoB	324	Farmland of Statewide Importance	Yes	Severe	High	0.43	Low	No	No	Moderate
MoC	1,093	Farmland of Statewide Importance	Yes	Severe	High	0.43	Moderate	Yes	No	Moderate
SeA	533	Yes	Yes	Severe	High	0.37	Low	No	No	Moderate
SfB	719	Yes	No	Severe	Moderate	0.37	Low	No	No	High
SkA	383	Farmland of statewide importance	Yes	Moderate	Moderate	0.17	Low	No	No	High
Uh	613	No	No	Not Rated	Not Rated	Not Rated	Not Rated	No	No	Low
W	1,344	No	No	Not rated	Not rated	Not rated	Not rated	No	No	Low
Wayne County, WV										
AgC	181	Farmland of statewide importance	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Moderate
BeD	830	Farmland of statewide importance	No	Severe	Moderate	Not rated	Moderate	Yes	No	Moderate
Ca	1,804	Yes	Yes	Severe	High	0.37	Low	No	No	Moderate
DgF	1,530	No	No	Slight	Low	0.05	Low	Yes	Yes	Moderate
GuC	294	Farmland of statewide importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
GuD	4,151	Farmland of statewide importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
GuE	344	Farmland of local importance	No	Severe	Moderate	0.37	High	Yes	Yes	Moderate
GuF	1,129	No	No	Severe	Moderate	Not rated	High	Yes	Yes	Low
Lo	151	Yes	Yes	Severe	High	0.28	Low	No	No	Moderate
MaB	598	Farmland of statewide importance	No	Severe	Moderate	0.55	Low	No	No	High
MaC	570	Farmland of statewide importance	No	Severe	Moderate	0.55	Moderate	Yes	No	Moderate
Ud	1,072	No	No	Not rated	Not rated	Not rated	Not rated	Yes	No	Low
W	1,847	No	No	Not rated	Not rated	Not rated	Not rated	No	No	Low
Greene County, PA										
CaC	932	Farmland of	No	Severe	High	0.24	Moderate	Yes	Yes	Moderate

APPENDIX R
Summary of Soils within the Leach XPress Project Area

Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
		Statewide Importance								
CaD	284	No	No	Severe	Moderate	0.24	Moderate	Yes	Yes	Moderate
DoD	201	No	Yes	Severe	High	0.37	Moderate	Yes	No	Moderate
DtD	618	No	Yes	Severe	High	0.37	Moderate	Yes	No	Moderate
DtF	1,923	No	Yes	Severe	High	0.37	High	Yes	No	Low
GdB	417	Yes	Yes	Severe	High	0.49	Low	Yes	No	Low
Hu	222	Yes	Yes	Severe	High	0.28	Low	No	No	Moderate
Nw	1,494	Farmland of Statewide Importance	Yes	Severe	High	0.37	Low	No	No	Moderate
Fairfield County, OH										
BkF	48	No	No	Severe	Moderate	0.17	High	No	Yes	Moderate
Cg	556	Prime farmland if protected from flooding	Yes	Severe	High	0.37	Low	No	No	Moderate
FhB	711	Yes	No	Severe	Moderate	0.37	High	No	No	Moderate
FmA	931	Yes	No	Severe	Moderate	0.49	Low	No	No	High
GcE	369	No	No	Moderate	Slight	0.17	Moderate	No	Yes	Moderate
GdF	447	No	No	Moderate	Slight	0.10	Moderate	No	Yes	Moderate
GkC	3,464	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
GkD	3,575	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
GnC2	765	Farmland of local importance	No	Severe	Moderate	0.43	Moderate	No	No	Moderate
Lk	1,151	Yes	Yes	Severe	High	0.37	Low	No	No	Moderate
Ne	295	Prime farmland if drained and protected during the growing season	Yes	Severe	High	0.37	Low	Yes	No	Moderate
SdD	870	Farmland of local importance	No	Severe	Moderate	0.32	Moderate	No	No	Moderate
SeE	9,919	No	No	Severe	Moderate	0.32	High	Yes	No	Low
SfD	2,172	Farmland of local importance	No	Severe	Moderate	0.28	Moderate	Yes	No	Moderate
SfE	1,417	No	No	Severe	Moderate	0.28	High	Yes	No	Low
W	121	No	No	Not rated	Not rated	Not rated	Not rated	No	No	Low

APPENDIX R
Summary of Soils within the Leach XPress Project Area

Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
WeC	5,654	Farmland of local importance	No	Severe	Moderate	0.43	Moderate	No	Yes	Moderate
WfC	218	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
ZnC2	1,388	Farmland of local importance	No	Severe	Moderate	0.43	Moderate	No	Yes	Moderate
Hocking County, OH										
AfB	328	Yes	No	Severe	Moderate	0.43	Low	No	No	Moderate
AfC	892	Farmland of local importance	No	Severe	Moderate	0.43	Moderate	No	No	Moderate
BrF	151	No	No	Severe	Moderate	0.17	High	Yes	Yes	Low
CeF	2,560	No	No	Moderate	Slight	0.10	Low	Yes	Yes	Low
Cg	491	Prime farmland if protected during the growing season	Yes	Severe	High	0.37	Low	No	No	Moderate
Chg1AF	4,015	Prime farmland if protected during the growing season	Yes	Severe	High	0.32	Low	No	No	Moderate
CtC	146	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
DkF	1,164	No	No	Severe	Moderate	0.05	High	Yes	Yes	Low
EcA	316	Prime farmland if drained	Yes	Severe	High	0.43	Low	No	No	Moderate
GfA	2,487	Yes	Yes	Severe	High	0.49	Low	No	No	Moderate
GfB	2,258	Yes	Yes	Severe	High	0.49	Low	No	No	Moderate
Hay1AF	1,567	Prime farmland if protected during the growing season	No	Severe	Moderate	0.43	Low	No	No	High
LnC	4,717	Farmland of local importance	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Moderate
LnD	1,525	Farmland of local	No	Severe	Moderate	0.32	High	Yes	Yes	Moderate

APPENDIX R
Summary of Soils within the Leach XPress Project Area

Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
		importance								
McA	1,396	Prime farmland if drained	Yes	Severe	High	0.43	Low	No	No	Moderate
Mel1AF	2,327	Prime farmland if protected during the growing season	Yes	Severe	High	0.43	Moderate	No	No	Moderate
Nk	1,063	Yes	Yes	Severe	High	0.37	Low	No	No	Moderate
Orr1AF	3,518	Prime farmland if protected and drained during the growing season	Yes	Severe	High	0.32	Low	No	No	Moderate
OtB	2,795	Yes	Yes	Severe	High	0.49	Low	No	No	Moderate
OtC	1,120	Farmland of local importance	No	Severe	Moderate	0.49	Moderate	Yes	No	Moderate
OtD2	691	Farmland of local importance	No	Severe	Moderate	0.49	Moderate	Yes	No	Moderate
Po	1,658	Yes	Yes	Severe	High	0.37	Low	No	No	Moderate
SaC	2,400	Farmland of local importance	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Moderate
SaD	1,617	Farmland of local importance	No	Severe	Moderate	0.32	High	Yes	Yes	Moderate
SbE	23,883	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
ScD	8,387	Farmland of local importance	No	Severe	Moderate	0.32	Moderate	Yes	No	Moderate
ScE	13,374	No	No	Severe	Moderate	0.32	High	Yes	No	Low
ScF	586	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
W	153	No	No	Not rated	Not rated	Not rated	Not rated	No	No	Low
WeB	266	Yes	No	Severe	Moderate	0.43	Low	No	Yes	High
WeC	1,962	No	No	Severe	Moderate	0.43	Moderate	Yes	Yes	Moderate
WfC	19,228	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
WmB	646	Yes	No	Severe	Moderate	0.37	Low	No	Yes	High
WmC	649	Farmland of local	No	Severe	Moderate	0.37	Moderate	No	Yes	Moderate

APPENDIX R
Summary of Soils within the Leach XPress Project Area

Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
		importance								
WtA	657	Yes	Yes	Severe	High	0.43	Low	No	No	Moderate
Lawrence County, OH										
EmB	508	No	Yes	Not rated	Not rated	Not rated	Not rated	No	No	Low
W	41	No	No	Not rated	Not rated	Not rated	Not rated	No	No	Low
Monroe County, OH										
BwE2	148	No	No	Severe	Moderate	0.37	High	Yes	Yes	Low
Chg1AF	135	Prime farmland if protected during the growing season	Yes	Severe	High	0.32	Low	No	No	Moderate
DkE2	963	No	No	Severe	Moderate	0.24	High	Yes	Yes	Low
GkC2	2,411	No	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Low
GkD2	4,654	No	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Low
GkE2	23,273	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
GkE3	883	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
GkG	5,274	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
GlG	9,873	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
GoB2	258	Yes	No	Severe	Moderate	0.32	Low	No	Yes	Moderate
GoC2	8,174	No	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Moderate
GoD2	8,848	No	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Moderate
GoD3	622	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
GoE2	25,967	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
GoE3	1,706	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
GoG2	8,367	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
GrD2	689	No	No	Severe	Moderate	0.43	Moderate	Yes	No	Moderate
GsG	4,779	No	No	Severe	Moderate	0.43	High	Yes	No	Low
GtD	285	No	No	Severe	Moderate	0.43	Moderate	Yes	Yes	Moderate
GwC2	364	No	No	Severe	Moderate	0.43	Moderate	Yes	No	Moderate
GwD2	2,045	No	No	Severe	Moderate	0.43	Moderate	Yes	No	Moderate
GwE2	4,748	No	No	Severe	Moderate	0.43	High	Yes	No	Low
GwE3	136	No	No	Severe	Moderate	0.43	High	Yes	Yes	Low
GwG2	1,964	No	No	Severe	Moderate	0.43	High	Yes	No	Low
He	1,976	Yes	No	Severe	Moderate	0.32	Low	No	Yes	High
Hr	1,563	Prime farmland if drained	Yes	Severe	High	0.37	Low	No	Yes	Moderate
KnL1AF	165	Prime farmland if drained and protected during the growing season	Yes	Severe	Moderate	0.32	Low	No	No	Moderate

APPENDIX R
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Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
Lh	562	Yes	Yes	Severe	High	0.32	Low	No	No	Moderate
LpE2	2,083	No	No	Severe	Moderate	0.37	High	Yes	Yes	Low
LuF	586	No	No	Severe	Moderate	0.37	High	Yes	No	Low
Ma	346	No	No	Not rated	Not rated	Not rated	Not rated	Not rated	No	Low
New1AF	408	Prime farmland if drained or protected during the growing season	Yes	Severe	High	0.32	Low	No	No	Moderate
SsE	1,362	No	No	Severe	Moderate	0.37	High	Yes	No	Low
UrC3	351	No	No	Severe	Moderate	0.32	High	No	Yes	Low
UrD3	1,026	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
VaD	164	No	Yes	Severe	High	0.32	Moderate	Yes	No	Low
W	128	No	No	Not rated	Not rated	Not rated	Not rated	No	No	Low
WhB2	502	Yes	No	Severe	Moderate	0.37	Low	No	Yes	Moderate
WhC2	2,336	No	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
WhD2	2,409	No	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
Wml1D2	1,541	No	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Moderate
WmW1D2	3,659	No	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Moderate
WrA	592	Yes	No	Severe	Moderate	0.37	Low	No	No	High
ZnB	1,168	Yes	No	Severe	Moderate	0.43	Low	No	Yes	Moderate
ZnB2	1,388	Yes	No	Severe	Moderate	0.43	Low	No	Yes	Moderate
ZnC	64	No	No	Severe	Moderate	0.43	Moderate	No	Yes	Moderate
ZnC2	2,562	No	No	Severe	Moderate	0.43	Moderate	No	Yes	Moderate
ZoB2	745	Yes	No	Severe	Moderate	0.43	Low	No	Yes	Moderate
ZoC2	2,286	No	No	Severe	Moderate	0.43	Moderate	Yes	Yes	Moderate
Morgan County, OH										
BdF	391	No	No	Severe	Moderate	0.17	High	Yes	Yes	Low
BrD	456	Farmland of local importance	Yes	Severe	High	0.37	Moderate	Yes	No	Moderate
BrE	336	No	Yes	Severe	High	0.37	High	Yes	No	Moderate
CeB	1,169	Yes	No	Severe	Moderate	0.28	Low	No	No	High
CgC	896	Farmland of local importance	Yes	Severe	High	0.24	Low	Yes	No	Moderate
CoB	587	Farmland of local importance	No	Moderate	Low	0.37	Low	No	No	High
GhD2	2,052	Farmland of local importance	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Moderate
GhE2	1,392	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
GhF	741	No	No	Severe	Moderate	Not	High	Yes	Yes	Low

APPENDIX R
Summary of Soils within the Leach XPress Project Area

Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
						rated				
GnB	138	Yes	Yes	Severe	High	0.49	Low	No	No	Moderate
GsD2	8,511	Farmland of local importance	Yes	Severe	High	0.43	Moderate	Yes	No	Moderate
Hay1AO	272	Prime farmland if drained and protected during the growing season	No	Severe	Moderate	0.43	Low	No	No	High
Ld	1,043	Yes	Yes	Severe	High	0.37	Low	Yes	No	Moderate
LoD2	10,641	No	No	Severe	Moderate	0.43	Moderate	Yes	Yes	Moderate
LrE2	6,069	No	No	Severe	Moderate	0.28	High	Yes	No	Low
LrF	2,207	No	No	Severe	Moderate	0.28	High	Yes	Yes	Low
LsE2	429	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
MoB	90	No	No	Severe	Moderate	0.32	Low	No	No	High
Np	992	Prime farmland if drained and protected during the growing season	Yes	Severe	High	0.32	Low	No	No	Moderate
Pg	557	No	No	Not rated	Not Rated	Not rated	Not rated	No	No	Low
UpC2	810	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	No	No	Moderate
VbD2	459	Farmland of local importance	Yes	Severe	High	0.37	Moderate	Yes	No	Moderate
W	546	No	No	Not rated	Not rated	Not rated	Not rated	No	No	Low
WfB	4,677	Yes	No	Severe	Moderate	0.37	Low	No	No	High
WfC2	9,183	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	No	No	Moderate
WgE2	659	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
WgF	7,852	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
WnC2	116	No	No	Severe	Moderate	0.37	Moderate	Yes	No	Moderate
WyB	472	Yes	No	Severe	Moderate	0.37	Low	No	Yes	Moderate
WyC2	2,294	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	No	Moderate
ZnC2	91	Farmland of local	No	Severe	Moderate	0.43	Moderate	No	Yes	Moderate

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Summary of Soils within the Leach XPress Project Area

Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
		importance								
Muskingum County, OH										
BkF	631	No	No	Severe	Moderate	0.17	High	Yes	Yes	Low
CrC	249	No	Yes	Severe	High	0.24	Low	Yes	No	Moderate
GdC2	436	No	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
GeD2	161	No	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
GtC2	12,543	No	No	Severe	Moderate	0.37	Moderate	No	No	Moderate
GtD2	5,885	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	No	Moderate
Lk	1,077	Yes	Yes	Severe	High	0.37	Low	No	No	Moderate
Lm	861	Yes	Yes	Severe	High	0.28	Low	No	No	Moderate
LpD	286	No	No	Severe	Moderate	0.37	Moderate	Yes	No	Moderate
LpD2	2,693	No	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
LrE2	9,757	No	No	Severe	Moderate	0.28	High	Yes	Yes	Low
LrF	414	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
MrF	144	No	Yes	Severe	Moderate	0.15	High	Yes	No	Moderate
MsB	1,719	No	Yes	Severe	High	0.32	Low	No	No	Moderate
MsD	2,889	No	Yes	Severe	High	0.32	Low	Yes	No	Moderate
Ne	416	Prime farmland if drained and protected during the growing season	Yes	Severe	High	0.37	Low	Yes	No	Moderate
WhC2	1,838	No	No	Severe	Moderate	0.43	Moderate	Yes	Yes	Moderate
WmB	422	Yes	No	Severe	Moderate	0.37	Low	No	No	High
WmC2	3,198	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	No	No	Moderate
ZnB	639	Yes	No	Severe	Moderate	0.43	Low	No	No	High
Noble County, OH										
BkD	56	No	No	Severe	Moderate	0.17	Moderate	Yes	Yes	Moderate
BkE	376	No	No	Severe	Moderate	0.17	High	Yes	Yes	Low
BkF	6,995	No	No	Severe	Moderate	0.17	High	Yes	Yes	Low
BtD2	1,162	No	Yes	Severe	Moderate	0.37	Moderate	Yes	No	Moderate
BtE2	389	No	Yes	Severe	Moderate	0.37	High	Yes	No	Low
DkF	3,082	No	No	Severe	Moderate	0.17	High	Yes	Yes	Low
EbE2	716	No	No	Severe	Moderate	0.37	High	Yes	Yes	Low
GdE	1,477	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
GdF	871	No	No	Severe	Moderate	Not rated	High	Yes	Yes	Low
GkE2	4,512	No	No	Severe	Moderate	0.37	High	Yes	Yes	Moderate
GkF2	957	No	No	Severe	Moderate	0.32	High	Yes	Yes	Moderate
GuC	2,224	No	No	Severe	Moderate	0.43	Moderate	Yes	Yes	Moderate
GuD	2171	No	No	Severe	Moderate	0.43	Moderate	Yes	Yes	Moderate
KnL1AF	2,293	Prime	Yes	Severe	Moderate	0.32	Low	No	No	Moderate

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Summary of Soils within the Leach XPress Project Area

Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
		farmland if drained and protected during the growing season								
LoD	4,523	No	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
LpE2	10,688	No	No	Severe	Moderate	0.37	High	Yes	Yes	Low
LrE2	934	No	No	Severe	Moderate	0.37	High	Yes	Yes	Moderate
LuE	12,570	No	No	Severe	Moderate	0.37	High	Yes	No	Low
LuF	14,127	No	No	Severe	Moderate	0.37	High	Yes	No	Low
MrB	248	No	Yes	Severe	Moderate	0.32	High	No	No	Moderate
MrF	3,640	No	Yes	Severe	Moderate	0.32	High	Yes	No	Moderate
Mwr1D1	714	No	No	Severe	Moderate	0.43	Moderate	Yes	No	Low
No	1,855	Prime farmland if drained and protected during the growing season	Yes	Severe	Moderate	0.43	Low	No	No	Moderate
Sa	1,839	No	Yes	Severe	Moderate	0.32	Moderate	No	No	Moderate
Uc	2,696	No	No	Not rated	Not rated	Not rated	Not rated	No	No	Low
UpC	783	No	No	Severe	Moderate	0.43	Moderate	Yes	Yes	Moderate
UrD3	4,774	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
VaE2	1,194	No	No	Severe	Moderate	0.37	High	Yes	No	Moderate
VcD2	22,861	No	No	Severe	Moderate	0.37	Moderate	Yes	No	Moderate
VcE2	1,335	No	No	Severe	Moderate	0.37	High	Yes	No	Low
WoB	336	Yes	No	Severe	Moderate	0.43	Low	No	No	High
WoC	2,550	No	No	Severe	Moderate	0.43	Moderate	No	No	Moderate
ZaB	2,995	Yes	No	Severe	Moderate	0.43	Low	No	Yes	High
ZaC	4,537	No	No	Severe	Moderate	0.43	Moderate	No	Yes	Moderate
Perry County, OH										
AfC	679	Farmland of local importance	No	Severe	Moderate	0.49	Moderate	Yes	No	Moderate
BhB	1,358	No	No	Severe	Moderate	0.43	Low	No	No	Moderate
BkD	360	No	Yes	Severe	High	0.17	Low	Yes	No	Low
BkF	6,860	No	Yes	Severe	High	0.17	High	No	No	Low
BvF	499	No	No	Severe	Moderate	0.37	High	Yes	Yes	Low
CkC2	1,819	Farmland of local importance	No	Severe	Moderate	0.43	Moderate	Yes	No	Moderate
DkD	727	No	No	Severe	Moderate	0.24	Moderate	Yes	Yes	Moderate
DkE	4,256	No	No	Severe	Moderate	0.24	High	Yes	Yes	Low
DmF	1,113	No	No	Severe	Moderate	0.24	Low	Yes	Yes	Moderate
Ds	645	No	No	Not rated	Not rated	Not	Not rated	Not rated	No	Low

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Summary of Soils within the Leach XPress Project Area

Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
						rated				
EnE	2,396	No	Yes	Severe	High	0.17	Low	Yes	No	Low
FtA	170	Prime farmland if drained	Yes	Severe	High	0.37	Low	No	No	Moderate
GdC	814	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
GdD	974	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
GnB	1,011	Yes	Yes	Severe	High	0.43	Moderate	No	No	High
GwC	9,923	Farmland of local importance	No	Severe	Moderate	0.43	Moderate	Yes	No	Moderate
GwD	9,001	Farmland of local importance	No	Severe	Moderate	0.43	Moderate	Yes	No	Moderate
GwE	5,163	No	No	Severe	Moderate	0.43	High	Yes	No	Low
HaD2	878	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	No	Moderate
Km	265	Prime farmland if drained and protected during the growing season	Yes	Severe	High	0.43	Low	No	No	Moderate
KnL1AF	130	Prime farmland if drained and protected during the growing season	Yes	Severe	High	0.32	Low	No	No	Moderate
Ne	1,725	Prime farmland if drained and protected during the growing season	Yes	Severe	High	0.37	Low	No	No	Moderate
New1AF	1,860	Prime farmland if drained and protected during the	Yes	Severe	High	0.32	Low	No	No	Moderate

APPENDIX R
Summary of Soils within the Leach XPress Project Area

Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
		growing season								
Sfe	77	No	No	Severe	Moderate	0.28	High	Yes	No	Low
Uc	769	No	No	Not rated	Not rated	Not rated	Not rated	No	No	Low
W	161	No	No	Not rated	Not rated	Not rated	Not rated	No	No	Low
WhB	4,057	Yes	No	Severe	Moderate	0.37	Moderate	No	Yes	Moderate
WhC	23,838	Farmland of local importance	No	Severe	Moderate	0.43	Moderate	Yes	Yes	Moderate
WkB	761	Yes	No	Severe	Moderate	0.37	Moderate	No	Yes	Moderate
WkC	2,105	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
WmC	5,979	Farmland of local importance	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Moderate
WmD	5,608	Farmland of local importance	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Moderate
WmE	1,490	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
WsF	505	No	No	Severe	Moderate	0.37	High	Yes	Yes	Low
WtC	928	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
ZnB	9,258	Yes	No	Severe	Moderate	0.43	Moderate	No	No	Moderate
ZnC	1,728	Farmland of local importance	No	Severe	Moderate	0.43	Moderate	Yes	No	Moderate
Vinton County, OH										
GaD	2,529	No	No	Moderate	Slight	0.17	Moderate	Yes	Yes	Moderate
GaE	1,692	No	No	Moderate	Slight	0.17	High	Yes	Yes	Low
Omu1B1	226	Yes	No	Severe	Moderate	0.43	Low	No	No	High
Omu1C1	890	No	No	Severe	Moderate	0.43	Moderate	No	No	Moderate
Phi1AF	1,113	Prime farmland if drained and protected during the growing season	Yes	Severe	High	0.37	Low	No	No	Moderate
Pn	109	Yes	No	Severe	High	0.37	Low	No	No	High
ScD	1,676	No	No	Severe	Moderate	0.32	Moderate	Yes	No	Moderate
SfE	6,100	No	No	Severe	Moderate	0.32	High	Yes	Yes	Low
SkP1AF	960	Prime farmland if drained and	Yes	Severe	High	0.37	Low	No	No	Moderate

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Summary of Soils within the Leach XPress Project Area

Map Unit Symbol [a]	Pipeline Crossing Length (feet) / Impact Acreage b	Prime Farmland a	Hydric Soils a	Soil Rutting Hazard a	Compaction Potential c	K Factor a	Erosion Potential d	Steep Slopes e	Shallow Bedrock f	Revegetation Potential
		protected during the growing season								
WbC	1,673	No	No	Severe	Moderate	0.43	Moderate	No	Yes	Moderate
WhL1C1	8,470	No	No	Severe	Moderate	0.43	Moderate	Yes	Yes	Moderate
WhL1D1	24,511	No	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
WhL1E1	7,256	No	No	Severe	Moderate	0.37	High	Yes	Yes	Low
Aboveground Facilities										
Marshall County, WV										
Lone Oak Compressor Station										
ClC	0.27	Farmland of Statewide Importance	No	Severe	Moderate	0.24	Moderate	Yes	Yes	Moderate
CmC	3.53	Farmland of Statewide Importance	No	Severe	Moderate	0.24	Moderate	Yes	Yes	High
CmD	10.54	Farmland of Statewide Importance	No	Severe	Moderate	0.20	Moderate	Yes	Yes	High
DrE	8.13	No	No	Severe	Moderate	0.37	High	Yes	Yes	Low
DsF	14.24	No	No	Severe	Moderate	0.37	High	Yes	No	Low
LEX launcher										
CmC	0.14	Farmland of Statewide Importance	No	Severe	Moderate	0.24	Moderate	Yes	Yes	High
CmD	0.46	Farmland of Statewide Importance	No	Severe	Moderate	0.20	Moderate	Yes	Yes	High
DsF	0.02	No	No	Severe	Moderate	0.37	High	Yes	No	Low
MoB	0.14	Farmland of Statewide Importance	Yes	Severe	High	0.43	Low	No	No	Moderate
Mainline Valve 1										
ClC	0.06	Farmland of Statewide Importance	No	Severe	Moderate	0.24	Moderate	Yes	Yes	Moderate
Mainline Valve 2										
CmD	0.08	Farmland of Statewide Importance	No	Severe	Moderate	0.20	Moderate	Yes	Yes	High
DrE	0.03	No	No	Severe	Moderate	0.37	High	Yes	Yes	Low
Wayne County, WV										
Ceredo Compressor Station										
MaB	16.40	Farmland of statewide importance	No	Severe	Moderate	0.55	Low	No	No	High
Fairfield County, OH										

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Crawford Compressor Station										
CdF	0.34	No	No	Moderate	Slight	0.15	Low	Yes	Yes	Moderate
FhB	1.26	Yes	No	Severe	Moderate	0.37	High	No	No	Moderate
Gf	8.12	Yes	Yes	Severe	High	0.37	Low	No	No	Moderate
Ne	0.59	Yes	Yes	Severe	High	0.37	High	No	No	Moderate
Ud	11.72	No	No	Not rated	Not rated	Not rated	Not rated	No	No	Low
Ug	0.01	No	No	Not rated	Not rated	Not rated	Not rated	No	No	Low
K-260 Regulator Station g										
GdF	1.67	No	No	Moderate	Slight	0.10	Moderate	No	Yes	Moderate
GkC	0.70	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
GkD	1.99	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
GnB	0.24	Yes	Yes	Severe	High	0.49	Low	No	No	Moderate
GnC2	0.31	Farmland of local importance	No	Severe	Moderate	0.43	Moderate	No	No	Moderate
SeE	0.48	No	No	Severe	Moderate	0.32	High	Yes	No	Low
WeC	4.29	Farmland of local importance	No	Severe	Moderate	0.43	Moderate	No	Yes	Moderate
LEX1 receiver										
FmA	2.06	Yes	No	Severe	Moderate	0.49	High	No	No	Moderate
Hocking County, OH										
Benton Compressor Station										
Cg	3.83	Prime farmland if protected during the growing season	Yes	Severe	High	0.37	Low	No	No	Moderate
Benton Regulator Station										
ScD	1.33	Farmland of local importance	No	Severe	Moderate	0.32	Moderate	Yes	No	Moderate
WeC	0.07	No	No	Severe	Moderate	0.43	Moderate	Yes	Yes	Moderate
WmC	1.03	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	No	Yes	Moderate
R-System Regulator Station i										
CeF	0.03	No	No	Moderate	Slight	0.10	Low	Yes	Yes	Low
GfB	4.44	Yes	Yes	Severe	High	0.49	Low	No	No	Moderate
Hay1AF	0.03	Prime farmland if	No	Severe	Moderate	0.43	Low	No	No	High

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		protected during the growing season								
McA	1.25	Prime farmland if drained	Yes	Severe	High	0.43	Low	No	No	Moderate
Mainline Valve 8										
ScD	0.06	Farmland of local importance	No	Severe	Moderate	0.32	Moderate	Yes	No	Moderate
Mainline Valve 9										
WfC	0.06	Farmland of local importance	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
Jackson County, OH										
Oak Hill Compressor Station h										
Omu1A1	3.62	Yes	Yes	Severe	High	0.43	Low	No	No	Moderate
Omu1B1	14.72	Yes	No	Severe	Moderate	0.43	Low	No	No	Moderate
Omu1C1	0.07	No	No	Severe	Moderate	0.43	Moderate	Yes	No	Moderate
Pio1AF	0.22	Prime farmland if drained	Yes	Severe	High	0.43	Moderate	No	No	High
Wya3C2	4.21	No	No	Severe	Moderate	0.37	Moderate	Yes	No	Moderate
R-486 Odorization Site										
Omu1C1	0.14	No	No	Severe	Moderate	0.43	Moderate	Yes	No	Moderate
R-130 Odorization Site										
Omu1B1	0.12	Yes	No	Severe	Moderate	0.43	Low	No	No	Moderate
R-543 Odorization Site										
Omu1A1	0.14	Yes	Yes	Severe	High	0.43	Low	No	No	Moderate
Lawrence County, OH										
R-300 / R-500 Odorization Site										
KaB	1.08	Yes	No	Severe	Moderate	0.37	Low	No	No	Moderate
KaC	0.18	No	No	Severe	Moderate	0.37	Moderate	Yes	No	Moderate
PpS1AF	0.01	Prime farmland if protected during the growing season	Yes	Severe	High	0.37	Low	No	No	Moderate
BM-111 Loop launcher										
EmB	0.80	No	Yes	Not rated	Not rated	Not rated	Not rated	No	No	Low
Monroe County, OH										
Mainline Valve 3										
GoD2	<0.01	No	No	Severe	Moderate	0.32	Moderate	Yes	Yes	Moderate
GwD2	0.06	No	No	Severe	Moderate	0.43	Moderate	Yes	No	Moderate
Mainline Valve 4										

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GrD2	0.06	No	No	Severe	Moderate	0.43	Moderate	Yes	No	Moderate
Muskingum County, OH										
Mainline Valve 6										
MsB	0.06	No	Yes	Severe	High	0.32	Low	No	No	Moderate
MsD	<0.01	No	Yes	Severe	High	0.32	Low	Yes	No	Moderate
Noble County, OH										
Summerfield Compressor Station										
EbE2	6.34	No	No	Severe	Moderate	0.37	High	Yes	Yes	Low
LuE	0.45	No	No	Severe	Moderate	0.37	High	Yes	No	Low
Mainline Valve 5										
BkF	0.06	No	No	Severe	Moderate	0.17	High	Yes	Yes	Low
Perry County, OH										
Mainline Valve 7										
GwC	0.06	Farmland of local importance	No	Severe	Moderate	0.43	Moderate	Yes	No	Moderate
Vinton County, OH										
McArthur Regulator Station										
GaD	2.56	No	No	Moderate	Slight	0.17	Moderate	Yes	Yes	Moderate
WhL1D1	0.19	No	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate
RS-1286										
WhL1D1	0.20	No	No	Severe	Moderate	0.37	Moderate	Yes	Yes	Moderate

Note: The numbers in this table have been rounded for presentation purposes. As a result, the totals may not reflect the sum of the addends.

[a] As designated by the Natural Resources Conservation Service.

[b] Represents total length (in feet) crossed by the pipeline facilities or acres of impacts associated with construction of the aboveground facilities.

[c] Compaction Potential – Based on soil rutting hazard: Low (slight), Moderate (moderate), High (severe), and hydric designation (yes, no). d Erosion Potential – Based on land capability class and subclass: High (Ve-VIIIe); Moderate (IIIe-IVe); and Low (remaining subclasses). e Steep Slopes – Represents soils with slopes greater than 8 percent.

[f] Shallow Bedrock – Represents soils with consolidated rock 60 inches or less from the surface.

[g] Acreages presented for the K-260 RS include soils affected during construction and operation of the associated incoming line and tie-in valve.

[h] Acreages presented for the Oak Hill CS include soils affected during construction and operation of the associated suction/discharge lines and tie-in facility.

[i] Acreages presented for the R-System RS include soils affected during construction and operation of the associated outgoing line and tie-in facility.

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Environmental Resources Management is a third party contractor assisting the Commission staff in reviewing the environmental aspects of the project application and preparing the environmental documents required by NEPA. Third party contractors are selected by Commission staff and funded by project applicants. Per the procedures in 40 CFR 1506.5(c), third party contractors execute a disclosure statement specifying that they have no financial or other conflicting interest in the outcome of the project. The Commission staff has complete control over the scope, content, quality, and schedule of the contractor's work. The Commission staff independently evaluates the results of the third-party contractor's work and the Commission, through its staff, bears ultimate responsibility for full compliance with the requirements of NEPA.

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