

Letter of Notification for the Monza 345 kV Station Project



PUCO Case No. 26-0866-EL-BLN

Submitted to:
The Ohio Power Siting Board
Pursuant to Ohio Administrative Code
Section 4906-6-05

Submitted by:
AEP Ohio Transmission Company, Inc.

September 3, 2026

LETTER OF NOTIFICATION FOR MONZA 345 kV STATION PROJECT

LETTER OF NOTIFICATION AEP Ohio Transmission Company, Inc. Monza 345 kV Station Project

4906-6-05 Accelerated Application Requirements

AEP Ohio Transmission Company, Inc. (the Company) provides the following information to the Ohio Power Siting Board (OPSB) in accordance with the accelerated application requirements of Ohio Administrative Code (Adm.Code) Section 4906-6-05.

4906-6-05(B) General Information

B(1) Project Description

The name of the project and applicant's reference number, names and reference number(s) of resulting circuits, a brief description of the project, and why the project meets the requirements for a Letter of Notification.

The Company is proposing the Monza 345 kV Station Project (the Project), located in Scioto Township, Pike County, Ohio. The Project involves construction of a new 8.4-acre 345 kV transmission substation and one-acre permanent access drive. The Project is located entirely within property owned by the customer and will support the customer's new and ongoing development in the area. The proposed Monza 345 kV Station will interconnect the proposed Don Marquis–Monza 345 kV Transmission Line (see Case No. 26-0913-EL-BLN) and will interconnect the customer-owned Mercury Station via two new 345 kV tie lines, designated as Monza–Mercury 345 kV Tie Lines No. 1 and No. 2 (to be filed separately). The location of the Project is shown on **Map 1** and **Map 2** of **Appendix A**.

The Project meets the requirements for a Letter of Notification (LON), as defined by Item 3 of Appendix A to Ohio Administrative Code Section 4906-1-01, *Application Requirement Matrix for Electric Power Transmission Lines*:

(3) Constructing a new electric power transmission substation.

The Project has been assigned Case No. 26-0866-EL-BLN.

B(2) Statement of Need

If the proposed Letter of Notification project is an electric power transmission line or gas or natural gas transmission line, a statement explaining the need for the proposed facility.

LETTER OF NOTIFICATION FOR MONZA 345 kV STATION PROJECT

The Project is necessary to serve a request for new transmission service from a customer in Piketon, Ohio. The customer has requested approximately **800 megawatts (MW)** of electric demand and requires a new transmission delivery point to support development of the facility. The Company has an obligation to provide electric service to meet the customer's load requirements.

Existing transmission facilities are not configured to directly serve the requested load. Planning evaluations determined that modifications to Don Marquis Station and construction of new transmission facilities are required to establish a reliable transmission source for the customer.

To address this need, the Company will construct two new 2.6-mile 345 kV transmission lines (Case No. 26-0913-EL-BLN) that will extend to the proposed Monza 345 kV Station (which is the subject of this application). In addition, two 345 kV tie lines will also be constructed from Monza Station to the new customer station (Mercury), which will be the subject of a separate filing with OPSB.

Failure to move forward with the Project will prevent the Company from providing the requested transmission service necessary to support the customer's planned development and requested **800 MW** load.

Ohio Substitute House Bill 15, effective in August 2025, requires applicants for certificates of environmental compatibility and public need for the construction of new transmission lines to submit a summary of studies that have been made by or for the applicant of cost-effective advanced transmission technologies that maximize the value, expand the capacity, or improve the reliability of the facility (Ohio Revised Code 4906.06(A)(7)). Under the plain text of House Bill 15, a summary of studies regarding advanced transmission technology is required for new transmission lines but is not required for stations. However, this Project does include installation of a static synchronous compensator (STATCOM) to dynamically regulate voltage and stabilize the power grid, which is a form of advanced transmission technology consistent with the legislative intent behind House Bill 15.

The need was presented and reviewed with stakeholders at the February 3, 2026, PJM Interconnection (PJM) Transmission Expansion Advisory Committee (TEAC) meeting and the solution was presented and reviewed with stakeholders at the April 7, 2026, PJM TEAC meeting (see **Appendix B**). PJM has assigned a supplemental upgrade number #s3864. The Project was not identified at the time of the Company's 2026 Long-Term Forecast Report (LTFR).

LETTER OF NOTIFICATION FOR MONZA 345 kV STATION PROJECT

B(3) Project Location

The applicant shall provide the location of the project in relation to existing or proposed lines and substations shown on an area system map of sufficient scale and size to show existing and proposed transmission facilities in the Project area.

Map 1, in **Appendix A**, shows the location of the Project in relation to existing transmission lines and substations. **Map 2**, in **Appendix A**, identifies the Project components on a 2026 aerial photograph.

B(4) Alternatives Considered

The applicant shall describe the alternatives considered and reasons why the proposed location or route is best suited for the proposed facility. The discussion shall include, but not be limited to, impacts associated with socioeconomic, ecological, construction, or engineering aspects of the project.

The Project area, totaling 9.4 acres, includes the 8.4-acre substation pad and its one-acre permanent access that extends to the customer's future road improvements. The Project area is located entirely within property owned by the customer. Based on the customer's proposed development and existing facilities in the area, the proposed location is the most suitable location for the Project. Other alternatives would require more significant impacts to neighboring properties, as opposed to remaining on the customer's property. In addition, the proposed location of the station minimizes the length of the required tie lines needed for the customer's new 800 MW station.

The Project is located on agricultural land and will not require impacts to any delineated wetland or streams. Approximately 4.2 acres of tree clearing is required for the Project. The location of the Project minimizes impacts on the community and the environment, while considering the engineering and construction needs of the customer. The Project also represents the most suitable location and most appropriate solution for meeting the Company's and customer's needs.

B(5) Public Information Program

The applicant shall describe its public information program to inform affected property owners and tenants of the nature of the project and the proposed timeframe for project construction and restoration activities.

The Company will inform affected property owners and tenants about this Project through several different mediums. Within seven days of filing this LON, the Company will issue a public notice in a newspaper of

LETTER OF NOTIFICATION FOR MONZA 345 kV STATION PROJECT

general circulation in the Project area. The notice will comply with all requirements of Adm.Code 4906-6-08(A)(1)-(6). Further, the Company will mail a letter, via first class mail, to affected landowners, tenants, contiguous owners, and any other landowner the Company may approach for an easement necessary for the construction, operation, or maintenance of the Project. The letter will comply with all requirements of Adm.Code 4906-6-08(B). The Company maintains a website (<http://aeptransmission.com/ohio/>) that hosts an electronic copy of this LON and the public notice of this LON. An electronic copy of the LON will be served to the public library in each political subdivision affected by this Project. In addition, the Company retains right-of-way (ROW) land agents that discuss Project timelines, construction and restoration activities and convey this information to affected owners and tenants.

B(6) Construction Schedule

The applicant shall provide an anticipated construction schedule and proposed in-service date of the project.

Construction of the Project is planned to begin in December 2026, with an anticipated in-service date of September 2027.

B(7) Area Map

The applicant shall provide a map of at least 1:24,000 scale clearly depicting the facility with clearly marked streets, roads, and highways, and an aerial image.

Map 1, in **Appendix A**, identifies the location of the Project area on a U.S. Geological Survey 1:24,000 Waverly South quadrangle map. **Map 2**, in **Appendix A**, identifies the location of the Project area on a 2026 aerial photograph.

B(8) Property Agreements

The applicant shall provide a list of properties for which the applicant has obtained easements, options, and/or land use agreements necessary to construct and operate the facility and a list of the additional properties for which such agreements have not been obtained.

The proposed Monza 345 kV Station is currently located on customer property.

LETTER OF NOTIFICATION FOR MONZA 345 kV STATION PROJECT

B(9) Technical Features

The applicant shall describe the following information regarding the technical features of the project:

B(9)(a) Operating characteristics, Estimated Number and Types of Structures Required, and Right-of-Way and/or Land Requirements.

The Project requires an 8.4-acre substation pad and a 1-acre permanent access road. No ROW is required for the Project. The equipment and facilities to be installed for the Project are anticipated to include the following:

- 6 – 345 kV circuit breakers
- 1 – 16 feet x 60 feet drop-in control module (DICM)
- 1 – (+/-) 150 megavolt-amperes reactive (MVAR) STATCOM

B(9)(b) Electric and Magnetic Fields

For electric power transmission lines that are within one hundred feet of an occupied residence or institution, the production of electric and magnetic fields during the operation of the proposed electric power transmission line.

B(9)(b)(i) Calculated Electric and Magnetic Field Strength Levels

i) Calculated Electric and Magnetic Field Levels

Not applicable. No occupied residences or institutions are located within 100 feet of the Project.

B(9)(b)(ii) Design Alternatives

A discussion of the applicant's consideration of design alternatives with respect to electric and magnetic fields and their strength levels, including alternate conductor configuration and phasing, tower height, corridor location, and right-of-way width.

Not applicable. No occupied residences or institutions are located within 100 feet of the Project.

B(9)(b)(ii)(c) Project Cost

The estimated capital cost of the project.

LETTER OF NOTIFICATION FOR MONZA 345 kV STATION PROJECT

The costs estimate for the proposed Project, which is comprised of applicable tangible and capital costs, is approximately \$146 million using a Class 4 estimate. Cost recovery for these facilities will occur in accordance with AEP Ohio's Schedule Data Center Tariff, and Pursuant to the PJM OATT, costs for this Project will also be recovered in the AEP Ohio Transmission Company Inc.'s FERC formula rate (Attachment H-20 to the PJM OATT) and allocated to the AEP Zone.

B(10) Social and Ecological Impacts

The applicant shall describe the social and ecological impacts of the project:

B(10)(a) Land Use

Provide a brief, general description of land use within the vicinity of the proposed project, including a list of municipalities, townships, and counties affected.

The 9.4-acre Project area, consisting of the 8.4-acre station pad and one-acre permanent access road, is located within Scioto Township, Pike County, Ohio. The Project is located east of the former U.S. Department of Energy Portsmouth (PORTS) facility and is predominantly surrounded by existing agricultural and residential properties located along Dutch Run Road, Zimmerman Road, and Loop Road. Undeveloped forested areas surrounding the Project are best described as residential or agricultural woodlots used for screening purposes.

Approximately 4.2 acres of tree clearing is anticipated for the Project. Based on publicly available data, no schools, parks, places of worship, cemeteries, wildlife management areas, or nature preserve lands were identified in proximity to the Project.

B(10)(b) Agricultural Land Information

Provide the acreage and a general description of all agricultural land, and separately all agricultural district land, existing at least sixty days prior to submission of the application within the potential disturbance area of the project.

Approximately 5.2 acres of the Project area is characterized by existing agricultural land use (cultivated cropland). The surrounding area is predominantly characterized by agricultural or residential properties scattered with woodlots.

Based on data received from the Pike County Auditor's office on July 22, 2026, there are no agricultural district parcels within the potential disturbance area of the Project. Additionally, the Project crosses no Ohio Department of Agriculture easements.

LETTER OF NOTIFICATION FOR MONZA 345 kV STATION PROJECT

B(10)(c) Archaeological and Cultural Resources

Provide a description of the applicant's investigation concerning the presence or absence of significant archaeological or cultural resources that may be located within the potential disturbance area of the project, a statement of the findings of the investigation, and a copy of any document produced as a result of the investigation.

The Company's consultant completed Phase I Archaeological and Phase I History/Architectural surveys for the Project. The surveys involved subsurface testing and visual inspection in July 2026. Within or partially within the Project's Area of Potential Effect (APE), which encompasses the Project in addition to the Don Marquis–Monza 345 kV Transmission Line and Monza–Mercury 345 kV Tie Line (to be filed separately), the Company's consultant identified three previously identified sites, including one historic chapel and cemetery site that had been previously determined as eligible for listing on the National Register of Historic Places (NRHP). The Company's consultant recommended that no further work is considered necessary for the remaining two sites, and the State Historic Preservation Office (SHPO) agrees with their determination (see **Appendix B**).

Additionally, the Company's consultant identified one Ohio Genealogical Society cemetery, Mount Gilead Cemetery, located within the APE along Dutch Run Road. Both the historic chapel and cemetery site and Mount Gilead Cemetery have previously been determined as eligible for listing on the NRHP. Based on the recommendations from their consultant and SHPO, the Company will observe a minimum 100-foot buffer around the extent of the site and cemetery boundaries prior to and during all construction activities for the Don Marquis–Monza 345 kV Transmission Line Project. However, the Monza 345 kV Station Project area is located at least approximately 1 mile from these sensitive resources; therefore, there are no concerns of potential impacts.

B(10)(d) Local, State, and Federal Agency Correspondence

Provide a list of the local, state, and federal governmental agencies known to have requirements that must be met in connection with the construction of the project, and a list of documents that have been or are being filed with those agencies in connection with siting and constructing the project.

A summary of anticipated permits and authorizations for the Project is provided in **Table 1** below. There are no other known local, state, or federal requirements that must be met prior to commencement of the Project.

LETTER OF NOTIFICATION FOR MONZA 345 kV STATION PROJECT

Table 1 – Anticipated Permits

Permit/Authorization/Coordination	Agency	Date
Storm Water Pollution Prevention Plan	Ohio Environmental Protection Agency	Expected December 2026
	Pike County	
Notice Criteria	Federal Aviation Administration	No further action required July 27, 2026
Road Maintenance Agreement and County Road Crossing	Pike County	Submitting September 2026
Clean Water Act Section 404/401	U.S. Army Corps of Engineers	Not anticipated
	Ohio Environmental Protection Agency	
Archaeology/Architectural	Ohio Historic Preservation Office	Coordination complete August 21, 2026, no additional work required
Threatened and Endangered Species	U.S Fish and Wildlife Service	Coordination complete August 13, 2026
Threatened and Endangered Species	Ohio Department of Natural Resources	Coordination complete August 18, 2026

B(10)(e) Threatened, Endangered, and Rare Species

Provide a description of the applicant's investigation concerning the presence or absence of federal and state designated species (including endangered species, threatened species, rare species, species proposed for listing, species under review for listing, and species of special interest) that may be located within the potential disturbance area of the project, a statement of the findings of the investigation, and a copy of any document produced as a result of the investigation.

Coordination letters were submitted to the U.S. Fish and Wildlife Service (USFWS) and the Ohio Department of Natural Resources (ODNR) Ohio Natural Heritage Program and Division of Wildlife, seeking an environmental review of the Project for potential impacts to state and/or federally protected species.

The Company initiated correspondence with USFWS concerning the presence or absence of federal designated species in July 2026. During the period of time between request and response, some structures were shifted and a follow-up letter was sent along to the agency for review. The letters dated July 17, 2026, and August 13, 2026 are included as part of this submittal package. ODNR provided their response on August 18, 2026. Copies of the agencies' responses are presented in **Appendix C**.

LETTER OF NOTIFICATION FOR MONZA 345 kV STATION PROJECT

Table 5.1 in **Appendix D** lists the federal and state threatened or endangered species in the Project area.

Based on the nature of the proposed Project activities and habitat characteristics of the surrounding vicinity, construction impacts to protected species are not anticipated.

B(10)(f) Areas of Ecological Concern

Provide a description of the applicant's investigation concerning the presence or absence of areas of ecological concern (including national and state forests and parks, floodplains, wetlands, designated or proposed wilderness areas, national and state wild and scenic rivers, wildlife areas, wildlife refuges, wildlife management areas, and wildlife sanctuaries) that may be located within the potential disturbance area of the project, a statement of the findings of the investigation, and a copy of any document produced as a result of the investigation.

In July 2026, the Company's consultant conducted wetland and stream delineation surveys for an approximately 117-acre Environmental Survey Area (ESA) encompassing the Project (see **Appendix D**). Land uses within the ESA primarily comprise forested land, maintained lawn, old field, agriculture, scrub/shrub, and grassland. The Company's consultant delineated 13 wetlands, 13 streams, and two ponds within the ESA—none of which are located within the Project footprint.

Based on a review of the Protected Areas Database of the United States as well as the National Conservation Easement Database, there are no state or national parks, forests, wildlife areas, or mapped conservation easements in the vicinity of the Project.

Approximately 4.2 acres of tree clearing is anticipated for the Project. ODNR indicated that the Project is within range of four state-listed bat species: Indiana bat (*Myotis sodalis*), northern long-eared bat (*Myotis septentrionalis*), tricolored bat (*Perimyotis subflavus*), and little brown bat (*Myotis lucifugus*). Wooded areas identified within the ESB may provide potentially suitable habitat for these species. No potential hibernacula were identified within a 5-mile radius of the Project. The Company will adhere to seasonal tree clearing between October 1 and March 31 to avoid adverse effects to and/or direct take of the Indiana bat, northern long-eared bat, little brown bat, and tricolored bat species.

The Federal Emergency Management Agency (FEMA) Flood Insurance Rate Map was reviewed to identify any floodplains/flood hazard areas that have been mapped within the Project area (specifically, map number 39131C0250C). Based on this mapping, no FEMA-designated 100-year floodplain or regulatory floodway areas are located within the Project area.

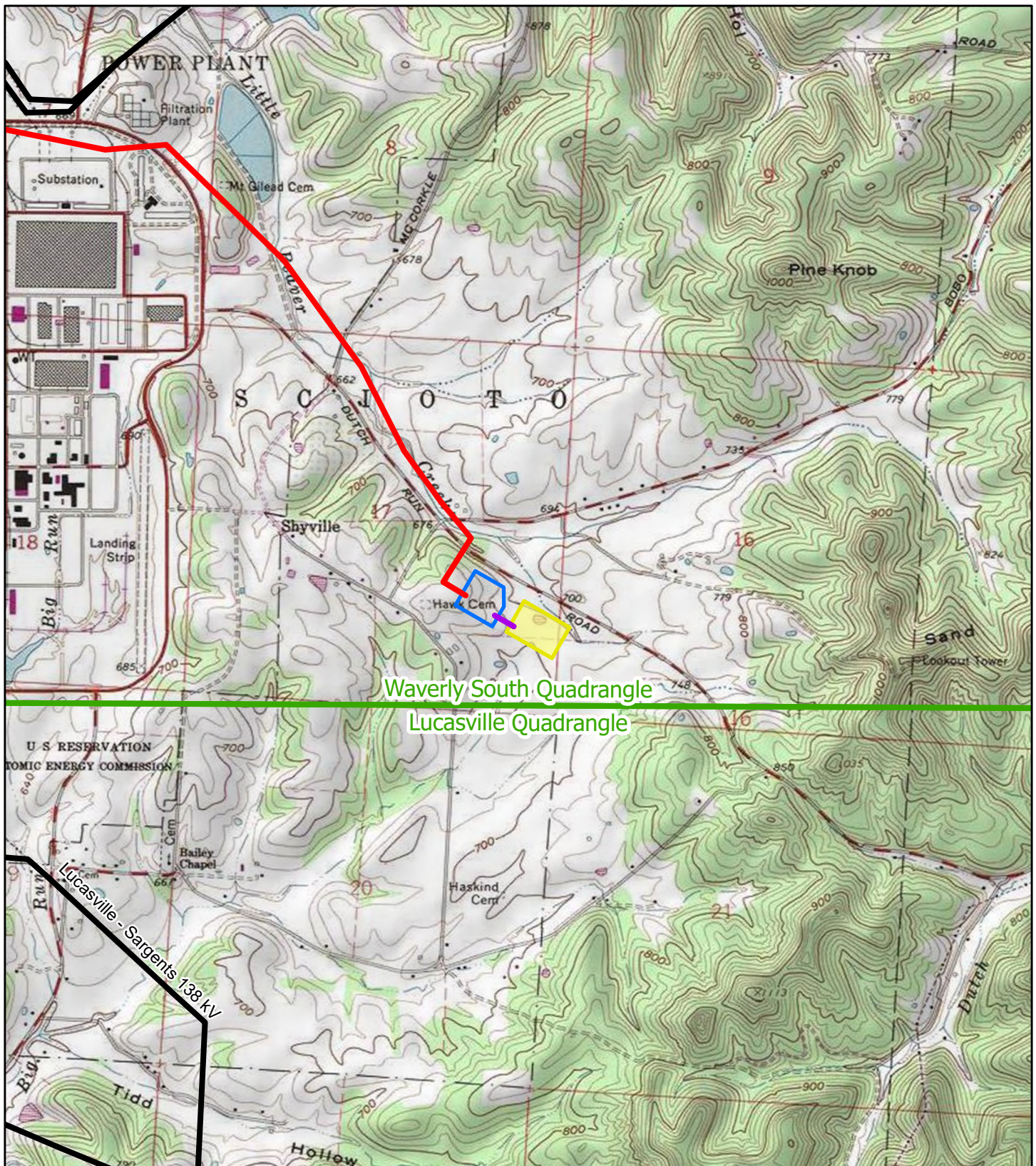
LETTER OF NOTIFICATION FOR MONZA 345 kV STATION PROJECT

B(10)(g) Unusual Conditions

Provide any known additional information that will describe any unusual conditions resulting in significant environmental, social, health, or safety impacts.

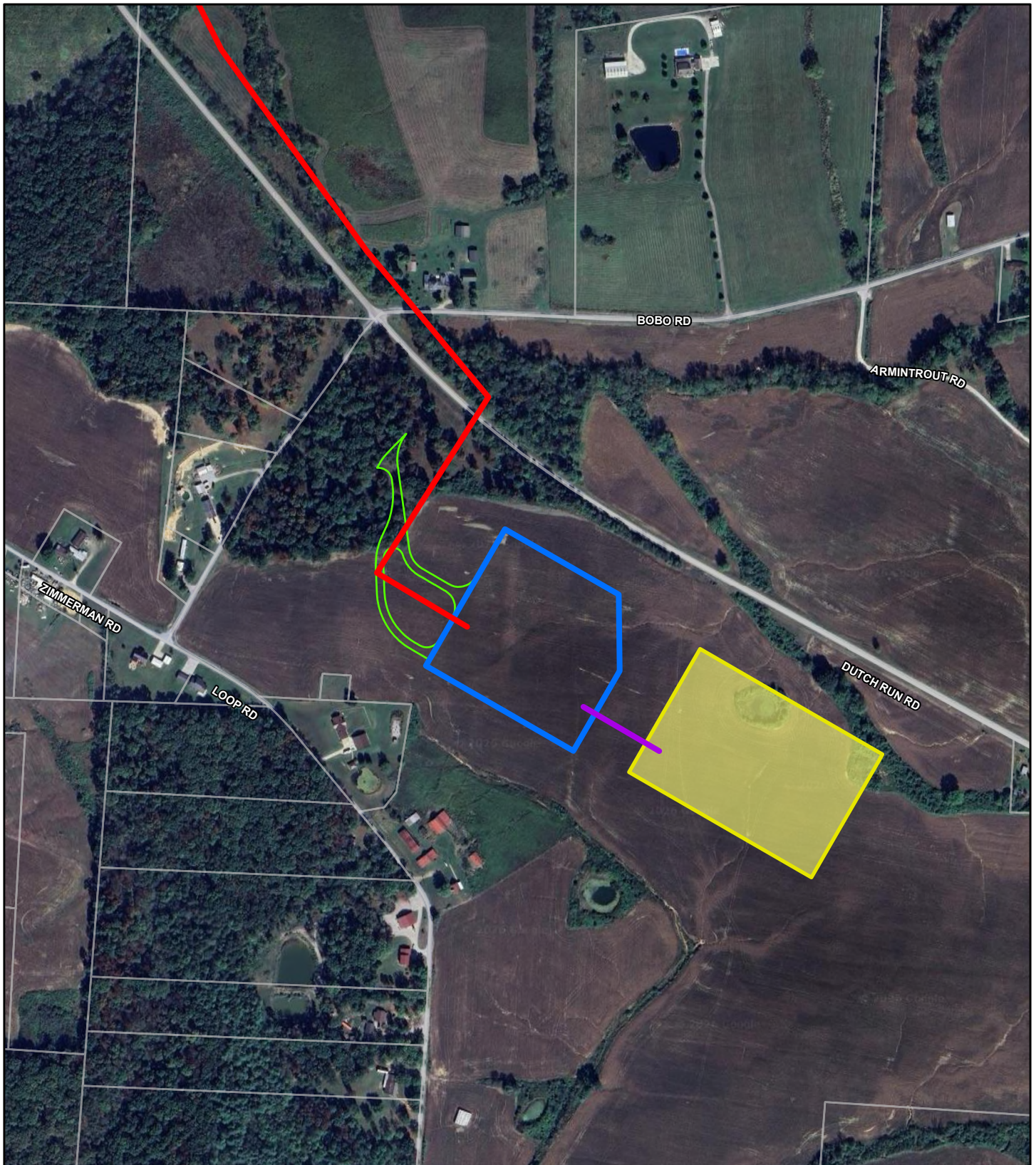
To the best of the Company's knowledge, no unusual conditions exist that would result in significant environmental, social, health, or safety impacts.

Appendix A Project Maps



Waverly South Quadrangle
Lucasville Quadrangle

■ Monza 345 kV Station Pad Don Marquis - Monza 345 kV — Transmission Line (to be filed separately - see Case No. 26-0913-EL-BLN) — Monza - Mercury 345 kV Tie Line (to be filed separately) ■ Mercury (Customer Station) — Existing Transmission Line — USGS Topographic Quad Boundary	Sources: Topo (USGS) Quad Boundaries (USGS) Coordinate System: State Plane Ohio South NAD 1983 August 31, 2026		Map 1 Project Location Monza 345 kV Station Project AEP OHIO TRANSMISSION COMPANY An AEP Company BOUNDLESS ENERGY™ 0 1,000 2,000 Feet N
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- Monza 345 kV Station Pad - Permanent Access Drive - Mercury (Customer Station) - Don Marquis - Monza 345 kV Transmission Line (to be filed separately - see Case No. 26-0913-EL-BLN) - Monza - Mercury 345 kV Tie Line (to be filed separately) - Parcel Boundary	Sources: Topo (USGS) Quad Boundaries (USGS) Coordinate System: State Plane Ohio South NAD 1983 August 31, 2026		Map 2 Aerial Map Monza 345 kV Station Project AEP OHIO TRANSMISSION COMPANY An AEP Company BOUNDLESS ENERGY™ 0 250 500 Feet N
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Appendix B PJM Slides

AEP Transmission Zone M-3 Process Don Marquis, OH

Need Number: AEP-2026-OH004

Process Stage: Need Meeting 02/03/2026

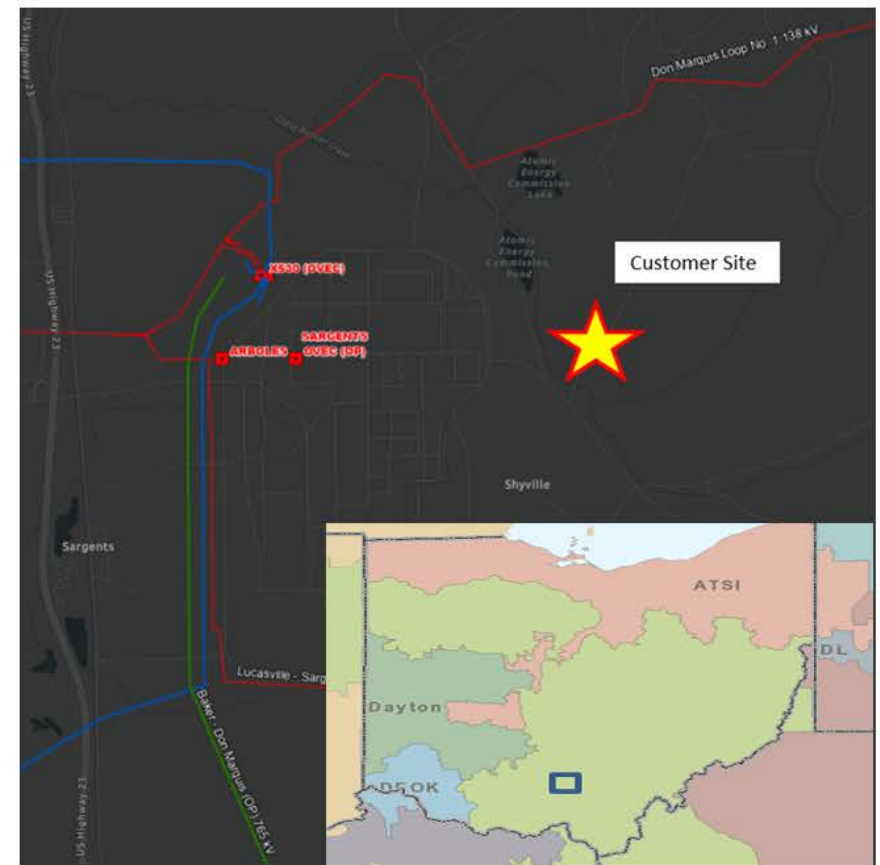
Project Driver: Customer Service

Specific Assumption References:

AEP Connection Requirements for the AEP Transmission System (AEP Assumptions Slide 12)

Problem Statement:

A customer has requested service for 800 MW of new demand near Piketon, OH. The requested in service date is 12/2027.



Need number(s): AEP-2026-OH004

Process Stage: Solution Meeting TEAC - 04/07/2026

Proposed Solution:

Don Marquis - Monza 345kV #1: Construct 1.8-mile 345kV single circuit transmission line from Don Marquis to the new Monza Station. Estimated Cost: \$7.5 M

Monza 345kV Station: Construct greenfield 345kV ring bus switching station, comprising of six (6) 345kV 63kA 5000A breakers and a 150 MVAR STATCOM. Estimated Cost: \$131.5 M

Monza 345kV Customer Feed Ckt 1: Greenfield 345kV 0.2-mile transmission feed from Monza Station to customer site. Estimated Cost: \$0.5 M

Monza 345kV Customer Feed Ckt 2: Greenfield 0.2-mile 345kV transmission feed from Monza Station to customer site. Estimated Cost: \$0.5 M

Don Marquis 345kV: Install four (4) 63kA 5000A breakers for two (2) additional feeds to a new switching station Monza. Estimated Cost: \$9.1 M

Don Marquis - Monza 345kV #2: Construct a second 1.8-mile 345kV single circuit transmission line from Don Marquis to the new Monza Station. Estimated Cost: \$7.5 M

Transmission Cost Estimate: \$156.6 M

Alternatives Considered:

Considering the final location of the request and availability for new connections out of Marquis station, no other viable transmission alternates were identified.

Projected In-Service: 12/31/2027

Project Status: Scoping

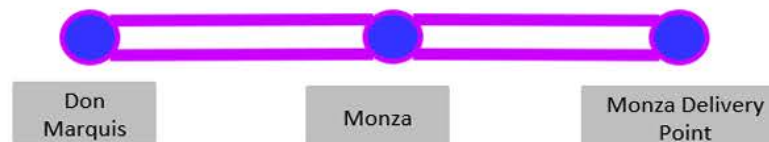
AEP Transmission Zone M-3 Process Don Marquis, OH/Monza, OH/Customer, OH

Existing:



Legend	
500 kV	
345 kV	
138 kV	
69 kV	
34.5 kV	
23 kV	
New	

Proposed:



Appendix C Agency Coordination Letters



In reply refer to:
2026-PIK-68277

August 21, 2026

Chad Porter
Weller & Associates, Inc.
1395 West 5th Ave
Columbus, OH 43212
Email: c.porter@wellercrm.com

RE: Section 106 Review: Don Marquis-Monza 345kV Transmission Line Project, Pike County, Ohio

Dear Mr. Porter:

This letter is in response to the correspondence received on July 30, 2026, regarding the proposed Don Marquis-Monza 345kV Transmission Line Project in Pike County, Ohio. We appreciate the opportunity to comment on this project. The comments of the Ohio State Historic Preservation Office (SHPO) are made pursuant to Section 149.53 of the Ohio Revised Code and the Ohio Power Siting Board (OPSB) for siting this project (OAC 4906-4 & 4906-5). The comments of the Ohio SHPO are also submitted in accordance with the provisions of Section 106 of the National Historic Preservation Act of 1966, as amended (54 U.S.C. 306108 [36 CFR 800]).

The following comments pertain to *Addendum 1: Archaeological Investigations for the 4.53 km (2.82 mi) Long Don Marquis-Monza 345kV Transmission Line V5 Route Project in Scioto Township, Pike County, Ohio* (Weller & Associates, July 2026). These investigations extend outside disturbed, sloped, and surveyed areas that were not previously addressed for the transmission line project. The field investigations involved subsurface testing and visual inspection. One (1) new archaeological site (33PK0566) was recovered during these investigations. Weller determined that this site is not eligible for listing on the National Register of Historic Places (NRHP); the SHPO agrees with this determination.

A large portion of the project area has been subject to previous investigations (NADB# 14839; 21033; 21154; 21159; 21161; 21169; 21170; 24898). Three (3) previously identified sites (OAI#s 33PK0327, 33PK0362, & 33PK0189) are located within or partially within the project corridor. Additionally, one (1) cemetery, the Mount Gilead Cemetery (OGS ID# 9835), is also located within the project area, and is associated with 33PK0189 and OHI# PIK0020612. Weller recommended that no further work is considered necessary for sites 33PK0327 and 33PK0362. Based on the results of previous survey work, the SHPO agrees with this determination; these sites have been determined as not eligible for listing on the National Register of Historic Places (NRHP).

OAI 33PK0189 is a historic chapel and cemetery site that has been previously determined as eligible for listing on the NRHP under Criteria D; the Mount Gilead Cemetery (OGS ID# 9835) has also been determined as eligible under Criteria A and C (OHI# PIK0020612). The historic cemetery and chapel likely served as focal point of the surrounding community during the mid-nineteenth to twentieth century and includes Revolutionary and Civil War burials. Weller recommended OAI site 33PK0189 & OGS ID# 9835 for avoidance. The SHPO agrees with this recommendation, and additionally recommends that based on the information submitted, the presence of human remains, and the significance of the site and cemetery, a minimum 100-foot buffer around the extent of the site and cemetery boundaries should be established for avoidance, prior to and during all construction activities. The SHPO requests that this buffer and avoidance measures, such as temporary fencing, be depicted on project plans and avoidance plans, and that these plans be sent to our office for review and comment. If avoidance is not possible, consultation with the SHPO must take place to discuss next steps for mitigation.

The SHPO looks forward to future coordination regarding the Don Marquis-Monza 345kV Transmission Line Project in Pike County, Ohio. If you have any questions concerning this review, please contact me via email at broddy@ohiohistory.org. Thank you for your cooperation.

Sincerely,



Bridget C. Roddy, Project Reviews Manager-Archaeology
Resource Protection and Review
State Historic Preservation Office

RPR Serial No. 1115057



**Department of
Natural Resources**
ohiodnr.gov

Mike DeWine, Governor
Jim Tressel, Lt. Governor
Mary Mertz, Director

Office of Real Estate & Land Management

Tara Paciorek - Chief
2045 Morse Road – E-2
Columbus, Ohio 43229-6693

August 18, 2026

Jake Lubbers
Jacobs Engineering Group, Inc.
2 Crowne Point Court, Suite 100
Cincinnati, Ohio 45241

Re: 26-1204_Monza-Don Marquis 345kV

Project: The proposed project involves the construction of two greenfield 345kV transmission lines (total of approximately 2.5-mile) and the installation of two new, approximately 10-acre 345kV stations.

Location: The proposed project is located in Scioto Township, Pike County, Ohio.

Approximate Center Coordinates: 39.0197, -82.9873

The Ohio Department of Natural Resources (ODNR) has completed a review of the above referenced project. These comments were generated by an inter-disciplinary review within the Department. These comments have been prepared under the authority of the Fish and Wildlife Coordination Act (48 Stat. 401, as amended; 16 U.S.C. 661 et seq.), the National Environmental Policy Act, the Coastal Zone Management Act, Ohio Revised Code and other applicable laws and regulations. These comments are also based on ODNR's experience as the state natural resource management agency and do not supersede or replace the regulatory authority of any local, state, or federal agency nor relieve the applicant of the obligation to comply with any local, state, or federal laws or regulations.

Natural Heritage Database: A review of the Ohio Natural Heritage Database indicates there are no records of state or federally listed plants or animals within one mile of the specified project area. Records searched date from 1980.

Please note that Ohio has not been completely surveyed and we rely on receiving information from many sources. Therefore, a lack of records for any particular area is not a statement that rare species or unique features are absent from that area.

Fish and Wildlife: The Division of Wildlife (DOW) has the following comments.

The DOW recommends that impacts to streams, wetlands and other water resources be avoided and minimized to the fullest extent possible, and that Best Management Practices be utilized to minimize erosion and sedimentation.

The project is within the vicinity of records for the northern long-eared bat (*Myotis septentrionalis*), a state endangered and federally endangered species, the little brown bat (*Myotis lucifugus*), a state endangered species, and the tricolored bat (*Perimyotis subflavus*), a state endangered species. Because presence of state endangered bat species has been established in the area, summer tree clearing is not recommended, and additional summer surveys would not constitute presence/absence in the area. However, limited summer tree clearing inside this buffer may be acceptable after further consultation with DOW (contact Eileen Wyza at Eileen.Wyza@dnr.ohio.gov).

In addition, the entire state of Ohio is within the range of the Indiana bat (*Myotis sodalis*), a state endangered and federally endangered species, the northern long-eared bat (*Myotis septentrionalis*), a state endangered and federally endangered species, the little brown bat (*Myotis lucifugus*), a state endangered species, and the tricolored bat (*Perimyotis subflavus*), a state endangered species. During the spring and summer (April 1 through September 30), these bat species predominately roost in trees behind loose, exfoliating bark, in crevices and cavities, or in clusters of dead leaves on tree limbs. However, these species are also dependent on the forest structure surrounding roost trees. The DOW recommends tree and/or tree limb clearing only occur from October 1 through March 31, conserving trees with loose, shaggy bark and/or crevices, holes, or cavities, as well as trees with a Diameter Breast Height (DBH) $\geq 20''$ if possible.

For every project, the DOW also recommends that a winter bat habitat assessment is conducted to determine if potential hibernacula are present within the project area. This is to limit possible disturbances that seasonal tree clearing and/or subsurface work (e.g., trenching, blasting, etc.) may cause to hibernating bats. Potential hibernacula include rocky outcroppings, caves, and underground mines. Direction on how to conduct winter habitat assessments can be found in the joint guidance [OHIO DIVISION OF WILDLIFE AND U.S. FISH AND WILDLIFE SERVICE \(OH-FIELD OFFICE\) JOINT GUIDANCE FOR BAT SURVEYS](#). If a potential or known hibernaculum is found, the DOW recommends a 0.25-mile permanent tree clearing buffer around the hibernaculum entrance. Limited summer or winter tree clearing may be acceptable after consultation with the DOW. If a habitat assessment for projects involving subsurface disturbance finds that a potential hibernaculum is present within 5 miles of the project area, please consult with Eileen Wyza for project recommendations. If no tree clearing or subsurface impacts to a hibernaculum are proposed, this project is not likely to impact these species.

The DOW recommends that all impacts to karst features be avoided to the greatest extent practicable. Subsurface ground disturbance and tree clearing around cave entrances have the potential to affect

sensitive species that reside within karst habitats. To help identify known and potential karst features, refer to the Division of Geological Survey's [online interactive karst map](#).

The project is within the range of the following listed mussel species.

Federally Endangered

clubshell (*Pleurobema clava*)

Northern riffleshell (*Epioblasma torulosa rangiana*)

rayed bean (*Villosa fabalis*)

State Endangered

Ohio pigtoe (*Pleurobema cordatum*)

washboard (*Megaloniais nervosa*)

yellow sandshell (*Lampsilis teres*)

Due to the location, and that there is no in-water work proposed in a perennial stream of sufficient size, this project is not likely to impact these species.

The project is within the range of the following listed fish species.

State Endangered

bigeye shiner (*Notropis boops*)

goldeye (*Hiodon alosoides*),

popeye shiner (*Notropis ariommus*),

shoal chub (*Macrhybopsis hyostoma*),

shortnose gar (*Lepisosteus platostomus*),

shovelnose sturgeon (*Scaphirhynchus platyrhynchus*),

State Threatened

blue sucker (*Cycleptus elongatus*),

channel darter (*Percina copelandi*),

paddlefish (*Polyodon spathula*)

river darter (*Percina shumardi*),

The DOW recommends no in-water work in perennial streams from March 15 through June 30 to reduce impacts to indigenous aquatic species and their habitat. If no in-water work is proposed in a perennial stream, this project is not likely to impact these or other aquatic species.

The project is within the range of the timber rattlesnake (*Crotalus horridus*), a state endangered species, and a federal species of concern. The timber rattlesnake is a woodland species. In addition to using wooded areas, the timber rattlesnake also utilizes sunlit gaps in the canopy for basking and

deep rock crevices known as den sites for overwintering. Due to the location, the type of habitat within the project area, and the type of work proposed, this project is not likely to impact this species.

The project is within the range of the eastern spadefoot toad (*Scaphiopus holbrookii*), a state endangered species. This species is found in areas of sandy soils that are associated with river valleys. Breeding habitats may include flooded agricultural fields or other water holding depressions. Due to the location, the type of habitat within the project area, and the type of work proposed, this project is not likely to impact this species.

The project is within the range of the midland mud salamander (*Pseudotriton montanus diastictus*), a state threatened species. Due to the location, the type of habitat within the project area, and the type of work proposed, this project is not likely to impact this species.

The project is within the range of the eastern harvest mouse (*Reithrodontomys humulis*), a state threatened species. This species relies on early successional habitats dominated by herbaceous vegetation with less than 30% woody material. The DOW recommends that early successional habitats be preserved where possible. If early successional habitats won't be impacted, this project is not likely to impact this species.

Due to the potential for impacts to federally listed species, as well as to state-listed species, we recommend that this project be coordinated with the US Fish & Wildlife Service.

The Divisions of Water Resources, Forestry, and Mineral Resources Management have not conducted a project specific review and/or comments; however, the guidance provided below should be reviewed by the Environmental Review applicant for applicability on this project and subsequent compliance as applicable.

Water Resources: If the subject project is in a floodplain regulated by the Federal Emergency Management Agency (FEMA), the [local floodplain administrator](#) should be contacted concerning the possible need for any floodplain permits or approvals. The FEMA National Flood Hazard Layer (NHFL) Viewer [website](#) can be utilized to see if the project is in a FEMA regulated floodplain. If the project is not in a FEMA regulated floodplain, then no further action is required.

Ohio Revised Code (ORC) Section 1521.16 mandates that any owner of a property or a facility that has the capacity of withdrawing 100,000 gallons per day (gpd) of water from groundwater, surface water, or both must register with the Division of Water Resources' [Water Withdrawal Facilities Registration \(WWFR\) Program](#) and report their withdrawals annually.

Additional coordination may be required depending on the location of the withdrawal and consumptive use. Permitting may be required for:

- New or increased consumptive use of water averaging 2 million gallons per day (mgd) within 30 days within the Ohio River basin.
- New or increased withdrawal and consumptive water use in the Lake Erie watershed averaging 1 million gallons per day (mgd) or more in 90 days.
- New or increased water withdrawal directly from Lake Erie averaging 2.5 million gallons per day (mgd) or more in 90 days.
- Diversion or movement of water across the Ohio River and Lake Erie basin divide.

If the project does not involve activities that are subject to water withdrawal regulatory requirements as described above, then no further action is required. For more information, visit the [Water Inventory & Planning website](#).

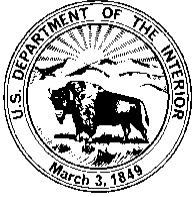
Forestry: The Division of Forestry recommends that construction projects preserve existing trees to the greatest extent possible. Failing to consider trees during any phase of project development (e.g. planning, design, preconstruction, construction, landscaping and/or postconstruction) can compromise tree health and structural integrity. Preserving trees during a construction project involves protecting the soil, roots, trunks, and crowns of trees. Protection barriers should be visible and extend around the root zone, the area under the tree that extends beyond the drip zone. There should be no storage of material or traffic within this established zone. Trees should be monitored throughout the project and steps taken to remedy any impacts. Projects should consider Best Management Practices (BMPs) during construction and the [Purdue Extension document Construction and Trees: Guidelines for Protection](#) is recommended as a resource for BMPs. Certified arborists can be located through the [International Society of Arboriculture website](#). Please note that tree preservation practices may also be required under municipal ordinances.

Mineral Resources: For projects requiring earth disturbance, the Ohio Mines Locator ([ODNR Mines of Ohio Viewer](#)) should be referenced. Both current and abandoned mines with either underground or surface features should be identified, and project impacts evaluated. Please reference the [Ask Before You Build](#) development guide for information about abandoned mine land features. Division of Mineral Resources Management may be contacted for further information and guidance regarding development of mined lands. Contact minerals@dnr.ohio.gov for further information.

ODNR appreciates the opportunity to provide these comments. Please contact Mike Pettegrew (Environmental Services Administrator) at mike.pettegrew@dnr.ohio.gov if you have questions about these comments or need additional information.

Expiration: *ODNR Environmental Reviews are typically valid for 2 years from the issuance date. If the scope of work, project area, construction limits, and/or anticipated impacts to natural resources have changed significantly from the original project submittal, then a new Environmental Review request should be submitted.*

United States Department of the Interior



FISH AND WILDLIFE SERVICE

Ecological Services
4625 Morse Road, Suite 104
Columbus, Ohio 43230
(614) 416-8993 / FAX (614) 416-8994



August 13, 2026

Project Code: 2026-0090867

Dear Mr. Lubbers:

The U.S. Fish and Wildlife Service (Service) has received your recent correspondence requesting information about the subject proposal. We offer the following comments and recommendations to assist you in minimizing and avoiding adverse impacts to threatened and endangered species pursuant to the Endangered Species Act of 1973 (16 U.S.C. 1531 et seq), as amended (ESA).

Federally Threatened and Endangered Species: The endangered Indiana bat (*Myotis sodalis*) and northern long-eared bat (*Myotis septentrionalis*) occur throughout the State of Ohio. The Indiana bat and northern long-eared bat may be found wherever suitable habitat occurs unless a presence/absence survey has been performed to document absence. Suitable summer habitat for Indiana bats and northern long-eared bats consists of a wide variety of forested/wooded habitats where they roost, forage, and breed that may also include adjacent and interspersed non-forested habitats such as emergent wetlands and adjacent edges of agricultural fields, woodlots, fallow fields, and pastures. Roost trees for both species include live and standing dead trees ≥ 3 inches diameter at breast height (dbh) that have any exfoliating bark, cracks, crevices, hollows and/or cavities. These roost trees may be located in forested habitats as well as linear features such as fencerows, riparian forests, and other wooded corridors. Individual trees may be considered suitable habitat when they exhibit the characteristics of a potential roost tree and are located within 1,000 feet of other forested/wooded habitat. Bridges and culverts have also been used as roosts. Additionally, northern long-eared bats have been observed roosting in other human-made structures, such as buildings, barns, and bat houses; therefore, these structures should also be considered potential summer habitat. In the winter, Indiana bats and northern long-eared bats hibernate in caves, rock crevices and abandoned mines.

Seasonal Restrictions for Federally Listed Bat Species: Should the proposed project site contain trees ≥ 3 inches dbh, we recommend avoiding tree removal wherever possible. If any caves or abandoned mines may be disturbed, further coordination with this office is requested to determine if fall or spring portal surveys are warranted. If no caves or abandoned mines are present and trees ≥ 3 inches dbh cannot be avoided, we recommend removal of any trees ≥ 3 inches dbh only occur between October 1 and March 31. If bridges or culverts will be impacted, we recommend reviewing Appendix K in the most recent "Range-Wide Indiana Bat & Northern Long-Eared Bat Survey Guidelines" to determine if the bridge/culvert may be suitable roost habitat. We recommend impacts to suitable bridges and culverts only occur from October 1 and March 31. These seasonal restrictions are recommended to avoid adverse effects to Indiana bats and northern long-eared bats. Please note that, because Indiana bat and/or northern long-eared

bat presence has already been confirmed in the project vicinity, any additional summer surveys would not constitute presence/absence surveys for these species.

Federally Proposed Species: On September 14, 2022, the Service proposed to list the tricolored bat (*Perimyotis subflavus*) as endangered under the ESA. The bat faces extinction due to the impacts of white-nose syndrome, a deadly disease affecting cave-dwelling bats across the continent. During spring, summer, and fall, this species roosts primarily among leaf clusters of live or recently dead trees, emerging at dusk to hunt for insects over waterways and forest edges. While white-nose syndrome is by far the most serious threat to the tricolored bat, other threats now have an increased significance due to the dramatic decline in the species' population. These threats include disturbance to bats in roosting, foraging, commuting, and over-wintering habitats. Mortality due to collision with wind turbines, especially during migration, has also been documented across their range. Conservation measures for the Indiana bat and northern long-eared bat will also help to conserve the tricolored bat.

On December 12, 2024 the Service proposed to list the monarch butterfly (*Danaus plexippus plexippus*) as threatened under the ESA. Monarch butterflies are found throughout Ohio and some populations migrate vast distances across multiple generations each year. Many monarchs fly between the U.S., Mexico and Canada – a journey of over 3,000 miles. Monarch populations have declined significantly in recent years. Threats include habitat loss – particularly the loss of milkweed, the monarch caterpillar's sole food source – and mortality resulting from pesticide use. The Service recommends the following actions to maintain habitat and avoid impacts to monarchs in Ohio: revegetate disturbed areas with native plant species including nectar-producing plants and milkweed endemic to the area; limit mowing monarch habitat from March 15 to August 31 when monarchs are breeding and from September 1 to October 31 when large numbers of monarchs are migrating; and avoid the use of pesticides and herbicides in and near monarch habitat.

Section 7 Coordination: If there is a federal nexus for the project (e.g., federal funding provided, federal permits required to construct), then no tree clearing should occur on any portion of the project area until consultation under section 7 of the ESA, between the Service and the federal action agency, is completed. We recommend the federal action agency submit a determination of effects to this office, relative to the Indiana bat and northern long-eared bat, for our review and concurrence. This letter provides technical assistance only and does not serve as a completed section 7 consultation document.

Bald Eagle: The project is in the range of the bald eagle (*Haliaeetus leucocephalus*), which is protected under the Bald and Golden Eagle Protection Act (16 U.S.C. 668-668d). We recommend that you visit <https://ohiodnr.gov/discover-and-learn/animals/birds/bald-eagle> to determine if the project is within 0.5 mile of a documented eagle nest. Additionally, because not all eagle nests in the state have been mapped, we recommend that an on-site examination be conducted to determine if any large stick nests are visible from project area. If the project is within 0.5 mile of a documented eagle nest or the on-site examination reveals the presence of a potential eagle nest, we recommend visiting <https://www.fws.gov/story/do-i-need-eagle-take-permit> to determine if an eagle take permit is required.

Stream and Wetland Avoidance: Over 90% of the wetlands in Ohio have been drained, filled, or modified by human activities, thus is it important to conserve the functions and values of the

remaining wetlands in Ohio (https://epa.ohio.gov/portals/47/facts/ohio_wetlands.pdf). We recommend avoiding and minimizing project impacts to all wetland habitats (e.g., forests, streams, vernal pools) to the maximum extent possible in order to benefit water quality and fish and wildlife habitat. Additionally, natural buffers around streams and wetlands should be preserved to enhance beneficial functions. If streams or wetlands will be impacted, the U.S. Army Corps of Engineers should be contacted to determine whether a Clean Water Act section 404 permit is required. Best management practices should be used to minimize erosion, especially on slopes. Disturbed areas should be mulched and revegetated with native plant species. In addition, prevention of non-native, invasive plant establishment is critical in maintaining high quality habitats.

Due to the project type, size, and location, we do not anticipate adverse effects to any other federally endangered, threatened, or proposed species, or proposed or designated critical habitat. Should the project design change, or additional information on listed or proposed species or their critical habitat become available, or if new information reveals effects of the action that were not previously considered, coordination with the Service should be initiated to assess any potential impacts.

Thank you for your efforts to conserve listed species and sensitive habitats in Ohio. We recommend coordinating with the Ohio Department of Natural Resources due to the potential for the proposed project to affect state listed species and/or state lands. Contact Mike Pettegrew, Environmental Services Administrator, at (614) 265-6387 or at mike.pettegrew@dnr.ohio.gov.

If you have questions, or if we can be of further assistance in this matter, please contact our office at (614) 416-8993 or ohio@fws.gov.

Sincerely,



Erin Knoll
Field Office Supervisor

cc: Matthew.Stooksbury@dnr.ohio.gov
Eileen.Wyza@dnr.ohio.gov



United States Department of the Interior

FISH AND WILDLIFE SERVICE

Ohio Ecological Services Field Office

4625 Morse Road, Suite 104

Columbus, OH 43230-8355

Phone: (614) 416-8993 Fax: (614) 416-8994



In Reply Refer To:

07/17/2026 21:34:10 UTC

Project Code: 2026-0090867

Project Name: Monza-Don Marquis 345kV Transmission Line Project

Subject: List of threatened and endangered species that may occur in your proposed project location or may be affected by your proposed project

To Whom It May Concern:

The enclosed species list identifies threatened, endangered, proposed and candidate species, as well as proposed and final designated critical habitat, that may occur within the boundary of your proposed project and/or may be affected by your proposed project. The species list fulfills the requirements of the U.S. Fish and Wildlife Service (Service) under section 7(c) of the Endangered Species Act (Act) of 1973, as amended (16 U.S.C. 1531 *et seq.*).

New information based on updated surveys, changes in the abundance and distribution of species, changed habitat conditions, or other factors could change this list. Please feel free to contact us if you need more current information or assistance regarding the potential impacts to federally proposed, listed, and candidate species and federally designated and proposed critical habitat. Please note that under 50 CFR 402.12(e) of the regulations implementing section 7 of the Act, the accuracy of this species list should be verified after 90 days. This verification can be completed formally or informally as desired. The Service recommends that verification be completed by visiting the IPaC website at regular intervals during project planning and implementation for updates to species lists and information. An updated list may be requested through the IPaC system by completing the same process used to receive the enclosed list.

The purpose of the Act is to provide a means whereby threatened and endangered species and the ecosystems upon which they depend may be conserved. Under sections 7(a)(1) and 7(a)(2) of the Act and its implementing regulations (50 CFR 402 *et seq.*), Federal agencies are required to utilize their authorities to carry out programs for the conservation of threatened and endangered species and to determine whether projects may affect threatened and endangered species and/or designated critical habitat.

A Biological Assessment is required for construction projects (or other undertakings having similar physical impacts) that are major Federal actions significantly affecting the quality of the human environment as defined in the National Environmental Policy Act (42 U.S.C. 4332(2) (c)). For projects other than major construction activities, the Service suggests that a biological

evaluation similar to a Biological Assessment be prepared to determine whether the project may affect listed or proposed species and/or designated or proposed critical habitat. Recommended contents of a Biological Assessment are described at 50 CFR 402.12.

If a Federal agency determines, based on the Biological Assessment or biological evaluation, that listed species and/or designated critical habitat may be affected by the proposed project, the agency is required to consult with the Service pursuant to 50 CFR 402. In addition, the Service recommends that candidate species, proposed species and proposed critical habitat be addressed within the consultation. More information on the regulations and procedures for section 7 consultation, including the role of permit or license applicants, can be found in the "Endangered Species Consultation Handbook" at:

<https://www.fws.gov/sites/default/files/documents/endangered-species-consultation-handbook.pdf>

Migratory Birds: In addition to responsibilities to protect threatened and endangered species under the Endangered Species Act (ESA), there are additional responsibilities under the Migratory Bird Treaty Act (MBTA) and the Bald and Golden Eagle Protection Act (BGEPA) to protect native birds from project-related impacts. Any activity resulting in take of migratory birds, including eagles, is prohibited unless otherwise permitted by the U.S. Fish and Wildlife Service (50 C.F.R. Sec. 10.12 and 16 U.S.C. Sec. 668(a)). For more information regarding these Acts, see <https://www.fws.gov/program/migratory-bird-permit/what-we-do>.

It is the responsibility of the project proponent to comply with these Acts by identifying potential impacts to migratory birds and eagles within applicable NEPA documents (when there is a federal nexus) or a Bird/Eagle Conservation Plan (when there is no federal nexus). Proponents should implement conservation measures to avoid or minimize the production of project-related stressors or minimize the exposure of birds and their resources to the project-related stressors. For more information on avian stressors and recommended conservation measures, see <https://www.fws.gov/library/collections/threats-birds>.

In addition to MBTA and BGEPA, Executive Order 13186: *Responsibilities of Federal Agencies to Protect Migratory Birds*, obligates all Federal agencies that engage in or authorize activities that might affect migratory birds, to minimize those effects and encourage conservation measures that will improve bird populations. Executive Order 13186 provides for the protection of both migratory birds and migratory bird habitat. For information regarding the implementation of Executive Order 13186, please visit <https://www.fws.gov/partner/council-conservation-migratory-birds>.

We appreciate your concern for threatened and endangered species. The Service encourages Federal agencies to include conservation of threatened and endangered species into their project planning to further the purposes of the Act. Requests for additional technical assistance or consultation from the Ohio Field Office should be submitted following guidance on the following page <https://www.fws.gov/office/ohio-ecological-services/request-project-review>. Please include the Consultation Code in the header of this letter with any request for consultation or correspondence about your project that you submit to our office.

Attachment(s):

- Official Species List

OFFICIAL SPECIES LIST

This list is provided pursuant to Section 7 of the Endangered Species Act, and fulfills the requirement for Federal agencies to "request of the Secretary of the Interior information whether any species which is listed or proposed to be listed may be present in the area of a proposed action".

This species list is provided by:

Ohio Ecological Services Field Office
4625 Morse Road, Suite 104
Columbus, OH 43230-8355
(614) 416-8993

PROJECT SUMMARY

Project Code: 2026-0090867

Project Name: Monza-Don Marquis 345kV Transmission Line Project

Project Type: Distribution Line - New Construction - Above Ground

Project Description: ×

Project description

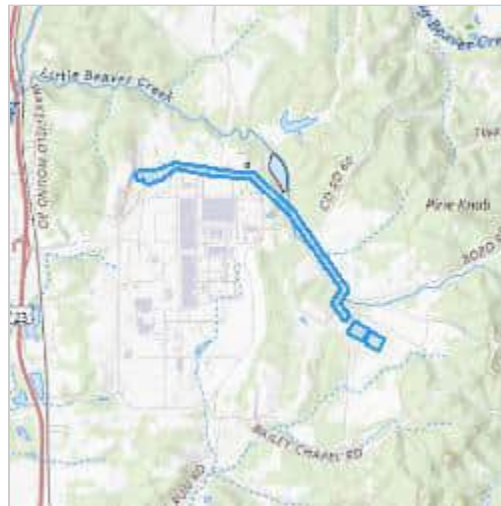
The Monza-Don Marquis 345kV Transmission Line Project consists of the construction of two greenfield, approximately 2.5-mile 345kV transmission lines and the installation of two new, approximately 10-acre 345kV Stations. The Project alignment generally parallels Perimeter Road and Dutch Run Road east of the existing Monza Don Marquis substation (39.0221, -83.0101), ending at two proposed substation sites just south of the intersection of Loop Road and Dutch Run Road, located in Pike County, Ohio approximately 19 miles north of the City of Portsmouth.

The project scope includes project management services, Rare, Threatened and Endangered Species Coordination, Ecological Survey and Report, and Stormwater Pollution Prevention Plan (SWPPP).

Overall project schedule: April 2026-December 2026

Project Location:

The approximate location of the project can be viewed in Google Maps: <https://www.google.com/maps/@39.00248035,-82.9718706,14z>



Counties: Pike County, Ohio

ENDANGERED SPECIES ACT SPECIES

There is a total of 8 threatened, endangered, or candidate species on this species list.

Species on this list should be considered in an effects analysis for your project and could include species that exist in another geographic area. For example, certain fish may appear on the species list because a project could affect downstream species.

IPaC does not display listed species or critical habitats under the sole jurisdiction of NOAA Fisheries¹, as USFWS does not have the authority to speak on behalf of NOAA and the Department of Commerce.

See the "Critical habitats" section below for those critical habitats that lie wholly or partially within your project area under this office's jurisdiction. Please contact the designated FWS office if you have questions.

-
1. [NOAA Fisheries](#), also known as the National Marine Fisheries Service (NMFS), is an office of the National Oceanic and Atmospheric Administration within the Department of Commerce.

MAMMALS

NAME	STATUS
Indiana bat <i>Myotis sodalis</i> There is final critical habitat for this species. Your location does not overlap the critical habitat. Species profile: https://ecos.fws.gov/ecp/species/5949	Endangered
Northern Long-Eared Bat <i>Myotis septentrionalis</i> No critical habitat has been designated for this species. Species profile: https://ecos.fws.gov/ecp/species/9045	Endangered
Tricolored bat <i>Perimyotis subflavus</i> No critical habitat has been designated for this species. Species profile: https://ecos.fws.gov/ecp/species/10515	Proposed Endangered

CLAMS

NAME	STATUS
Clubshell <i>Pleurobema clava</i> Population: Wherever found; Except where listed as Experimental Populations No critical habitat has been designated for this species. Species profile: https://ecos.fws.gov/ecp/species/3789	Endangered
Northern riffleshell <i>Epioblasma rangiana</i> No critical habitat has been designated for this species. Species profile: https://ecos.fws.gov/ecp/species/527	Endangered
Rayed Bean <i>Villosa fabalis</i> There is final critical habitat for this species. Your location does not overlap the critical habitat. Species profile: https://ecos.fws.gov/ecp/species/5862	Endangered
Salamander mussel <i>Simpsonaias ambigua</i> There is proposed critical habitat for this species. Your location does not overlap the critical habitat. Species profile: https://ecos.fws.gov/ecp/species/6208	Proposed Endangered

INSECTS

NAME	STATUS
Monarch butterfly <i>Danaus plexippus</i> There is proposed critical habitat for this species. Your location does not overlap the critical habitat. Species profile: https://ecos.fws.gov/ecp/species/9743	Proposed Threatened

CRITICAL HABITATS

THERE ARE NO CRITICAL HABITATS WITHIN YOUR PROJECT AREA UNDER THIS OFFICE'S JURISDICTION.

YOU ARE STILL REQUIRED TO DETERMINE IF YOUR PROJECT(S) MAY HAVE EFFECTS ON ALL ABOVE LISTED SPECIES.

IPAC USER CONTACT INFORMATION

Agency: Jacobs

Name: Maria Fagin

Address: 2 Crowne Pt.

City: Cincinnati

State: OH

Zip: 45241

Email: maria.fagin@jacobs.com

Phone: 5132802778

Appendix D Environmental Survey Report

Ecological Survey Report

Monza-Don Marquis 345 kV Transmission Line Project Pike County, Ohio

Prepared for



August 25, 2026

Jacobs

2 Crowne Point Court
Suite 100
Cincinnati, OH 45241

Contents

1	Introduction	1-1
2	Background Information.....	2-1
2.1	Precipitation	2-1
2.2	Drainage Basins.....	2-1
3	Wetland and Waterbody Delineation	3-1
3.1	Desktop Review	3-1
3.2	Field Survey Methodology	3-2
3.2.1	Wetland Delineation.....	3-2
3.2.2	Stream Assessment	3-2
4	Field Survey Results.....	4-1
4.1	Wetlands	4-1
4.1.1	Wetland ORAM Results.....	4-1
4.1.2	NWI Field Verification.....	4-3
4.2	Streams	4-3
4.2.1	Ohio Administrative Code Chapter 3745-1 Designated Use	4-3
4.2.2	HHEI Results.....	4-5
4.3	Ponds/Open Water	4-5
4.4	Land Use/Habitat	4-5
5	Protected Species.....	5-1
6	Conclusion.....	6-1
7	References.....	7-1

Tables

- 2.1 Precipitation Data in Waverly, OH
- 3.1 Soil Map Units
- 4.1 Delineated Wetlands
 - 4.1.1 Wetland ORAM Summary
 - 4.1.2 Mapped National Wetland Inventory Features
- 4.2 Delineated Streams
 - 4.2.2 HHEI Summary
- 4.3 Delineated Ponds
- 4.4 Land Use and Habitat
- 5.1 Protected Species Summary

Appendices

- A **Figures**
 - 1 Overview Map
 - 2 Soils, NHD Features, NWI Wetlands, and FEMA Floodplain Map
 - 3 Delineated Features Map
 - 4 Land Use and Habitat Map
- B USACE Wetland Determination Forms: Eastern Mountains and Piedmont Region
- C Ohio Rapid Assessment Method for Wetlands (ORAM) Forms
- D Designated Use Stream Photographs
- E Primary Headwater Habitat Evaluation Index (HHEI) Stream Forms
- F Jacobs Pond Forms
- G Representative Land Use Photographs
- H Agency Coordination

1 Introduction

This report summarizes the results of the ecological survey conducted in Pike County, Ohio by Jacobs Engineering Group Inc. (Jacobs) for the American Electric Power Ohio Transco (AEP) Monza-Don Marquis 345 kV Transmission Line Project (Project). AEP is proposing to build 2.6 miles of new 345 kilovolt (kV) transmission line (Figure 1). The environmental survey boundary (ESB) consists of the proposed 150-foot right-of-way (ROW) plus a 75-foot buffer on both sides, totaling 300 feet in width. This environmental survey report contains the following components:

- Figure 1 (Appendix A) provides an overview map of the ESB overlain on a topographic map.
- Figure 2 (Appendix A) shows Natural Resource Conservation Service (NRCS) soil map units, National Hydrography Dataset (NHD) streams, National Wetland Inventory (NWI) polygons, and Federal Emergency Management Agency (FEMA) 100-year floodplain information.
- Figure 3 (Appendix A) provides the location of all features mapped during the delineation by Jacobs biologists within the ESB. This includes all wetlands, streams, ponds, and data points.
- Figure 4 (Appendix A) shows the land use within the ESB.
- U.S. Army Corps of Engineers (USACE) wetland determination field data forms and photographs are in Appendix B.
- Ohio Rapid Assessment Method for Wetlands (ORAM) forms are in Appendix C.
- Photographs of designated use streams are in Appendix D.
- Primary Headwater Habitat Evaluation Index (HHEI) stream data forms and photographs are in Appendix E.
- Jacobs pond evaluation forms and photographs are in Appendix F.
- Representative photographs of land use types are in Appendix G.
- Documentation for federal and state-listed species agency coordination is in Appendix H.

2 Background Information

The ESB begins at the proposed Monza Station (39.00437, -82.97472) and ends at the existing Don Marquis Station (39.02165, -83.00788). It is within Scioto Township, Pike County, Ohio (Figure 1).

The U.S. Geological Survey (USGS) 7.5-minute topographic maps of the area (Waverly South and Piketon, OH) indicate that the prominent drainage features in the Project area include Little Beaver Creek and unnamed tributaries of Little Beaver Creek (USGS 2023). Topographic relief is minimal in the central portion of the Project and includes rolling hills in the eastern half and the western end of the Project, with elevations ranging between 640 feet and 760 feet above sea level throughout the ESB (Figure 1).

2.1 Precipitation

Precipitation history from the Waverly, Ohio weather station (the nearest weather station with both historical and recent precipitation records) was reviewed before completing the environmental surveys to determine if climatic conditions were normal during surveys. Monthly precipitation ranged from normal to above normal in the months leading up to the survey in July 2026 (Table 2.1; USDA 2026). This precipitation history was taken into consideration during the survey.

Table 2.1 Precipitation Data in Waverly, OH

Monza-Don Marquis 345 kV Transmission Line Project

	April	May	June	Total
2026 Monthly Sum (inches) ¹	3.31	6.13*	3.84	13.28*
Historic Normal Range (inches) ²	2.33 - 3.91	2.69 - 4.97	2.44 - 4.70	7.46 - 13.58
Climatic Condition	average	above average	average	average

¹Monthly weather summary from WETS Station WAVERLY, OH (2026)

²USDA WETS Station Climate Data (1971-2000)

* missing data, so value may be an underrepresentation

2.2 Drainage Basins

The ESB is within the Lower Scioto drainage basins, 8-digit Hydrologic Unit Code (HUC) 05060002. More specifically it is within the Little Beaver Creek-Big Beaver Creek watershed, 12-digit HUC 05060002-1303 (USGS 2026).

3 Wetland and Waterbody Delineation

3.1 Desktop Review

Prior to conducting the field investigations, Jacobs reviewed the following resources to identify the potential for wetlands within the ESB:

- Aerial photo-based map (Esri 2020)
- USGS Topographic maps (USGS 2023)
- Web Soil Survey (NRCS 2025)
- NHD map (USGS 2026)
- NWI map (USFWS 2025)

According to the NRCS soil survey of Pike County (NRCS 2025), the ESB contains 11 soil map units. Of these, two are listed as predominantly non-hydric, and nine are listed as not hydric (Table 3.1). Not hydric or predominantly non-hydric soils make up the entirety of the ESB (Figure 2).

Generally, hydric soils are those soils that indicate through their color and structure that they have experienced dominantly reducing (i.e., oxygen-poor) conditions. Oxygen-poor conditions result from inundation and/or saturation by water. Partially hydric soils have both hydric and non-hydric soil components identified in the soil map unit.

Table 3.1 Soil Map Units

Monza-Don Marquis 345 kV Transmission Line Project

Symbol	Soil Description	Hydric Classification	Acreage within ESB
Cf	Clifty silt loam, occasionally flooded	Nonhydric	4.49
CoC	Coolville silt loam, 8 to 15 percent slopes	Nonhydric	2.87
LhW1D1	Latham-Wharton silt loams, 15 to 25 percent slopes	Nonhydric	6.46
Omu1A1	Omulga silt loam, 0 to 2 percent slopes	Predominantly Nonhydric	0.18
Omu1B1	Omulga silt loam, 2 to 6 percent slopes	Nonhydric	13.60
Omu1C1	Omulga silt loam, 6 to 12 percent slopes	Nonhydric	3.84
RdD	Rarden silt loam, 15 to 25 percent slopes	Nonhydric	7.17
ShD	Shelocta silt loam, 15 to 25 percent slopes	Nonhydric	5.29
UoA	Urbanland-Omulga complex, 0 to 6 percent slopes	Nonhydric	45.21
Wm	Wilbur silt loam, occasionally flooded	Predominantly Nonhydric	27.89
Wya3C2	Wyatt silty clay loam, 6 to 12 percent slopes, eroded	Nonhydric	2.60

NWI data were obtained from the U.S. Fish and Wildlife Service (USFWS) for review of potential wetlands that may occur within the ESB. The NWI data (USFWS 2025) identify the type of wetland or open water present at a location using the USFWS classification system (FGDC 2013). The presence of an NWI feature is not a definitive indicator that a wetland or waterbody is present. The information on NWI maps is obtained largely from aerial interpretation, may be outdated, and is only sporadically field-checked. Additional detail on mapped NWI wetlands within the ESB is provided in Table 4.1.2.

The ESB does not cross any FEMA 100-year floodplains (FEMA 2010).

3.2 Field Survey Methodology

Jacobs biologists surveyed the ESB on July 14-16 and July 23, 2026, by walking the area and evaluating for wetlands and other waterbodies. The boundaries of each wetland and waterbody within the ESB were delineated and recorded using handheld global navigation satellite system (GNSS) units. For streams identified within the ESB, the ordinary high water mark (OHWM) was used as the jurisdictional boundary.

Wetland data were recorded on USACE Regional Supplement wetland determination data forms and Ohio Rapid Assessment Method (ORAM) forms, stream data were recorded on Headwater Habitat Evaluation Index (HHEI) forms and Qualitative Habitat Evaluation Index (QHEI) forms, and pond data were recorded on Jacobs' pond forms. All other land use, habitat, and other supplemental data were collected in a digital geodatabase during the environmental survey.

3.2.1 Wetland Delineation

Wetland boundaries were field-delineated according to Section 404 of the Clean Water Act and the routine onsite methodology described in the Technical Report Y-87-1 *Corps of Engineers' Wetlands Delineation Manual*, subsequent guidance documents (Environmental Laboratory 1987), and *Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Eastern Mountains and Piedmont Region (Version 2.0)* (USACE 2012). Representative wetland and upland data points were recorded during the wetland delineation to determine the presence/absence of wetlands and/or document upland conditions within the Project area. Upland data points were determined not to be within wetlands because they did not have positive indicators of one or more of the three wetland criteria: hydrophytic vegetation, wetland hydrology, and hydric soils.

Wetland quality was evaluated using the Ohio Environmental Protection Agency (OEPA) Ohio Rapid Assessment Method (ORAM) for Wetlands Version 5.0 (OEPA 2001). Wetlands are scored based on size, surrounding land use, hydrology, habitat alteration, special wetland communities, and plant communities. Each of these subject areas is further divided into subcategories under ORAM v5.0 resulting in a score that describes the wetland using a range from 0 (low quality and high disturbance) to 100 (high quality and low disturbance). Wetlands scored from 0 to 29.9 are grouped into "Category 1", 30 to 59.9 are "Category 2" and 60 to 100 are "Category 3". Jacobs commonly assesses each Cowardin component of a wetland complex separately. However, the ORAM evaluates the larger wetland complex as a unit and as a result each wetland component within a complex will receive the same ORAM score.

3.2.2 Stream Assessment

Jurisdictional streams were identified as those waters that possessed a continuously defined bed and bank, OHWM indicators, and lacked a dominance of upland vegetation in the channel. The OHWM is defined as the "line on the shore established by the fluctuations of water and indicated by physical characteristics such as a clear, natural line impressed on the bank, shelving, changes in the character of soil, destruction of terrestrial vegetation, the presence of litter and debris, or other appropriate means that consider the characteristics of the surrounding areas" (USACE 2005). Channels that parallel a roadway or railroad were identified as upland drainage features and were not considered to be jurisdictional unless they had an identifiable OHWM, were identified on the USGS topographic map, or represented a presumed relocation of a natural channel.

During the field survey, functional stream assessments were conducted using the methods described in the OEPA's *Methods for Assessing Habitat in Flowing Waters: Using the Qualitative Habitat Evaluation Index* (OEPA 2006) and in the OEPA's *Field Methods for Evaluating Primary Headwater Streams in Ohio*

(OEPA 2020). The Qualitative Habitat Evaluation Index (QHEI) is used to characterize larger streams (drainage areas greater than 1 square mile or maximum pool depth greater than 40 centimeters), while the Primary Headwater Habitat Evaluation Index (HHEI) is appropriate for first-order and second-order headwater streams (drainage areas less than or equal to 1 square mile and maximum pool depth less than or equal to 40 centimeters).

4 Field Survey Results

Jacobs' biologists identified 13 wetlands, 13 streams, and two ponds in the ESB. These features are displayed on the Delineated Features Map (Figure 3). Jacobs defaults to the USACE and OEPA for the final determination of hydrologic connectivity and jurisdiction.

4.1 Wetlands

Thirteen wetlands were delineated within the ESB, totaling 1.91 acres and ranging in size from 0.01 to 0.88 acres (Table 4.1, next page). The reported wetland acreage only corresponds to areas delineated within the ESB as some wetlands extended beyond the survey boundary. Of the 13 wetlands, ten were palustrine emergent (PEM), two were palustrine forested (PFO), and one was palustrine aquatic bed (PAB). All wetlands were isolated except Wetland MD-04, which appears to directly abut Little Beaver Creek (a relatively permanent water) outside of the ESB. Completed USACE wetland and upland determination forms, plus representative photographs, are provided in Appendix B.

4.1.1 Wetland ORAM Results

Eleven Category 1 wetlands and two Category 2 wetlands were identified within the ESB (Table 4.1.1). Completed ORAM forms are included in Appendix C.

Eleven wetlands were classified as Category 1 based on ORAM scores ranging from 8 to 29. Generally, Category 1 wetlands have low species diversity, no significant habitat or wildlife use, limited potential to achieve beneficial wetland functions, and/or a predominance of non-native species (OEPA 2001).

Two wetlands were classified as Category 2 based on ORAM scores of 42.5 and 49. Category 2 wetlands constitute the broad middle category of "good" quality wetlands; they can be considered a functioning, diverse, healthy water resource that has ecological integrity and human value (OEPA 2001).

No Category 3 wetlands were identified within the ESB.

Table 4.1.1 Wetland ORAM Summary

Monza-Don Marquis 345 kV Transmission Line Project

Wetland Type	ORAM Category			Number of Wetlands	Delineated Area (acre) ^{1,2}
	Category 1	Category 2	Category 3		
PEM	10	0	0	10	0.69
PFO	0	2	0	2	1.17
PAB	1	0	0	1	0.05
Totals	11	2	0	13	1.91

¹Acreage within the ESB.

²Numbers have been rounded for presentation purposes. Thus, the total may not reflect the exact sum of the addends.

Table 4.1 Delineated Wetlands*Monza-Don Marquis 345 kV Transmission Line Project*

Wetland Data Summary - 2024 Wetland Assessment Project														
Wetland ID	Location		Isolated?	Habitat Type ¹	Delineated Area (acre) ^{2,3}	Score	ORAM		Nearest Structure # (Existing/Proposed)	Existing Structure # in Wetland	Proposed Structure # in Wetland	Structure Installation Method	Proposed Impacts	
	Latitude	Longitude					Category	Temporary Matting Area (acre)					Permanent Impact Area (acre)	
Wetland MD-01	39.00683	-82.97581	Yes	PEM	0.02	15	Category 1	14	None	None	TBD	TBD	TBD	
Wetland MD-02	39.01064	-82.97786	Yes	PEM	0.05	29	Category 1	11	None	None	TBD	TBD	TBD	
Wetland MD-03	39.01459	-82.98143	Yes	PEM	0.31	20	Category 1	10	None	None	TBD	TBD	TBD	
Wetland MD-04	39.01581	-82.98321	No	PFO	0.88	49	Category 2	9	None	None	TBD	TBD	TBD	
Wetland MD-05	39.01693	-82.98383	Yes	PEM	0.07	29	Category 1	8	None	None	TBD	TBD	TBD	
Wetland MD-06	39.01792	-82.98442	Yes	PFO	0.28	42.5	Category 2	8	None	None	TBD	TBD	TBD	
Wetland MD-07	39.01810	-82.98557	Yes	PEM	0.05	18	Category 1	8	None	None	TBD	TBD	TBD	
Wetland MD-08	39.02208	-82.99006	Yes	PEM	0.01	27	Category 1	6	None	None	TBD	TBD	TBD	
Wetland MD-09	39.02231	-82.99396	Yes	PEM	0.08	8	Category 1	5	None	None	TBD	TBD	TBD	
Wetland MD-10	39.02354	-83.00023	Yes	PEM	0.01	9	Category 1	3	None	None	TBD	TBD	TBD	
Wetland MD-11	39.02236	-83.00467	Yes	PEM	0.08	9	Category 1	2B	None	None	TBD	TBD	TBD	
Wetland MD-12	39.02269	-83.00488	Yes	PAB	0.05	24	Category 1	2A	None	None	TBD	TBD	TBD	
Wetland MD-13	39.02280	-83.00758	Yes	PEM	0.01	16	Category 1	1A	None	None	TBD	TBD	TBD	
Total Wetland Acreage:					1.91	Proposed Impacts Totals:						TBD	TBD	

PEM = palustrine emergent, PFO = palustrine forested, PAB = palustrine aquatic bed

¹FGDC 2013.²Acreage within the ESB.³Numbers have been rounded for presentation purposes. Thus, the total may not reflect the exact sum of the addends.

4.1.2 NWI Field Verification

The NWI data indicated that there are five mapped features within the ESB: four riverine features and one freshwater shrub/emergent wetland (Figure 2; USFWS 2025). Wetlands and/or waterbodies were confirmed in at least part of all five sites (Table 4.1.2).

Table 4.1.2 Mapped National Wetland Inventory Features

Monza-Don Marquis 345 kV Transmission Line Project

Wetland Classification Code ¹	NWI Description	Figure 2 Page #	Related Field Inventoried Resource	Comments
R5UBH	Riverine unknown perennial unconsolidated bottom, permanently flooded	3, 4, 5, 6	Stream MD-02	
R4SBC	Riverine intermittent streambed, seasonally flooded	6	Stream MD-05	
PSS1/EM1A	Palustrine scrub-shrub, broad-leaved deciduous; palustrine emergent, persistent, temporarily flooded	6	Wetland MD-04, Data Point MD-01	PFO wetland in part, upland woods in part
R5UBH	Riverine unknown perennial unconsolidated bottom, permanently flooded	8	Stream MD-02	
R4SBC	Riverine intermittent streambed, seasonally flooded	12	Stream MD-07	

¹FGDC 2013.

4.2 Streams

Thirteen streams were identified within the ESB, totaling 7,789 linear feet (Table 4.2, next page). Of the 13 streams, two were identified as perennial streams, one was identified as an intermittent stream, and ten were identified as ephemeral streams.

4.2.1 Ohio Administrative Code Chapter 3745-1 Designated Use

The OEPA has established water use designation for streams throughout Ohio as outlined in the Ohio Administrative Code (OAC) Chapter 3745-1-07 (OEPA 2022). One delineated stream, Stream MD-02, had a designated use as regulated under OAC Chapter 3745-1 (Table 4.2, next page). Jacobs defaults to the assigned OAC designations and therefore did not assess this stream. Representative photographs are provided in Appendix D.

Table 4.2 Delineated Streams*Monza-Don Marquis 345 kV Transmission Line Project*

Stream ID	Location		Stream Type ¹	Stream Name	Delineated Length (feet) ²	Bankfull Width (feet)	OHWM Width (feet)	Field Evaluation			Stream Crossing?	Proposed Impacts	
	Latitude	Longitude						Method	Score	Category / Rating / OAC Designation		Fill Type	Area (acre)
Stream MD-01	39.00682	-82.97532	Ephemeral	UNT to Little Beaver Creek	332	3	3	HHEI	20	Modified Class I	TBD	TBD	TBD
Stream MD-02	39.01042	-82.97853	Perennial	Little Beaver Creek	4,731	30	18	OAC	N/A	WWH	TBD	TBD	TBD
Stream MD-03	39.00935	-82.97820	Ephemeral	UNT to Little Beaver Creek	199	3	2	HHEI	32	Modified Class II	TBD	TBD	TBD
Stream MD-04	39.01065	-82.97914	Ephemeral	UNT to Little Beaver Creek	377	5	5	HHEI	36	Modified Class II	TBD	TBD	TBD
Stream MD-05	39.01326	-82.98021	Intermittent	UNT to Little Beaver Creek	124	15	12	HHEI	74	Class III	TBD	TBD	TBD
Stream MD-06	39.01680	-82.98382	Ephemeral	UNT to Little Beaver Creek	340	5	4	HHEI	38	Modified Class II	TBD	TBD	TBD
Stream MD-07	39.02384	-83.00241	Perennial	UNT to Little Beaver Creek	49	6	5	HHEI	69	Modified Class II	TBD	TBD	TBD
Stream MD-08	39.02219	-83.00615	Ephemeral	UNT to Little Beaver Creek	459	3	3	HHEI	22	Modified Class I	TBD	TBD	TBD
Stream MD-09	39.02235	-83.00648	Ephemeral	UNT to Little Beaver Creek	362	2	2	HHEI	59	Modified Class II	TBD	TBD	TBD
Stream MD-10	39.02246	-83.00690	Ephemeral	UNT to Little Beaver Creek	176	2	2	HHEI	15	Modified Class I	TBD	TBD	TBD
Stream MD-11	39.02252	-83.00739	Ephemeral	UNT to Little Beaver Creek	283	3	2	HHEI	34	Modified Class II	TBD	TBD	TBD
Stream MD-12	39.02251	-83.00757	Ephemeral	UNT to Little Beaver Creek	148	3	2	HHEI	24	Modified Class I	TBD	TBD	TBD
Stream MD-13	39.02270	-83.00774	Ephemeral	UNT to Little Beaver Creek	209	4	3	HHEI	35	Modified Class II	TBD	TBD	TBD
Total Stream Length:					7,789	Total Proposed Impacts Area:						TBD	

¹Flow regime is defined as perennial, intermittent, or ephemeral and is determined using field observations and USGS topographic maps.²Stream length within the ESB.

4.2.2 HHEI Results

Twelve headwater streams, totaling 3,058 linear feet within the ESB, were evaluated using HHEI methodology. Of the 12 streams, one was classified as Class III, seven were classified as Modified Class II, and four were classified as Modified Class I (Table 4.2.2). Completed HHEI forms and representative photographs are provided in Appendix E.

Table 4.2.2 HHEI Summary

Monza-Don Marquis 345 kV Transmission Line Project

Flow Regime	HHEI Class					Number of Streams	Length (feet) within ESB ¹
	Modified Class I PHW	Class I PHW	Modified Class II PHW	Class II PHW	Class III PHW		
Ephemeral	4	0	6	0	0	10	2,886
Intermittent	0	0	0	0	1	1	124
Perennial	0	0	1	0	0	1	49
Total	4	0	7	0	1	12	3,058

¹Numbers have been rounded for presentation purposes. Thus, the total may not reflect the exact sum of the addends.

4.3 Ponds/Open Water

Two ponds were identified, totaling 0.18 acres within the ESB (Table 4.3). Jacobs Pond/Open Water forms with representative photographs are provided in Appendix F.

Table 4.3 Delineated Ponds

Monza-Don Marquis 345 kV Transmission Line Project

Pond Name	Location		Delineated Area (ac) ¹
	Latitude	Longitude	
Pond MD-01	39.02202	-82.99009	0.13
Pond MD-02	39.02221	-83.00718	0.05
Total Pond Acreage:			0.18

¹Acreage within the ESB.

4.4 Land Use/Habitat

In addition to the delineated wetland and waterbody features, Jacobs observed the following land use types and habitats within the ESB: forested, maintained lawn, impervious surface, old field, agriculture, scrub/shrub, and grassland (Figure 4). Based on Jacobs observations, the primary land use in the ESB is forested. Land use descriptions and percentages within the ESB are outlined in Table 4.4 and representative photographs of land use types are in Appendix G.

Table 4.4 Land Use and Habitat

Monza-Don Marquis 345 kV Transmission Line Project

Land Use and Habitats	Land Use and Habitat Description	Approximate Acreage in ESB	Approximate Percentage of ESB
Agriculture	Areas currently or recently used for row crop and similar areas.	13.62	12%
Delineated Pond	Areas of permanent or nearly permanent water, often constructed for water retention or cattle watering purposes, but sometimes naturally formed.	0.18	<1%

Table 4.4 Land Use and Habitat*Monza-Don Marquis 345 kV Transmission Line Project*

Land Use and Habitats	Land Use and Habitat Description	Approximate Acreage in ESB	Approximate Percentage of ESB
Delineated Stream	Areas with a defined bed and bank, or evidence of an ordinary high water mark which lacked a dominance of upland vegetation in the channel.	2.27	2%
Delineated Wetland	Areas that satisfy wetland criteria as defined in the USACE Delineation Manual (Environmental Laboratory 1987) and regional supplements.	1.91	2%
Forested	Areas that are dominated by primarily upland forested vegetation, such as maples (<i>Acer</i> spp.), oaks (<i>Quercus</i> spp.), shagbark hickory (<i>Carya ovata</i>), black cherry (<i>Prunus serotina</i>), black walnut (<i>Juglans nigra</i>), and other upland tree species. This community may have some upland vegetation in the shrub or herbaceous strata, but the predominant vegetation is comprised of upland tree species.	39.82	34%
Grassland	Grassy areas that receive periodic mowing, maintenance, or grazing. It includes new field herbaceous areas, areas used to graze livestock, or areas used for the cultivation of hay.	1.08	1%
Impervious Surface	Areas with little to no vegetation that include road, railroad, gravel, and paved.	16.74	14%
Maintained Lawn	Areas where residential and commercial properties are present. This includes associated yards, outbuildings (garages, sheds, etc.), gardens, golf courses, and other maintained landscaped areas associated with the residential and commercial property. These landscaped areas contain frequently mowed grasses and forbs.	19.89	17%
Old Field	Areas that may have been previously cultivated but are now dominated by perennial grasses and other herbaceous plants.	16.49	14%
Scrub/Shrub	Areas that are dominated by primarily upland shrub vegetation, such as sumacs (<i>Rhus</i> spp.), raspberries (<i>Rubus</i> spp.), multiflora rose (<i>Rosa multiflora</i>), apple or crabapples (<i>Malus</i> spp.), hawthorns (<i>Crataegus</i> spp.), saplings of trees identified in upland forested species description, and other upland shrub species. This community may have some upland vegetation in the herbaceous or tree strata, but the predominant vegetation is comprised of upland shrub species.	4.56	4%

5 Protected Species

Jacobs utilized the USFWS Information for Planning and Consultation (IPaC) to produce an official species list (Table 5, Appendix H). Jacobs requested a federal-species review from USFWS and received a response on August 13, 2026 (Appendix H). The USFWS confirmed that the Project area lies within the range of three federally listed species, Indiana bat (*Myotis sodalis*), northern long-eared bat (*Myotis septentrionalis*), and tri colored bat (*Perimyotis subflavus*) (USFWS, 2026; Table 5). USFWS also provided recommendations for the monarch butterfly (*Danaus Plexippus*) and bald eagle (*Haliaeetus leucocephalus*). In addition, Jacobs also requested information on state-listed species from Ohio Department of Natural Resources (ODNR) on July 24, 2026; and their response was received on August 18, 2026 (Appendix H) indicating that the Project is within range of 24 federal and state threatened or endangered species (Table 5)..

ODNR indicated that the Project is within range of four state-listed bat species. ODNR commented that the Project is within the vicinity of records for the northern long-eared bat, the little brown bat and the tricolored bat. Because presence of state endangered bat species has been established in the area, summer tree cutting is not recommended, and additional summer surveys would not constitute presence/absence in the area. However, limited summer tree cutting inside this buffer may be acceptable after further consultation with DOW. If trees must be cut, ODNR-DOW recommends only cutting from October 1 to March 31 and conserving trees with loose, shaggy bark; with crevices, holes, or cavities; or with a diameter at breast height (DBH) greater than or equal to 20 inches. ODNR also recommended that a desktop habitat assessment, followed by a field assessment if needed, be conducted to determine if there are potential hibernaculum(a) present within the Project area.

During the field surveys conducted by Jacobs, no evidence of potential hibernaculum consisting of caves, rock outcrops, mines, cliffs, or karst features were observed. In addition to the field surveys, USFWS and ODNR did not identify any known bat hibernaculum or records of federal or state listed bats within a one-mile radius of the Project.

Jacobs' biologists also followed methodology provided in Appendix H of the USFWS "Range-wide Indiana Bat Survey Guidelines" document to conduct a desktop hibernaculum assessment. Review of the USGS Piketon, Ohio 7.5-minute topographic map indicated that there are no karst features within 5 miles of the Project area. According to the ODNR Division of Mineral Resources data, several active and inactive surface mines are located within 5 miles of the Project area. These mines were identified as sand and gravel surface mines located west of U.S. Route 23 near the Scioto River, and one inactive clay surface mine located north of State Route 32. According to the ODNR Mines of Ohio Viewer, no caves or abandoned mines are located within 5 miles of the Project area. The closest mine opening location was located approximately 6.5 miles southeast of the project and was noted with having a "mine point extent unknown". Based on the desktop habitat review, it does not appear likely that potential hibernaculum exists within 5-mile of the Project area.

According to ODNR, the Project must not have an impact on freshwater native mussels within the Project area and per the Ohio Mussel Survey Protocol (ODNR-DOW, 2020), all Group 2, 3, and 4 streams require mussel surveys. Because no in-water work is proposed in any perennial stream within the Project area, the Project is not likely to impact threatened or endangered aquatic species.

The Project is within the range of timber rattlesnake, eastern spadefoot toad, and midland mud salamander. ODNR states that due to the location, type of habitat within the project area, and type of work proposed, the Project is not likely to impact these species.

ODNR also commented that the Project is within the range of the eastern harvest mouse. Potentially suitable habitat (maintained ROW) will be preserved, and expanded, by the proposed Project. No impacts to this species' habitat are anticipated.

A summary of the state and federally listed species is provided below in Table 5.1.

Table 5.1 Protected Species Summary

Monza-Don Marquis 345 kV Transmission Line Project

Common Name (<i>Scientific Name</i>)	State Listed Status	Federal Listed Status	Typical Habitat*	Habitat Observed	Avoidance Dates*	Agency Comment*	Potential Impacts
Indiana bat (<i>Myotis sodalis</i>)	E	E	A wide variety of forested/wooded habitats. Hibernates in caves and mines; Maternity and foraging habitat = small stream corridors with well-developed riparian woods and upland forests.	Yes – wooded areas may provide potentially suitable habitat	April 1 to September 30	USFWS: Recommend avoiding tree removal whenever possible. Remove trees between Oct 1 and Mar 31. ODNR: conserve trees with loose, shaggy bark and/or dbh $\geq 20''$; seasonal cutting for other trees; desktop habitat assessment recommended	Agency guidelines on tree clearing will be followed, therefore no impacts to this species are anticipated.
Northern long-eared bat (<i>Myotis septentrionalis</i>)	E	E	A wide variety of forested/ wooded habitats, plus roosting in human-made structures	Yes – wooded areas may provide potentially suitable habitat	April 1 to September 30	USFWS: Recommend avoiding tree removal whenever possible. Remove trees between Oct 1 and Mar 31. ODNR: project is within the vicinity of records for this species. Summer tree cutting is not recommended. Conserve trees with loose, shaggy bark and/or dbh $\geq 20''$; seasonal cutting for other trees; desktop habitat assessment recommended	Agency guidelines on tree clearing will be followed, therefore no impacts to this species are anticipated.
Tricolored bat (<i>Perimyotis subflavus</i>)	E	PE	Trees with loose bark and cavities during spring and summer	Yes – wooded areas may provide potentially suitable habitat	April 1 to September 30	USFWS: Recommend avoiding tree removal whenever possible. Remove trees between Oct 1 and Mar 31. ODNR: project is within the vicinity of records for this species. Summer tree cutting is not recommended. Conserve trees with loose, shaggy bark and/or dbh $\geq 20''$; seasonal cutting for other trees; desktop habitat assessment recommended	Agency guidelines on tree clearing will be followed, therefore no impacts to this species are anticipated.

Table 5.1 Protected Species Summary*Monza-Don Marquis 345 kV Transmission Line Project*

Common Name (Scientific Name)	State Listed Status	Federal Listed Status	Typical Habitat*	Habitat Observed	Avoidance Dates*	Agency Comment*	Potential Impacts
Little brown bat (<i>Myotis lucifugus</i>)	E	NA	Hibernates in caves and mines; swarms in surrounding wooded areas in autumn. During late spring and summer, roosts and forages in upland forests.	Yes--wooded areas were identified which appear to be potentially suitable habitat	April 1 to September 30	USFWS: None ODNR: conserve trees with loose, shaggy bark and/or dbh $\geq 20"$; seasonal cutting for other trees; desktop habitat assessment recommended.	Agency guidelines on tree clearing will be followed, therefore no impacts to this species are anticipated
Clubshell (<i>Pleurobema clava</i>)	E	E	Small to medium rivers and streams; sand and gravel in riffle/runs ¹	Yes – perennial streams may provide potentially suitable habitat	No in-water work in perennial streams from March 15 through June 30	USFWS: None ODNR: Due to the location, and that there is no in-water work proposed in a perennial stream of sufficient size, this project is not likely to impact these species.	No in-water work is proposed in a perennial stream. No impacts to mussel species and their habitat are anticipated.
Northern riffleshell (<i>Epioblasma rangiana</i>)	E	E	Highly oxygenated riffle areas of smaller streams ¹	Yes – perennial streams may provide potentially suitable habitat	No in-water work in perennial streams from March 15 through June 30	USFWS: None ODNR: Due to the location, and that there is no in-water work proposed in a perennial stream of sufficient size, this project is not likely to impact these species.	No in-water work is proposed in a perennial stream. No impacts to mussel species and their habitat are anticipated.
Rayed bean (<i>Villosa fabalis</i>)	E	E	Small headwater creeks to larger rivers; gravel and sand; often associated with vegetation ¹	Yes – perennial streams may provide potentially suitable habitat	No in-water work in perennial streams from March 15 through June 30	USFWS: None ODNR: Due to the location, and that there is no in-water work proposed in a perennial stream of sufficient size, this project is not likely to impact these species.	No in-water work is proposed in a perennial stream. No impacts to mussel species and their habitat are anticipated.
Salamander mussel (<i>Simpsonaias ambigua</i>)	NA	PE	Under large, flat stones in swift current of medium to large rivers, streams, and creeks, on a variety of substrates ¹	Yes – perennial streams may provide potentially suitable habitat	N/A	None	No in-water work is proposed in a perennial stream. No impacts to mussel species and their habitat are anticipated.
Various Fish Species	E, T,	NA	Perennial streams	Yes-Perennial stream may provide potentially suitable habitat	No in-water work in perennial streams from March 15 through June 30	USFWS: None ODNR: Due to the location, and that there is no in-water work proposed in a perennial stream of sufficient size, this project is not likely to impact these species.	No in-water work is proposed in a perennial stream. No impacts to fish species and their habitat are anticipated.

Table 5.1 Protected Species Summary*Monza-Don Marquis 345 kV Transmission Line Project*

Common Name (Scientific Name)	State Listed Status	Federal Listed Status	Typical Habitat*	Habitat Observed	Avoidance Dates*	Agency Comment*	Potential Impacts
Ohio Pigtoe (<i>Pleurobema cordatum</i>)	E	NA	Inhabits large rivers but may be found in medium-sized rivers. Found in or immediately above riffles in heterogenous assemblages of gravel, cobble, and boulder.	No- potentially suitable habitat for this species was not observed	No in-water work in perennial streams from March 15 through June 30	USFWS: None ODNR: Due to the location, and that there is no in-water work proposed in a perennial stream of sufficient size, this project is not likely to impact these species.	No in-water work is proposed in a perennial stream. No impacts to mussel species and their habitat are anticipated.
Washboard (<i>Megaloniais nervosa</i>)	E	NA	Found in large rivers and in some instances, medium-sized and even small rivers in areas with a slow current with muddy to coarse gravel substrates.	No- potentially suitable habitat for this species was not observed	No in-water work in perennial streams from March 15 through June 30	USFWS: None ODNR: Due to the location, and that there is no in-water work proposed in a perennial stream of sufficient size, this project is not likely to impact these species.	No in-water work is proposed in a perennial stream. No impacts to mussel species and their habitat are anticipated.
Yellow sandshell (<i>Lampsilis teres</i>)	E	NA	Inhabits medium-sized creeks to large rivers, often in slower current areas in sandy substrates.	No- potentially suitable habitat for this species was not observed	No in-water work in perennial streams from March 15 through June 30	USFWS: None ODNR: Due to the location, and that there is no in-water work proposed in a perennial stream of sufficient size, this project is not likely to impact these species.	No in-water work is proposed in a perennial stream. No impacts to mussel species and their habitat are anticipated.
Timber rattlesnake (<i>Crotalus horridus</i>)	E	SC	Woodland species. In addition to using wooded areas, also utilizes sunlit gaps in the canopy for basking and deep rock crevices (den sites) for overwintering.	Potentially suitable habitat for this species is not likely to be present	N/A	USFWS: None ODNR: Due to the location, the type of habitat within the project area, and the type of work proposed, this project is not likely to impact this species	No impacts to this species and its habitat are anticipated.
Eastern spadefoot toad (<i>Scaphiopus holbrookii</i>)	E	NA	Found in areas of sandy soils associated with river valleys. Breeding habitats may include flooded agricultural fields or other water holding depressions.	No-potentially suitable habitat for this species was not observed	N/A	USFWS: None ODNR: Due to the location, the type of habitat within the project area, and the type of work proposed, this project is not likely to impact this species	No impacts to this species and its habitat are anticipated.
Midland mud salamander (<i>Pseudotriton</i>)	T	NA	This species is typically found in streams, seeps and swamps and	Yes-limited number of streams and wetlands were	N/A	USFWS: None ODNR: Due to the location, the type of habitat within the project area,	No impacts to this species and its habitat are anticipated.

Table 5.1 Protected Species Summary*Monza-Don Marquis 345 kV Transmission Line Project*

Common Name (<i>Scientific Name</i>)	State Listed Status	Federal Listed Status	Typical Habitat*	Habitat Observed	Avoidance Dates*	Agency Comment*	Potential Impacts
<i>montanus diastictus</i>)			underneath logs, rocks and leaves	identified which may be potentially suitable habitat		and the type of work proposed, this project is not likely to impact this species	
Eastern harvest mouse (<i>Reithrodontomys humulis</i>)	T	NA	Found in old fields, marshes, and wet meadows. Climbs among herbaceous vegetation.	Yes- early successional habitats in the form of maintained ROW were identified within the ESB.	N/A	USFWS: none ODNR-DOW: recommends that early successional habitats be preserved where possible. If early successional habitats won't be impacted, this project is not likely to impact this species.	Potentially suitable habitat (maintained ROW) will be preserved, and expanded, by the proposed Project. No impacts to this species' habitat are anticipated.
Monarch butterfly (<i>Danaus plexippus</i>)	NA	PT	Milkweed (caterpillars) and other nectar-producing plants (adults) ¹	Yes – milkweed was observed with adult monarchs present	March 15 to October 31	USFWS: revegetate disturbed areas with native plants, limit mowing monarch habitat Mar 15 to Oct 31, avoid pesticide and herbicide use	Agency recommendations on mowing, revegetating, and pesticide use will be followed, therefore no impacts to this species are anticipated.

E = Endangered; T = Threatened; PE = potentially endangered; PT = potentially threatened

* Source: Appendix H unless otherwise noted

¹ NatureServe 2026

6 Conclusion

Jacobs conducted environmental surveys of AEP's Monza-Don Marquis 345 kV Transmission Line Project on July 14-16 and 23, 2026. A total of 13 wetlands, 13 streams, and two ponds were delineated within the ESB. The 13 wetlands, totaling 1.91 acres within the ESB, included ten PEM wetlands, two PFO wetlands, and one PAB wetland. Of the 13 wetlands, eleven were identified as Category 1 wetlands and two were identified as Category 2 wetlands. No category 3 wetlands were identified within the ESB.

The 13 streams, totaling 7,789 linear feet, included two perennial streams, one intermittent stream, and ten ephemeral streams. The two ponds totaled 0.18 acres within the ESB. Jacobs defaults to the USACE and OEPA for the final determination of hydrologic connectivity and jurisdiction. Further coordination is recommended prior to the submittal of any permit or impacts due to construction activities.

The results of the wetland and waterbody survey described in this report conducted by Jacobs are limited to what was identified within the ESB, as depicted in Figure 3. The information contained in this ecological survey report is for a study area that may be much larger than the actual Project limits-of-disturbance for construction; therefore, lengths and acreages listed in this report may likely not constitute the actual impacts of the Project at the time of construction. If permits are determined to be necessary, actual impacted lengths and/or acreages will be submitted in subsequent permit applications.

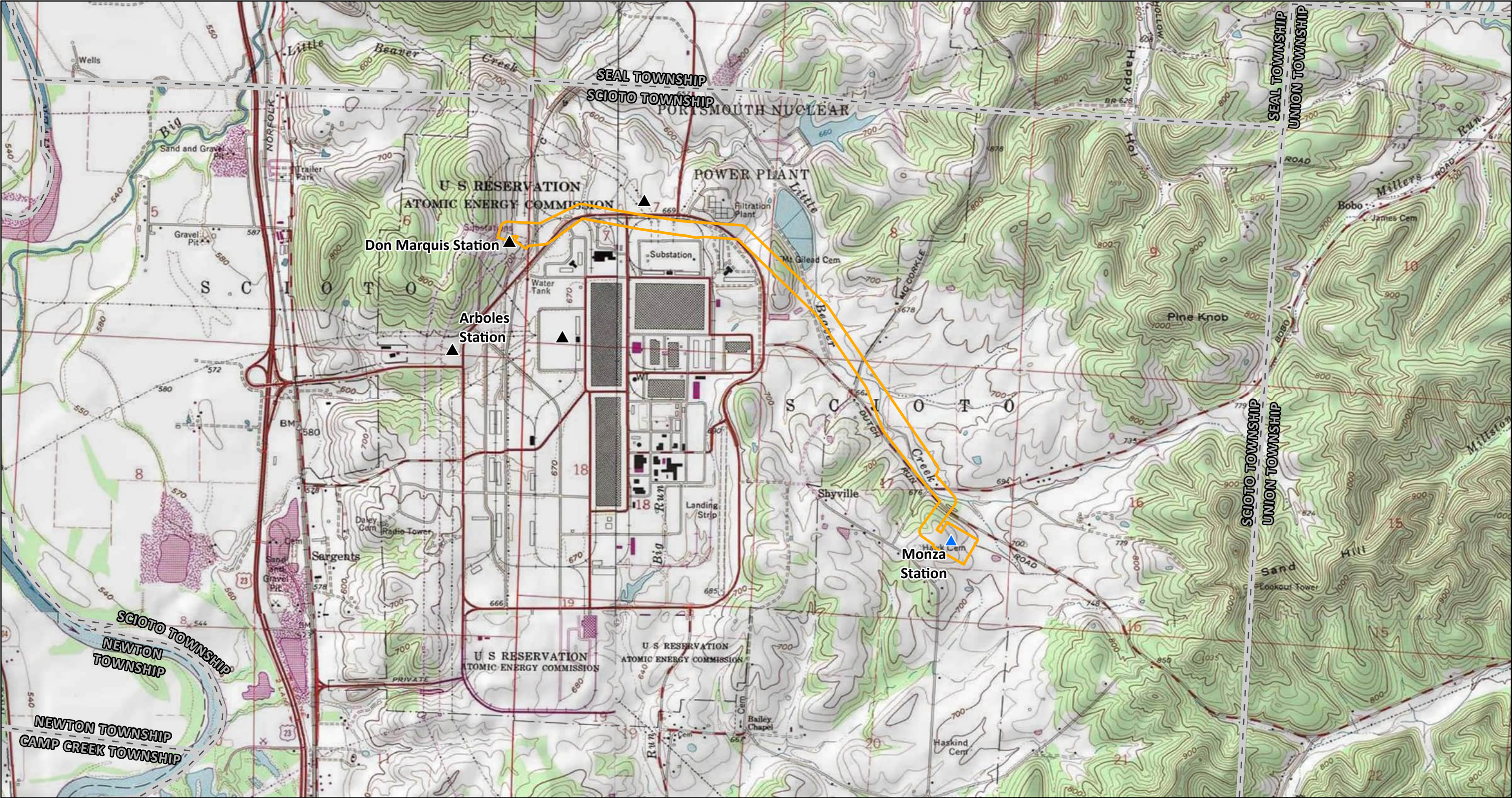
The wetland and waterbodies delineation survey results presented within this report apply to the site conditions at the time of our assessment. Changes within the ESB that may occur with time due to natural processes or human impacts at the project site or on adjacent properties, could invalidate the findings of this report, especially if Jacobs is unaware and has not had the opportunity to revisit the ESB. Additionally, changes in applicable standards and regulations may also occur as a result of legislation or the expansion of scientific research over time. Therefore, the findings of this wetland and waterbodies delineation report may be invalidated, wholly or in part, by changes that are beyond the control of Jacobs.

7 References

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Appendix A

Figures



▲

Proposed Station

▲

Existing Station

Environmental Survey Boundary

Township Boundary

BASE MAP SOURCES:
USGS Topographic

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:24,000

N

August 13, 2026

OHIO

Pike County

FIGURE 1
OVERVIEW MAP

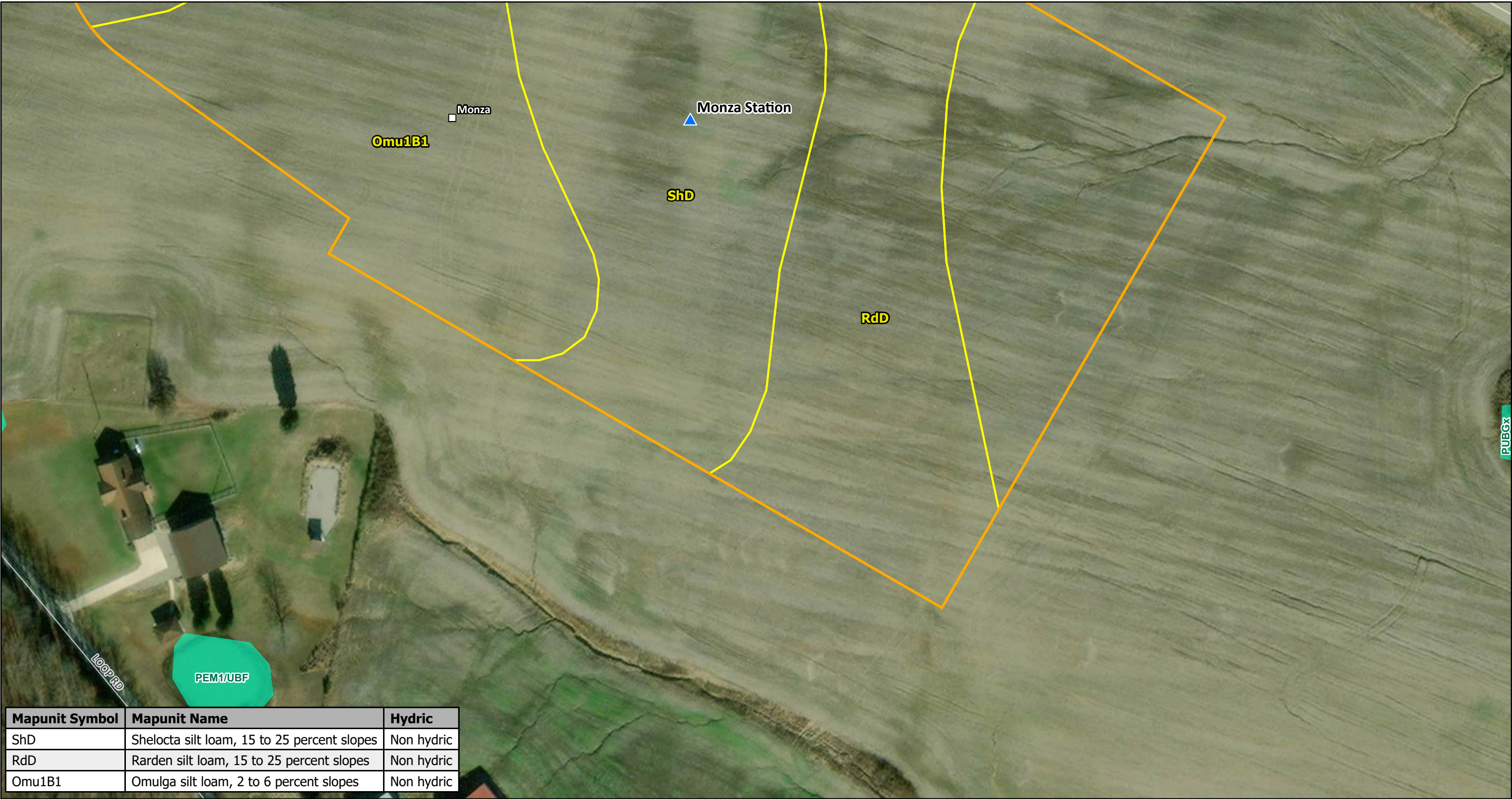
AMERICAN
ELECTRIC
POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

02,0004,000

Feet

\\p01n01gsp01\GIS\Monza_DonMarquis_Schematic\MapNetwork_Figures.aprx



Mapunit Symbol	Mapunit Name	Hydric
ShD	Shelocta silt loam, 15 to 25 percent slopes	Non hydric
RdD	Rarden silt loam, 15 to 25 percent slopes	Non hydric
Omu1B1	Omurga silt loam, 2 to 6 percent slopes	Non hydric

Legend

□

Proposed Structure

▲

Proposed Station

▲

Existing Station

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Existing Transmission Line

□

Environmental Survey Boundary

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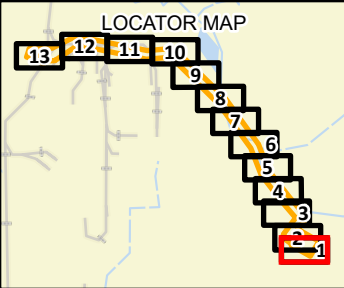
NHD Stream

■

NWI Wetland

□

Soil Map Unit



MAP SHEET
1 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026



FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

AMERICAN
ELECTRIC
POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet

Note: No FEMA floodplain features are present within the map area



Mapunit Symbol	Mapunit Name	Hydric
ShD	Shelocta silt loam, 15 to 25 percent slopes	Non hydric
RdD	Rarden silt loam, 15 to 25 percent slopes	Non hydric
Omu1B1	Omurga silt loam, 2 to 6 percent slopes	Non hydric

Legend

□

Proposed Structure

▲

Proposed Station

▲

Existing Station

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Existing Transmission Line

□

Environmental Survey Boundary

—

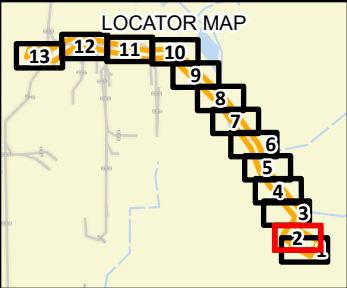
NHD Stream

■

NWI Wetland

□

Soil Map Unit



MAP SHEET
2 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026



FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

AMERICAN
ELECTRIC
POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet

Note: No FEMA floodplain features are present within the map area



Mapunit Symbol	Mapunit Name	Hydric
Wm	Wilbur silt loam, occasionally flooded	Predominantly non hydric
ShD	Shelocta silt loam, 15 to 25 percent slopes	Non hydric
RdD	Rarden silt loam, 15 to 25 percent slopes	Non hydric

Legend

- Proposed Structure

▲

 Existing Station
- Existing Transmission Line

□

 Environmental Survey Boundary
- NHD Stream

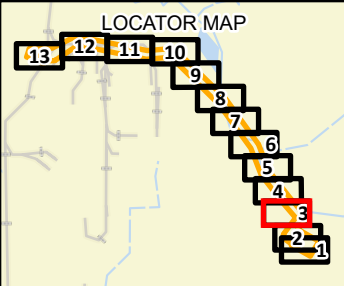
■

 NWI Wetland

□

 Soil Map Unit

Note: No FEMA floodplain features are present within the map area



MAP SHEET
3 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026



FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

AMERICAN
ELECTRIC
POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0 100 200

Feet



Mapunit Symbol	Mapunit Name	Hydric
Wm	Wilbur silt loam, occasionally flooded	Predominantly non hydric
RdD	Rarden silt loam, 15 to 25 percent slopes	Non hydric
Omu1B1	Omurga silt loam, 2 to 6 percent slopes	Non hydric
Omu1C1	Omurga silt loam, 6 to 12 percent slopes	Non hydric

Legend

□ Proposed Structure

▲ Existing Station

— Existing Transmission Line

Environmental Survey Boundary

— NHD Stream

NWI Wetland

Soil Map Unit

MAP SHEET
4 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026

FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

AMERICAN
ELECTRIC
POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet

Note: No FEMA floodplain features are present within the map area



Mapunit Symbol	Mapunit Name	Hydric
UoA	Urbanland-Omulga complex, 0 to 6 percent slopes	Non hydric
Wm	Wilbur silt loam, occasionally flooded	Predominantly non hydric
RdD	Rarden silt loam, 15 to 25 percent slopes	Non hydric
Omu1B1	Omulga silt loam, 2 to 6 percent slopes	Non hydric

Legend

- Proposed Structure

▲

Existing Station
- Existing Transmission Line

□

Environmental Survey Boundary
- NHD Stream

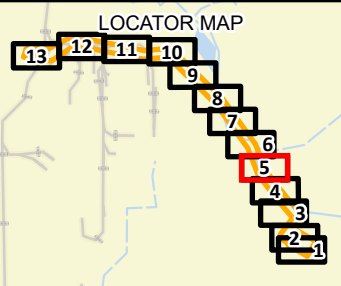
■

NWI Wetland

□

Soil Map Unit

Note: No FEMA floodplain features are present within the map area



MAP SHEET
5 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026



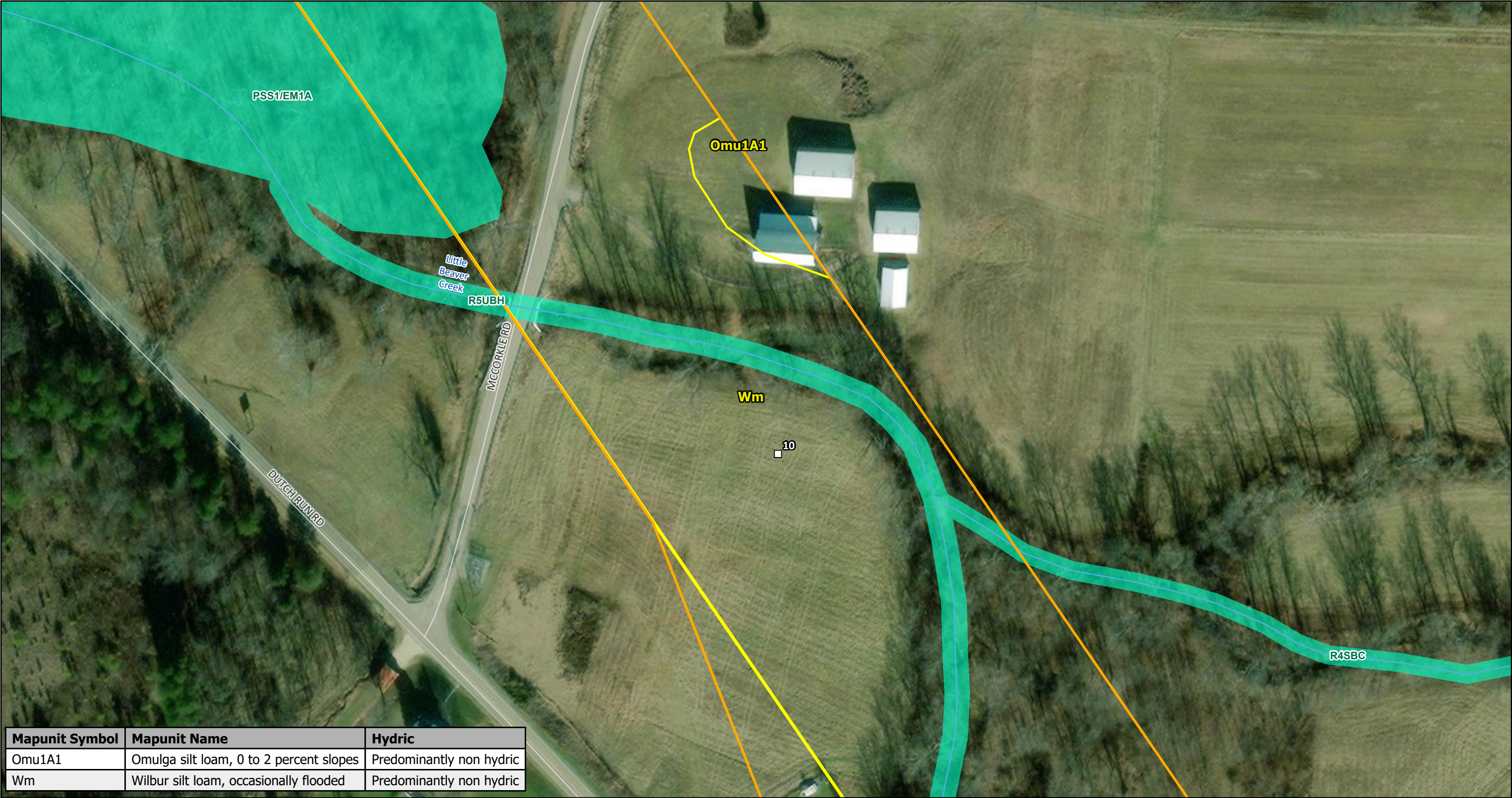
FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

AMERICAN
ELECTRIC
POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet



Mapunit Symbol	Mapunit Name	Hydric
Omu1A1	Omurga silt loam, 0 to 2 percent slopes	Predominantly non hydric
Wm	Wilbur silt loam, occasionally flooded	Predominantly non hydric

Legend

- Proposed Structure

▲

Existing Station
- Existing Transmission Line

□

Environmental Survey Boundary
- NHD Stream

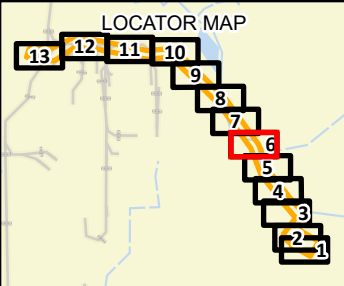
■

NWI Wetland

□

Soil Map Unit

Note: No FEMA floodplain features are present within the map area



MAP SHEET
6 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026



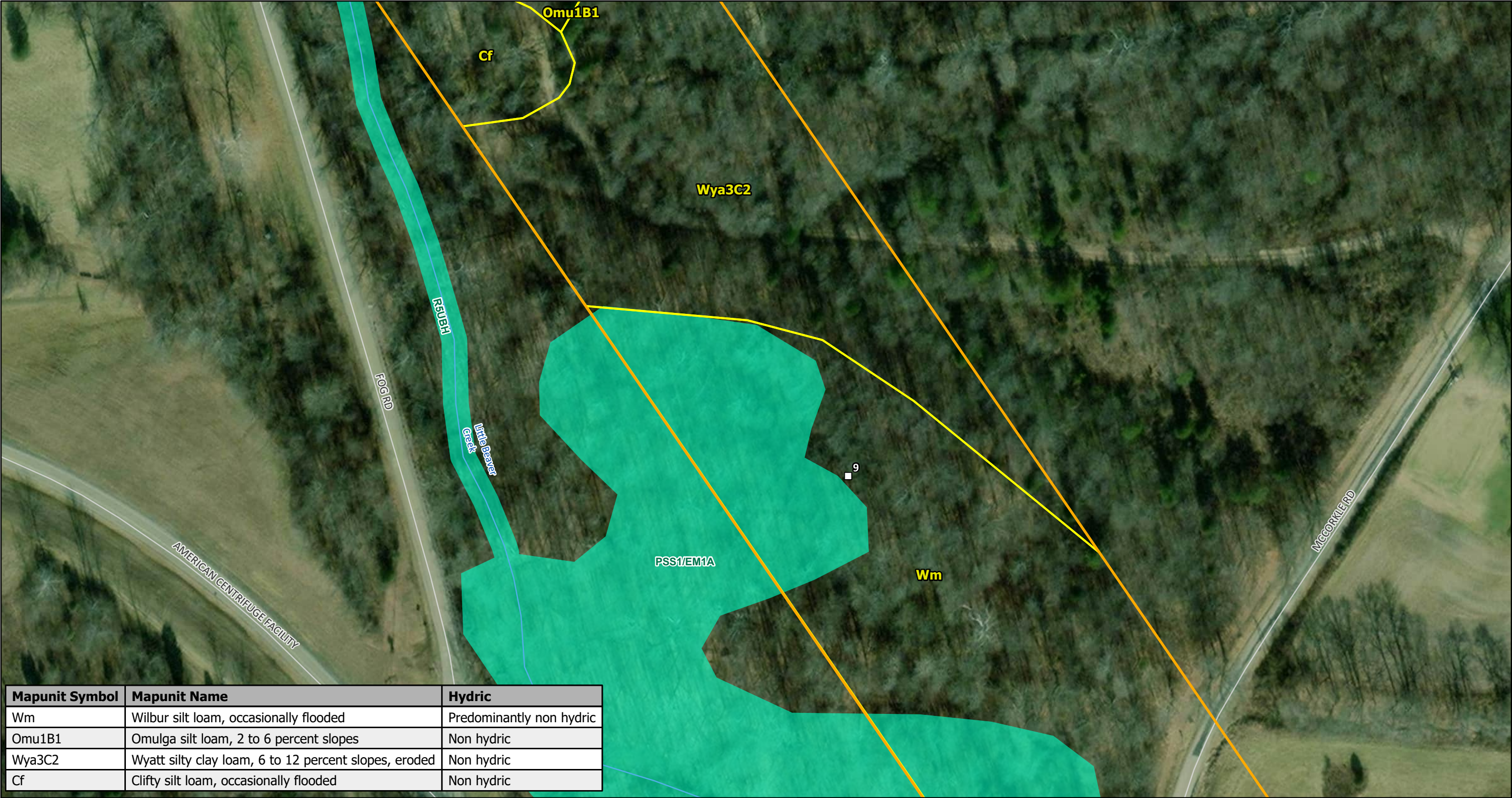
FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

AMERICAN
ELECTRIC
POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet



Mapunit Symbol	Mapunit Name	Hydric
Wm	Wilbur silt loam, occasionally flooded	Predominantly non hydric
Omu1B1	Omurga silt loam, 2 to 6 percent slopes	Non hydric
Wya3C2	Wyatt silty clay loam, 6 to 12 percent slopes, eroded	Non hydric
Cf	Clifty silt loam, occasionally flooded	Non hydric

Legend

□ Proposed Structure

▲ Existing Station

— Existing Transmission Line

▭ Environmental Survey Boundary

— NHD Stream

■ NWI Wetland

▭ Soil Map Unit

Note: No FEMA floodplain features are present within the map area

LOCATOR MAP

MAP SHEET
7 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026

Pike County

FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

AMERICAN
ELECTRIC
POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH



Mapunit Symbol	Mapunit Name	Hydric
Omu1B1	Omurga silt loam, 2 to 6 percent slopes	Non hydric
Wya3C2	Wyatt silty clay loam, 6 to 12 percent slopes, eroded	Non hydric
CoC	Coolville silt loam, 8 to 15 percent slopes	Non hydric
Cf	Clifty silt loam, occasionally flooded	Non hydric
LhW1D1	Latham-Wharton silt loams, 15 to 25 percent slopes	Non hydric

Legend

□

Proposed Structure

▲

Existing Station

—

Existing Transmission Line

Environmental Survey Boundary

—

NHD Stream

NWI Wetland

Soil Map Unit

MAP SHEET
8 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026

FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

AMERICAN
ELECTRIC
POWER

MONZA-DON MARQUIS 345 kV
TRANSMISSION LINE PROJECT
PIKE COUNTY, OH

0100200

Feet

Note: No FEMA floodplain features are present within the map area



Mapunit Symbol	Mapunit Name	Hydric
UoA	Urbanland-Omulga complex, 0 to 6 percent slopes	Non hydric
CoC	Coolville silt loam, 8 to 15 percent slopes	Non hydric
Cf	Clifty silt loam, occasionally flooded	Non hydric
LhW1D1	Latham-Wharton silt loams, 15 to 25 percent slopes	Non hydric

Legend

□

Proposed Structure

▲

Proposed Station

▲

Existing Station

—

Existing Transmission Line

Environmental Survey Boundary

—

NHD Stream

NWI Wetland

Soil Map Unit

MAP SHEET
9 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026

FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

AMERICAN
ELECTRIC
POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet

Note: No FEMA floodplain features are present within the map area



Mapunit Symbol	Mapunit Name	Hydric
UoA	Urbanland-Omulga complex, 0 to 6 percent slopes	Non hydric
LhW1D1	Latham-Wharton silt loams, 15 to 25 percent slopes	Non hydric

Legend

- Proposed Structure

▲

 Existing Station
- Existing Transmission Line

—

 Environmental Survey Boundary
- NHD Stream

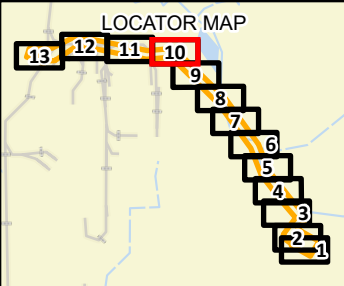
—

 NWI Wetland

—

 Soil Map Unit

Note: No FEMA floodplain features are present within the map area



MAP SHEET
10 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026

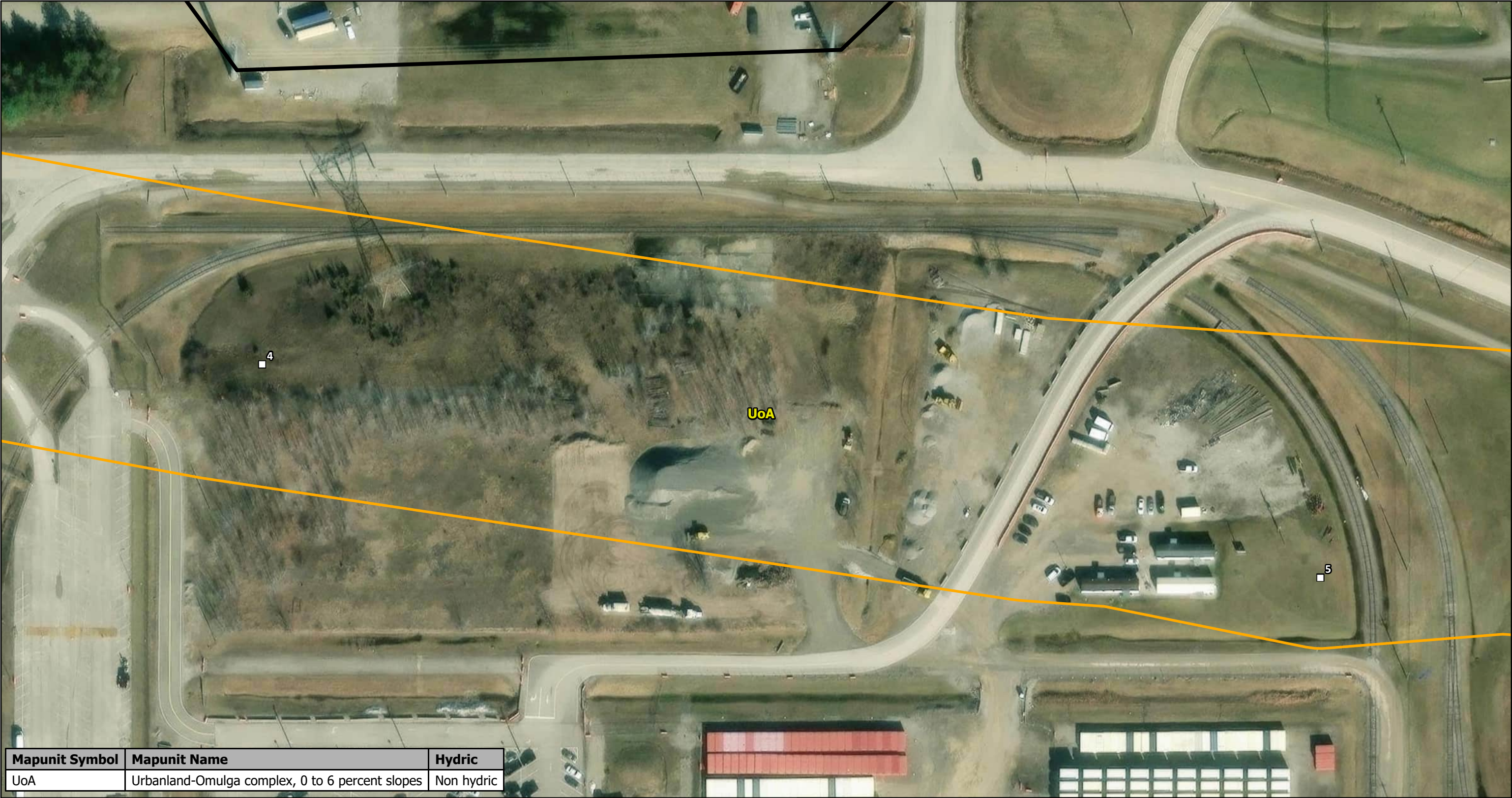


FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

 **Monza-Don Marquis 345 kV**
Transmission Line Project
Pike County, OH

0 100 200

Feet



Mapunit Symbol	Mapunit Name	Hydric
UoA	Urbanland-Omulga complex, 0 to 6 percent slopes	Non hydric

Legend

- Proposed Structure

▲

 Existing Station
- Existing Transmission Line

□

 Environmental Survey Boundary
- NHD Stream

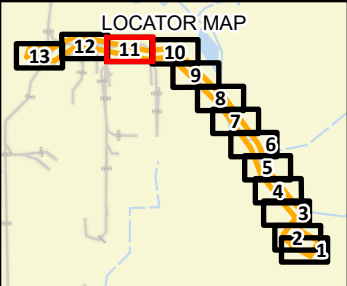
■

 NWI Wetland

□

 Soil Map Unit

Note: No FEMA floodplain features are present within the map area



MAP SHEET
11 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026



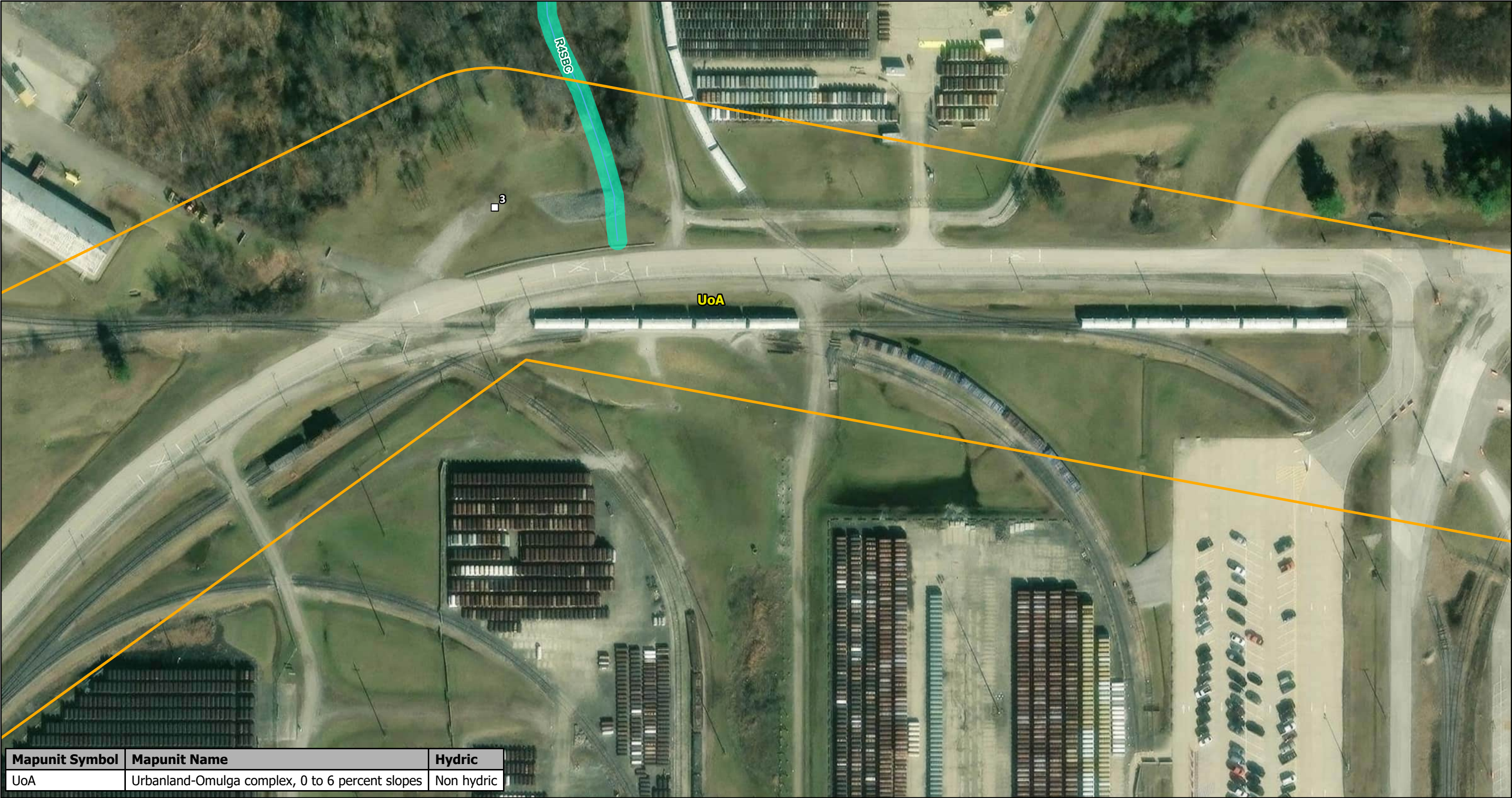
FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

**AMERICAN ELECTRIC POWER**
"BOUNDLESS ENERGY"

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet



Mapunit Symbol	Mapunit Name	Hydric
UoA	Urbanland-Omulga complex, 0 to 6 percent slopes	Non hydric

Legend

□

Proposed Structure

▲

Proposed Station

▲

Existing Station

—

Existing Transmission Line

□

Environmental Survey Boundary

—

NHD Stream

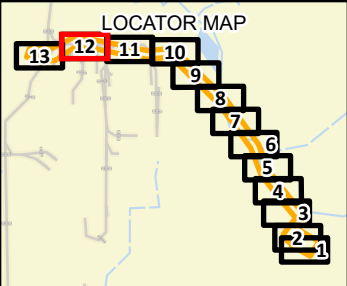
■

NWI Wetland

■

Soil Map Unit

Note: No FEMA floodplain features are present within the map area



MAP SHEET
12 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026

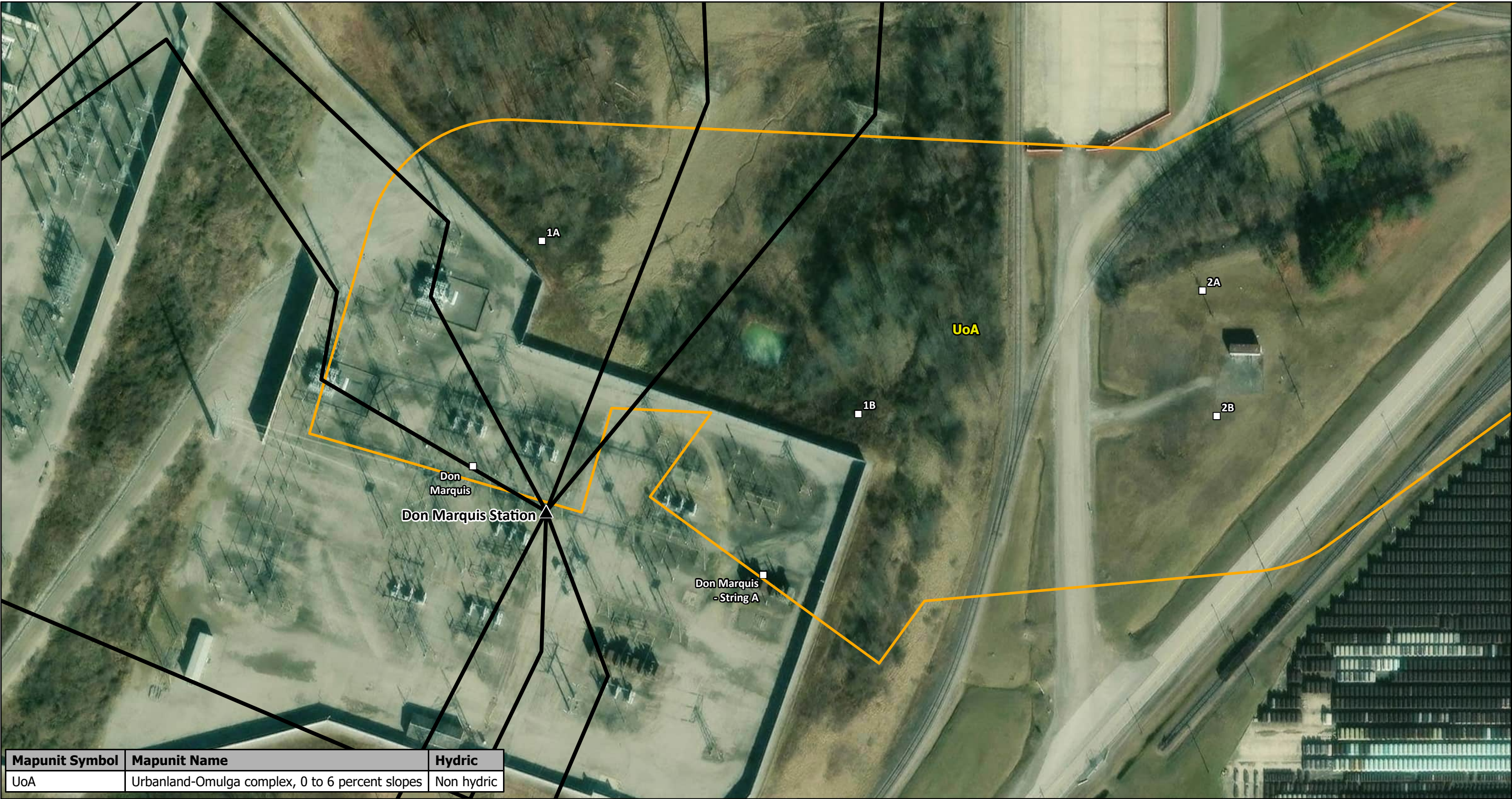


FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet



Mapunit Symbol	Mapunit Name	Hydric
UoA	Urbanland-Omulga complex, 0 to 6 percent slopes	Non hydric

Legend

□

Proposed Structure

▲

Proposed Station

▲

Existing Station

—

Existing Transmission Line

Environmental Survey Boundary

—

NHD Stream

NWI Wetland

Soil Map Unit

Note: No FEMA floodplain features are present within the map area

LOCATOR MAP

13

12

11

10

9

8

7

6

5

4

3

2

1

MAP SHEET
13 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026

Ohio

Pike County

FIGURE 2
SOILS, NHD FEATURES, NWI WETLANDS
AND FEMA FLOODPLAIN MAP

AMERICAN
ELECTRIC
POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0

100

200

Feet



Legend

□

Proposed Structure

▲

Proposed Station

□

Environmental Survey Boundary

—

Upland Drainage Feature

—

Delineated Stream

LOCATOR MAP

MAP SHEET
1 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026

**FIGURE 3
DELINEATED FEATURES MAP**

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet

\\c1rso1\gisproj\AEP\Monza_DonMarquis_Permitting\MapFiles\Work_Figures.aprx



Legend

 Proposed Structure

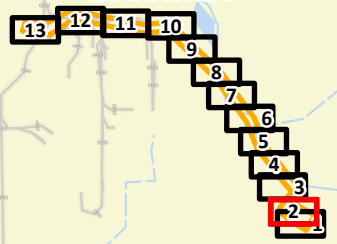
 Proposed Station

 Environmental Survey Boundary

 Upland Drainage Feature

 Delineated Stream

LOCATOR MAP



MAP SHEET
2 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026



**FIGURE 3
DELINEATED FEATURES MAP**



Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet



Legend

Proposed Structure

Environmental Survey Boundary

Existing Culvert

Upland Data Point

Wetland Data Point

Upland Drainage Feature

Delineated Stream

Delineated PEM Wetland

LOCATOR MAP

MAP SHEET
3 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026

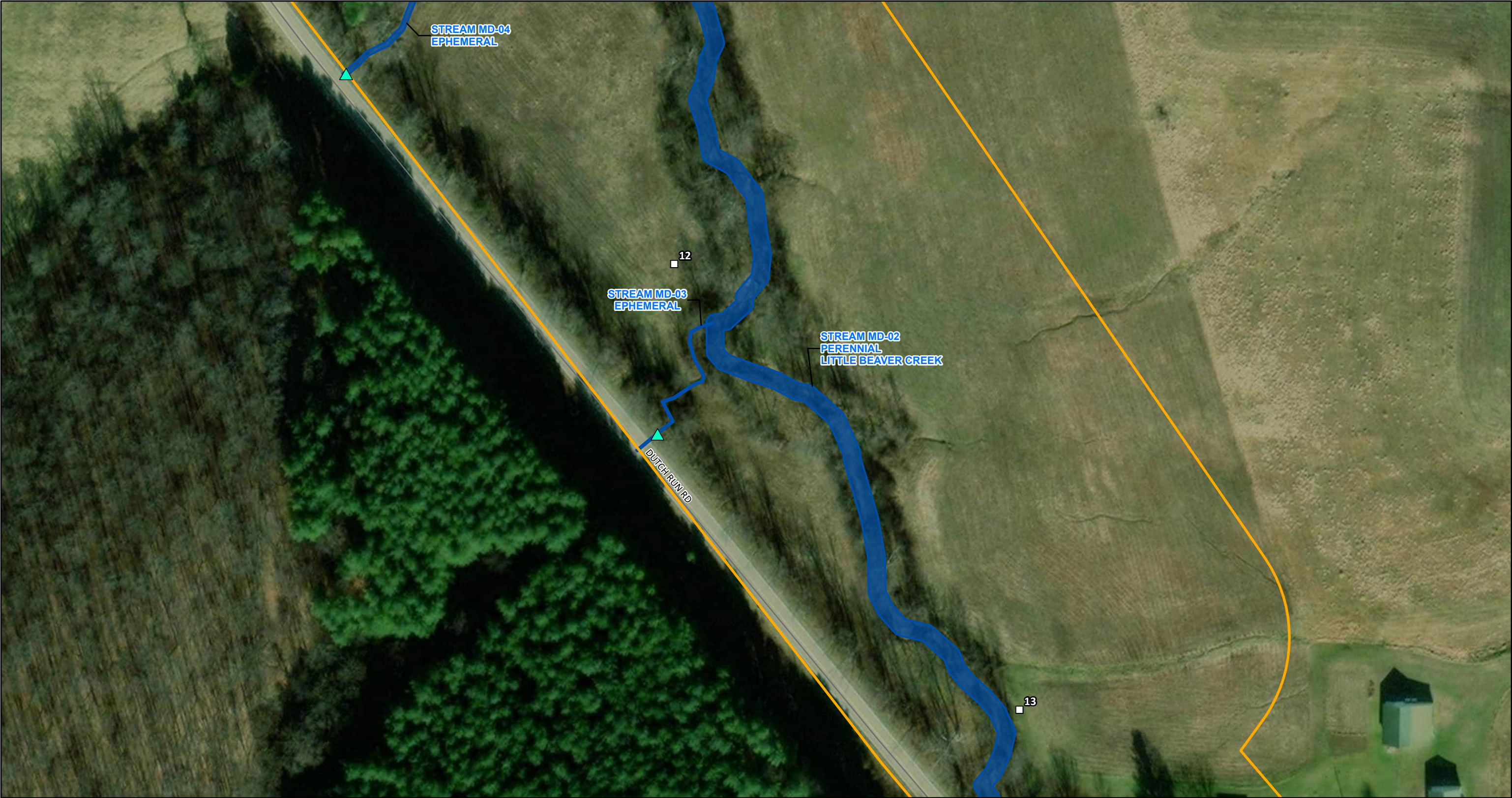
FIGURE 3
DELINEATED FEATURES MAP

AMERICAN ELECTRIC POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet



Legend

□

Proposed Structure

△

Existing Culvert

■

Delineated Stream

▭

Environmental Survey Boundary

—

Upland Drainage Feature

LOCATOR MAP

MAP SHEET
4 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

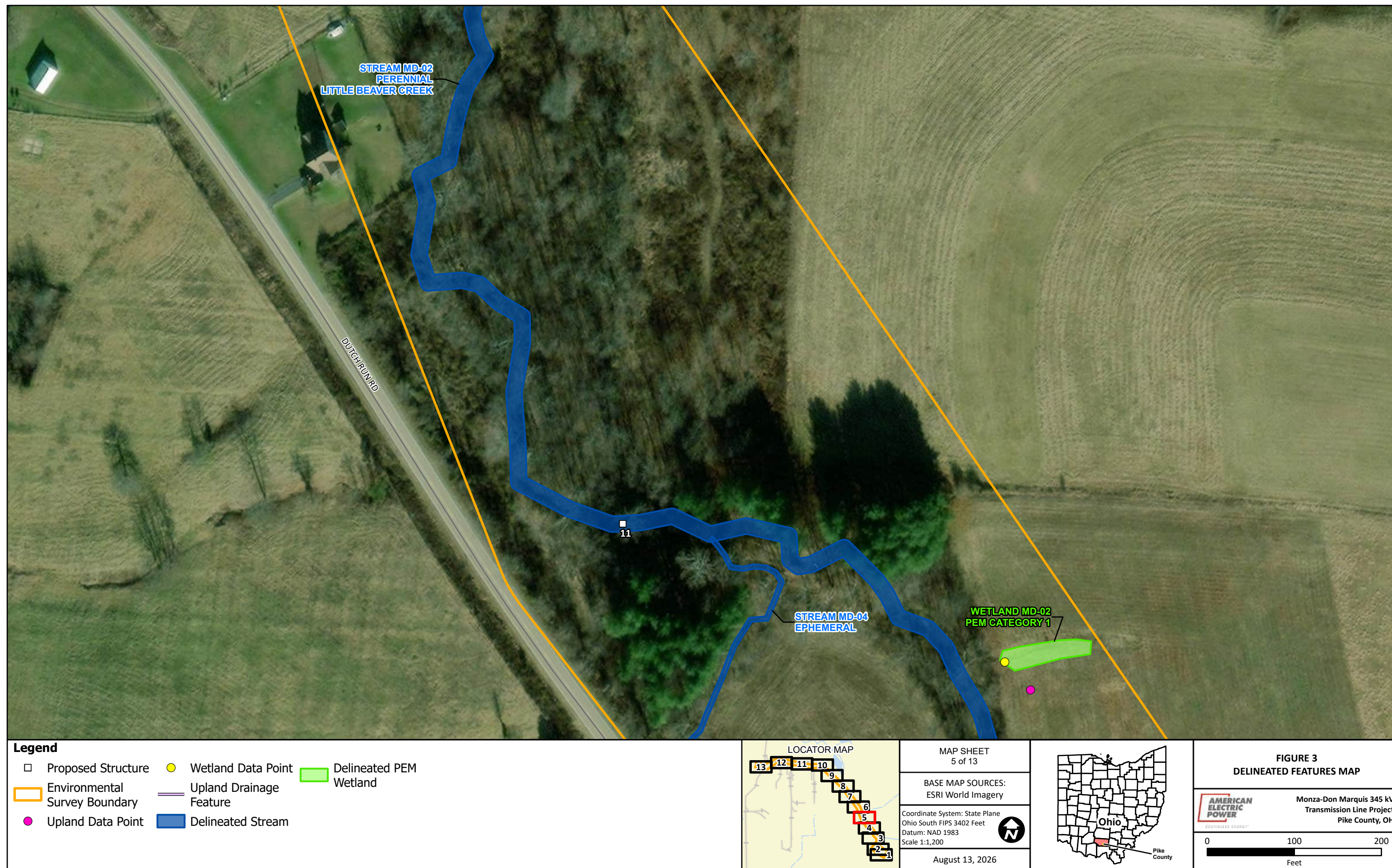
August 13, 2026

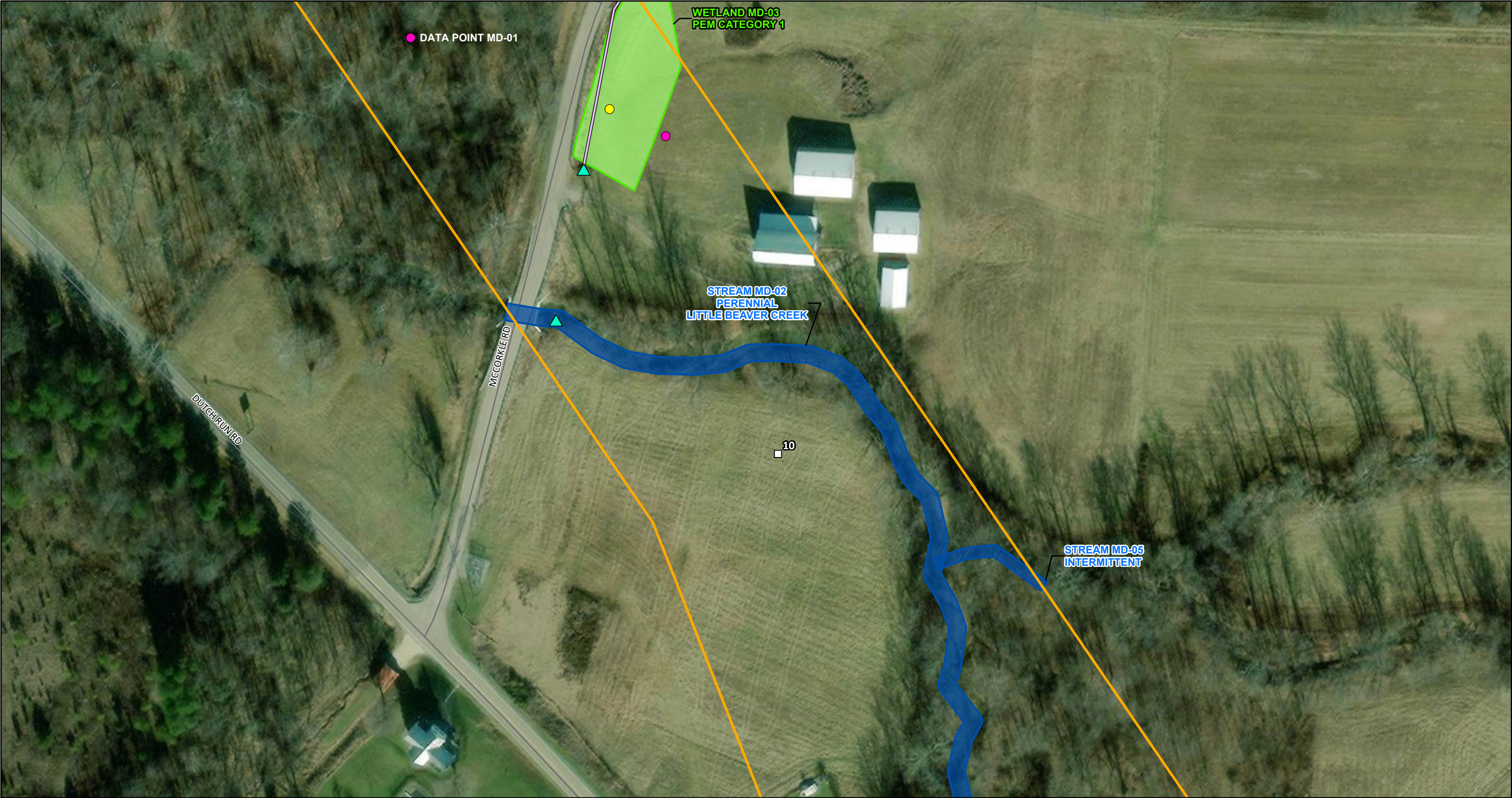
**FIGURE 3
DELINEATED FEATURES MAP**

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet





Legend		LOCATOR MAP 	MAP SHEET 6 of 13		FIGURE 3 DELINEATED FEATURES MAP
Proposed Structure	Upland Data Point		Delineated Stream		
Environmental Survey Boundary	Wetland Data Point	Delineated PEM Wetland	Coordinate System: State Plane Ohio South FIPS 3402 Feet Datum: NAD 1983 Scale 1:1,200		
Existing Culvert	Upland Drainage Feature		August 13, 2026		Monza-Don Marquis 345 kV Transmission Line Project Pike County, OH



Legend

Proposed Structure	Existing Culvert	Upland Drainage Feature	Delineated PEM Wetland
Environmental Survey Boundary	Upland Data Point	Delineated Stream	Delineated PFO Wetland
	Wetland Data Point		

LOCATOR MAP

MAP SHEET
8 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026

Ohio

Pike County

**FIGURE 3
DELINEATED FEATURES MAP**

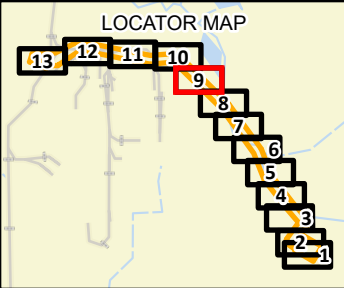
AMERICAN ELECTRIC POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0 100 200
Feet



- Legend**
- Proposed Structure
 - Environmental Survey Boundary
 - Upland Drainage Feature
 - Delineated Stream



MAP SHEET
9 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026



**FIGURE 3
DELINEATED FEATURES MAP**

**AMERICAN
ELECTRIC
POWER**

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0 100 200
Feet



Legend

□ Proposed Structure	▲ Existing Culvert	— Upland Drainage Feature	■ Delineated PEM Wetland
▭ Environmental Survey Boundary	● Upland Data Point	▬ Delineated Stream	■ Delineated Pond
	● Wetland Data Point		

LOCATOR MAP

MAP SHEET
10 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026

**FIGURE 3
DELINEATED FEATURES MAP**

AMERICAN ELECTRIC POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0 100 200
Feet



Legend

Proposed Structure

Existing Transmission Line

Environmental Survey Boundary

Wetland Data Point

Upland Drainage Feature

Delineated Stream

Delineated PEM Wetland

LOCATOR MAP

MAP SHEET
11 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

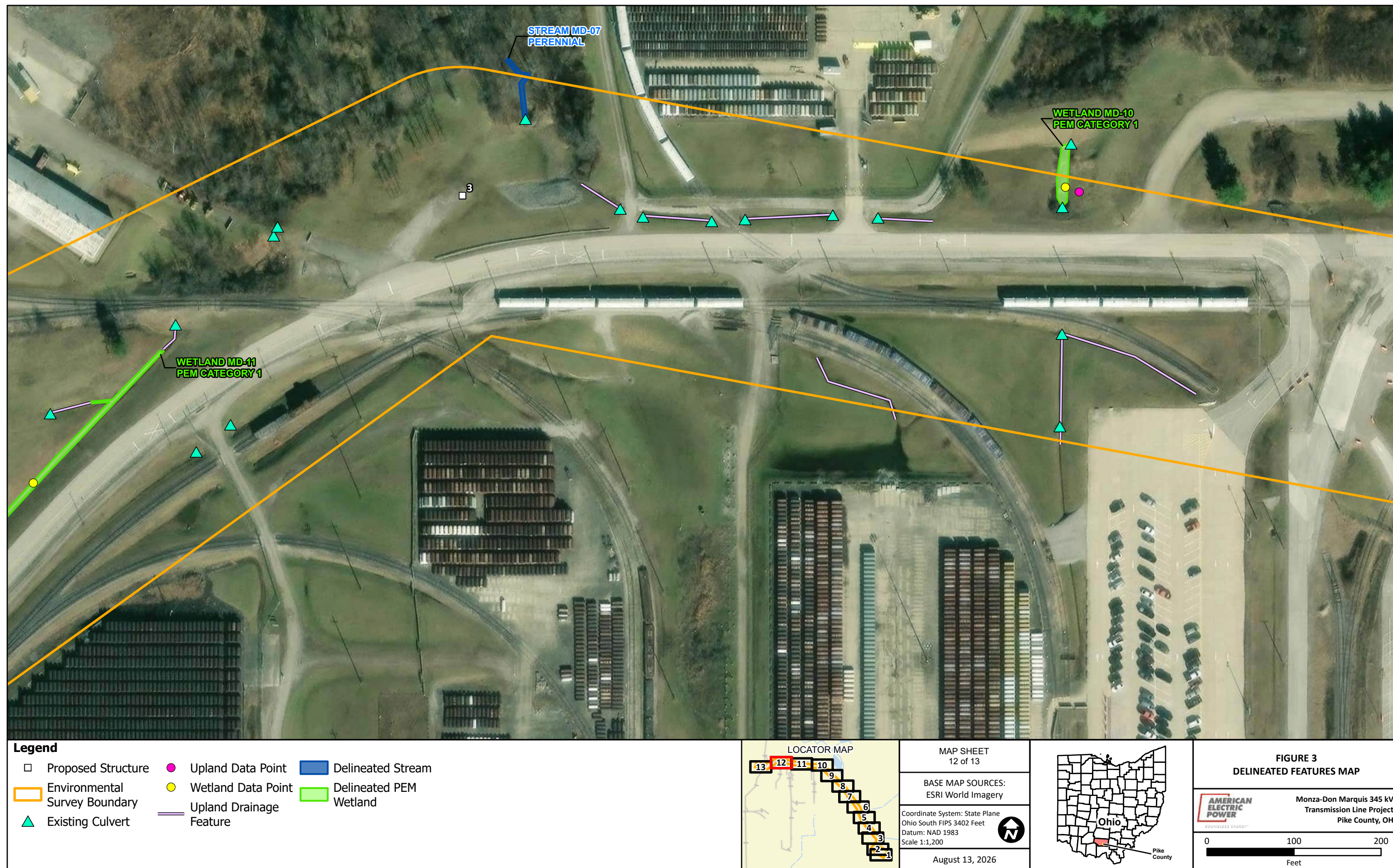
August 13, 2026

**FIGURE 3
DELINEATED FEATURES MAP**

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet





Legend

□ Proposed Structure	Environmental Survey Boundary	● Wetland Data Point	▭ Delineated PEM Wetland
▲ Existing Station	Existing Culvert	— Upland Drainage Feature	▭ Delineated PAB Wetland
— Existing Transmission Line	● Upland Data Point	▬ Delineated Stream	▭ Delineated Pond

LOCATOR MAP

MAP SHEET 13 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026

Ohio

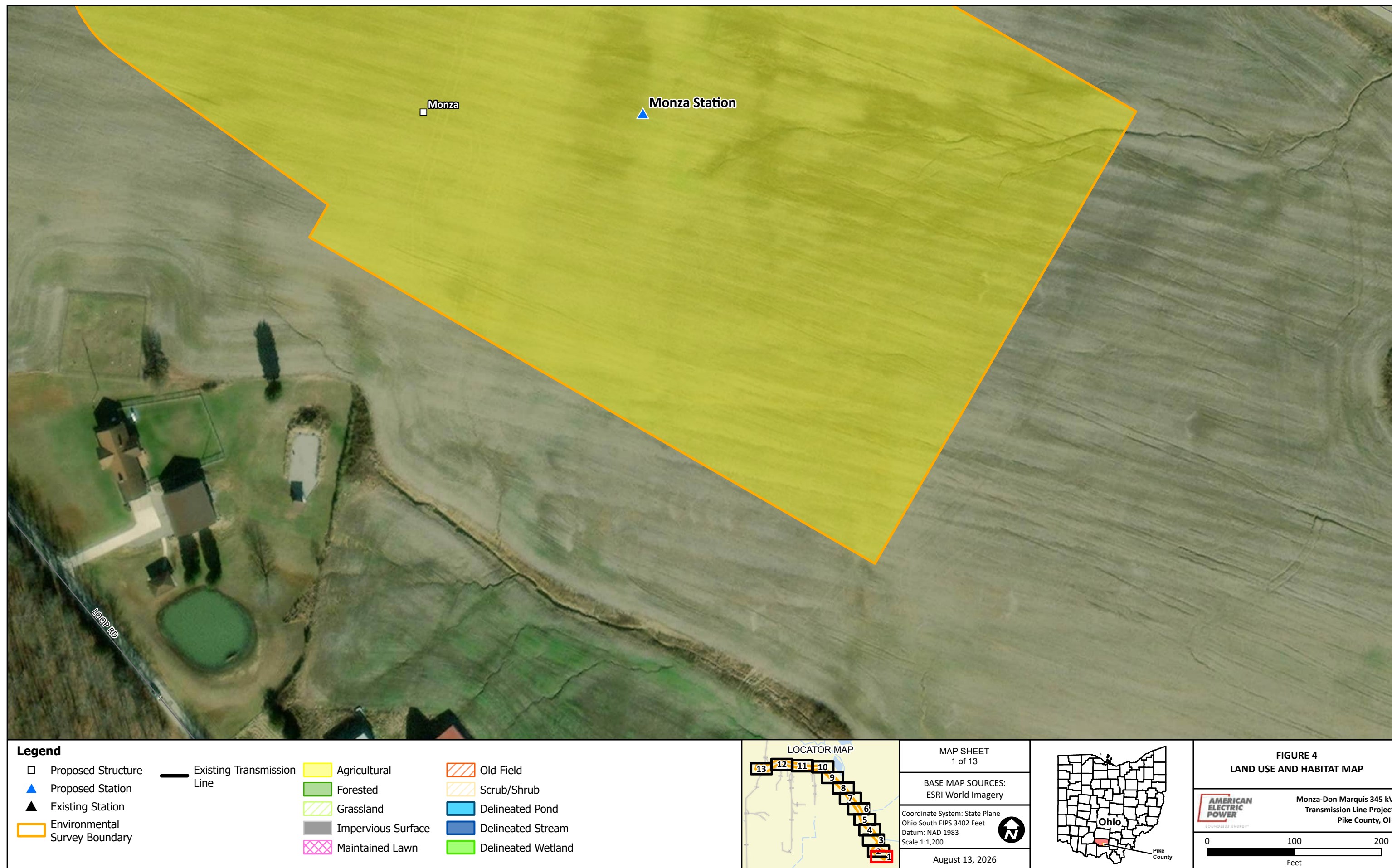
Pike County

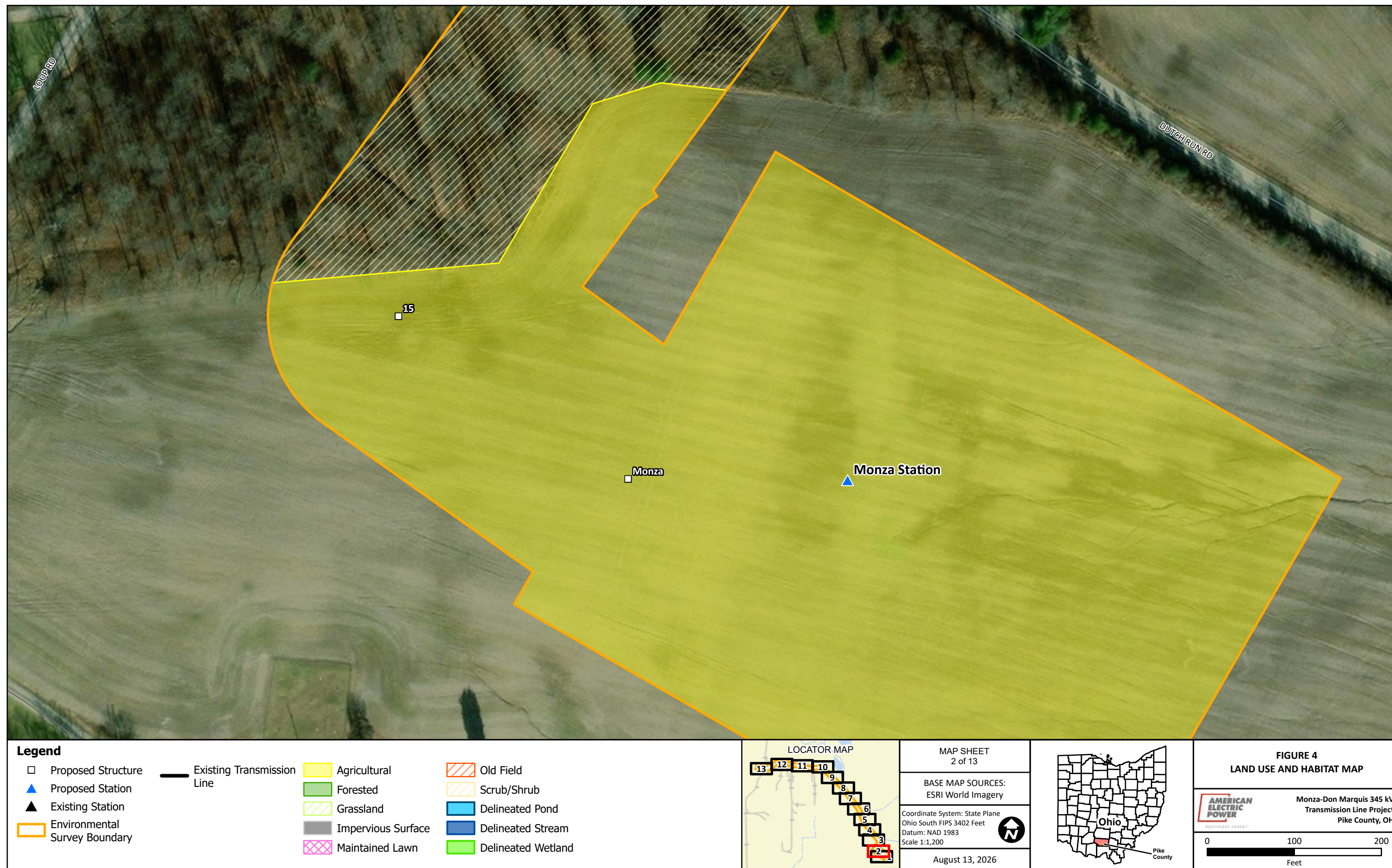
**FIGURE 3
DELINEATED FEATURES MAP**

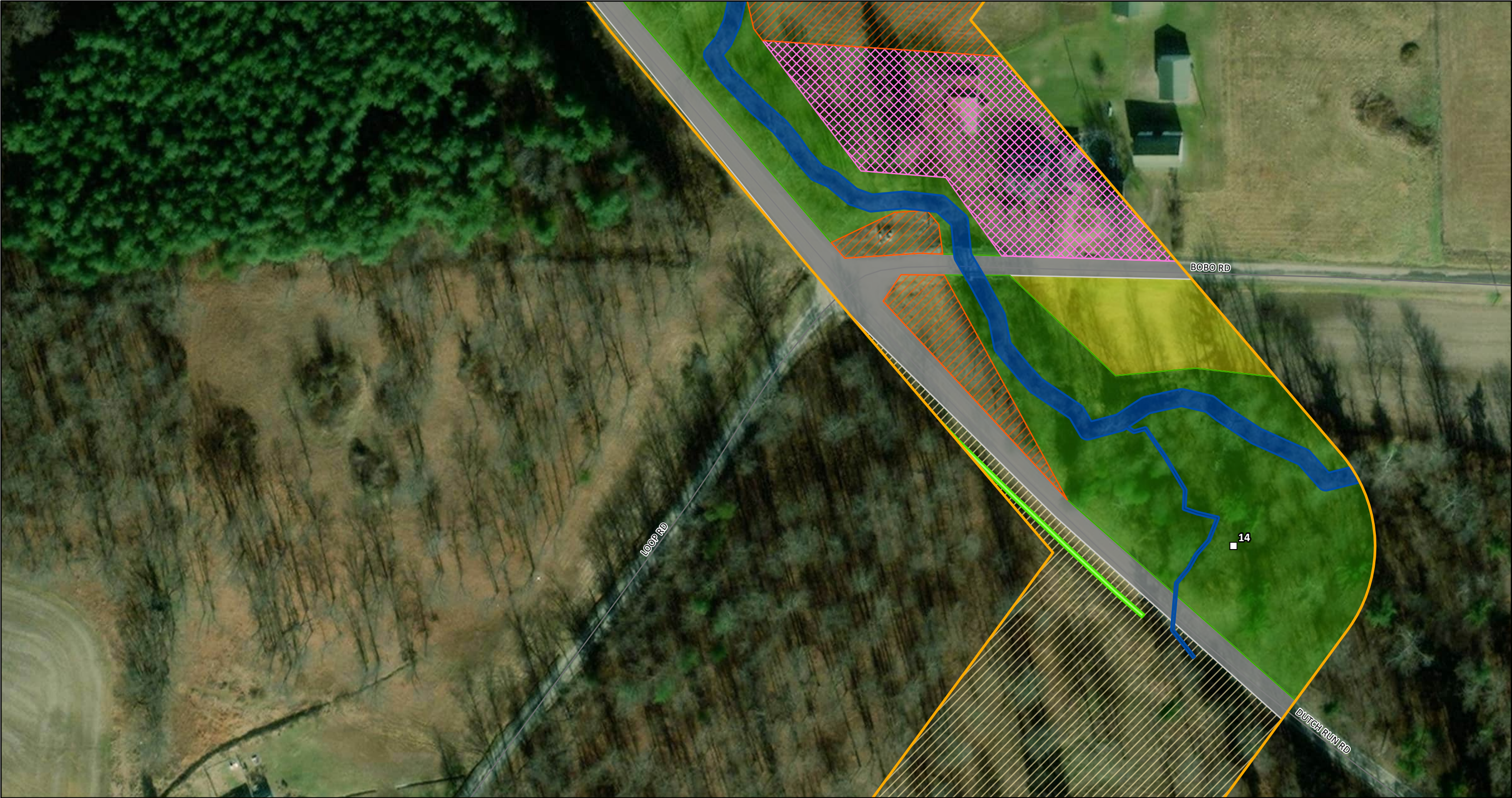
AMERICAN ELECTRIC POWER

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0 100 200
Feet



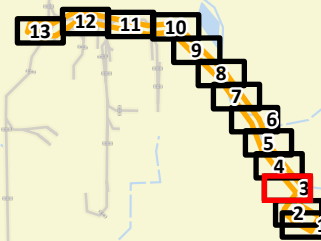




Legend

- | | | | |
|---------------------------------|------------------------------|----------------------|----------------------|
| □ Proposed Structure | — Existing Transmission Line | ■ Agricultural | ▨ Old Field |
| ▲ Proposed Station | | ■ Forested | ▨ Scrub/Shrub |
| ▲ Existing Station | | ■ Grassland | ■ Delineated Pond |
| ■ Environmental Survey Boundary | | ■ Impervious Surface | ■ Delineated Stream |
| | | ■ Maintained Lawn | ■ Delineated Wetland |

LOCATOR MAP



MAP SHEET
3 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

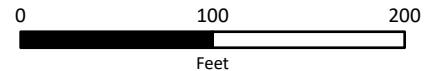
August 13, 2026

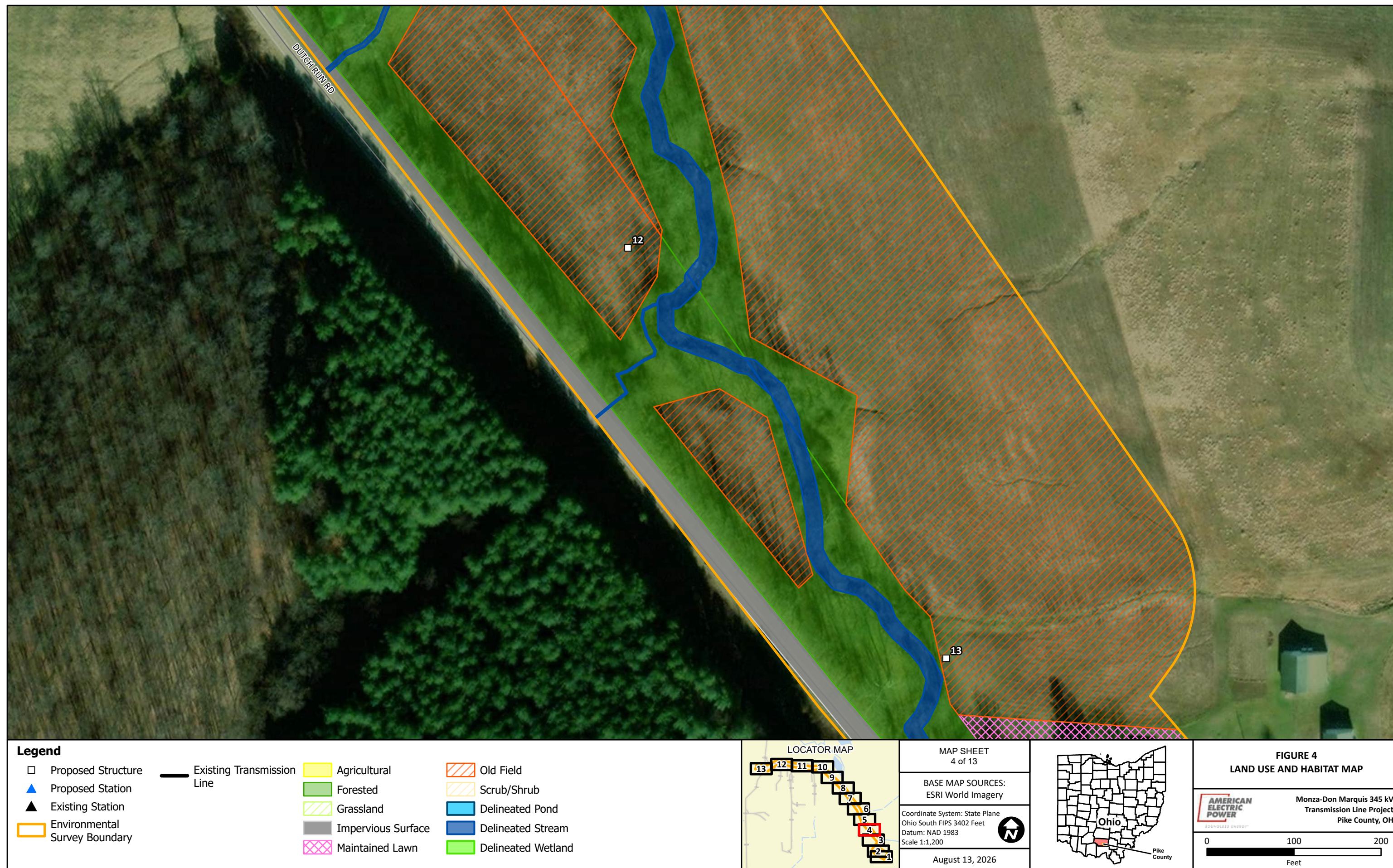


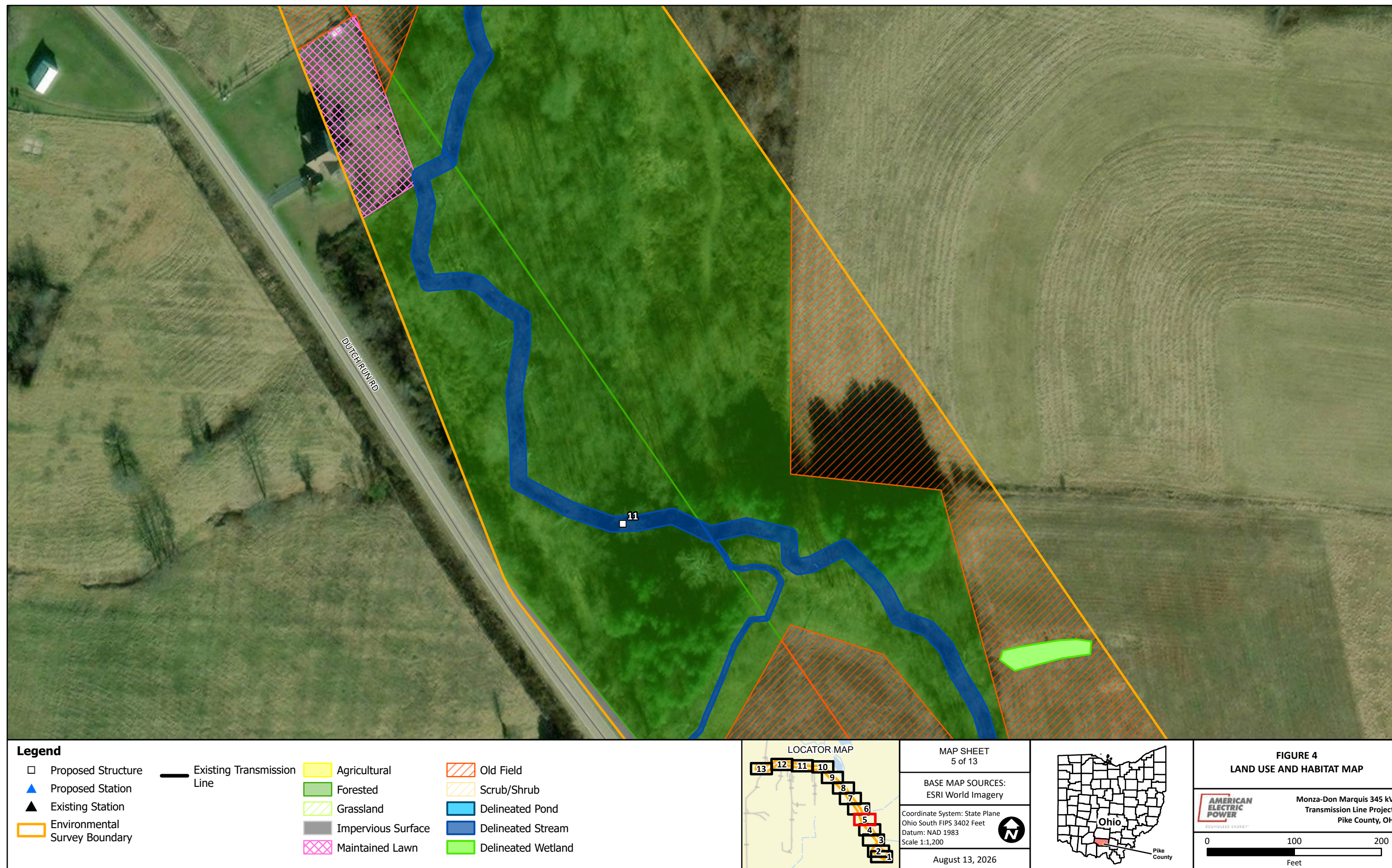
**FIGURE 4
LAND USE AND HABITAT MAP**



Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH









Legend

□

Proposed Structure

▲

Proposed Station

▲

Existing Station

□

Environmental Survey Boundary

—

Existing Transmission Line

■

Agricultural

■

Forested

■

Grassland

■

Impervious Surface

■

Maintained Lawn

■

Old Field

■

Scrub/Shrub

■

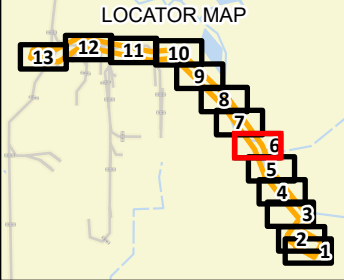
Delineated Pond

■

Delineated Stream

■

Delineated Wetland



MAP SHEET
6 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026



FIGURE 4
LAND USE AND HABITAT MAP

Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0100200

Feet



□ Proposed Structure

▲ Proposed Station

▲ Existing Station

Environmental Survey Boundary

Existing Transmission Line

—

Agricultural

Forested

Grassland

Impervious Surface

Maintained Lawn

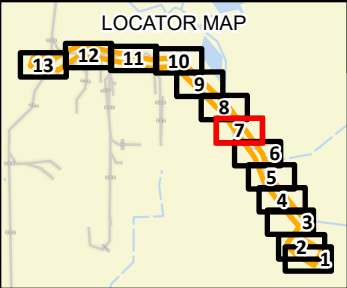
Old Field

Scrub/Shrub

Delineated Pond

Delineated Stream

Delineated Wetland



MAP SHEET
7 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026



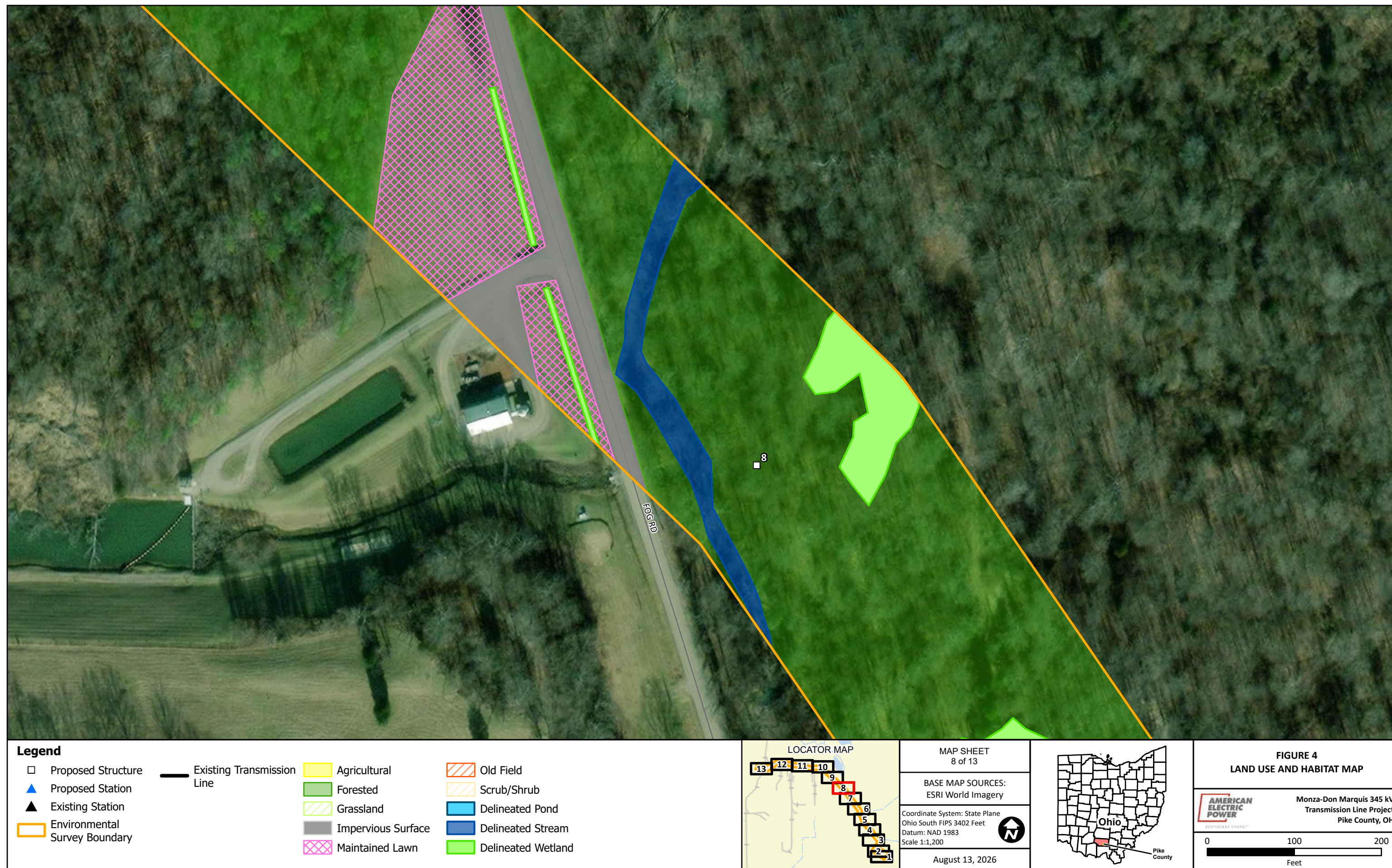
FIGURE 4
LAND USE AND HABITAT MAP

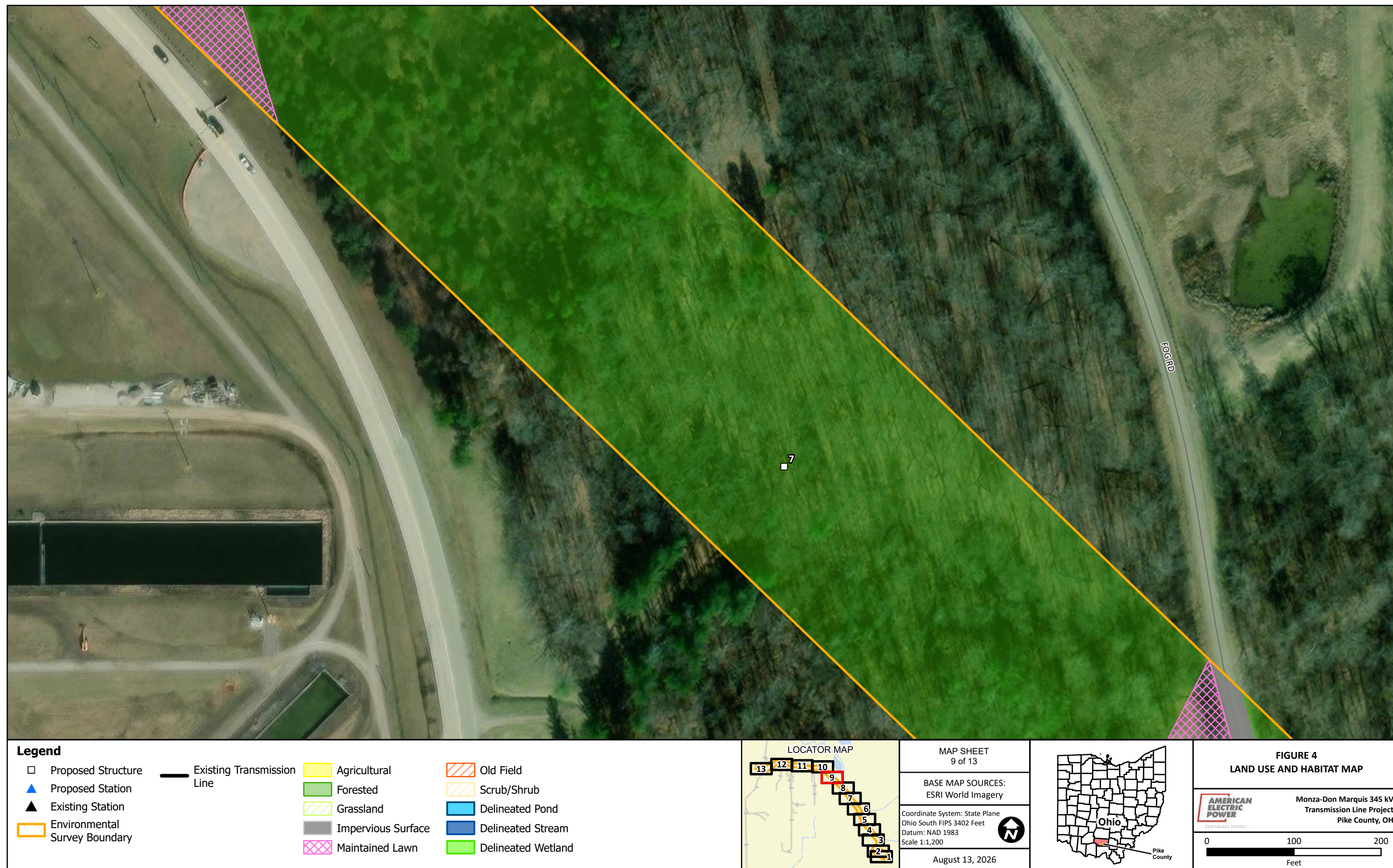
AMERICAN
ELECTRIC
POWER

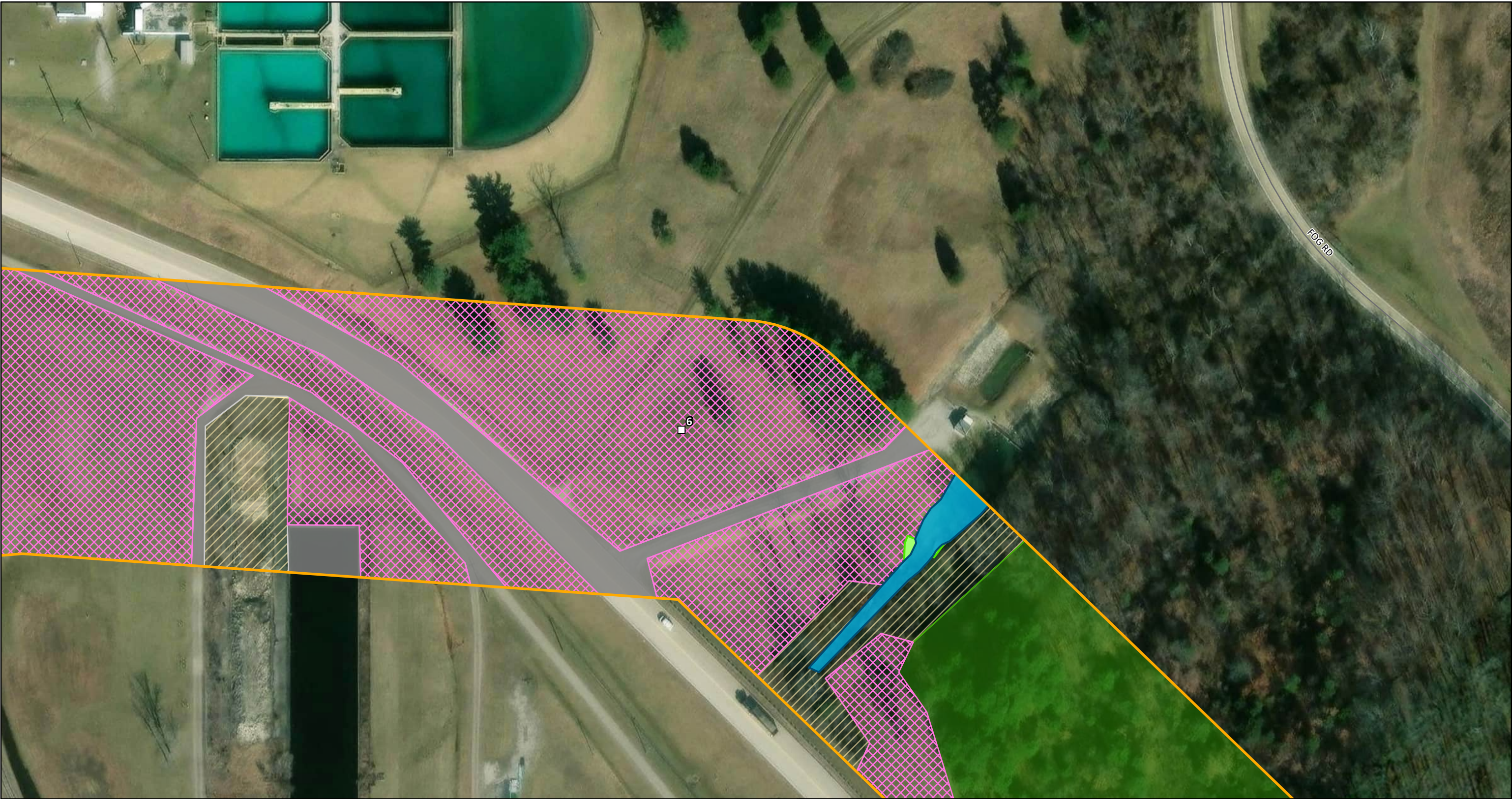
Monza-Don Marquis 345 kV
Transmission Line Project
Pike County, OH

0 100 200

Feet







Legend

□

Proposed Structure

▲

Proposed Station

▲

Existing Station

—

Environmental Survey Boundary

—

Existing Transmission Line

■

Agricultural

■

Forested

■

Grassland

■

Impervious Surface

■

Maintained Lawn

■

Old Field

■

Scrub/Shrub

■

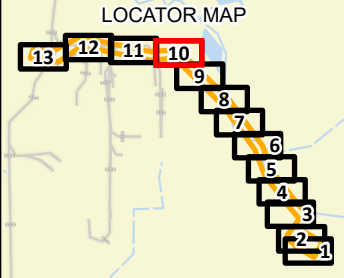
Delineated Pond

■

Delineated Stream

■

Delineated Wetland



MAP SHEET
10 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026



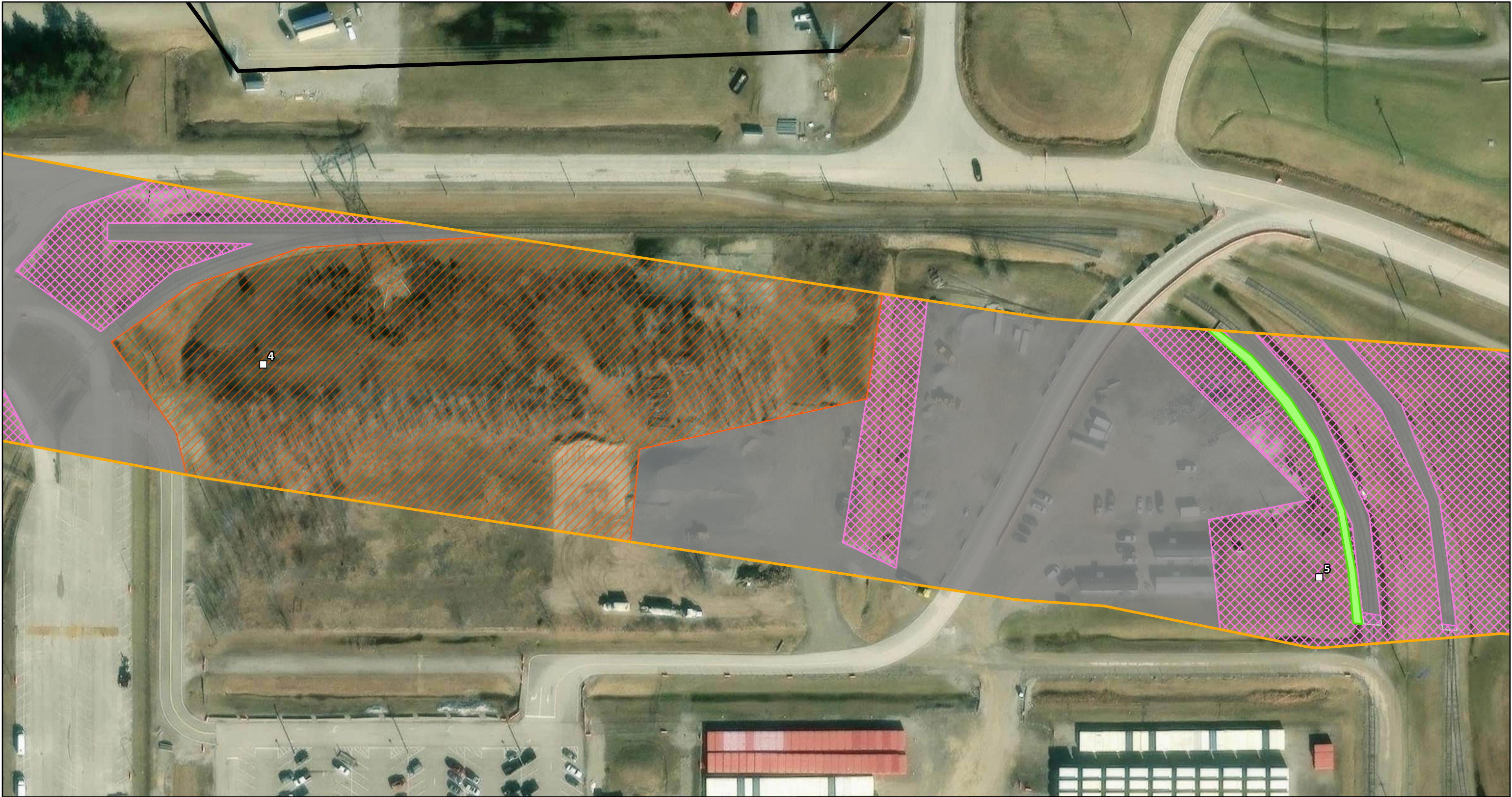
FIGURE 4
LAND USE AND HABITAT MAP

AMERICAN
ELECTRIC
POWER

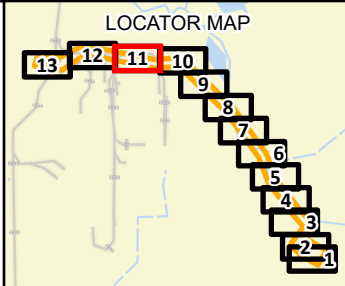
MONZA-DON MARQUIS 345 kV
TRANSMISSION LINE PROJECT
PIKE COUNTY, OH

0100200

Feet



- Legend**
- | | | | |
|---------------------------------|------------------------------|----------------------|----------------------|
| □ Proposed Structure | — Existing Transmission Line | ■ Agricultural | ▨ Old Field |
| ▲ Proposed Station | | ■ Forested | ▨ Scrub/Shrub |
| ▲ Existing Station | | ▨ Grassland | ■ Delineated Pond |
| ■ Environmental Survey Boundary | | ■ Impervious Surface | ■ Delineated Stream |
| | | ■ Maintained Lawn | ■ Delineated Wetland |

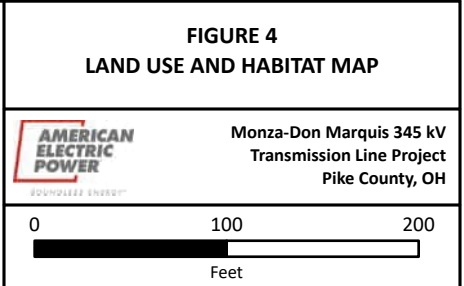


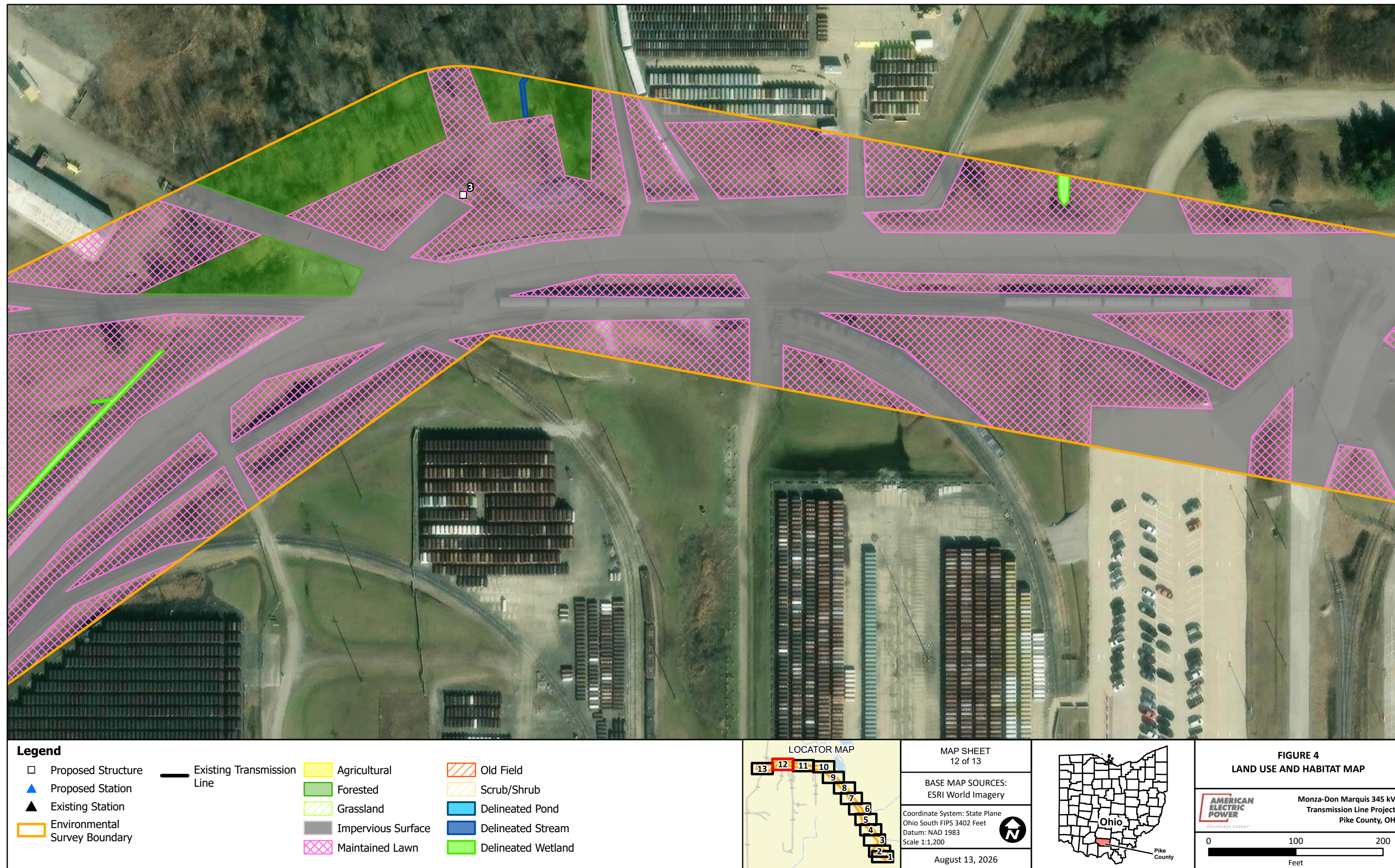
MAP SHEET
11 of 13

BASE MAP SOURCES:
ESRI World Imagery

Coordinate System: State Plane
Ohio South FIPS 3402 Feet
Datum: NAD 1983
Scale 1:1,200

August 13, 2026





Appendix B
USACE Wetland Determination Forms

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/23/26
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-01
Investigator(s): JFW Section, Township, Range: S17 4N 21W
Landform (hillslope, terrace, etc.): Toeslope Local relief (concave, convex, none): Concave Slope (%): 2
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.006684 Long: -82.975605 Datum: NAD 83
Soil Map Unit Name: Rarden silt loam, 15 to 25 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes ☒ No ☐ (If no, explain in Remarks.)
Are Vegetation ☐, Soil ☐, or Hydrology ☐ significantly disturbed? Are "Normal Circumstances" present? Yes ☒ No ☐
Are Vegetation ☐, Soil ☐, or Hydrology ☐ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes ☒ No ☐	Is the Sampled Area within a Wetland? Yes ☒ No ☐
Hydric Soil Present? Yes ☒ No ☐	
Wetland Hydrology Present? Yes ☒ No ☐	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		☐ Surface Soil Cracks (B6)
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Sparsely Vegetated Concave Surface (B8)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Drainage Patterns (B10)
☐ Saturation (A3)	☒ Oxidized Rhizospheres on Living Roots (C3)	☐ Moss Trim Lines (B16)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Dry-Season Water Table (C2)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Crayfish Burrows (C8)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Stunted or Stressed Plants (D1)
☐ Iron Deposits (B5)		☒ Geomorphic Position (D2)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Shallow Aquitard (D3)
☐ Water-Stained Leaves (B9)		☐ Microtopographic Relief (D4)
☐ Aquatic Fauna (B13)		☒ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes ☐ No ☒ Depth (inches):
Water Table Present? Yes ☐ No ☒ Depth (inches):
Saturation Present? Yes ☐ No ☒ Depth (inches):
(includes capillary fringe)

Wetland Hydrology Present? Yes ☒ No ☐

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Wetland MD-01

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:														
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>2</u> (A) Total Number of Dominant Species Across All Strata: <u>2</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>1.0</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="text-align: left;">Total % Cover of:</th> <th style="text-align: left;">Multiply by:</th> </tr> <tr> <td>OBL species <u>70</u></td> <td>x 1 = <u>70.0</u></td> </tr> <tr> <td>FACW species <u>30</u></td> <td>x 2 = <u>60.0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0.0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>100</u> (A)</td> <td><u>130.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>1.30</u>	Total % Cover of:	Multiply by:	OBL species <u>70</u>	x 1 = <u>70.0</u>	FACW species <u>30</u>	x 2 = <u>60.0</u>	FAC species <u>0</u>	x 3 = <u>0.0</u>	FACU species <u>0</u>	x 4 = <u>0.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>100</u> (A)	<u>130.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>70</u>	x 1 = <u>70.0</u>																	
FACW species <u>30</u>	x 2 = <u>60.0</u>																	
FAC species <u>0</u>	x 3 = <u>0.0</u>																	
FACU species <u>0</u>	x 4 = <u>0.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>100</u> (A)	<u>130.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <i>Scirpus atrovirens</i>	<u>70</u>	<u>Yes</u>	<u>OBL</u>	Hydrophytic Vegetation Indicators: <u>Yes</u> 1 - Rapid Test for Hydrophytic Vegetation <u>Yes</u> 2 - Dominance Test is >50% <u>Yes</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain)														
2. <i>Ulmus americana</i>	<u>10</u>	<u>No</u>	<u>FACW</u>															
3. <i>Platanus occidentalis</i>	<u>20</u>	<u>Yes</u>	<u>FACW</u>															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: <u>50.0</u> 20% of total cover: <u>20.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.)																		
Other Tree Species:		Other Herb Species:																
Other Sapling Species:		Other Woody Vine Species:																

SOIL

Sampling Point: Wetland MD-01

[illegible]



N



S



W



E



Soil

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/23/26
Applicant/Owner: AEP State: OH Sampling Point: Upland MD-01
Investigator(s): JFW Section, Township, Range: S17 4N 21W
Landform (hillslope, terrace, etc.): Shoulder slope Local relief (concave, convex, none): Convex Slope (%): 3
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.006704 Long: -82.975578 Datum: NAD 83
Soil Map Unit Name: Rarden silt loam, 15 to 25 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
Are Vegetation X, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes _____ No <u>X</u>	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present? Yes _____ No <u>X</u>	
Wetland Hydrology Present? Yes _____ No <u>X</u>	

Remarks:
Mowed today

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Surface Soil Cracks (B6)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Drainage Patterns (B10)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Moss Trim Lines (B16)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Dry-Season Water Table (C2)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Crayfish Burrows (C8)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Iron Deposits (B5)		☐ Stunted or Stressed Plants (D1)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Geomorphic Position (D2)
☐ Water-Stained Leaves (B9)		☐ Shallow Aquitard (D3)
☐ Aquatic Fauna (B13)		☐ Microtopographic Relief (D4)
		☐ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No X Depth (inches): _____
Water Table Present? Yes _____ No X Depth (inches): _____
Saturation Present? Yes _____ No X Depth (inches): _____
(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Upland MD-01

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status															
1. _____	_____	_____	_____	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A) Total Number of Dominant Species Across All Strata: <u>2</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.5</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <td style="width: 50%;">Total % Cover of:</td> <td style="width: 50%;">Multiply by:</td> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0.0</u></td> </tr> <tr> <td>FACW species <u>0</u></td> <td>x 2 = <u>0.0</u></td> </tr> <tr> <td>FAC species <u>20</u></td> <td>x 3 = <u>60.0</u></td> </tr> <tr> <td>FACU species <u>70</u></td> <td>x 4 = <u>280.0</u></td> </tr> <tr> <td>UPL species <u>10</u></td> <td>x 5 = <u>50.0</u></td> </tr> <tr> <td>Column Totals: <u>100</u> (A)</td> <td><u>390.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>3.90</u>	Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0.0</u>	FACW species <u>0</u>	x 2 = <u>0.0</u>	FAC species <u>20</u>	x 3 = <u>60.0</u>	FACU species <u>70</u>	x 4 = <u>280.0</u>	UPL species <u>10</u>	x 5 = <u>50.0</u>	Column Totals: <u>100</u> (A)	<u>390.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>0</u>	x 1 = <u>0.0</u>																	
FACW species <u>0</u>	x 2 = <u>0.0</u>																	
FAC species <u>20</u>	x 3 = <u>60.0</u>																	
FACU species <u>70</u>	x 4 = <u>280.0</u>																	
UPL species <u>10</u>	x 5 = <u>50.0</u>																	
Column Totals: <u>100</u> (A)	<u>390.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover				Hydrophytic Vegetation Indicators: <u>No</u> 1 - Rapid Test for Hydrophytic Vegetation <u>No</u> 2 - Dominance Test is >50% <u>No</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain)														
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <i>Schedonorus arundinaceus</i>	60	Yes	FACU															
2. <i>Plantago lanceolata</i>	10	No	UPL															
3. <i>Prunella vulgaris</i>	10	No	FACU															
4. <i>Conoclinium coelestinum</i>	20	Yes	FAC															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
100 = Total Cover																		
50% of total cover: <u>50.0</u> 20% of total cover: <u>20.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.)				Hydrophytic Vegetation Present?														
				Yes _____ No <u>X</u>														
Other Tree Species:		Other Herb Species:																
Other Sapling Species:		Other Woody Vine Species:																

SOIL

Sampling Point: Upland MD-01

[illegible]



S



Soil

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-02
Investigator(s): JFW Section, Township, Range: S17 4N 21W
Landform (hillslope, terrace, etc.): Hillside Local relief (concave, convex, none): Concave Slope (%): 3
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.010616 Long: -82.978022 Datum: NAD 83
Soil Map Unit Name: Omulga silt loam, 2 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes ☒ No ☐ (If no, explain in Remarks.)
Are Vegetation ☐, Soil ☐, or Hydrology ☐ significantly disturbed? Are "Normal Circumstances" present? Yes ☒ No ☐
Are Vegetation ☐, Soil ☐, or Hydrology ☐ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes ☒ No ☐	Is the Sampled Area within a Wetland? Yes ☒ No ☐
Hydric Soil Present? Yes ☒ No ☐	
Wetland Hydrology Present? Yes ☒ No ☐	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		☐ Surface Soil Cracks (B6)
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Sparsely Vegetated Concave Surface (B8)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Drainage Patterns (B10)
☐ Saturation (A3)	☒ Oxidized Rhizospheres on Living Roots (C3)	☐ Moss Trim Lines (B16)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Dry-Season Water Table (C2)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Crayfish Burrows (C8)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Stunted or Stressed Plants (D1)
☐ Iron Deposits (B5)		☒ Geomorphic Position (D2)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Shallow Aquitard (D3)
☐ Water-Stained Leaves (B9)		☐ Microtopographic Relief (D4)
☐ Aquatic Fauna (B13)		☒ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes ☐ No ☒ Depth (inches):
Water Table Present? Yes ☐ No ☒ Depth (inches):
Saturation Present? Yes ☐ No ☒ Depth (inches):
(includes capillary fringe)

Wetland Hydrology Present? Yes ☒ No ☐

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Wetland MD-02

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:														
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A) Total Number of Dominant Species Across All Strata: <u>1</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>1.0</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="text-align: left;">Total % Cover of:</th> <th style="text-align: left;">Multiply by:</th> </tr> <tr> <td>OBL species <u>30</u></td> <td>x 1 = <u>30.0</u></td> </tr> <tr> <td>FACW species <u>90</u></td> <td>x 2 = <u>180.0</u></td> </tr> <tr> <td>FAC species <u>2</u></td> <td>x 3 = <u>6.0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>122</u> (A)</td> <td><u>216.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>1.80</u>	Total % Cover of:	Multiply by:	OBL species <u>30</u>	x 1 = <u>30.0</u>	FACW species <u>90</u>	x 2 = <u>180.0</u>	FAC species <u>2</u>	x 3 = <u>6.0</u>	FACU species <u>0</u>	x 4 = <u>0.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>122</u> (A)	<u>216.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>30</u>	x 1 = <u>30.0</u>																	
FACW species <u>90</u>	x 2 = <u>180.0</u>																	
FAC species <u>2</u>	x 3 = <u>6.0</u>																	
FACU species <u>0</u>	x 4 = <u>0.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>122</u> (A)	<u>216.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <i>Agrimonia parviflora</i>	<u>70</u>	<u>Yes</u>	<u>FACW</u>															
2. <i>Conium maculatum</i>	<u>10</u>	<u>No</u>	<u>FACW</u>															
3. <i>Scirpus atrovirens</i>	<u>10</u>	<u>No</u>	<u>OBL</u>															
4. <i>Carex vulpinoidea</i>	<u>20</u>	<u>No</u>	<u>OBL</u>															
5. <i>Rumex crispus</i>	<u>2</u>	<u>No</u>	<u>FAC</u>															
6. <i>Onoclea sensibilis</i>	<u>10</u>	<u>No</u>	<u>FACW</u>															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
<u>122</u> = Total Cover																		
50% of total cover: <u>61.0</u> 20% of total cover: <u>24.4</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.) Other Tree Species: Other Sapling Species: Other Herb Species: Other Woody Vine Species:																		
				Hydrophytic Vegetation Present?														
Definitions of Four Vegetation Strata: Tree – Woody plants, excluding vines, 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height. Sapling/Shrub – Woody plants, excluding vines, less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall. Herb – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall. Woody vine – All woody vines greater than 3.28 ft in height.																		
Yes <u>X</u> No _____																		

SOIL

Sampling Point: Wetland MD-02

[illegible]



N



E



S



W



Soil

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Upland MD-02
Investigator(s): JFW Section, Township, Range: S17 4N 21W
Landform (hillslope, terrace, etc.): Hillside Local relief (concave, convex, none): Flat Slope (%): 2
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.010528 Long: -82.977917 Datum: NAD 83
Soil Map Unit Name: Omulga silt loam, 2 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
Are Vegetation _____, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <u>X</u> No _____	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present? Yes _____ No <u>X</u>	
Wetland Hydrology Present? Yes _____ No <u>X</u>	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Surface Soil Cracks (B6)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Drainage Patterns (B10)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Moss Trim Lines (B16)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Dry-Season Water Table (C2)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Crayfish Burrows (C8)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Iron Deposits (B5)		☐ Stunted or Stressed Plants (D1)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Geomorphic Position (D2)
☐ Water-Stained Leaves (B9)		☐ Shallow Aquitard (D3)
☐ Aquatic Fauna (B13)		☐ Microtopographic Relief (D4)
		☐ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No X Depth (inches): _____
Water Table Present? Yes _____ No X Depth (inches): _____
Saturation Present? Yes _____ No X Depth (inches): _____
(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

No hydrology indicators observed

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Upland MD-02

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:														
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>2</u> (A) Total Number of Dominant Species Across All Strata: <u>3</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.67</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <td style="width: 50%;">Total % Cover of:</td> <td style="width: 50%;">Multiply by:</td> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0.0</u></td> </tr> <tr> <td>FACW species <u>20</u></td> <td>x 2 = <u>40.0</u></td> </tr> <tr> <td>FAC species <u>25</u></td> <td>x 3 = <u>75.0</u></td> </tr> <tr> <td>FACU species <u>55</u></td> <td>x 4 = <u>220.0</u></td> </tr> <tr> <td>UPL species <u>5</u></td> <td>x 5 = <u>25.0</u></td> </tr> <tr> <td>Column Totals: <u>105</u> (A)</td> <td><u>360.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>3.40</u>	Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0.0</u>	FACW species <u>20</u>	x 2 = <u>40.0</u>	FAC species <u>25</u>	x 3 = <u>75.0</u>	FACU species <u>55</u>	x 4 = <u>220.0</u>	UPL species <u>5</u>	x 5 = <u>25.0</u>	Column Totals: <u>105</u> (A)	<u>360.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>0</u>	x 1 = <u>0.0</u>																	
FACW species <u>20</u>	x 2 = <u>40.0</u>																	
FAC species <u>25</u>	x 3 = <u>75.0</u>																	
FACU species <u>55</u>	x 4 = <u>220.0</u>																	
UPL species <u>5</u>	x 5 = <u>25.0</u>																	
Column Totals: <u>105</u> (A)	<u>360.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <i>Solidago canadensis</i>	<u>50</u>	<u>Yes</u>	<u>FACU</u>	Hydrophytic Vegetation Indicators: <u>No</u> 1 - Rapid Test for Hydrophytic Vegetation <u>Yes</u> 2 - Dominance Test is >50% <u>No</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.														
2. <i>Agrimonia parviflora</i>	<u>20</u>	<u>Yes</u>	<u>FACW</u>															
3. <i>Daucus carota</i>	<u>5</u>	<u>No</u>	<u>UPL</u>															
4. <i>Allium canadense</i>	<u>5</u>	<u>No</u>	<u>FACU</u>															
5. <i>Juncus tenuis</i>	<u>5</u>	<u>No</u>	<u>FAC</u>															
6. <i>Symphytotrichum pilosum</i>	<u>20</u>	<u>Yes</u>	<u>FAC</u>															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
<u>105</u> = Total Cover																		
50% of total cover: <u>52.5</u> 20% of total cover: <u>21.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.) 																		
Other Tree Species:		Other Herb Species:																
Other Sapling Species:		Other Woody Vine Species:																

SOIL

Sampling Point: Upland MD-02

[illegible]



Soil



NE

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-03
Investigator(s): JFW Section, Township, Range: S17 4N 21W
Landform (hillslope, terrace, etc.): Flat Local relief (concave, convex, none): Concave Slope (%): 0
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.014569 Long: -82.981496 Datum: NAD 83
Soil Map Unit Name: Wilbur silt loam, occasionally flooded NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes ☒ No ☐ (If no, explain in Remarks.)
Are Vegetation ☐, Soil ☐, or Hydrology ☐ significantly disturbed? Are "Normal Circumstances" present? Yes ☒ No ☐
Are Vegetation ☐, Soil ☐, or Hydrology ☐ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes ☒ No ☐	Is the Sampled Area within a Wetland? Yes ☒ No ☐
Hydric Soil Present? Yes ☒ No ☐	
Wetland Hydrology Present? Yes ☒ No ☐	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		☐ Surface Soil Cracks (B6)
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Sparsely Vegetated Concave Surface (B8)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Drainage Patterns (B10)
☒ Saturation (A3)	☒ Oxidized Rhizospheres on Living Roots (C3)	☐ Moss Trim Lines (B16)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Dry-Season Water Table (C2)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Crayfish Burrows (C8)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Stunted or Stressed Plants (D1)
☐ Iron Deposits (B5)		☒ Geomorphic Position (D2)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Shallow Aquitard (D3)
☐ Water-Stained Leaves (B9)		☐ Microtopographic Relief (D4)
☐ Aquatic Fauna (B13)		☒ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes ☐ No ☒ Depth (inches):
Water Table Present? Yes ☒ No ☐ Depth (inches): 16
Saturation Present? Yes ☒ No ☐ Depth (inches): 0
(includes capillary fringe)

Wetland Hydrology Present? Yes ☒ No ☐

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Wetland MD-03

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:														
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A) Total Number of Dominant Species Across All Strata: <u>1</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>1.0</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="text-align: left;">Total % Cover of:</th> <th style="text-align: left;">Multiply by:</th> </tr> <tr> <td>OBL species <u>25</u></td> <td>x 1 = <u>25.0</u></td> </tr> <tr> <td>FACW species <u>80</u></td> <td>x 2 = <u>160.0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0.0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>105</u> (A)</td> <td><u>185.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>1.80</u>	Total % Cover of:	Multiply by:	OBL species <u>25</u>	x 1 = <u>25.0</u>	FACW species <u>80</u>	x 2 = <u>160.0</u>	FAC species <u>0</u>	x 3 = <u>0.0</u>	FACU species <u>0</u>	x 4 = <u>0.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>105</u> (A)	<u>185.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>25</u>	x 1 = <u>25.0</u>																	
FACW species <u>80</u>	x 2 = <u>160.0</u>																	
FAC species <u>0</u>	x 3 = <u>0.0</u>																	
FACU species <u>0</u>	x 4 = <u>0.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>105</u> (A)	<u>185.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <i>Phalaris arundinacea</i>	<u>80</u>	<u>Yes</u>	<u>FACW</u>															
2. <i>Typha angustifolia</i>	<u>20</u>	<u>No</u>	<u>OBL</u>															
3. <i>Eutrochium fistulosum</i>	<u>5</u>	<u>No</u>	<u>FACW</u>															
4. <i>Carex frankii</i>	<u>5</u>	<u>No</u>	<u>OBL</u>															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
<u>110</u> = Total Cover																		
50% of total cover: <u>55.0</u> 20% of total cover: <u>22.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.) 				Hydrophytic Vegetation Present?														
				Yes <u>X</u> No _____														
Other Tree Species: _____ Other Herb Species: _____ Other Sapling Species: _____ Other Woody Vine Species: _____																		

SOIL

Sampling Point: Wetland MD-03

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)								
Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
0-18	2.5Y 5/2	80	5YR 5/6	20	C	PL	Clay loam	

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains.

²Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators:			Indicators for Problematic Hydric Soils³:		
☐ Histosol (A1)	☒	Dark Surface (S7)	☐ 2 cm Muck (A10) (MLRA 147)		
☐ Histic Epipedon (A2)	☐	Polyvalue Below Surface (S8) (MLRA 147, 148)	☐ Coast Prairie Redox (A16)		
☐ Black Histic (A3)	☐	Thin Dark Surface (S9) (MLRA 147, 148)	☐ (MLRA 147, 148)		
☐ Hydrogen Sulfide (A4)	☐	Loamy Gleyed Matrix (F2)	☐ Piedmont Floodplain Soils (F19)		
☐ Stratified Layers (A5)	X	Depleted Matrix (F3)	☐ (MLRA 136, 147)		
☐ 2 cm Muck (A10) (LRR N)	☐	Redox Dark Surface (F6)	☐ Very Shallow Dark Surface (TF12)		
☐ Depleted Below Dark Surface (A11)	☐	Depleted Dark Surface (F7)	☐ Other (Explain in Remarks)		
☐ Thick Dark Surface (A12)	☐	Redox Depressions (F8)			
☐ Sandy Mucky Mineral (S1) (LRR N,	☐	Iron-Manganese Masses (F12) (LRR N,			
☐ MLRA 147, 148)	☐	MLRA 136)			
☐ Sandy Gleyed Matrix (S4)	☐	Umbric Surface (F13) (MLRA 136, 122)			
☐ Sandy Redox (S5)	☐	Piedmont Floodplain Soils (F19) (MLRA 148)			
☐ Stripped Matrix (S6)	☐	Red Parent Material (F21) (MLRA 127, 147)			

Restrictive Layer (if observed):

Type: _____

Depth (inches): _____

Hydric Soil Present?

Yes X_____ No _____

Remarks:



N



E



S



W



Soil

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Upland MD-03
Investigator(s): JFW Section, Township, Range: S17 4N 21W
Landform (hillslope, terrace, etc.): Flat Local relief (concave, convex, none): Flat Slope (%): 0
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.014491 Long: -82.981286 Datum: NAD 83
Soil Map Unit Name: Wilbur silt loam, occasionally flooded NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
Are Vegetation _____, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <u>X</u> No _____	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present? Yes _____ No <u>X</u>	
Wetland Hydrology Present? Yes <u>X</u> No _____	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Surface Soil Cracks (B6)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ Saturation (A3)	☒ Oxidized Rhizospheres on Living Roots (C3)	☐ Drainage Patterns (B10)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Moss Trim Lines (B16)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Dry-Season Water Table (C2)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Crayfish Burrows (C8)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Iron Deposits (B5)		☐ Stunted or Stressed Plants (D1)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Geomorphic Position (D2)
☐ Water-Stained Leaves (B9)		☐ Shallow Aquitard (D3)
☐ Aquatic Fauna (B13)		☐ Microtopographic Relief (D4)
		☐ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No X Depth (inches): _____
Water Table Present? Yes _____ No X Depth (inches): _____
Saturation Present? Yes _____ No X Depth (inches): _____
(includes capillary fringe)

Wetland Hydrology Present? Yes X No _____

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

Sampling Point: Upland MD-03

Tree Stratum (Plot size: <u>30</u>)				Absolute % Cover	Dominant Species?	Indicator Status
1.						
2.						
3.						
4.						
5.						
6.						
7.						
_____ = Total Cover						
50% of total cover: _____				20% of total cover: _____		
Sapling/Shrub Stratum (Plot size: <u>15</u>)						
1.						
2.						
3.						
4.						
5.						
6.						
7.						
8.						
9.						
_____ = Total Cover						
50% of total cover: _____				20% of total cover: _____		
Herb Stratum (Plot size: <u>5</u>)						
1.	Schedonorus arundinaceus	20	No	FACU		
2.	Juncus effusus	30	Yes	FACW		
3.	Plantago lanceolata	30	Yes	UPL		
4.	Conoclinium coelestinum	30	Yes	FAC		
5.	Cyperus strigosus	10	No	FACW		
6.	Setaria pumila	10	No	FAC		
7.						
8.						
9.						
10.						
11.						
130 = Total Cover						
50% of total cover: <u>65.0</u>				20% of total cover: <u>26.0</u>		
Woody Vine Stratum (Plot size: <u>30</u>)						
1.						
2.						
3.						
4.						
5.						

SOIL

Sampling Point: Upland MD-03

[illegible]



Soil



S

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-04
Investigator(s): JFW Section, Township, Range: S08 4N 21W
Landform (hillslope, terrace, etc.): Undulating Local relief (concave, convex, none): Concave Slope (%): 0
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.015626 Long: -82.982850 Datum: NAD 83
Soil Map Unit Name: Wilbur silt loam, occasionally flooded NWI classification: PSS1/EM1A

Are climatic / hydrologic conditions on the site typical for this time of year? Yes ☒ No ☐ (If no, explain in Remarks.)
Are Vegetation ☐, Soil ☐, or Hydrology ☐ significantly disturbed? Are "Normal Circumstances" present? Yes ☒ No ☐
Are Vegetation ☐, Soil ☐, or Hydrology ☐ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes ☒ No ☐	Is the Sampled Area within a Wetland? Yes ☒ No ☐
Hydric Soil Present? Yes ☒ No ☐	
Wetland Hydrology Present? Yes ☒ No ☐	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		☐ Surface Soil Cracks (B6)
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Sparsely Vegetated Concave Surface (B8)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Drainage Patterns (B10)
☐ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Moss Trim Lines (B16)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Dry-Season Water Table (C2)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Crayfish Burrows (C8)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Stunted or Stressed Plants (D1)
☐ Iron Deposits (B5)		☐ Geomorphic Position (D2)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Shallow Aquitard (D3)
☒ Water-Stained Leaves (B9)		☐ Microtopographic Relief (D4)
☐ Aquatic Fauna (B13)		☒ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes ☐ No ☒ Depth (inches):
Water Table Present? Yes ☐ No ☒ Depth (inches):
Saturation Present? Yes ☐ No ☒ Depth (inches):
(includes capillary fringe)

Wetland Hydrology Present? Yes ☒ No ☐

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Wetland MD-04

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status															
1. <u>Acer saccharum</u>	50	Yes	FACU	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>9</u> (A) Total Number of Dominant Species Across All Strata: <u>10</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.9</u> (A/B)														
2. <u>Platanus occidentalis</u>	20	Yes	FACW															
3. _____																		
4. _____																		
5. _____																		
6. _____																		
7. _____																		
70 = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="text-align: left;">Total % Cover of:</th> <th style="text-align: left;">Multiply by:</th> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0.0</u></td> </tr> <tr> <td>FACW species <u>60</u></td> <td>x 2 = <u>120.0</u></td> </tr> <tr> <td>FAC species <u>10</u></td> <td>x 3 = <u>30.0</u></td> </tr> <tr> <td>FACU species <u>50</u></td> <td>x 4 = <u>200.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>120</u> (A)</td> <td><u>350.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>2.90</u>	Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0.0</u>	FACW species <u>60</u>	x 2 = <u>120.0</u>	FAC species <u>10</u>	x 3 = <u>30.0</u>	FACU species <u>50</u>	x 4 = <u>200.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>120</u> (A)	<u>350.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>0</u>	x 1 = <u>0.0</u>																	
FACW species <u>60</u>	x 2 = <u>120.0</u>																	
FAC species <u>10</u>	x 3 = <u>30.0</u>																	
FACU species <u>50</u>	x 4 = <u>200.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>120</u> (A)	<u>350.0</u> (B)																	
50% of total cover: <u>35.0</u> 20% of total cover: <u>14.0</u>																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____																		
2. _____																		
3. _____																		
4. _____																		
5. _____																		
6. _____																		
7. _____																		
8. _____																		
9. _____																		
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <u>Packera aurea</u>	10	Yes	FACW	Hydrophytic Vegetation Indicators: <u>No</u> 1 - Rapid Test for Hydrophytic Vegetation <u>Yes</u> 2 - Dominance Test is >50% <u>Yes</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.														
2. <u>Ulmus americana</u>	5	Yes	FACW															
3. <u>Impatiens capensis</u>	5	Yes	FACW															
4. <u>Microstegium vimineum</u>	5	Yes	FAC															
5. <u>Leersia virginica</u>	15	Yes	FACW															
6. <u>Onoclea sensibilis</u>	5	Yes	FACW															
7. <u>Fraxinus pennsylvanica</u>	5	Yes	FACW															
8. <u>Smilax rotundifolia</u>	5	Yes	FAC															
9. _____																		
10. _____																		
11. _____																		
55 = Total Cover																		
50% of total cover: <u>27.5</u> 20% of total cover: <u>11.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____																		
2. _____																		
3. _____																		
4. _____																		
5. _____																		
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.) 																		
Other Tree Species:		Other Herb Species:																
Other Sapling Species:		Other Woody Vine Species:																

SOIL

Sampling Point: Wetland MD-04

[illegible]



N



E



S



W

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Upland MD-04
Investigator(s): JFW Section, Township, Range: S08 4N 21W
Landform (hillslope, terrace, etc.): Undulating Local relief (concave, convex, none): Flat Slope (%): 2
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.015731 Long: -82.982706 Datum: NAD 83
Soil Map Unit Name: Wilbur silt loam, occasionally flooded NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
Are Vegetation _____, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes _____ No <u>X</u>	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present?	Yes _____ No <u>X</u>	
Wetland Hydrology Present?	Yes _____ No <u>X</u>	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Surface Soil Cracks (B6)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Drainage Patterns (B10)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Moss Trim Lines (B16)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Dry-Season Water Table (C2)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Crayfish Burrows (C8)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Iron Deposits (B5)		☐ Stunted or Stressed Plants (D1)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Geomorphic Position (D2)
☐ Water-Stained Leaves (B9)		☐ Shallow Aquitard (D3)
☐ Aquatic Fauna (B13)		☐ Microtopographic Relief (D4)
		☐ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No X Depth (inches): _____
Water Table Present? Yes _____ No X Depth (inches): _____
Saturation Present? Yes _____ No X Depth (inches): _____
(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

None

Sampling Point: Upland MD-04

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	
1. <u>Acer rubrum</u>	<u>10</u>	<u>No</u>	<u>FAC</u>	
2. <u>Acer saccharum</u>	<u>40</u>	<u>Yes</u>	<u>FACU</u>	
3. <u>Platanus occidentalis</u>	<u>5</u>	<u>No</u>	<u>FACW</u>	
4. <u>Catalpa speciosa</u>	<u>5</u>	<u>No</u>	<u>FAC</u>	
5. _____	_____	_____	_____	
6. _____	_____	_____	_____	
7. _____	_____	_____	_____	
_____ = Total Cover				
50% of total cover: <u>30.0</u>		20% of total cover: <u>12.0</u>		
<u>Sapling/Shrub Stratum</u> (Plot size: <u>15</u>)				
1. _____	_____	_____	_____	
2. _____	_____	_____	_____	
3. _____	_____	_____	_____	
4. _____	_____	_____	_____	
5. _____	_____	_____	_____	
6. _____	_____	_____	_____	
7. _____	_____	_____	_____	
8. _____	_____	_____	_____	
9. _____	_____	_____	_____	
_____ = Total Cover				
50% of total cover: _____		20% of total cover: _____		
<u>Herb Stratum</u> (Plot size: <u>5</u>)				
1. <u>Rubus allegheniensis</u>	<u>15</u>	<u>Yes</u>	<u>FACU</u>	
2. <u>Microstegium vimineum</u>	<u>20</u>	<u>Yes</u>	<u>FAC</u>	
3. <u>Polystichum acrostichoides</u>	<u>5</u>	<u>No</u>	<u>FACU</u>	
4. <u>Onoclea sensibilis</u>	<u>5</u>	<u>No</u>	<u>FACW</u>	
5. <u>Rosa multiflora</u>	<u>5</u>	<u>No</u>	<u>FACU</u>	
6. <u>Liriodendron tulipifera</u>	<u>5</u>	<u>No</u>	<u>FACU</u>	
7. <u>Goodyera pubescens</u>	<u>1</u>	<u>No</u>	<u>FACU</u>	
8. _____	_____	_____	_____	
9. _____	_____	_____	_____	
10. _____	_____	_____	_____	
11. _____	_____	_____	_____	
_____ = Total Cover				
50% of total cover: <u>28.0</u>		20% of total cover: <u>11.2</u>		
<u>Woody Vine Stratum</u> (Plot size: <u>30</u>)				
1. _____	_____	_____	_____	
2. _____	_____	_____	_____	
3. _____	_____	_____	_____	
4. _____	_____	_____	_____	
5. _____	_____	_____	_____	
_____ = Total Cover				
50% of total cover: _____		20% of total cover: _____		

Remarks: (Include photo numbers here or on a separate sheet.)

Other Tree Species: _____

 Other Sapling Species: _____

Other Herb Species: _____

 Other Woody Vine Species: _____

SOIL

Sampling Point: Upland MD-04

[illegible]



W



SE

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-05
Investigator(s): JFW Section, Township, Range: S08 4N 21W
Landform (hillslope, terrace, etc.): Channel (abandoned) Local relief (concave, convex, none): Concave Slope (%): 2
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.016971 Long: -82.983806 Datum: NAD 83
Soil Map Unit Name: Wyatt silty clay loam, 6 to 12 percent slopes, eroded NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes ☒ No ☐ (If no, explain in Remarks.)
Are Vegetation ☐, Soil ☐, or Hydrology ☐ significantly disturbed? Are "Normal Circumstances" present? Yes ☒ No ☐
Are Vegetation ☐, Soil ☐, or Hydrology ☐ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes ☒ No ☐	Is the Sampled Area within a Wetland? Yes ☒ No ☐
Hydric Soil Present? Yes ☒ No ☐	
Wetland Hydrology Present? Yes ☒ No ☐	

Remarks:

PEM

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		☐ Surface Soil Cracks (B6)
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Sparsely Vegetated Concave Surface (B8)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Drainage Patterns (B10)
☒ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Moss Trim Lines (B16)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Dry-Season Water Table (C2)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Crayfish Burrows (C8)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Stunted or Stressed Plants (D1)
☐ Iron Deposits (B5)		☒ Geomorphic Position (D2)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Shallow Aquitard (D3)
☒ Water-Stained Leaves (B9)		☐ Microtopographic Relief (D4)
☐ Aquatic Fauna (B13)		☒ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes ☐ No ☒ Depth (inches):
Water Table Present? Yes ☐ No ☒ Depth (inches):
Saturation Present? Yes ☒ No ☐ Depth (inches): 0
(includes capillary fringe)

Wetland Hydrology Present? Yes ☒ No ☐

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Wetland MD-05

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:														
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>5</u> (A) Total Number of Dominant Species Across All Strata: <u>5</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>1.0</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <td style="width: 50%;">Total % Cover of:</td> <td style="width: 50%;">Multiply by:</td> </tr> <tr> <td>OBL species <u>50</u></td> <td>x 1 = <u>50.0</u></td> </tr> <tr> <td>FACW species <u>50</u></td> <td>x 2 = <u>100.0</u></td> </tr> <tr> <td>FAC species <u>30</u></td> <td>x 3 = <u>90.0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>130</u> (A)</td> <td><u>240.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>1.80</u>	Total % Cover of:	Multiply by:	OBL species <u>50</u>	x 1 = <u>50.0</u>	FACW species <u>50</u>	x 2 = <u>100.0</u>	FAC species <u>30</u>	x 3 = <u>90.0</u>	FACU species <u>0</u>	x 4 = <u>0.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>130</u> (A)	<u>240.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>50</u>	x 1 = <u>50.0</u>																	
FACW species <u>50</u>	x 2 = <u>100.0</u>																	
FAC species <u>30</u>	x 3 = <u>90.0</u>																	
FACU species <u>0</u>	x 4 = <u>0.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>130</u> (A)	<u>240.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. <u>Ulmus americana</u>	<u>10</u>	<u>Yes</u>	<u>FACW</u>															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: <u>5.0</u> 20% of total cover: <u>5.0</u>																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <u>Dichanthelium clandestinum</u>	<u>30</u>	<u>Yes</u>	<u>FAC</u>															
2. <u>Scirpus atrovirens</u>	<u>20</u>	<u>Yes</u>	<u>OBL</u>															
3. <u>Carex vulpinoidea</u>	<u>20</u>	<u>Yes</u>	<u>OBL</u>															
4. <u>Juncus acuminatus</u>	<u>10</u>	<u>No</u>	<u>OBL</u>															
5. <u>Packera aurea</u>	<u>10</u>	<u>No</u>	<u>FACW</u>															
6. <u>Impatiens capensis</u>	<u>20</u>	<u>Yes</u>	<u>FACW</u>															
7. <u>Teucrium canadense</u>	<u>10</u>	<u>No</u>	<u>FACW</u>															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: <u>60.0</u> 20% of total cover: <u>24.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Hydrophytic Vegetation Present? Yes <u>X</u> No _____																		
Remarks: (Include photo numbers here or on a separate sheet.)																		
Other Tree Species:		Other Herb Species:																
Other Sapling Species:		Other Woody Vine Species:																

SOIL

Sampling Point: Wetland MD-05

[illegible]



E



W



N



S



Soil

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Upland MD-05
Investigator(s): JFW Section, Township, Range: S08 4N 21W
Landform (hillslope, terrace, etc.): Shoulder slope Local relief (concave, convex, none): Flat Slope (%): 2
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.016992 Long: -82.983993 Datum: NAD 83
Soil Map Unit Name: Clifty silt loam, occasionally flooded NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
Are Vegetation _____, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes _____ No <u>X</u>	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present?	Yes _____ No <u>X</u>	
Wetland Hydrology Present?	Yes _____ No <u>X</u>	

Remarks:

PEM

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Surface Soil Cracks (B6)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Drainage Patterns (B10)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Moss Trim Lines (B16)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Dry-Season Water Table (C2)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Crayfish Burrows (C8)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Iron Deposits (B5)		☐ Stunted or Stressed Plants (D1)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Geomorphic Position (D2)
☐ Water-Stained Leaves (B9)		☐ Shallow Aquitard (D3)
☐ Aquatic Fauna (B13)		☐ Microtopographic Relief (D4)
		☐ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No X Depth (inches): _____
Water Table Present? Yes _____ No X Depth (inches): _____
Saturation Present? Yes _____ No X Depth (inches): _____
(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

None

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Upland MD-05

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status															
1. <u>Platanus occidentalis</u>	<u>20</u>	Yes	FACW	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>2</u> (A) Total Number of Dominant Species Across All Strata: <u>4</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.5</u> (A/B)														
2. _____																		
3. _____																		
4. _____																		
5. _____																		
6. _____																		
7. _____																		
<u>20</u> = Total Cover 50% of total cover: <u>10.0</u> 20% of total cover: <u>4.0</u>				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="text-align: left;">Total % Cover of:</th> <th style="text-align: left;">Multiply by:</th> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0.0</u></td> </tr> <tr> <td>FACW species <u>20</u></td> <td>x 2 = <u>40.0</u></td> </tr> <tr> <td>FAC species <u>35</u></td> <td>x 3 = <u>105.0</u></td> </tr> <tr> <td>FACU species <u>90</u></td> <td>x 4 = <u>360.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>145</u> (A)</td> <td><u>505.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>3.50</u>	Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0.0</u>	FACW species <u>20</u>	x 2 = <u>40.0</u>	FAC species <u>35</u>	x 3 = <u>105.0</u>	FACU species <u>90</u>	x 4 = <u>360.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>145</u> (A)	<u>505.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>0</u>	x 1 = <u>0.0</u>																	
FACW species <u>20</u>	x 2 = <u>40.0</u>																	
FAC species <u>35</u>	x 3 = <u>105.0</u>																	
FACU species <u>90</u>	x 4 = <u>360.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>145</u> (A)	<u>505.0</u> (B)																	
<u>20</u> = Total Cover 50% of total cover: <u>10.0</u> 20% of total cover: <u>10.0</u>																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. <u>Rosa multiflora</u>	<u>20</u>	Yes	FACU	Hydrophytic Vegetation Indicators: <u> </u> 1 - Rapid Test for Hydrophytic Vegetation <u>No</u> 2 - Dominance Test is >50% <u>No</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain)														
2. _____																		
3. _____																		
4. _____																		
5. _____																		
6. _____																		
7. _____																		
8. _____																		
9. _____																		
<u>20</u> = Total Cover 50% of total cover: <u>10.0</u> 20% of total cover: <u>10.0</u>																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <u>Schedonorus arundinaceus</u>	<u>20</u>	No	FACU	Definitions of Four Vegetation Strata: Tree – Woody plants, excluding vines, 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height. Sapling/Shrub – Woody plants, excluding vines, less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall. Herb – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall. Woody vine – All woody vines greater than 3.28 ft in height.														
2. <u>Microstegium vimineum</u>	<u>30</u>	Yes	FAC															
3. <u>Geum canadense</u>	<u>20</u>	No	FACU															
4. <u>Rosa multiflora</u>	<u>30</u>	Yes	FACU															
5. <u>Toxicodendron radicans</u>	<u>5</u>	No	FAC															
6. _____																		
7. _____																		
8. _____																		
9. _____																		
10. _____																		
11. _____																		
<u>105</u> = Total Cover 50% of total cover: <u>52.5</u> 20% of total cover: <u>21.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____				Hydrophytic Vegetation Present? Yes _____ No <u>X</u>														
2. _____																		
3. _____																		
4. _____																		
5. _____																		
6. _____																		
_____ = Total Cover 50% of total cover: _____ 20% of total cover: _____																		

Remarks: (Include photo numbers here or on a separate sheet.)

Other Tree Species:
 Other Sapling Species:

Other Herb Species:
 Other Woody Vine Species:

SOIL

Sampling Point: Upland MD-05

[illegible]



N



S



Soil

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-06
Investigator(s): JFW Section, Township, Range: S08 4N 21W
Landform (hillslope, terrace, etc.): Undulating Local relief (concave, convex, none): Flat Slope (%): 2
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.018095 Long: -82.984220 Datum: NAD 83
Soil Map Unit Name: Omulga silt loam, 2 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes ☒ No ☐ (If no, explain in Remarks.)
Are Vegetation ☐, Soil ☐, or Hydrology ☐ significantly disturbed? Are "Normal Circumstances" present? Yes ☒ No ☐
Are Vegetation ☐, Soil ☐, or Hydrology ☐ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

<table style="width: 100%;"><tr><td style="width: 30%;">Hydrophytic Vegetation Present?</td><td style="width: 30%;">Yes ☒</td><td style="width: 30%;">No ☐</td></tr><tr><td>Hydric Soil Present?</td><td>Yes ☒</td><td>No ☐</td></tr><tr><td>Wetland Hydrology Present?</td><td>Yes ☒</td><td>No ☐</td></tr></table>	Hydrophytic Vegetation Present?	Yes ☒	No ☐	Hydric Soil Present?	Yes ☒	No ☐	Wetland Hydrology Present?	Yes ☒	No ☐	<table style="width: 100%;"><tr><td style="width: 60%;">Is the Sampled Area within a Wetland?</td><td style="width: 20%;">Yes ☒</td><td style="width: 20%;">No ☐</td></tr></table>	Is the Sampled Area within a Wetland?	Yes ☒	No ☐
Hydrophytic Vegetation Present?	Yes ☒	No ☐											
Hydric Soil Present?	Yes ☒	No ☐											
Wetland Hydrology Present?	Yes ☒	No ☐											
Is the Sampled Area within a Wetland?	Yes ☒	No ☐											

Remarks:
PFO

HYDROLOGY

Wetland Hydrology Indicators:	Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>	
☐ Surface Water (A1)	☐ Surface Soil Cracks (B6)
☐ High Water Table (A2)	☐ Sparsely Vegetated Concave Surface (B8)
☒ Saturation (A3)	☐ Drainage Patterns (B10)
☐ Water Marks (B1)	☐ Moss Trim Lines (B16)
☐ Sediment Deposits (B2)	☐ Dry-Season Water Table (C2)
☐ Drift Deposits (B3)	☐ Crayfish Burrows (C8)
☐ Algal Mat or Crust (B4)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Iron Deposits (B5)	☐ Stunted or Stressed Plants (D1)
☐ Inundation Visible on Aerial Imagery (B7)	☒ Geomorphic Position (D2)
☒ Water-Stained Leaves (B9)	☐ Shallow Aquitard (D3)
☐ Aquatic Fauna (B13)	☐ Microtopographic Relief (D4)
	☒ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present?	Yes ☐	No ☒	Depth (inches): <u> </u>
Water Table Present?	Yes ☐	No ☒	Depth (inches): <u> </u>
Saturation Present? (includes capillary fringe)	Yes ☒	No ☐	Depth (inches): <u>0</u>

Wetland Hydrology Present? Yes ☒ No ☐

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Wetland MD-06

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:														
1. <u>Betula nigra</u>	<u>50</u>	<u>Yes</u>	<u>FACW</u>	Number of Dominant Species That Are OBL, FACW, or FAC: <u>4</u> (A) Total Number of Dominant Species Across All Strata: <u>4</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>1.0</u> (A/B)														
2. <u>Platanus occidentalis</u>	<u>30</u>	<u>Yes</u>	<u>FACW</u>															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
<u>80</u> = Total Cover 50% of total cover: <u>40.0</u> 20% of total cover: <u>16.0</u>				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="width: 50%;">Total % Cover of:</th> <th style="width: 50%;">Multiply by:</th> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0.0</u></td> </tr> <tr> <td>FACW species <u>180</u></td> <td>x 2 = <u>360.0</u></td> </tr> <tr> <td>FAC species <u>20</u></td> <td>x 3 = <u>60.0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>200</u> (A)</td> <td><u>420.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>2.10</u>	Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0.0</u>	FACW species <u>180</u>	x 2 = <u>360.0</u>	FAC species <u>20</u>	x 3 = <u>60.0</u>	FACU species <u>0</u>	x 4 = <u>0.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>200</u> (A)	<u>420.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>0</u>	x 1 = <u>0.0</u>																	
FACW species <u>180</u>	x 2 = <u>360.0</u>																	
FAC species <u>20</u>	x 3 = <u>60.0</u>																	
FACU species <u>0</u>	x 4 = <u>0.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>200</u> (A)	<u>420.0</u> (B)																	
Sapling/Shrub Stratum (Plot size: <u>15</u>) 1. _____ 2. _____ 3. _____ 4. _____ 5. _____ 6. _____ 7. _____ 8. _____ 9. _____ _____ = Total Cover 50% of total cover: _____ 20% of total cover: _____				Hydrophytic Vegetation Indicators: <u>Yes</u> 1 - Rapid Test for Hydrophytic Vegetation <u>Yes</u> 2 - Dominance Test is >50% <u>Yes</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain)														
Herb Stratum (Plot size: <u>5</u>) 1. <u>Microstegium vimineum</u> <u>20</u> <u>No</u> <u>FAC</u> 2. <u>Onoclea sensibilis</u> <u>40</u> <u>Yes</u> <u>FACW</u> 3. <u>Agrimonia parviflora</u> <u>50</u> <u>Yes</u> <u>FACW</u> 4. <u>Fraxinus pennsylvanica</u> <u>10</u> <u>No</u> <u>FACW</u> 5. _____ 6. _____ 7. _____ 8. _____ 9. _____ 10. _____ 11. _____ <u>120</u> = Total Cover 50% of total cover: <u>60.0</u> 20% of total cover: <u>24.0</u>					Definitions of Four Vegetation Strata: Tree – Woody plants, excluding vines, 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height. Sapling/Shrub – Woody plants, excluding vines, less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall. Herb – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall. Woody vine – All woody vines greater than 3.28 ft in height.													
Woody Vine Stratum (Plot size: <u>30</u>) 1. _____ 2. _____ 3. _____ 4. _____ 5. _____ _____ = Total Cover 50% of total cover: _____ 20% of total cover: _____						Hydrophytic Vegetation Present? Yes <u>X</u> No _____												
Remarks: (Include photo numbers here or on a separate sheet.) 																		
Other Tree Species: _____ Other Sapling Species: _____						Other Herb Species: _____ Other Woody Vine Species: _____												

SOIL

Sampling Point: Wetland MD-06

[illegible]



W



E



S



N



Soil

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Upland MD-06
Investigator(s): JFW Section, Township, Range: S08 4N 21W
Landform (hillslope, terrace, etc.): Undulating Local relief (concave, convex, none): Flat Slope (%): 2
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.018038 Long: -82.984097 Datum: NAD 83
Soil Map Unit Name: Omulga silt loam, 2 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
Are Vegetation _____, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes _____ No <u>X</u>	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present? Yes _____ No <u>X</u>	
Wetland Hydrology Present? Yes _____ No <u>X</u>	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Surface Soil Cracks (B6)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Drainage Patterns (B10)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Moss Trim Lines (B16)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Dry-Season Water Table (C2)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Crayfish Burrows (C8)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Iron Deposits (B5)		☐ Stunted or Stressed Plants (D1)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Geomorphic Position (D2)
☐ Water-Stained Leaves (B9)		☐ Shallow Aquitard (D3)
☐ Aquatic Fauna (B13)		☐ Microtopographic Relief (D4)
		☐ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No X Depth (inches): _____
Water Table Present? Yes _____ No X Depth (inches): _____
Saturation Present? Yes _____ No X Depth (inches): _____
(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

No hydrology indicators observed

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Upland MD-06

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:																
1. <u>Acer saccharum</u>	<u>30</u>	<u>Yes</u>	<u>FACU</u>	Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A)																
2. _____	_____	_____	_____	Total Number of Dominant Species Across All Strata: <u>3</u> (B)																
3. _____	_____	_____	_____	Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.33</u> (A/B)																
4. _____	_____	_____	_____	Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="width: 50%;">Total % Cover of:</th> <th style="width: 50%;">Multiply by:</th> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0.0</u></td> </tr> <tr> <td>FACW species <u>0</u></td> <td>x 2 = <u>0.0</u></td> </tr> <tr> <td>FAC species <u>85</u></td> <td>x 3 = <u>255.0</u></td> </tr> <tr> <td>FACU species <u>60</u></td> <td>x 4 = <u>240.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>145</u> (A)</td> <td><u>495.0</u> (B)</td> </tr> <tr> <td colspan="2">Prevalence Index = B/A = <u>3.40</u></td> </tr> </table>	Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0.0</u>	FACW species <u>0</u>	x 2 = <u>0.0</u>	FAC species <u>85</u>	x 3 = <u>255.0</u>	FACU species <u>60</u>	x 4 = <u>240.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>145</u> (A)	<u>495.0</u> (B)	Prevalence Index = B/A = <u>3.40</u>	
Total % Cover of:	Multiply by:																			
OBL species <u>0</u>	x 1 = <u>0.0</u>																			
FACW species <u>0</u>	x 2 = <u>0.0</u>																			
FAC species <u>85</u>	x 3 = <u>255.0</u>																			
FACU species <u>60</u>	x 4 = <u>240.0</u>																			
UPL species <u>0</u>	x 5 = <u>0.0</u>																			
Column Totals: <u>145</u> (A)	<u>495.0</u> (B)																			
Prevalence Index = B/A = <u>3.40</u>																				
5. _____	_____	_____	_____																	
6. _____	_____	_____	_____																	
7. _____	_____	_____	_____																	
8. _____	_____	_____	_____																	
9. _____	_____	_____	_____	Hydrophytic Vegetation Indicators: <u>No</u> 1 - Rapid Test for Hydrophytic Vegetation <u>No</u> 2 - Dominance Test is >50% <u>No</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.																
50% of total cover: <u>15.0</u> 20% of total cover: <u>6.0</u> Sapling/Shrub Stratum (Plot size: <u>15</u>)																				
1. _____	_____	_____	_____																	
2. _____	_____	_____	_____																	
3. _____	_____	_____	_____																	
4. _____	_____	_____	_____																	
5. _____	_____	_____	_____	Definitions of Four Vegetation Strata: Tree – Woody plants, excluding vines, 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height. Sapling/Shrub – Woody plants, excluding vines, less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall. Herb – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall. Woody vine – All woody vines greater than 3.28 ft in height.																
6. _____	_____	_____	_____																	
7. _____	_____	_____	_____																	
8. _____	_____	_____	_____																	
9. _____	_____	_____	_____																	
10. _____	_____	_____	_____	Hydrophytic Vegetation Present? Yes _____ No <u>X</u>																
11. _____	_____	_____	_____																	
50% of total cover: _____ 20% of total cover: _____ Herb Stratum (Plot size: <u>5</u>)																				
1. <u>Dichanthelium clandestinum</u>	<u>15</u>	<u>No</u>	<u>FAC</u>																	
2. <u>Rosa multiflora</u>	<u>30</u>	<u>Yes</u>	<u>FACU</u>																	
3. <u>Microstegium vimineum</u>	<u>50</u>	<u>Yes</u>	<u>FAC</u>																	
4. <u>Toxicodendron radicans</u>	<u>20</u>	<u>No</u>	<u>FAC</u>																	
5. _____	_____	_____	_____	Woody Vine Stratum (Plot size: <u>30</u>)																
6. _____	_____	_____	_____																	
7. _____	_____	_____	_____																	
8. _____	_____	_____	_____																	
9. _____	_____	_____	_____																	
10. _____	_____	_____	_____	50% of total cover: <u>57.5</u> 20% of total cover: <u>23.0</u> 115 = Total Cover																
11. _____	_____	_____	_____																	
50% of total cover: _____ 20% of total cover: _____																				
30 = Total Cover																				
50% of total cover: _____ 20% of total cover: _____																				

Remarks: (Include photo numbers here or on a separate sheet.)

Other Tree Species:
 Other Sapling Species:

Other Herb Species:
 Other Woody Vine Species:

SOIL

Sampling Point: Upland MD-06

[illegible]



N



S



Soil

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-07
Investigator(s): JFW Section, Township, Range: S08 4N 21W
Landform (hillslope, terrace, etc.): Channel (active) Local relief (concave, convex, none): Concave Slope (%): 1
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.018308 Long: -82.985666 Datum: NAD 83
Soil Map Unit Name: Clifty silt loam, occasionally flooded NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes ☒ No ☐ (If no, explain in Remarks.)
Are Vegetation ☒, Soil ☐, or Hydrology ☒ significantly disturbed? Are "Normal Circumstances" present? Yes ☒ No ☐
Are Vegetation ☐, Soil ☐, or Hydrology ☐ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes ☒ No ☐	Is the Sampled Area within a Wetland? Yes ☒ No ☐
Hydric Soil Present? Yes ☒ No ☐	
Wetland Hydrology Present? Yes ☒ No ☐	

Remarks:

Mowed roadside ditch

HYDROLOGY

Wetland Hydrology Indicators:	Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>	☐ Surface Soil Cracks (B6)
☒ Surface Water (A1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ High Water Table (A2)	☐ Drainage Patterns (B10)
☒ Saturation (A3)	☐ Moss Trim Lines (B16)
☐ Water Marks (B1)	☐ Dry-Season Water Table (C2)
☐ Sediment Deposits (B2)	☐ Crayfish Burrows (C8)
☐ Drift Deposits (B3)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Algal Mat or Crust (B4)	☐ Stunted or Stressed Plants (D1)
☐ Iron Deposits (B5)	☒ Geomorphic Position (D2)
☐ Inundation Visible on Aerial Imagery (B7)	☐ Shallow Aquitard (D3)
☐ Water-Stained Leaves (B9)	☐ Microtopographic Relief (D4)
☐ Aquatic Fauna (B13)	☒ FAC-Neutral Test (D5)
☐ True Aquatic Plants (B14)	
☒ Hydrogen Sulfide Odor (C1)	
☐ Oxidized Rhizospheres on Living Roots (C3)	
☒ Presence of Reduced Iron (C4)	
☐ Recent Iron Reduction in Tilled Soils (C6)	
☐ Thin Muck Surface (C7)	
☐ Other (Explain in Remarks)	

Field Observations:

Surface Water Present? Yes ☒ No ☐ Depth (inches): 3
Water Table Present? Yes ☐ No ☒ Depth (inches):
Saturation Present? Yes ☒ No ☐ Depth (inches): 0
(includes capillary fringe)

Wetland Hydrology Present? Yes ☒ No ☐

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Wetland MD-07

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:														
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>2</u> (A) Total Number of Dominant Species Across All Strata: <u>2</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>1.0</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="text-align: left;">Total % Cover of:</th> <th style="text-align: left;">Multiply by:</th> </tr> <tr> <td>OBL species <u>80</u></td> <td>x 1 = <u>80.0</u></td> </tr> <tr> <td>FACW species <u>15</u></td> <td>x 2 = <u>30.0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0.0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>95</u> (A)</td> <td><u>110.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>1.20</u>	Total % Cover of:	Multiply by:	OBL species <u>80</u>	x 1 = <u>80.0</u>	FACW species <u>15</u>	x 2 = <u>30.0</u>	FAC species <u>0</u>	x 3 = <u>0.0</u>	FACU species <u>0</u>	x 4 = <u>0.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>95</u> (A)	<u>110.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>80</u>	x 1 = <u>80.0</u>																	
FACW species <u>15</u>	x 2 = <u>30.0</u>																	
FAC species <u>0</u>	x 3 = <u>0.0</u>																	
FACU species <u>0</u>	x 4 = <u>0.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>95</u> (A)	<u>110.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <u>Juncus acuminatus</u>	<u>30</u>	<u>Yes</u>	<u>OBL</u>															
2. <u>Leersia oryzoides</u>	<u>50</u>	<u>Yes</u>	<u>OBL</u>															
3. <u>Scirpus cyperinus</u>	<u>10</u>	<u>No</u>	<u>FACW</u>															
4. <u>Juncus effusus</u>	<u>5</u>	<u>No</u>	<u>FACW</u>															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
<u>95</u> = Total Cover																		
50% of total cover: <u>47.5</u> 20% of total cover: <u>19.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.) 				Hydrophytic Vegetation Present?														
				Yes <u>X</u> No _____														
Other Tree Species: _____ Other Herb Species: _____ Other Sapling Species: _____ Other Woody Vine Species: _____																		

SOIL

Sampling Point: Wetland MD-07

[illegible]



N



S



W



E

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Upland MD-07
Investigator(s): JFW Section, Township, Range: S08 4N 21W
Landform (hillslope, terrace, etc.): Hillside Local relief (concave, convex, none): Flat Slope (%): 10
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.018297 Long: -82.985686 Datum: NAD 83
Soil Map Unit Name: Clifty silt loam, occasionally flooded NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
Are Vegetation X, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes _____ No <u>X</u>	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present? Yes _____ No _____	
Wetland Hydrology Present? Yes _____ No <u>X</u>	

Remarks:

Mowed

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Surface Soil Cracks (B6)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Drainage Patterns (B10)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Moss Trim Lines (B16)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Dry-Season Water Table (C2)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Crayfish Burrows (C8)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Iron Deposits (B5)		☐ Stunted or Stressed Plants (D1)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Geomorphic Position (D2)
☐ Water-Stained Leaves (B9)		☐ Shallow Aquitard (D3)
☐ Aquatic Fauna (B13)		☐ Microtopographic Relief (D4)
		☐ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No X Depth (inches): _____
Water Table Present? Yes _____ No X Depth (inches): _____
Saturation Present? Yes _____ No X Depth (inches): _____
(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

None

VEGETATION (Four Strata) – Use scientific names of plants.

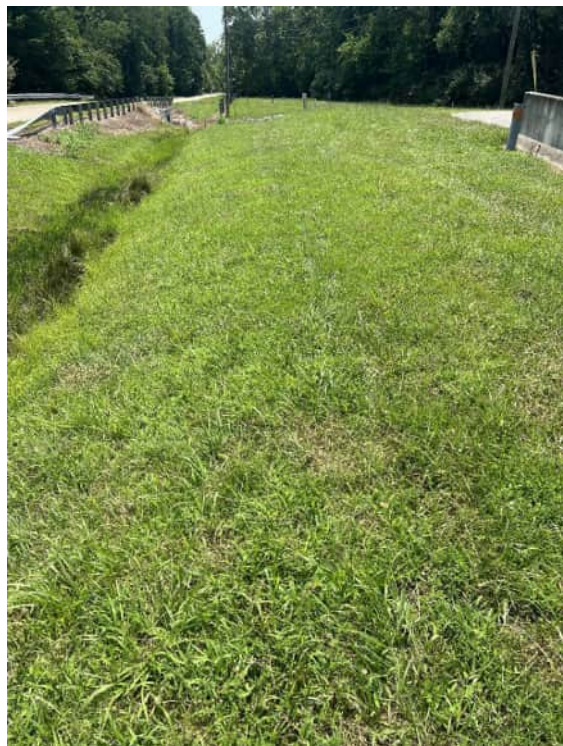
 Sampling Point: Upland MD-07

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:																								
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>0</u> (A)																								
2. _____	_____	_____	_____	Total Number of Dominant Species Across All Strata: <u>2</u> (B)																								
3. _____	_____	_____	_____	Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.0</u> (A/B)																								
4. _____	_____	_____	_____	Prevalence Index worksheet: <table style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="width: 40%;">Total % Cover of:</th> <th style="width: 20%;">Multiply by:</th> <th style="width: 40%;"></th> </tr> </thead> <tbody> <tr> <td>OBL species <u>0</u></td> <td>x 1 =</td> <td><u>0.0</u></td> </tr> <tr> <td>FACW species <u>0</u></td> <td>x 2 =</td> <td><u>0.0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 =</td> <td><u>0.0</u></td> </tr> <tr> <td>FACU species <u>90</u></td> <td>x 4 =</td> <td><u>360.0</u></td> </tr> <tr> <td>UPL species <u>15</u></td> <td>x 5 =</td> <td><u>75.0</u></td> </tr> <tr> <td>Column Totals: <u>105</u> (A)</td> <td></td> <td><u>435.0</u> (B)</td> </tr> <tr> <td colspan="3">Prevalence Index = B/A = <u>4.10</u></td> </tr> </tbody> </table>	Total % Cover of:	Multiply by:		OBL species <u>0</u>	x 1 =	<u>0.0</u>	FACW species <u>0</u>	x 2 =	<u>0.0</u>	FAC species <u>0</u>	x 3 =	<u>0.0</u>	FACU species <u>90</u>	x 4 =	<u>360.0</u>	UPL species <u>15</u>	x 5 =	<u>75.0</u>	Column Totals: <u>105</u> (A)		<u>435.0</u> (B)	Prevalence Index = B/A = <u>4.10</u>		
Total % Cover of:	Multiply by:																											
OBL species <u>0</u>	x 1 =	<u>0.0</u>																										
FACW species <u>0</u>	x 2 =	<u>0.0</u>																										
FAC species <u>0</u>	x 3 =	<u>0.0</u>																										
FACU species <u>90</u>	x 4 =	<u>360.0</u>																										
UPL species <u>15</u>	x 5 =	<u>75.0</u>																										
Column Totals: <u>105</u> (A)		<u>435.0</u> (B)																										
Prevalence Index = B/A = <u>4.10</u>																												
5. _____	_____	_____	_____																									
6. _____	_____	_____	_____																									
7. _____	_____	_____	_____																									
_____ = Total Cover	_____	_____	_____																									
50% of total cover: _____	20% of total cover: _____																											
Sapling/Shrub Stratum (Plot size: <u>15</u>)				Hydrophytic Vegetation Indicators: <u>No</u> 1 - Rapid Test for Hydrophytic Vegetation <u>No</u> 2 - Dominance Test is >50% <u>No</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain)																								
1. _____	_____	_____	_____																									
2. _____	_____	_____	_____																									
3. _____	_____	_____	_____																									
4. _____	_____	_____	_____																									
5. _____	_____	_____	_____	¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.																								
6. _____	_____	_____	_____																									
7. _____	_____	_____	_____																									
8. _____	_____	_____	_____																									
9. _____	_____	_____	_____																									
_____ = Total Cover	_____	_____	_____	Definitions of Four Vegetation Strata: Tree – Woody plants, excluding vines, 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height. Sapling/Shrub – Woody plants, excluding vines, less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall. Herb – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall. Woody vine – All woody vines greater than 3.28 ft in height.																								
50% of total cover: _____	20% of total cover: _____																											
Herb Stratum (Plot size: <u>5</u>)																												
1. <i>Schedonorus arundinaceus</i>	<u>60</u>	<u>Yes</u>	<u>FACU</u>																									
2. <i>Trifolium repens</i>	<u>25</u>	<u>Yes</u>	<u>FACU</u>																									
3. <i>Plantago lanceolata</i>	<u>15</u>	<u>No</u>	<u>UPL</u>																									
4. <i>Paspalum setaceum</i>	<u>5</u>	<u>No</u>	<u>FACU</u>																									
5. _____	_____	_____	_____	Hydrophytic Vegetation Present? Yes _____ No <u>X</u>																								
6. _____	_____	_____	_____																									
7. _____	_____	_____	_____																									
8. _____	_____	_____	_____																									
9. _____	_____	_____	_____																									
10. _____	_____	_____	_____																									
11. _____	_____	_____	_____																									
_____ = Total Cover	_____	_____	_____																									
50% of total cover: <u>52.5</u>	20% of total cover: <u>21.0</u>																											
Woody Vine Stratum (Plot size: <u>30</u>)																												
1. _____	_____	_____	_____																									
2. _____	_____	_____	_____																									
3. _____	_____	_____	_____																									
4. _____	_____	_____	_____																									
5. _____	_____	_____	_____																									
_____ = Total Cover	_____	_____	_____																									
50% of total cover: _____	20% of total cover: _____																											
Remarks: (Include photo numbers here or on a separate sheet.)																												
Other Tree Species:		Other Herb Species:																										
Other Sapling Species:		Other Woody Vine Species:																										

SOIL

Sampling Point: Upland MD-07

[illegible]



S

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-08
Investigator(s): JFW Section, Township, Range: S07 4N 21W
Landform (hillslope, terrace, etc.): Depression Local relief (concave, convex, none): Concave Slope (%): 5
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.022112 Long: -82.990130 Datum: NAD 83
Soil Map Unit Name: Urbanland-Omulga complex, 0 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes ☒ No ☐ (If no, explain in Remarks.)

Are Vegetation ☐, Soil ☐, or Hydrology ☐ significantly disturbed? Are "Normal Circumstances" present? Yes ☒ No ☐

Are Vegetation ☐, Soil ☐, or Hydrology ☐ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes ☒ No ☐	Is the Sampled Area within a Wetland? Yes ☒ No ☐
Hydric Soil Present? Yes ☒ No ☐	
Wetland Hydrology Present? Yes ☒ No ☐	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		☐ Surface Soil Cracks (B6)
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Sparsely Vegetated Concave Surface (B8)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Drainage Patterns (B10)
☒ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Moss Trim Lines (B16)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Dry-Season Water Table (C2)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Crayfish Burrows (C8)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Stunted or Stressed Plants (D1)
☐ Iron Deposits (B5)		☒ Geomorphic Position (D2)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Shallow Aquitard (D3)
☐ Water-Stained Leaves (B9)		☐ Microtopographic Relief (D4)
☐ Aquatic Fauna (B13)		☒ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes ☐ No ☒ Depth (inches):

Water Table Present? Yes ☐ No ☒ Depth (inches):

Saturation Present? Yes ☒ No ☐ Depth (inches): 0
(includes capillary fringe)

Wetland Hydrology Present? Yes ☒ No ☐

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Wetland MD-08

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:														
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>3</u> (A) Total Number of Dominant Species Across All Strata: <u>3</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>1.0</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="width: 40%;">Total % Cover of:</th> <th style="width: 60%;">Multiply by:</th> </tr> <tr> <td>OBL species <u>85</u></td> <td>x 1 = <u>85.0</u></td> </tr> <tr> <td>FACW species <u>20</u></td> <td>x 2 = <u>40.0</u></td> </tr> <tr> <td>FAC species <u>5</u></td> <td>x 3 = <u>15.0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>110</u> (A)</td> <td><u>140.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>1.30</u>	Total % Cover of:	Multiply by:	OBL species <u>85</u>	x 1 = <u>85.0</u>	FACW species <u>20</u>	x 2 = <u>40.0</u>	FAC species <u>5</u>	x 3 = <u>15.0</u>	FACU species <u>0</u>	x 4 = <u>0.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>110</u> (A)	<u>140.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>85</u>	x 1 = <u>85.0</u>																	
FACW species <u>20</u>	x 2 = <u>40.0</u>																	
FAC species <u>5</u>	x 3 = <u>15.0</u>																	
FACU species <u>0</u>	x 4 = <u>0.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>110</u> (A)	<u>140.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <u>Carex lurida</u>	<u>20</u>	<u>Yes</u>	<u>OBL</u>															
2. <u>Rumex crispus</u>	<u>5</u>	<u>No</u>	<u>FAC</u>															
3. <u>Mentha spicata</u>	<u>20</u>	<u>Yes</u>	<u>FACW</u>															
4. <u>Carex frankii</u>	<u>40</u>	<u>Yes</u>	<u>OBL</u>															
5. <u>Juncus acuminatus</u>	<u>10</u>	<u>No</u>	<u>OBL</u>															
6. <u>Alisma subcordatum</u>	<u>5</u>	<u>No</u>	<u>OBL</u>															
7. <u>Leersia oryzoides</u>	<u>10</u>	<u>No</u>	<u>OBL</u>															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
<u>110</u> = Total Cover																		
50% of total cover: <u>55.0</u> 20% of total cover: <u>22.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.) 				Hydrophytic Vegetation Present?														
				Yes <u>X</u> No _____														
Other Tree Species: _____ Other Herb Species: _____ Other Sapling Species: _____ Other Woody Vine Species: _____																		

SOIL

Sampling Point: Wetland MD-08

[illegible]



S



N



W



E

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Upland MD-08
Investigator(s): JFW Section, Township, Range: S07 4N 21W
Landform (hillslope, terrace, etc.): Hillside Local relief (concave, convex, none): Convex Slope (%): 8
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.022077 Long: -82.990091 Datum: NAD 83
Soil Map Unit Name: Urbanland-Omulga complex, 0 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)

Are Vegetation X, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____

Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes _____ No <u>X</u>	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present? Yes _____ No <u>X</u>	
Wetland Hydrology Present? Yes _____ No <u>X</u>	

Remarks:

Mowed

HYDROLOGY

Wetland Hydrology Indicators:		<u>Secondary Indicators (minimum of two required)</u>
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		____ Surface Soil Cracks (B6)
____ Surface Water (A1)	____ True Aquatic Plants (B14)	____ Sparsely Vegetated Concave Surface (B8)
____ High Water Table (A2)	____ Hydrogen Sulfide Odor (C1)	____ Drainage Patterns (B10)
____ Saturation (A3)	____ Oxidized Rhizospheres on Living Roots (C3)	____ Moss Trim Lines (B16)
____ Water Marks (B1)	____ Presence of Reduced Iron (C4)	____ Dry-Season Water Table (C2)
____ Sediment Deposits (B2)	____ Recent Iron Reduction in Tilled Soils (C6)	____ Crayfish Burrows (C8)
____ Drift Deposits (B3)	____ Thin Muck Surface (C7)	____ Saturation Visible on Aerial Imagery (C9)
____ Algal Mat or Crust (B4)	____ Other (Explain in Remarks)	____ Stunted or Stressed Plants (D1)
____ Iron Deposits (B5)		____ Geomorphic Position (D2)
____ Inundation Visible on Aerial Imagery (B7)		____ Shallow Aquitard (D3)
____ Water-Stained Leaves (B9)		____ Microtopographic Relief (D4)
____ Aquatic Fauna (B13)		____ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No X Depth (inches): _____

Water Table Present? Yes _____ No X Depth (inches): _____

Saturation Present? Yes _____ No X Depth (inches): _____
(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

None

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Upland MD-08

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status															
1. <u>Juglans nigra</u>	<u>20</u>	<u>Yes</u>	<u>FACU</u>	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>0</u> (A) Total Number of Dominant Species Across All Strata: <u>5</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.0</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
20 = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="text-align: left;">Total % Cover of:</th> <th style="text-align: left;">Multiply by:</th> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0.0</u></td> </tr> <tr> <td>FACW species <u>0</u></td> <td>x 2 = <u>0.0</u></td> </tr> <tr> <td>FAC species <u>10</u></td> <td>x 3 = <u>30.0</u></td> </tr> <tr> <td>FACU species <u>100</u></td> <td>x 4 = <u>400.0</u></td> </tr> <tr> <td>UPL species <u>20</u></td> <td>x 5 = <u>100.0</u></td> </tr> <tr> <td>Column Totals: <u>130</u> (A)</td> <td><u>530.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>4.10</u>	Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0.0</u>	FACW species <u>0</u>	x 2 = <u>0.0</u>	FAC species <u>10</u>	x 3 = <u>30.0</u>	FACU species <u>100</u>	x 4 = <u>400.0</u>	UPL species <u>20</u>	x 5 = <u>100.0</u>	Column Totals: <u>130</u> (A)	<u>530.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>0</u>	x 1 = <u>0.0</u>																	
FACW species <u>0</u>	x 2 = <u>0.0</u>																	
FAC species <u>10</u>	x 3 = <u>30.0</u>																	
FACU species <u>100</u>	x 4 = <u>400.0</u>																	
UPL species <u>20</u>	x 5 = <u>100.0</u>																	
Column Totals: <u>130</u> (A)	<u>530.0</u> (B)																	
50% of total cover: <u>10.0</u> 20% of total cover: <u>4.0</u>																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. <u>Elaeagnus angustifolia</u>	<u>10</u>	<u>Yes</u>	<u>FACU</u>															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10 = Total Cover																		
50% of total cover: <u>5.0</u> 20% of total cover: <u>5.0</u>																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <u>Diospyros virginiana</u>	<u>10</u>	<u>No</u>	<u>FAC</u>	Hydrophytic Vegetation Indicators: <u>No</u> 1 - Rapid Test for Hydrophytic Vegetation <u>No</u> 2 - Dominance Test is >50% <u>No</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.														
2. <u>Lotus corniculatus</u>	<u>20</u>	<u>Yes</u>	<u>FACU</u>															
3. <u>Plantago lanceolata</u>	<u>20</u>	<u>Yes</u>	<u>UPL</u>															
4. <u>Schedonorus arundinaceus</u>	<u>40</u>	<u>Yes</u>	<u>FACU</u>															
5. <u>Trifolium pratense</u>	<u>10</u>	<u>No</u>	<u>FACU</u>															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
100 = Total Cover																		
50% of total cover: <u>50.0</u> 20% of total cover: <u>20.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.) 																		
Other Tree Species:		Other Herb Species:																
Other Sapling Species:		Other Woody Vine Species:																

SOIL

Sampling Point: Upland MD-08

[illegible]



S

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/27/2026
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-09
Investigator(s): JFW Section, Township, Range: S07 4N 21W
Landform (hillslope, terrace, etc.): Channel (active) Local relief (concave, convex, none): Concave Slope (%): 5
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.022837 Long: -82.994331 Datum: NAD 83
Soil Map Unit Name: Urbanland-Omulga complex, 0 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes ☒ No ☐ (If no, explain in Remarks.)

Are Vegetation ☐, Soil ☐, or Hydrology ☐ significantly disturbed? Are "Normal Circumstances" present? Yes ☒ No ☐

Are Vegetation ☐, Soil ☐, or Hydrology ☐ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes ☒ No ☐	Is the Sampled Area within a Wetland? Yes ☒ No ☐
Hydric Soil Present? Yes ☒ No ☐	
Wetland Hydrology Present? Yes ☒ No ☐	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:	Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>	☐ Surface Soil Cracks (B6)
☒ Surface Water (A1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ High Water Table (A2)	☐ Drainage Patterns (B10)
☒ Saturation (A3)	☐ Moss Trim Lines (B16)
☐ Water Marks (B1)	☐ Dry-Season Water Table (C2)
☐ Sediment Deposits (B2)	☐ Crayfish Burrows (C8)
☐ Drift Deposits (B3)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Algal Mat or Crust (B4)	☐ Stunted or Stressed Plants (D1)
☒ Iron Deposits (B5)	☒ Geomorphic Position (D2)
☐ Inundation Visible on Aerial Imagery (B7)	☐ Shallow Aquitard (D3)
☐ Water-Stained Leaves (B9)	☐ Microtopographic Relief (D4)
☐ Aquatic Fauna (B13)	☒ FAC-Neutral Test (D5)
☐ True Aquatic Plants (B14)	
☐ Hydrogen Sulfide Odor (C1)	
☐ Oxidized Rhizospheres on Living Roots (C3)	
☐ Presence of Reduced Iron (C4)	
☐ Recent Iron Reduction in Tilled Soils (C6)	
☐ Thin Muck Surface (C7)	
☐ Other (Explain in Remarks)	

Field Observations:

Surface Water Present? Yes ☒ No ☐ Depth (inches): 1

Water Table Present? Yes ☐ No ☒ Depth (inches):

Saturation Present? Yes ☒ No ☐ Depth (inches): 0
(includes capillary fringe)

Wetland Hydrology Present? Yes ☒ No ☐

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Wetland MD-09

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:														
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A) Total Number of Dominant Species Across All Strata: <u>1</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>1.0</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <td style="width: 50%;">Total % Cover of:</td> <td style="width: 50%;">Multiply by:</td> </tr> <tr> <td>OBL species <u>100</u></td> <td>x 1 = <u>100.0</u></td> </tr> <tr> <td>FACW species <u>0</u></td> <td>x 2 = <u>0.0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0.0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>100</u> (A)</td> <td><u>100.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>1.0</u>	Total % Cover of:	Multiply by:	OBL species <u>100</u>	x 1 = <u>100.0</u>	FACW species <u>0</u>	x 2 = <u>0.0</u>	FAC species <u>0</u>	x 3 = <u>0.0</u>	FACU species <u>0</u>	x 4 = <u>0.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>100</u> (A)	<u>100.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>100</u>	x 1 = <u>100.0</u>																	
FACW species <u>0</u>	x 2 = <u>0.0</u>																	
FAC species <u>0</u>	x 3 = <u>0.0</u>																	
FACU species <u>0</u>	x 4 = <u>0.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>100</u> (A)	<u>100.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <u>Typha angustifolia</u>	<u>100</u>	<u>Yes</u>	<u>OBL</u>	Hydrophytic Vegetation Indicators: <u>Yes</u> 1 - Rapid Test for Hydrophytic Vegetation <u>Yes</u> 2 - Dominance Test is >50% <u>Yes</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: <u>50.0</u> 20% of total cover: <u>20.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.)																		
Other Tree Species: _____ Other Herb Species: _____ Other Sapling Species: _____ Other Woody Vine Species: _____																		

SOIL

Sampling Point: Wetland MD-09

[illegible]



E

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/14/26
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-10
Investigator(s): JFW Section, Township, Range: S07 4N 21W
Landform (hillslope, terrace, etc.): Lowland Local relief (concave, convex, none): Convex Slope (%): 3-5
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.023566 Long: -83.000260 Datum: NAD 83
Soil Map Unit Name: Urbanland-Omulga complex, 0 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes ☒ No ☐ (If no, explain in Remarks.)
Are Vegetation ☐, Soil ☐, or Hydrology ☐ significantly disturbed? Are "Normal Circumstances" present? Yes ☒ No ☐
Are Vegetation ☐, Soil ☐, or Hydrology ☐ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes ☒ No ☐	Is the Sampled Area within a Wetland? Yes ☒ No ☐
Hydric Soil Present? Yes ☒ No ☐	
Wetland Hydrology Present? Yes ☒ No ☐	

Remarks:

PEM

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		☐ Surface Soil Cracks (B6)
☒ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Sparsely Vegetated Concave Surface (B8)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Drainage Patterns (B10)
☒ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Moss Trim Lines (B16)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Dry-Season Water Table (C2)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Crayfish Burrows (C8)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Stunted or Stressed Plants (D1)
☐ Iron Deposits (B5)		☒ Geomorphic Position (D2)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Shallow Aquitard (D3)
☐ Water-Stained Leaves (B9)		☐ Microtopographic Relief (D4)
☐ Aquatic Fauna (B13)		☒ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes ☒ No ☐ Depth (inches): 1
Water Table Present? Yes ☐ No ☒ Depth (inches):
Saturation Present? Yes ☒ No ☐ Depth (inches): 0
(includes capillary fringe)

Wetland Hydrology Present? Yes ☒ No ☐

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Wetland MD-10

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:														
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A) Total Number of Dominant Species Across All Strata: <u>1</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>1.0</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="text-align: left;">Total % Cover of:</th> <th style="text-align: left;">Multiply by:</th> </tr> <tr> <td>OBL species <u>80</u></td> <td>x 1 = <u>80.0</u></td> </tr> <tr> <td>FACW species <u>10</u></td> <td>x 2 = <u>20.0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0.0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>90</u> (A)</td> <td><u>100.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>1.10</u>	Total % Cover of:	Multiply by:	OBL species <u>80</u>	x 1 = <u>80.0</u>	FACW species <u>10</u>	x 2 = <u>20.0</u>	FAC species <u>0</u>	x 3 = <u>0.0</u>	FACU species <u>0</u>	x 4 = <u>0.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>90</u> (A)	<u>100.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>80</u>	x 1 = <u>80.0</u>																	
FACW species <u>10</u>	x 2 = <u>20.0</u>																	
FAC species <u>0</u>	x 3 = <u>0.0</u>																	
FACU species <u>0</u>	x 4 = <u>0.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>90</u> (A)	<u>100.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <u>Typha angustifolia</u>	<u>80</u>	<u>Yes</u>	<u>OBL</u>	Hydrophytic Vegetation Indicators: <u>Yes</u> 1 - Rapid Test for Hydrophytic Vegetation <u>Yes</u> 2 - Dominance Test is >50% <u>Yes</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain)														
2. <u>Agrimonia parviflora</u>	<u>10</u>	<u>No</u>	<u>FACW</u>															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
<u>90</u> = Total Cover																		
50% of total cover: <u>45.0</u> 20% of total cover: <u>18.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.)				Hydrophytic Vegetation Present?														
				Yes <u>X</u> No _____														
Other Tree Species: _____ Other Herb Species: _____ Other Sapling Species: _____ Other Woody Vine Species: _____																		

SOIL

Sampling Point: Wetland MD-10

[illegible]



W



E



N



S

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/14/26
Applicant/Owner: AEP State: OH Sampling Point: Upland MD-09,10
Investigator(s): JFW Section, Township, Range: S07 4N 21W
Landform (hillslope, terrace, etc.): Flat Local relief (concave, convex, none): Concave Slope (%): 1-2
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.023410 Long: -83.000432 Datum: NAD 83
Soil Map Unit Name: Urbanland-Omulga complex, 0 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
Are Vegetation _____, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes _____ No <u>X</u>	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present? Yes _____ No <u>X</u>	
Wetland Hydrology Present? Yes _____ No <u>X</u>	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Surface Soil Cracks (B6)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Drainage Patterns (B10)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Moss Trim Lines (B16)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Dry-Season Water Table (C2)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Crayfish Burrows (C8)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Iron Deposits (B5)		☐ Stunted or Stressed Plants (D1)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Geomorphic Position (D2)
☐ Water-Stained Leaves (B9)		☐ Shallow Aquitard (D3)
☐ Aquatic Fauna (B13)		☐ Microtopographic Relief (D4)
		☐ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No X Depth (inches): _____
Water Table Present? Yes _____ No X Depth (inches): _____
Saturation Present? Yes _____ No X Depth (inches): _____
(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

No hydrology indicators observed

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Upland MD-09,10

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:														
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>0</u> (A)														
2. _____	_____	_____	_____	Total Number of Dominant Species Across All Strata: <u>2</u> (B)														
3. _____	_____	_____	_____	Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.0</u> (A/B)														
4. _____	_____	_____	_____	Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="width: 50%;">Total % Cover of:</th> <th style="width: 50%;">Multiply by:</th> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0.0</u></td> </tr> <tr> <td>FACW species <u>0</u></td> <td>x 2 = <u>0.0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0.0</u></td> </tr> <tr> <td>FACU species <u>10</u></td> <td>x 4 = <u>40.0</u></td> </tr> <tr> <td>UPL species <u>20</u></td> <td>x 5 = <u>100.0</u></td> </tr> <tr> <td>Column Totals: <u>30</u> (A)</td> <td><u>140.0</u> (B)</td> </tr> </table>	Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0.0</u>	FACW species <u>0</u>	x 2 = <u>0.0</u>	FAC species <u>0</u>	x 3 = <u>0.0</u>	FACU species <u>10</u>	x 4 = <u>40.0</u>	UPL species <u>20</u>	x 5 = <u>100.0</u>	Column Totals: <u>30</u> (A)	<u>140.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>0</u>	x 1 = <u>0.0</u>																	
FACW species <u>0</u>	x 2 = <u>0.0</u>																	
FAC species <u>0</u>	x 3 = <u>0.0</u>																	
FACU species <u>10</u>	x 4 = <u>40.0</u>																	
UPL species <u>20</u>	x 5 = <u>100.0</u>																	
Column Totals: <u>30</u> (A)	<u>140.0</u> (B)																	
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover 50% of total cover: _____ 20% of total cover: _____				Prevalence Index = B/A = <u>4.70</u>														
Sapling/Shrub Stratum (Plot size: <u>15</u>) 1. _____ 2. _____ 3. _____ 4. _____ 5. _____ 6. _____ 7. _____ 8. _____ 9. _____ _____ = Total Cover 50% of total cover: _____ 20% of total cover: _____				Hydrophytic Vegetation Indicators: <u>No</u> 1 - Rapid Test for Hydrophytic Vegetation <u>No</u> 2 - Dominance Test is >50% <u>No</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.														
Herb Stratum (Plot size: <u>5</u>) 1. Lotus corniculatus 50 Yes FACU 2. Trifolium repens 10 No FACU 3. Daucus carota 10 No UPL 4. Plantago lanceolata 10 No UPL 5. Schedonorus arundinaceus 30 Yes FACU 6. _____ 7. _____ 8. _____ 9. _____ 10. _____ 11. _____ _____ = Total Cover 50% of total cover: <u>55.0</u> 20% of total cover: <u>22.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>) 1. _____ 2. _____ 3. _____ 4. _____ 5. _____ _____ = Total Cover 50% of total cover: _____ 20% of total cover: _____																		
_____ = Total Cover 50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.) 				Definitions of Four Vegetation Strata: Tree – Woody plants, excluding vines, 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height. Sapling/Shrub – Woody plants, excluding vines, less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall. Herb – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall. Woody vine – All woody vines greater than 3.28 ft in height.														
Other Tree Species: _____ Other Herb Species: _____ Other Sapling Species: _____ Other Woody Vine Species: _____				Hydrophytic Vegetation Present? Yes _____ No <u>X</u>														

SOIL

Sampling Point: Upland MD-09,10

[illegible]



W



E

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/14/26
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-11
Investigator(s): JFW Section, Township, Range: S07 4N 21W
Landform (hillslope, terrace, etc.): Channel (active) Local relief (concave, convex, none): Concave Slope (%): 3
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.022668 Long: -83.004418 Datum: NAD 83
Soil Map Unit Name: Urbanland-Omulga complex, 0 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes ☒ No ☐ (If no, explain in Remarks.)

Are Vegetation ☐, Soil ☐, or Hydrology ☐ significantly disturbed? Are "Normal Circumstances" present? Yes ☒ No ☐

Are Vegetation ☐, Soil ☐, or Hydrology ☐ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes ☒ No ☐	Is the Sampled Area within a Wetland? Yes ☒ No ☐
Hydric Soil Present? Yes ☒ No ☐	
Wetland Hydrology Present? Yes ☒ No ☐	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:	Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>	☐ Surface Soil Cracks (B6)
☒ Surface Water (A1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ High Water Table (A2)	☐ Drainage Patterns (B10)
☒ Saturation (A3)	☐ Moss Trim Lines (B16)
☐ Water Marks (B1)	☐ Dry-Season Water Table (C2)
☐ Sediment Deposits (B2)	☐ Crayfish Burrows (C8)
☐ Drift Deposits (B3)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Algal Mat or Crust (B4)	☐ Stunted or Stressed Plants (D1)
☐ Iron Deposits (B5)	☒ Geomorphic Position (D2)
☐ Inundation Visible on Aerial Imagery (B7)	☐ Shallow Aquitard (D3)
☐ Water-Stained Leaves (B9)	☐ Microtopographic Relief (D4)
☐ Aquatic Fauna (B13)	☒ FAC-Neutral Test (D5)
☐ True Aquatic Plants (B14)	
☐ Hydrogen Sulfide Odor (C1)	
☐ Oxidized Rhizospheres on Living Roots (C3)	
☐ Presence of Reduced Iron (C4)	
☐ Recent Iron Reduction in Tilled Soils (C6)	
☐ Thin Muck Surface (C7)	
☐ Other (Explain in Remarks)	

Field Observations:

Surface Water Present? Yes ☒ No ☐ Depth (inches): 0

Water Table Present? Yes ☐ No ☒ Depth (inches):

Saturation Present? Yes ☒ No ☐ Depth (inches): 0
(includes capillary fringe)

Wetland Hydrology Present? Yes ☒ No ☐

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Wetland MD-11

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:														
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A) Total Number of Dominant Species Across All Strata: <u>1</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>1.0</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th style="text-align: left;">Total % Cover of:</th> <th style="text-align: left;">Multiply by:</th> </tr> <tr> <td>OBL species <u>50</u></td> <td>x 1 = <u>50.0</u></td> </tr> <tr> <td>FACW species <u>0</u></td> <td>x 2 = <u>0.0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0.0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>50</u> (A)</td> <td><u>50.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>1.00</u>	Total % Cover of:	Multiply by:	OBL species <u>50</u>	x 1 = <u>50.0</u>	FACW species <u>0</u>	x 2 = <u>0.0</u>	FAC species <u>0</u>	x 3 = <u>0.0</u>	FACU species <u>0</u>	x 4 = <u>0.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>50</u> (A)	<u>50.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>50</u>	x 1 = <u>50.0</u>																	
FACW species <u>0</u>	x 2 = <u>0.0</u>																	
FAC species <u>0</u>	x 3 = <u>0.0</u>																	
FACU species <u>0</u>	x 4 = <u>0.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>50</u> (A)	<u>50.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <u>Typha latifolia</u>	<u>50</u>	<u>Yes</u>	<u>OBL</u>	Hydrophytic Vegetation Indicators: <u>Yes</u> 1 - Rapid Test for Hydrophytic Vegetation <u>Yes</u> 2 - Dominance Test is >50% <u>Yes</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: <u>25.0</u> 20% of total cover: <u>10.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Remarks: (Include photo numbers here or on a separate sheet.)																		
Other Tree Species: _____ Other Herb Species: _____ Other Sapling Species: _____ Other Woody Vine Species: _____																		

SOIL

Sampling Point: Wetland MD-11

[illegible]



E



W



N



S

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/14/26
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-12
Investigator(s): JFW Section, Township, Range: S07 4N 21W
Landform (hillslope, terrace, etc.): Channel (active) Local relief (concave, convex, none): Concave Slope (%): 2
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.022740 Long: -83.004911 Datum: NAD 83
Soil Map Unit Name: Urbanland-Omulga complex, 0 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
Are Vegetation _____, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <u>X</u> No _____	Is the Sampled Area within a Wetland? Yes <u>X</u> No _____
Hydric Soil Present? Yes <u>X</u> No _____	
Wetland Hydrology Present? Yes <u>X</u> No _____	

Remarks:

PAB

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		
<u>X</u> Surface Water (A1)	<u>X</u> True Aquatic Plants (B14)	___ Surface Soil Cracks (B6)
___ High Water Table (A2)	<u>X</u> Hydrogen Sulfide Odor (C1)	___ Sparsely Vegetated Concave Surface (B8)
<u>X</u> Saturation (A3)	___ Oxidized Rhizospheres on Living Roots (C3)	___ Drainage Patterns (B10)
___ Water Marks (B1)	___ Presence of Reduced Iron (C4)	___ Moss Trim Lines (B16)
___ Sediment Deposits (B2)	___ Recent Iron Reduction in Tilled Soils (C6)	___ Dry-Season Water Table (C2)
___ Drift Deposits (B3)	___ Thin Muck Surface (C7)	___ Crayfish Burrows (C8)
___ Algal Mat or Crust (B4)	___ Other (Explain in Remarks)	___ Saturation Visible on Aerial Imagery (C9)
___ Iron Deposits (B5)		___ Stunted or Stressed Plants (D1)
___ Inundation Visible on Aerial Imagery (B7)		<u>X</u> Geomorphic Position (D2)
___ Water-Stained Leaves (B9)		___ Shallow Aquitard (D3)
___ Aquatic Fauna (B13)		___ Microtopographic Relief (D4)
		<u>X</u> FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes X No _____ Depth (inches): 3
Water Table Present? Yes _____ No X Depth (inches): _____
Saturation Present? Yes X No _____ Depth (inches): 0
(includes capillary fringe)

Wetland Hydrology Present? Yes X No _____

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Wetland MD-12

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status															
1. _____	_____	_____	_____	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A) Total Number of Dominant Species Across All Strata: <u>1</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>1.0</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <td style="width: 50%;">Total % Cover of:</td> <td style="width: 50%;">Multiply by:</td> </tr> <tr> <td>OBL species <u>10</u></td> <td>x 1 = <u>10.0</u></td> </tr> <tr> <td>FACW species <u>0</u></td> <td>x 2 = <u>0.0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0.0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0.0</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0.0</u></td> </tr> <tr> <td>Column Totals: <u>10</u> (A)</td> <td><u>10.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>1.00</u>	Total % Cover of:	Multiply by:	OBL species <u>10</u>	x 1 = <u>10.0</u>	FACW species <u>0</u>	x 2 = <u>0.0</u>	FAC species <u>0</u>	x 3 = <u>0.0</u>	FACU species <u>0</u>	x 4 = <u>0.0</u>	UPL species <u>0</u>	x 5 = <u>0.0</u>	Column Totals: <u>10</u> (A)	<u>10.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>10</u>	x 1 = <u>10.0</u>																	
FACW species <u>0</u>	x 2 = <u>0.0</u>																	
FAC species <u>0</u>	x 3 = <u>0.0</u>																	
FACU species <u>0</u>	x 4 = <u>0.0</u>																	
UPL species <u>0</u>	x 5 = <u>0.0</u>																	
Column Totals: <u>10</u> (A)	<u>10.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover				Hydrophytic Vegetation Indicators: <u>Yes</u> 1 - Rapid Test for Hydrophytic Vegetation <u>Yes</u> 2 - Dominance Test is >50% <u>Yes</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain)														
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <u>Lemna minor</u>	<u>70</u>	<u>Yes</u>	<u>OBL</u>															
2. <u>Typha angustifolia</u>	<u>10</u>	<u>No</u>	<u>OBL</u>															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
_____ = Total Cover				Definitions of Four Vegetation Strata: Tree – Woody plants, excluding vines, 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height. Sapling/Shrub – Woody plants, excluding vines, less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall. Herb – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall. Woody vine – All woody vines greater than 3.28 ft in height.														
50% of total cover: <u>40.0</u> 20% of total cover: <u>16.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		

Remarks: (Include photo numbers here or on a separate sheet.)

Other Tree Species:
 Other Sapling Species:

Other Herb Species:
 Other Woody Vine Species:

SOIL

Sampling Point: Wetland MD-12

[illegible]



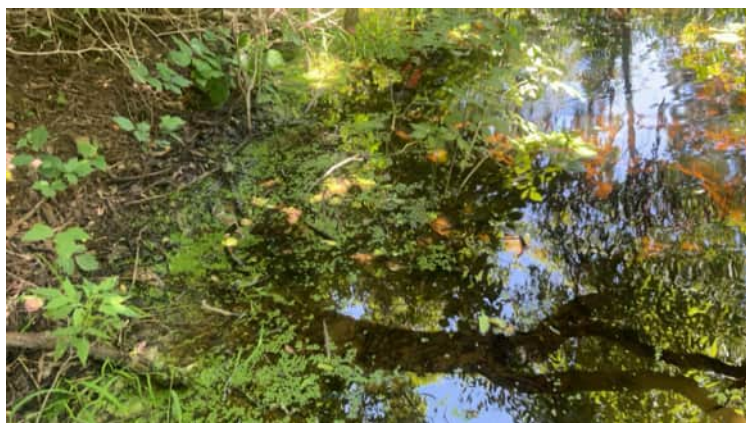
E



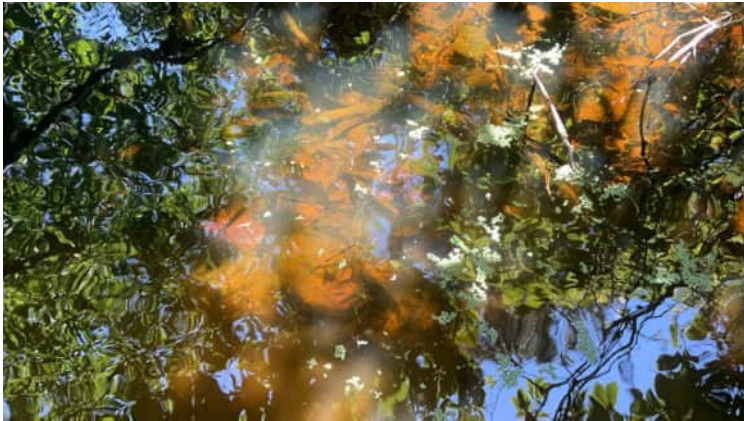
W



N



S



Soil

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/14/26
Applicant/Owner: AEP State: OH Sampling Point: Upland MD-11,12
Investigator(s): JFW Section, Township, Range: S07 4N 21W
Landform (hillslope, terrace, etc.): Flat Local relief (concave, convex, none): Concave Slope (%): 2
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.022751 Long: -83.004903 Datum: NAD 83
Soil Map Unit Name: Urbanland-Omulga complex, 0 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
Are Vegetation _____, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes _____ No <u>X</u>	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present? Yes _____ No <u>X</u>	
Wetland Hydrology Present? Yes _____ No <u>X</u>	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Surface Soil Cracks (B6)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Drainage Patterns (B10)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Moss Trim Lines (B16)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Dry-Season Water Table (C2)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Crayfish Burrows (C8)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Iron Deposits (B5)		☐ Stunted or Stressed Plants (D1)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Geomorphic Position (D2)
☐ Water-Stained Leaves (B9)		☐ Shallow Aquitard (D3)
☐ Aquatic Fauna (B13)		☐ Microtopographic Relief (D4)
		☐ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No X Depth (inches): _____
Water Table Present? Yes _____ No X Depth (inches): _____
Saturation Present? Yes _____ No X Depth (inches): _____
(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

No hydrology indicators observed

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Upland MD-11,12

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:																
1. _____	_____	_____	_____	Number of Dominant Species That Are OBL, FACW, or FAC: <u>0</u> (A)																
2. _____	_____	_____	_____	Total Number of Dominant Species Across All Strata: <u>2</u> (B)																
3. _____	_____	_____	_____	Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.0</u> (A/B)																
4. _____	_____	_____	_____	Prevalence Index worksheet: <table style="width: 100%;"> <tr> <th>Total % Cover of:</th> <th>Multiply by:</th> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0.0</u></td> </tr> <tr> <td>FACW species <u>0</u></td> <td>x 2 = <u>0.0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0.0</u></td> </tr> <tr> <td>FACU species <u>30</u></td> <td>x 4 = <u>120.0</u></td> </tr> <tr> <td>UPL species <u>30</u></td> <td>x 5 = <u>150.0</u></td> </tr> <tr> <td>Column Totals: <u>60</u> (A)</td> <td><u>270.0</u> (B)</td> </tr> <tr> <td colspan="2">Prevalence Index = B/A = <u>4.50</u></td> </tr> </table>	Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0.0</u>	FACW species <u>0</u>	x 2 = <u>0.0</u>	FAC species <u>0</u>	x 3 = <u>0.0</u>	FACU species <u>30</u>	x 4 = <u>120.0</u>	UPL species <u>30</u>	x 5 = <u>150.0</u>	Column Totals: <u>60</u> (A)	<u>270.0</u> (B)	Prevalence Index = B/A = <u>4.50</u>	
Total % Cover of:	Multiply by:																			
OBL species <u>0</u>	x 1 = <u>0.0</u>																			
FACW species <u>0</u>	x 2 = <u>0.0</u>																			
FAC species <u>0</u>	x 3 = <u>0.0</u>																			
FACU species <u>30</u>	x 4 = <u>120.0</u>																			
UPL species <u>30</u>	x 5 = <u>150.0</u>																			
Column Totals: <u>60</u> (A)	<u>270.0</u> (B)																			
Prevalence Index = B/A = <u>4.50</u>																				
5. _____	_____	_____	_____																	
6. _____	_____	_____	_____																	
7. _____	_____	_____	_____																	
_____ = Total Cover 50% of total cover: _____ 20% of total cover: _____				Hydrophytic Vegetation Indicators: <u>No</u> 1 - Rapid Test for Hydrophytic Vegetation <u>No</u> 2 - Dominance Test is >50% <u>No</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain)																
Sapling/Shrub Stratum (Plot size: <u>15</u>)																				
1. _____	_____	_____	_____																	
2. _____	_____	_____	_____																	
3. _____	_____	_____	_____	¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.																
4. _____	_____	_____	_____																	
5. _____	_____	_____	_____																	
6. _____	_____	_____	_____																	
7. _____	_____	_____	_____	Definitions of Four Vegetation Strata: Tree – Woody plants, excluding vines, 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height. Sapling/Shrub – Woody plants, excluding vines, less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall. Herb – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall. Woody vine – All woody vines greater than 3.28 ft in height.																
8. _____	_____	_____	_____																	
9. _____	_____	_____	_____																	
10. _____	_____	_____	_____																	
_____ = Total Cover 50% of total cover: _____ 20% of total cover: _____				Hydrophytic Vegetation Present? Yes _____ No <u>X</u>																
Herb Stratum (Plot size: <u>5</u>)																				
1. <u>Daucus carota</u>	<u>30</u>	<u>Yes</u>	<u>UPL</u>																	
2. <u>Schedonorus arundinaceus</u>	<u>50</u>	<u>Yes</u>	<u>FACU</u>																	
3. <u>Dactylis glomerata</u>	<u>20</u>	<u>No</u>	<u>FACU</u>	Woody Vine Stratum (Plot size: <u>30</u>)																
4. <u>Apocynum cannabinum</u>	<u>10</u>	<u>No</u>	<u>FACU</u>																	
5. _____	_____	_____	_____																	
6. _____	_____	_____	_____																	
7. _____	_____	_____	_____	_____ = Total Cover 50% of total cover: <u>55.0</u> 20% of total cover: <u>22.0</u>																
8. _____	_____	_____	_____																	
9. _____	_____	_____	_____																	
10. _____	_____	_____	_____																	
11. _____	_____	_____	_____	_____ = Total Cover 50% of total cover: _____ 20% of total cover: _____																
Woody Vine Stratum (Plot size: <u>30</u>)																				
1. _____	_____	_____	_____																	
2. _____	_____	_____	_____																	
3. _____	_____	_____	_____	_____ = Total Cover 50% of total cover: _____ 20% of total cover: _____																
4. _____	_____	_____	_____																	
5. _____	_____	_____	_____																	
6. _____	_____	_____	_____																	

Remarks: (Include photo numbers here or on a separate sheet.)

Other Tree Species:
 Other Sapling Species:

Other Herb Species:
 Other Woody Vine Species:

SOIL

Sampling Point: Upland MD-11,12

[illegible]



E



W

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/14/26
Applicant/Owner: AEP State: OH Sampling Point: Wetland MD-13
Investigator(s): JFW Section, Township, Range: S07 4N 21W
Landform (hillslope, terrace, etc.): Toeslope Local relief (concave, convex, none): Convex Slope (%): 2
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.022821 Long: -83.007609 Datum: NAD 83
Soil Map Unit Name: Urbanland-Omulga complex, 0 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes ☒ No ☐ (If no, explain in Remarks.)

Are Vegetation ☐, Soil ☐, or Hydrology ☐ significantly disturbed? Are "Normal Circumstances" present? Yes ☒ No ☐

Are Vegetation ☐, Soil ☐, or Hydrology ☐ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes ☒ No ☐	Is the Sampled Area within a Wetland? Yes ☐ No ☒
Hydric Soil Present? Yes ☒ No ☐	
Wetland Hydrology Present? Yes ☐ No ☐	

Remarks:

PEM

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		☐ Surface Soil Cracks (B6)
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Sparsely Vegetated Concave Surface (B8)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Drainage Patterns (B10)
☐ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Moss Trim Lines (B16)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Dry-Season Water Table (C2)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Crayfish Burrows (C8)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Stunted or Stressed Plants (D1)
☐ Iron Deposits (B5)		☒ Geomorphic Position (D2)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Shallow Aquitard (D3)
☐ Water-Stained Leaves (B9)		☐ Microtopographic Relief (D4)
☐ Aquatic Fauna (B13)		☒ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes ☐ No ☒ Depth (inches):

Water Table Present? Yes ☐ No ☒ Depth (inches):

Saturation Present? Yes ☐ No ☒ Depth (inches):
(includes capillary fringe)

Wetland Hydrology Present? Yes ☐ No ☐

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

Sampling Point: Wetland MD-13

Tree Stratum (Plot size: 30)				Absolute % Cover	Dominant Species?	Indicator Status
1.						
2.						
3.						
4.						
5.						
6.						
7.						
				_____ = Total Cover		
50% of total cover: _____				20% of total cover: _____		
Sapling/Shrub Stratum (Plot size: 15)				Absolute % Cover	Dominant Species?	Indicator Status
1.						
2.						
3.						
4.						
5.						
6.						
7.						
8.						
9.						
				_____ = Total Cover		
50% of total cover: _____				20% of total cover: _____		
Herb Stratum (Plot size: 5)				Absolute % Cover	Dominant Species?	Indicator Status
1.	Scirpus atrovirens			20	Yes	OBL
2.	Typha angustifolia			80	Yes	OBL
3.						
4.						
5.						
6.						
7.						
8.						
9.						
10.						
11.						
				100 _____ = Total Cover		
50% of total cover: 50.0 _____				20% of total cover: 20.0 _____		
Woody Vine Stratum (Plot size: 30)				Absolute % Cover	Dominant Species?	Indicator Status
1.						
2.						
3.						
4.						
5.						
				_____ = Total Cover		
50% of total cover: _____				20% of total cover: _____		
Remarks: (Include photo numbers here or on a separate sheet.)						
Other Tree Species: _____						
Other Sapling Species: _____						
Other Herb Species: _____						
Other Woody Vine Species: _____						

Dominance Test worksheet:			
Number of Dominant Species That Are OBL, FACW, or FAC: 2 (A)			
Total Number of Dominant Species Across All Strata: 2 (B)			
Percent of Dominant Species That Are OBL, FACW, or FAC: 1.0 (A/B)			
Prevalence Index worksheet:			
Total % Cover of:		Multiply by:	
OBL species	100	x 1 =	100.0
FACW species	0	x 2 =	0.0
FAC species	0	x 3 =	0.0
FACU species	0	x 4 =	0.0
UPL species	0	x 5 =	0.0
Column Totals:	100 (A)		100.0 (B)
Prevalence Index = B/A = 1.00			
Hydrophytic Vegetation Indicators:			
Yes	1 - Rapid Test for Hydrophytic Vegetation		
Yes	2 - Dominance Test is >50%		
Yes	3 - Prevalence Index is ≤3.0 ¹		
No	4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet)		
No	Problematic Hydrophytic Vegetation ¹ (Explain)		
¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.			
Definitions of Four Vegetation Strata:			
Tree – Woody plants, excluding vines, 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height.			
Sapling/Shrub – Woody plants, excluding vines, less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall.			
Herb – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall.			
Woody vine – All woody vines greater than 3.28 ft in height.			
Hydrophytic Vegetation Present? Yes <u>X</u> No _____			

SOIL

Sampling Point: Wetland MD-13

[illegible]



N



S



W



E

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/14/26
Applicant/Owner: AEP State: OH Sampling Point: Upland MD-13
Investigator(s): JFW Section, Township, Range: S06 4N 21W
Landform (hillslope, terrace, etc.): Toeslope Local relief (concave, convex, none): Flat Slope (%): 3
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.022892 Long: -83.007577 Datum: NAD 83
Soil Map Unit Name: Urbanland-Omulga complex, 0 to 6 percent slopes NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)

Are Vegetation _____, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____

Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes _____ No <u>X</u>	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present? Yes _____ No <u>X</u>	
Wetland Hydrology Present? Yes _____ No <u>X</u>	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		____ Surface Soil Cracks (B6)
____ Surface Water (A1)	____ True Aquatic Plants (B14)	____ Sparsely Vegetated Concave Surface (B8)
____ High Water Table (A2)	____ Hydrogen Sulfide Odor (C1)	____ Drainage Patterns (B10)
____ Saturation (A3)	____ Oxidized Rhizospheres on Living Roots (C3)	____ Moss Trim Lines (B16)
____ Water Marks (B1)	____ Presence of Reduced Iron (C4)	____ Dry-Season Water Table (C2)
____ Sediment Deposits (B2)	____ Recent Iron Reduction in Tilled Soils (C6)	____ Crayfish Burrows (C8)
____ Drift Deposits (B3)	____ Thin Muck Surface (C7)	____ Saturation Visible on Aerial Imagery (C9)
____ Algal Mat or Crust (B4)	____ Other (Explain in Remarks)	____ Stunted or Stressed Plants (D1)
____ Iron Deposits (B5)		____ Geomorphic Position (D2)
____ Inundation Visible on Aerial Imagery (B7)		____ Shallow Aquitard (D3)
____ Water-Stained Leaves (B9)		____ Microtopographic Relief (D4)
____ Aquatic Fauna (B13)		____ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No X Depth (inches): _____

Water Table Present? Yes _____ No X Depth (inches): _____

Saturation Present? Yes _____ No X Depth (inches): _____
(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Upland MD-13

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status															
1. _____	_____	_____	_____	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>0</u> (A) Total Number of Dominant Species Across All Strata: <u>1</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.0</u> (A/B)														
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
_____ = Total Cover				Prevalence Index worksheet: <table style="width: 100%;"> <tr> <td style="width: 50%;">Total % Cover of:</td> <td style="width: 50%;">Multiply by:</td> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0.0</u></td> </tr> <tr> <td>FACW species <u>0</u></td> <td>x 2 = <u>0.0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0.0</u></td> </tr> <tr> <td>FACU species <u>90</u></td> <td>x 4 = <u>360.0</u></td> </tr> <tr> <td>UPL species <u>10</u></td> <td>x 5 = <u>50.0</u></td> </tr> <tr> <td>Column Totals: <u>100</u> (A)</td> <td><u>410.0</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>4.10</u>	Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0.0</u>	FACW species <u>0</u>	x 2 = <u>0.0</u>	FAC species <u>0</u>	x 3 = <u>0.0</u>	FACU species <u>90</u>	x 4 = <u>360.0</u>	UPL species <u>10</u>	x 5 = <u>50.0</u>	Column Totals: <u>100</u> (A)	<u>410.0</u> (B)
Total % Cover of:	Multiply by:																	
OBL species <u>0</u>	x 1 = <u>0.0</u>																	
FACW species <u>0</u>	x 2 = <u>0.0</u>																	
FAC species <u>0</u>	x 3 = <u>0.0</u>																	
FACU species <u>90</u>	x 4 = <u>360.0</u>																	
UPL species <u>10</u>	x 5 = <u>50.0</u>																	
Column Totals: <u>100</u> (A)	<u>410.0</u> (B)																	
50% of total cover: _____ 20% of total cover: _____																		
Sapling/Shrub Stratum (Plot size: <u>15</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Herb Stratum (Plot size: <u>5</u>)																		
1. <u>Schedonorus arundinaceus</u>	<u>80</u>	<u>Yes</u>	<u>FACU</u>	Hydrophytic Vegetation Indicators: <u>No</u> 1 - Rapid Test for Hydrophytic Vegetation <u>No</u> 2 - Dominance Test is >50% <u>No</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.														
2. <u>Daucus carota</u>	<u>10</u>	<u>No</u>	<u>UPL</u>															
3. <u>Lespedeza capitata</u>	<u>10</u>	<u>No</u>	<u>FACU</u>															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
6. _____	_____	_____	_____															
7. _____	_____	_____	_____															
8. _____	_____	_____	_____															
9. _____	_____	_____	_____															
10. _____	_____	_____	_____															
11. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: <u>50.0</u> 20% of total cover: <u>20.0</u>																		
Woody Vine Stratum (Plot size: <u>30</u>)																		
1. _____	_____	_____	_____															
2. _____	_____	_____	_____															
3. _____	_____	_____	_____															
4. _____	_____	_____	_____															
5. _____	_____	_____	_____															
_____ = Total Cover																		
50% of total cover: _____ 20% of total cover: _____																		
Hydrophytic Vegetation Present? Yes _____ No <u>X</u>																		
Remarks: (Include photo numbers here or on a separate sheet.)																		
Other Tree Species:		Other Herb Species:																
Other Sapling Species:		Other Woody Vine Species:																

SOIL

Sampling Point: Upland MD-13

[illegible]



E

WETLAND DETERMINATION DATA FORM – Eastern Mountains and Piedmont Region

Project/Site: Monza-Don Marquis 345 kV Transmission Line City/County: Pike County Sampling Date: 07/15/26
Applicant/Owner: AEP State: OH Sampling Point: Data Point MD-01
Investigator(s): JFW Section, Township, Range: S17 4N 21W
Landform (hillslope, terrace, etc.): Undulating Local relief (concave, convex, none): Flat Slope (%): 0
Subregion (LRR or MLRA): LRR N, MLRA 124 Lat: 39.014720 Long: -82.982334 Datum: NAD 83
Soil Map Unit Name: Wilbur silt loam, occasionally flooded NWI classification: PSS1/EM1A

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
Are Vegetation _____, Soil _____, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <u>X</u> No _____	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present? Yes _____ No _____	
Wetland Hydrology Present? Yes _____ No <u>X</u>	

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
<u>Primary Indicators (minimum of one is required; check all that apply)</u>		
☐ Surface Water (A1)	☐ True Aquatic Plants (B14)	☐ Surface Soil Cracks (B6)
☐ High Water Table (A2)	☐ Hydrogen Sulfide Odor (C1)	☐ Sparsely Vegetated Concave Surface (B8)
☐ Saturation (A3)	☐ Oxidized Rhizospheres on Living Roots (C3)	☐ Drainage Patterns (B10)
☐ Water Marks (B1)	☐ Presence of Reduced Iron (C4)	☐ Moss Trim Lines (B16)
☐ Sediment Deposits (B2)	☐ Recent Iron Reduction in Tilled Soils (C6)	☐ Dry-Season Water Table (C2)
☐ Drift Deposits (B3)	☐ Thin Muck Surface (C7)	☐ Crayfish Burrows (C8)
☐ Algal Mat or Crust (B4)	☐ Other (Explain in Remarks)	☐ Saturation Visible on Aerial Imagery (C9)
☐ Iron Deposits (B5)		☐ Stunted or Stressed Plants (D1)
☐ Inundation Visible on Aerial Imagery (B7)		☐ Geomorphic Position (D2)
☐ Water-Stained Leaves (B9)		☐ Shallow Aquitard (D3)
☐ Aquatic Fauna (B13)		☐ Microtopographic Relief (D4)
		☐ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No X Depth (inches): _____
Water Table Present? Yes _____ No X Depth (inches): _____
Saturation Present? Yes _____ No X Depth (inches): _____
(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

No hydrology indicators

VEGETATION (Four Strata) – Use scientific names of plants.

 Sampling Point: Data Point MD-01

Tree Stratum (Plot size: <u>30</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
1. <u>Platanus occidentalis</u>	<u>60</u>	<u>Yes</u>	<u>FACW</u>	Number of Dominant Species That Are OBL, FACW, or FAC: <u>4</u> (A)
2. <u>Quercus bicolor</u>	<u>5</u>	<u>No</u>	<u>FACW</u>	Total Number of Dominant Species Across All Strata: <u>7</u> (B)
3. <u>Juniperus virginiana</u>	<u>5</u>	<u>No</u>	<u>FACU</u>	
4. _____	_____	_____	_____	Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.57</u> (A/B)
5. _____	_____	_____	_____	
6. _____	_____	_____	_____	
7. _____	_____	_____	_____	
<u>70</u> = Total Cover 50% of total cover: <u>35.0</u> 20% of total cover: <u>14.0</u>				Prevalence Index worksheet:
Sapling/Shrub Stratum (Plot size: <u>15</u>)				
1. <u>Lindera benzoin</u>	<u>50</u>	<u>Yes</u>	<u>FAC</u>	Total % Cover of: _____ Multiply by: _____
2. <u>Rosa multiflora</u>	<u>10</u>	<u>No</u>	<u>FACU</u>	OBL species <u>0</u> x 1 = <u>0.0</u>
3. _____	_____	_____	_____	FACW species <u>80</u> x 2 = <u>160.0</u>
4. _____	_____	_____	_____	FAC species <u>75</u> x 3 = <u>225.0</u>
5. _____	_____	_____	_____	FACU species <u>40</u> x 4 = <u>160.0</u>
6. _____	_____	_____	_____	UPL species <u>0</u> x 5 = <u>0.0</u>
7. _____	_____	_____	_____	Column Totals: <u>195</u> (A) <u>545.0</u> (B)
8. _____	_____	_____	_____	Prevalence Index = B/A = <u>2.80</u>
9. _____	_____	_____	_____	Hydrophytic Vegetation Indicators:
<u>60</u> = Total Cover 50% of total cover: <u>30.0</u> 20% of total cover: <u>30.0</u>				
Herb Stratum (Plot size: <u>5</u>)				<u>No</u> 1 - Rapid Test for Hydrophytic Vegetation <u>Yes</u> 2 - Dominance Test is >50% <u>Yes</u> 3 - Prevalence Index is ≤3.0 ¹ <u>No</u> 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>No</u> Problematic Hydrophytic Vegetation ¹ (Explain)
1. <u>Polystichum acrostichoides</u>	<u>10</u>	<u>Yes</u>	<u>FACU</u>	¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.
2. <u>Microstegium vimineum</u>	<u>5</u>	<u>No</u>	<u>FAC</u>	
3. <u>Verbesina alternifolia</u>	<u>20</u>	<u>Yes</u>	<u>FAC</u>	Definitions of Four Vegetation Strata:
4. <u>Rosa multiflora</u>	<u>10</u>	<u>Yes</u>	<u>FACU</u>	
5. <u>Impatiens capensis</u>	<u>5</u>	<u>No</u>	<u>FACW</u>	Tree – Woody plants, excluding vines, 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height. Sapling/Shrub – Woody plants, excluding vines, less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall. Herb – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall. Woody vine – All woody vines greater than 3.28 ft in height.
6. _____	_____	_____	_____	
7. _____	_____	_____	_____	
8. _____	_____	_____	_____	
9. _____	_____	_____	_____	
10. _____	_____	_____	_____	
11. _____	_____	_____	_____	
<u>50</u> = Total Cover 50% of total cover: <u>25.0</u> 20% of total cover: <u>10.0</u>				Hydrophytic Vegetation Present? Yes <u>X</u> No _____
Woody Vine Stratum (Plot size: <u>30</u>)				
1. <u>Parthenocissus quinquefolia</u>	<u>5</u>	<u>Yes</u>	<u>FACU</u>	
2. <u>Vitis riparia</u>	<u>10</u>	<u>Yes</u>	<u>FACW</u>	
3. _____	_____	_____	_____	
4. _____	_____	_____	_____	
5. _____	_____	_____	_____	
<u>15</u> = Total Cover 50% of total cover: <u>7.5</u> 20% of total cover: <u>3.0</u>				
Remarks: (Include photo numbers here or on a separate sheet.)				
Other Tree Species:		Other Herb Species:		
Other Sapling Species:		Other Woody Vine Species:		

SOIL

Sampling Point: Data Point MD-01

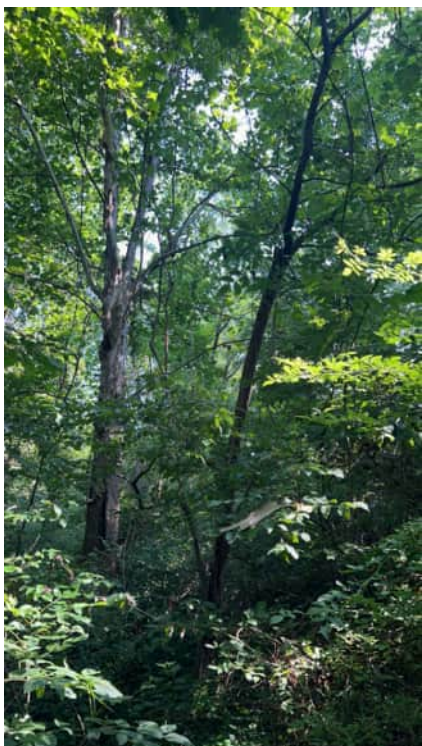
[illegible]



S



W



N



E

Appendix C

ORAM Forms

Site: Wetland MD-01	Rater(s): JFW	Date: 2026-07-23
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0.0	0.0	Metric 1. Wetland Area (size).
max 6 pts.	subtotal	

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☐ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☒ <0.1 acres (0.04ha) (0 pts)

4.0	4.0	Metric 2. Upland buffers and surrounding land use.
max 14 pts.	subtotal	

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☐ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☐ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☒ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☐ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☒ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☐ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☒ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

4.0	8.0	Metric 3. Hydrology.
max 30 pts.	subtotal	

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☐ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☐ None or none apparent (12)
- ☐ Recovered (7)
- ☐ Recovering (3)
- ☒ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☐ 100 year floodplain (1)
- ☐ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☐ Semi- to permanently inundated/saturated (4)
- ☐ Regularly inundated/saturated (3)
- ☐ Seasonally inundated (2)
- ☒ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed	
☐ ditch ☐ tile ☐ dike ☐ weir ☐ stormwater input	☐ point source (nonstormwater) ☐ filling/grading ☒ road bed/RR track ☐ dredging ☐ other _____

5.0	13.0	Metric 4. Habitat Alteration and Development.
max 20 pts.	subtotal	

4a. Substrate disturbance. Score one or double check and average.

- ☐ None or none apparent (4)
- ☒ Recovered (3)
- ☐ Recovering (2)
- ☐ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☐ Fair (3)
- ☐ Poor to fair (2)
- ☒ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☐ None or none apparent (9)
- ☐ Recovered (6)
- ☐ Recovering (3)
- ☒ Recent or no recovery (1)

Check all disturbances observed	
☒ mowing ☐ grazing ☐ clearcutting ☐ selective cutting ☐ woody debris removal ☐ toxic pollutants	☐ shrub/sapling removal ☐ herbaceous/aquatic bed removal ☐ sedimentation ☐ dredging ☐ farming ☐ nutrient enrichment

13.0

subtotal this page

Site: Wetland MD-01	Rater(s): JFW	Date: 2026-07-23
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13.0

subtotal first page

0.0	13.0
--	---

max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

2.0	15.0
--	---

max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- 0

 Aquatic bed
- 1

 Emergent
- 0

 Shrub
- 0

 Forest
- 0

 Mudflats
- 0

 Open water
- 0

 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- X

 None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- ☐ Extensive >75% cover (-5)
- ☐ Moderate 25-75% cover (-3)
- ☐ Sparse 5-25% cover (-1)
- ☐ Nearly absent <5% cover (0)
- X

 Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- 0

 Vegetated hummocks/tussocks
- 0

 Coarse woody debris >15cm (6in)
- 0

 Standing dead >25cm (10in) dbh
- 0

 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

15.0

GRAND TOTAL (max 100 pts)

Site: Wetland MD-02	Rater(s): JFW	Date: 2026-07-15
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0.0

0.0

Metric 1. Wetland Area (size).

max 6 pts.

subtotal

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☐ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☒ <0.1 acres (0.04ha) (0 pts)

10.0

10.0

Metric 2. Upland buffers and surrounding land use.

max 14 pts.

subtotal

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☒ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☐ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☐ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☐ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☐ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☒ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☐ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

10.0

20.0

Metric 3. Hydrology.

max 30 pts.

subtotal

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☐ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☐ None or none apparent (12)
- ☒ Recovered (7)
- ☐ Recovering (3)
- ☐ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☐ 100 year floodplain (1)
- ☐ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☐ Semi- to permanently inundated/saturated (4)
- ☐ Regularly inundated/saturated (3)
- ☐ Seasonally inundated (2)
- ☒ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed

- | | |
|---|---|
| ☐ ditch | ☐ point source (nonstormwater) |
| ☐ tile | ☐ filling/grading |
| ☐ dike | ☐ road bed/RR track |
| ☐ weir | ☐ dredging |
| ☐ stormwater input | ☐ other _____ |

7.0

27.0

Metric 4. Habitat Alteration and Development.

max 20 pts.

subtotal

4a. Substrate disturbance. Score one or double check and average.

- ☐ None or none apparent (4)
- ☒ Recovered (3)
- ☐ Recovering (2)
- ☐ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☐ Fair (3)
- ☐ Poor to fair (2)
- ☒ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☐ None or none apparent (9)
- ☐ Recovered (6)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

Check all disturbances observed

- | | |
|---|---|
| ☒ mowing | ☐ shrub/sapling removal |
| ☐ grazing | ☐ herbaceous/aquatic bed removal |
| ☐ clearcutting | ☐ sedimentation |
| ☐ selective cutting | ☐ dredging |
| ☐ woody debris removal | ☐ farming |
| ☐ toxic pollutants | ☐ nutrient enrichment |

27.0

subtotal this page

Site: Wetland MD-02	Rater(s): JFW	Date: 2026-07-15
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27.0

subtotal first page

0.0	27.0
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max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

2.0	29.0
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max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- 0

 Aquatic bed
- 1

 Emergent
- 0

 Shrub
- 0

 Forest
- 0

 Mudflats
- 0

 Open water
- 0

 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- X

 None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- ☐ Extensive >75% cover (-5)
- ☐ Moderate 25-75% cover (-3)
- ☐ Sparse 5-25% cover (-1)
- ☐ Nearly absent <5% cover (0)
- X

 Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- 0

 Vegetated hummocks/tussocks
- 0

 Coarse woody debris >15cm (6in)
- 0

 Standing dead >25cm (10in) dbh
- 0

 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

29.0

GRAND TOTAL (max 100 pts)

Site: Wetland MD-03	Rater(s): JFW	Date: 2026-07-15
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2.0 2.0 Metric 1. Wetland Area (size).

max 6 pts.

subtotal

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☒ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☐ <0.1 acres (0.04ha) (0 pts)

3.0 5.0 Metric 2. Upland buffers and surrounding land use.

max 14 pts.

subtotal

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☐ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☐ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☒ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☐ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☐ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☒ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☒ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

7.0 12.0 Metric 3. Hydrology.

max 30 pts.

subtotal

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☐ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☐ None or none apparent (12)
- ☐ Recovered (7)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☐ 100 year floodplain (1)
- ☐ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☐ Semi- to permanently inundated/saturated (4)
- ☒ Regularly inundated/saturated (3)
- ☐ Seasonally inundated (2)
- ☒ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed

- | | |
|---|--|
| ☒ ditch
☐ tile
☐ dike
☐ weir
☐ stormwater input | ☐ point source (nonstormwater)
☐ filling/grading
☐ road bed/RR track
☐ dredging
☐ other _____ |
|---|--|

6.0 18.0 Metric 4. Habitat Alteration and Development.

max 20 pts.

subtotal

4a. Substrate disturbance. Score one or double check and average.

- ☐ None or none apparent (4)
- ☐ Recovered (3)
- ☒ Recovering (2)
- ☐ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☐ Fair (3)
- ☐ Poor to fair (2)
- ☒ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☐ None or none apparent (9)
- ☐ Recovered (6)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

Check all disturbances observed

- | | |
|---|--|
| ☒ mowing
☐ grazing
☐ clearcutting
☐ selective cutting
☐ woody debris removal
☐ toxic pollutants | ☐ shrub/sapling removal
☐ herbaceous/aquatic bed removal
☐ sedimentation
☐ dredging
☐ farming
☐ nutrient enrichment |
|---|--|

18.0

subtotal this page

Site: Wetland MD-03	Rater(s): JFW	Date: 2026-07-15
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18.0

subtotal first page

0.0	18.0
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max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

2.0	20.0
--	---

max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- 0

 Aquatic bed
- 1

 Emergent
- 0

 Shrub
- 0

 Forest
- 0

 Mudflats
- 0

 Open water
- 0

 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- X

 None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- ☐ Extensive >75% cover (-5)
- ☐ Moderate 25-75% cover (-3)
- ☐ Sparse 5-25% cover (-1)
- ☐ Nearly absent <5% cover (0)
- X

 Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- 0

 Vegetated hummocks/tussocks
- 0

 Coarse woody debris >15cm (6in)
- 0

 Standing dead >25cm (10in) dbh
- 0

 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

20.0

GRAND TOTAL (max 100 pts)

Site: Wetland MD-04	Rater(s): JFW	Date: 2026-07-15
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2.0

2.0

Metric 1. Wetland Area (size).

max 6 pts. subtotal

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☒ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☐ <0.1 acres (0.04ha) (0 pts)

12.0

14.0

Metric 2. Upland buffers and surrounding land use.

max 14 pts. subtotal

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☒ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☐ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☐ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☐ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☒ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☐ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☐ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

15.0

29.0

Metric 3. Hydrology.

max 30 pts. subtotal

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☐ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☒ None or none apparent (12)
- ☐ Recovered (7)
- ☐ Recovering (3)
- ☐ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☐ 100 year floodplain (1)
- ☐ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☐ Semi- to permanently inundated/saturated (4)
- ☐ Regularly inundated/saturated (3)
- ☐ Seasonally inundated (2)
- ☒ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed	
☐ ditch ☐ tile ☐ dike ☐ weir ☐ stormwater input	☐ point source (nonstormwater) ☐ filling/grading ☐ road bed/RR track ☐ dredging ☐ other _____

16.0

45.0

Metric 4. Habitat Alteration and Development.

max 20 pts. subtotal

4a. Substrate disturbance. Score one or double check and average.

- ☒ None or none apparent (4)
- ☐ Recovered (3)
- ☐ Recovering (2)
- ☐ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☒ Fair (3)
- ☐ Poor to fair (2)
- ☐ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☒ None or none apparent (9)
- ☐ Recovered (6)
- ☐ Recovering (3)
- ☐ Recent or no recovery (1)

Check all disturbances observed	
☐ mowing ☐ grazing ☐ clearcutting ☐ selective cutting ☐ woody debris removal ☐ toxic pollutants	☐ shrub/sapling removal ☐ herbaceous/aquatic bed removal ☐ sedimentation ☐ dredging ☐ farming ☐ nutrient enrichment

45.0

subtotal this page

Site: Wetland MD-04	Rater(s): JFW	Date: 2026-07-15
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45.0

subtotal first page

0.0	45.0
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max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

4.0	49.0
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max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- ☐ 0 Aquatic bed
- ☐ 0 Emergent
- ☐ 0 Shrub
- ☐ 2 Forest
- ☐ 0 Mudflats
- ☐ 0 Open water
- ☐ 0 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- ☒ None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- ☐ Extensive >75% cover (-5)
- ☐ Moderate 25-75% cover (-3)
- ☐ Sparse 5-25% cover (-1)
- ☐ Nearly absent <5% cover (0)
- ☒ Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- ☐ 0 Vegetated hummocks/tussocks
- ☐ 1 Coarse woody debris >15cm (6in)
- ☐ 0 Standing dead >25cm (10in) dbh
- ☐ 0 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

49.0

GRAND TOTAL (max 100 pts)

Site: Wetland MD-05	Rater(s): JFW	Date: 2026-07-15
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0.0	0.0	Metric 1. Wetland Area (size).
max 6 pts.	subtotal	

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☐ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☒ <0.1 acres (0.04ha) (0 pts)

12.0	12.0	Metric 2. Upland buffers and surrounding land use.
max 14 pts.	subtotal	

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☒ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☐ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☐ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☐ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☒ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☐ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☐ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

10.0	22.0	Metric 3. Hydrology.
max 30 pts.	subtotal	

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☐ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☐ None or none apparent (12)
- ☒ Recovered (7)
- ☐ Recovering (3)
- ☐ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☐ 100 year floodplain (1)
- ☐ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☐ Semi- to permanently inundated/saturated (4)
- ☐ Regularly inundated/saturated (3)
- ☐ Seasonally inundated (2)
- ☒ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed	
☒ ditch ☐ tile ☐ dike ☐ weir ☐ stormwater input	☐ point source (nonstormwater) ☐ filling/grading ☐ road bed/RR track ☐ dredging ☐ other _____

6.0	28.0	Metric 4. Habitat Alteration and Development.
max 20 pts.	subtotal	

4a. Substrate disturbance. Score one or double check and average.

- ☐ None or none apparent (4)
- ☐ Recovered (3)
- ☐ Recovering (2)
- ☒ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☐ Fair (3)
- ☒ Poor to fair (2)
- ☐ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☐ None or none apparent (9)
- ☐ Recovered (6)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

Check all disturbances observed	
☐ mowing ☐ grazing ☐ clearcutting ☐ selective cutting ☐ woody debris removal ☐ toxic pollutants	☐ shrub/sapling removal ☐ herbaceous/aquatic bed removal ☒ sedimentation ☐ dredging ☐ farming ☐ nutrient enrichment

28.0

subtotal this page

Site: Wetland MD-05	Rater(s): JFW	Date: 2026-07-15
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28.0

subtotal first page

0.0	28.0
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max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

1.0	29.0
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max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- ☐ 0 Aquatic bed
- ☐ 1 Emergent
- ☐ 0 Shrub
- ☐ 0 Forest
- ☐ 0 Mudflats
- ☐ 0 Open water
- ☐ 0 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- ☒ X None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- ☐ Extensive >75% cover (-5)
- ☐ Moderate 25-75% cover (-3)
- ☐ Sparse 5-25% cover (-1)
- ☒ X Nearly absent <5% cover (0)
- ☐ Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- ☐ 0 Vegetated hummocks/tussocks
- ☐ 0 Coarse woody debris >15cm (6in)
- ☐ 0 Standing dead >25cm (10in) dbh
- ☐ 0 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

29.0 **GRAND TOTAL (max 100 pts)**

Site: Wetland MD-06	Rater(s): JFW	Date: 2026-07-15
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2.0	2.0	Metric 1. Wetland Area (size).
max 6 pts.	subtotal	

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☒ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☐ <0.1 acres (0.04ha) (0 pts)

12.0	14.0	Metric 2. Upland buffers and surrounding land use.
max 14 pts.	subtotal	

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☒ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☐ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☐ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☐ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☒ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☐ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☐ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

10.5	24.5	Metric 3. Hydrology.
max 30 pts.	subtotal	

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☐ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☒ None or none apparent (12)
- ☐ Recovered (7)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☐ 100 year floodplain (1)
- ☐ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☐ Semi- to permanently inundated/saturated (4)
- ☐ Regularly inundated/saturated (3)
- ☐ Seasonally inundated (2)
- ☒ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed	
☐ ditch ☐ tile ☐ dike ☐ weir ☐ stormwater input	☐ point source (nonstormwater) ☐ filling/grading ☒ road bed/RR track ☐ dredging ☐ other _____

15.0	39.5	Metric 4. Habitat Alteration and Development.
max 20 pts.	subtotal	

4a. Substrate disturbance. Score one or double check and average.

- ☐ None or none apparent (4)
- ☒ Recovered (3)
- ☐ Recovering (2)
- ☐ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☒ Fair (3)
- ☐ Poor to fair (2)
- ☐ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☒ None or none apparent (9)
- ☐ Recovered (6)
- ☐ Recovering (3)
- ☐ Recent or no recovery (1)

Check all disturbances observed	
☐ mowing ☐ grazing ☐ clearcutting ☐ selective cutting ☐ woody debris removal ☐ toxic pollutants	☐ shrub/sapling removal ☐ herbaceous/aquatic bed removal ☐ sedimentation ☐ dredging ☐ farming ☐ nutrient enrichment

39.5
subtotal this page

Site: Wetland MD-06	Rater(s): JFW	Date: 2026-07-15
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39.5

subtotal first page

0.0	39.5
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max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

3.0	42.5
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max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- ☐ 0 Aquatic bed
- ☐ 0 Emergent
- ☐ 0 Shrub
- ☐ 2 Forest
- ☐ 0 Mudflats
- ☐ 0 Open water
- ☐ 0 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- ☒ None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- ☐ Extensive >75% cover (-5)
- ☐ Moderate 25-75% cover (-3)
- ☐ Sparse 5-25% cover (-1)
- ☐ Nearly absent <5% cover (0)
- ☒ Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- ☐ 0 Vegetated hummocks/tussocks
- ☐ 0 Coarse woody debris >15cm (6in)
- ☐ 0 Standing dead >25cm (10in) dbh
- ☐ 0 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

42.5

GRAND TOTAL (max 100 pts)

Site: Wetland MD-07	Rater(s): JFW	Date: 2026-07-15
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0.0 0.0 Metric 1. Wetland Area (size).

max 6 pts.

subtotal

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☐ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☒ <0.1 acres (0.04ha) (0 pts)

3.0 3.0 Metric 2. Upland buffers and surrounding land use.

max 14 pts.

subtotal

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☐ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☐ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☐ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☒ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☐ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☒ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☐ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

7.0 10.0 Metric 3. Hydrology.

max 30 pts.

subtotal

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☐ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☐ None or none apparent (12)
- ☐ Recovered (7)
- ☐ Recovering (3)
- ☒ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☐ 100 year floodplain (1)
- ☒ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☐ Semi- to permanently inundated/saturated (4)
- ☒ Regularly inundated/saturated (3)
- ☐ Seasonally inundated (2)
- ☐ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed

- | | |
|--|--|
| ☒ ditch
☐ tile
☐ dike
☐ weir
☒ stormwater input | ☐ point source (nonstormwater)
☐ filling/grading
☐ road bed/RR track
☐ dredging
☐ other _____ |
|--|--|

6.0 16.0 Metric 4. Habitat Alteration and Development.

max 20 pts.

subtotal

4a. Substrate disturbance. Score one or double check and average.

- ☐ None or none apparent (4)
- ☐ Recovered (3)
- ☒ Recovering (2)
- ☐ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☐ Fair (3)
- ☐ Poor to fair (2)
- ☒ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☐ None or none apparent (9)
- ☐ Recovered (6)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

Check all disturbances observed

- | | |
|---|--|
| ☒ mowing
☐ grazing
☐ clearcutting
☐ selective cutting
☐ woody debris removal
☐ toxic pollutants | ☐ shrub/sapling removal
☐ herbaceous/aquatic bed removal
☐ sedimentation
☐ dredging
☐ farming
☐ nutrient enrichment |
|---|--|

16.0

subtotal this page

Site: Wetland MD-07	Rater(s): JFW	Date: 2026-07-15
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16.0

subtotal first page

0.0	16.0
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max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

2.0	18.0
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max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- ☐ 0 Aquatic bed
- ☐ 1 Emergent
- ☐ 0 Shrub
- ☐ 0 Forest
- ☐ 0 Mudflats
- ☐ 0 Open water
- ☐ 0 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- ☒ X None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- ☐ Extensive >75% cover (-5)
- ☐ Moderate 25-75% cover (-3)
- ☐ Sparse 5-25% cover (-1)
- ☐ Nearly absent <5% cover (0)
- ☒ X Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- ☐ 0 Vegetated hummocks/tussocks
- ☐ 0 Coarse woody debris >15cm (6in)
- ☐ 0 Standing dead >25cm (10in) dbh
- ☐ 0 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

18.0

GRAND TOTAL (max 100 pts)

Site: Wetland MD-08	Rater(s): JFW	Date: 2026-07-15
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0.0	0.0	Metric 1. Wetland Area (size).
max 6 pts.	subtotal	

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☐ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☒ <0.1 acres (0.04ha) (0 pts)

7.0	7.0	Metric 2. Upland buffers and surrounding land use.
max 14 pts.	subtotal	

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☐ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☒ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☐ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☐ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☐ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☒ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☐ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

11.0	18.0	Metric 3. Hydrology.
max 30 pts.	subtotal	

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☒ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☐ None or none apparent (12)
- ☐ Recovered (7)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☒ 100 year floodplain (1)
- ☐ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☐ Semi- to permanently inundated/saturated (4)
- ☐ Regularly inundated/saturated (3)
- ☒ Seasonally inundated (2)
- ☐ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed	
☐ ditch ☐ tile ☐ dike ☐ weir ☒ stormwater input	☐ point source (nonstormwater) ☐ filling/grading ☐ road bed/RR track ☐ dredging ☐ other _____

6.0	24.0	Metric 4. Habitat Alteration and Development.
max 20 pts.	subtotal	

4a. Substrate disturbance. Score one or double check and average.

- ☐ None or none apparent (4)
- ☐ Recovered (3)
- ☒ Recovering (2)
- ☐ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☐ Fair (3)
- ☐ Poor to fair (2)
- ☒ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☐ None or none apparent (9)
- ☐ Recovered (6)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

Check all disturbances observed	
☒ mowing ☐ grazing ☐ clearcutting ☐ selective cutting ☐ woody debris removal ☐ toxic pollutants	☐ shrub/sapling removal ☐ herbaceous/aquatic bed removal ☐ sedimentation ☐ dredging ☐ farming ☐ nutrient enrichment

24.0

subtotal this page

Site: Wetland MD-08	Rater(s): JFW	Date: 2026-07-15
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24.0

subtotal first page

0.0	24.0
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max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

3.0	27.0
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max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- 0

 Aquatic bed
- 1

 Emergent
- 0

 Shrub
- 0

 Forest
- 0

 Mudflats
- 0

 Open water
- 0

 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- X

 None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- ☐ Extensive >75% cover (-5)
- ☐ Moderate 25-75% cover (-3)
- ☐ Sparse 5-25% cover (-1)
- ☐ Nearly absent <5% cover (0)
- X

 Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- 0

 Vegetated hummocks/tussocks
- 0

 Coarse woody debris >15cm (6in)
- 0

 Standing dead >25cm (10in) dbh
- 1

 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

27.0

GRAND TOTAL (max 100 pts)

Site: Wetland MD-09	Rater(s): JFW	Date: 2026-07-27
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0.0	0.0	Metric 1. Wetland Area (size).
max 6 pts.	subtotal	

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☐ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☒ <0.1 acres (0.04ha) (0 pts)

1.0	1.0	Metric 2. Upland buffers and surrounding land use.
max 14 pts.	subtotal	

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☐ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☐ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☐ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☒ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☐ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☐ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☒ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

6.0	7.0	Metric 3. Hydrology.
max 30 pts.	subtotal	

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☐ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☐ None or none apparent (12)
- ☐ Recovered (7)
- ☐ Recovering (3)
- ☒ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☐ 100 year floodplain (1)
- ☐ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☐ Semi- to permanently inundated/saturated (4)
- ☒ Regularly inundated/saturated (3)
- ☐ Seasonally inundated (2)
- ☐ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed	
☒ ditch ☐ tile ☐ dike ☐ weir ☒ stormwater input	☐ point source (nonstormwater) ☐ filling/grading ☒ road bed/RR track ☐ dredging ☐ other _____

3.0	10.0	Metric 4. Habitat Alteration and Development.
max 20 pts.	subtotal	

4a. Substrate disturbance. Score one or double check and average.

- ☐ None or none apparent (4)
- ☐ Recovered (3)
- ☐ Recovering (2)
- ☒ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☐ Fair (3)
- ☐ Poor to fair (2)
- ☒ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☐ None or none apparent (9)
- ☐ Recovered (6)
- ☐ Recovering (3)
- ☒ Recent or no recovery (1)

Check all disturbances observed	
☒ mowing ☐ grazing ☐ clearcutting ☐ selective cutting ☐ woody debris removal ☒ toxic pollutants	☐ shrub/sapling removal ☐ herbaceous/aquatic bed removal ☐ sedimentation ☐ dredging ☐ farming ☐ nutrient enrichment

10.0
subtotal this page

Site: Wetland MD-09	Rater(s): JFW	Date: 2026-07-27
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10.0

subtotal first page

0.0	10.0
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max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

-2.0	8.0
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max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- ☐ 0 Aquatic bed
- ☐ 1 Emergent
- ☐ 0 Shrub
- ☐ 0 Forest
- ☐ 0 Mudflats
- ☐ 0 Open water
- ☐ 0 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- ☒ None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- ☐ Extensive >75% cover (-5)
- ☒ Moderate 25-75% cover (-3)
- ☐ Sparse 5-25% cover (-1)
- ☐ Nearly absent <5% cover (0)
- ☐ Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- ☐ 0 Vegetated hummocks/tussocks
- ☐ 0 Coarse woody debris >15cm (6in)
- ☐ 0 Standing dead >25cm (10in) dbh
- ☐ 0 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

8.0

GRAND TOTAL (max 100 pts)

Site: Wetland MD-10	Rater(s): JFW	Date: 2026-07-14
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0.0	0.0	Metric 1. Wetland Area (size).
max 6 pts.	subtotal	

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☐ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☒ <0.1 acres (0.04ha) (0 pts)

1.0	1.0	Metric 2. Upland buffers and surrounding land use.
max 14 pts.	subtotal	

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☐ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☐ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☐ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☒ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☐ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☐ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☒ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

5.0	6.0	Metric 3. Hydrology.
max 30 pts.	subtotal	

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☐ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☐ None or none apparent (12)
- ☐ Recovered (7)
- ☐ Recovering (3)
- ☒ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☐ 100 year floodplain (1)
- ☐ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☐ Semi- to permanently inundated/saturated (4)
- ☐ Regularly inundated/saturated (3)
- ☒ Seasonally inundated (2)
- ☐ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed	
☐ ditch ☐ tile ☐ dike ☐ weir ☒ stormwater input	☐ point source (nonstormwater) ☐ filling/grading ☐ road bed/RR track ☐ dredging ☐ other _____

6.0	12.0	Metric 4. Habitat Alteration and Development.
max 20 pts.	subtotal	

4a. Substrate disturbance. Score one or double check and average.

- ☐ None or none apparent (4)
- ☐ Recovered (3)
- ☒ Recovering (2)
- ☐ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☐ Fair (3)
- ☐ Poor to fair (2)
- ☒ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☐ None or none apparent (9)
- ☐ Recovered (6)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

Check all disturbances observed	
☐ mowing ☐ grazing ☐ clearcutting ☐ selective cutting ☐ woody debris removal ☒ toxic pollutants	☐ shrub/sapling removal ☐ herbaceous/aquatic bed removal ☐ sedimentation ☐ dredging ☐ farming ☐ nutrient enrichment

12.0

subtotal this page

Site: Wetland MD-10	Rater(s): JFW	Date: 2026-07-14
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12.0

subtotal first page

0.0	12.0
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max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

-3.0	9.0
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max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- 0

 Aquatic bed
- 1

 Emergent
- 0

 Shrub
- 0

 Forest
- 0

 Mudflats
- 0

 Open water
- 0

 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- X

 None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- X

 Extensive >75% cover (-5)
- ☐ Moderate 25-75% cover (-3)
- ☐ Sparse 5-25% cover (-1)
- ☐ Nearly absent <5% cover (0)
- ☐ Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- 0

 Vegetated hummocks/tussocks
- 0

 Coarse woody debris >15cm (6in)
- 0

 Standing dead >25cm (10in) dbh
- 1

 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

9.0

GRAND TOTAL (max 100 pts)

Site: Wetland MD-11	Rater(s): JFW	Date: 2026-07-14
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0.0 0.0 Metric 1. Wetland Area (size).

max 6 pts.

subtotal

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☐ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☒ <0.1 acres (0.04ha) (0 pts)

1.0 1.0 Metric 2. Upland buffers and surrounding land use.

max 14 pts.

subtotal

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☐ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☐ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☐ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☒ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☐ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☐ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☒ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

6.0 7.0 Metric 3. Hydrology.

max 30 pts.

subtotal

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☐ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☐ None or none apparent (12)
- ☐ Recovered (7)
- ☐ Recovering (3)
- ☒ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☐ 100 year floodplain (1)
- ☐ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☐ Semi- to permanently inundated/saturated (4)
- ☒ Regularly inundated/saturated (3)
- ☐ Seasonally inundated (2)
- ☐ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed

- | | |
|---|--|
| ☒ ditch
☐ tile
☐ dike
☐ weir
☐ stormwater input | ☐ point source (nonstormwater)
☐ filling/grading
☐ road bed/RR track
☐ dredging
☐ other _____ |
|---|--|

4.0 11.0 Metric 4. Habitat Alteration and Development.

max 20 pts.

subtotal

4a. Substrate disturbance. Score one or double check and average.

- ☐ None or none apparent (4)
- ☐ Recovered (3)
- ☒ Recovering (2)
- ☐ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☐ Fair (3)
- ☐ Poor to fair (2)
- ☒ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☐ None or none apparent (9)
- ☐ Recovered (6)
- ☐ Recovering (3)
- ☒ Recent or no recovery (1)

Check all disturbances observed

- | | |
|--|--|
| ☒ mowing
☐ grazing
☐ clearcutting
☐ selective cutting
☐ woody debris removal
☒ toxic pollutants | ☐ shrub/sapling removal
☐ herbaceous/aquatic bed removal
☐ sedimentation
☐ dredging
☐ farming
☐ nutrient enrichment |
|--|--|

11.0

subtotal this page

Site: Wetland MD-11	Rater(s): JFW	Date: 2026-07-14
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11.0

subtotal first page

0.0	11.0
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max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

-2.0	9.0
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max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- ☐ 0 Aquatic bed
- ☐ 1 Emergent
- ☐ 0 Shrub
- ☐ 0 Forest
- ☐ 0 Mudflats
- ☐ 0 Open water
- ☐ 0 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- ☒ None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- ☐ Extensive >75% cover (-5)
- ☒ Moderate 25-75% cover (-3)
- ☐ Sparse 5-25% cover (-1)
- ☐ Nearly absent <5% cover (0)
- ☐ Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- ☐ 0 Vegetated hummocks/tussocks
- ☐ 0 Coarse woody debris >15cm (6in)
- ☐ 0 Standing dead >25cm (10in) dbh
- ☐ 0 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

9.0

GRAND TOTAL (max 100 pts)

Site: Wetland MD-12	Rater(s): JFW	Date: 2026-07-14
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0.0

0.0

Metric 1. Wetland Area (size).

max 6 pts.

subtotal

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☐ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☒ <0.1 acres (0.04ha) (0 pts)

4.0

4.0

Metric 2. Upland buffers and surrounding land use.

max 14 pts.

subtotal

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☐ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☐ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☒ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☐ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☒ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☐ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☒ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

12.0

16.0

Metric 3. Hydrology.

max 30 pts.

subtotal

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☒ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☐ None or none apparent (12)
- ☐ Recovered (7)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☐ 100 year floodplain (1)
- ☐ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☒ Semi- to permanently inundated/saturated (4)
- ☐ Regularly inundated/saturated (3)
- ☐ Seasonally inundated (2)
- ☐ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed

- | | |
|--|--|
| ☒ ditch
☐ tile
☐ dike
☐ weir
☒ stormwater input | ☐ point source (nonstormwater)
☐ filling/grading
☐ road bed/RR track
☐ dredging
☐ other _____ |
|--|--|

6.0

22.0

Metric 4. Habitat Alteration and Development.

max 20 pts.

subtotal

4a. Substrate disturbance. Score one or double check and average.

- ☐ None or none apparent (4)
- ☐ Recovered (3)
- ☒ Recovering (2)
- ☐ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☐ Fair (3)
- ☐ Poor to fair (2)
- ☒ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☐ None or none apparent (9)
- ☐ Recovered (6)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

Check all disturbances observed

- | | |
|---|--|
| ☐ mowing
☐ grazing
☐ clearcutting
☐ selective cutting
☐ woody debris removal
☒ toxic pollutants | ☐ shrub/sapling removal
☐ herbaceous/aquatic bed removal
☒ sedimentation
☒ dredging
☐ farming
☐ nutrient enrichment |
|---|--|

22.0

subtotal this page

Site: Wetland MD-12	Rater(s): JFW	Date: 2026-07-14
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22.0

subtotal first page

0.0	22.0
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max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

2.0	24.0
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max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- 2

 Aquatic bed
- 0

 Emergent
- 0

 Shrub
- 0

 Forest
- 0

 Mudflats
- 0

 Open water
- 0

 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- X

 None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- ☐ Extensive >75% cover (-5)
- ☐ Moderate 25-75% cover (-3)
- X

 Sparse 5-25% cover (-1)
- ☐ Nearly absent <5% cover (0)
- ☐ Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- 0

 Vegetated hummocks/tussocks
- 0

 Coarse woody debris >15cm (6in)
- 0

 Standing dead >25cm (10in) dbh
- 1

 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

24.0

GRAND TOTAL (max 100 pts)

Site: Wetland MD-13	Rater(s): JFW	Date: 2026-07-14
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0.0	0.0	Metric 1. Wetland Area (size).
max 6 pts.	subtotal	

Select one size class and assign score.

- ☐ >50 acres (>20.2ha) (6 pts)
- ☐ 25 to <50 acres (10.1 to <20.2ha) (5 pts)
- ☐ 10 to <25 acres (4 to <10.1ha) (4 pts)
- ☐ 3 to <10 acres (1.2 to <4ha) (3 pts)
- ☐ 0.3 to <3 acres (0.12 to <1.2ha) (2pts)
- ☐ 0.1 to <0.3 acres (0.04 to <0.12ha) (1 pt)
- ☒ <0.1 acres (0.04ha) (0 pts)

7.0	7.0	Metric 2. Upland buffers and surrounding land use.
max 14 pts.	subtotal	

2a. Calculate average buffer width. Select only one and assign score. Do not double check.

- ☐ WIDE. Buffers average 50m (164ft) or more around wetland perimeter (7)
- ☒ MEDIUM. Buffers average 25m to <50m (82 to <164ft) around wetland perimeter (4)
- ☐ NARROW. Buffers average 10m to <25m (32ft to <82ft) around wetland perimeter (1)
- ☐ VERY NARROW. Buffers average <10m (<32ft) around wetland perimeter (0)

2b. Intensity of surrounding land use. Select one or double check and average.

- ☐ VERY LOW. 2nd growth or older forest, prairie, savannah, wildlife area, etc. (7)
- ☒ LOW. Old field (>10 years), shrubland, young second growth forest. (5)
- ☐ MODERATELY HIGH. Residential, fenced pasture, park, conservation tillage, new fallow field. (3)
- ☒ HIGH. Urban, industrial, open pasture, row cropping, mining, construction. (1)

6.0	13.0	Metric 3. Hydrology.
max 30 pts.	subtotal	

3a. Sources of Water. Score all that apply.

- ☐ High pH groundwater (5)
- ☐ Other groundwater (3)
- ☒ Precipitation (1)
- ☐ Seasonal/Intermittent surface water (3)
- ☐ Perennial surface water (lake or stream) (5)

3c. Maximum water depth. Select only one and assign score.

- ☐ >0.7 (27.6in) (3)
- ☐ 0.4 to 0.7m (15.7 to 27.6in) (2)
- ☒ <0.4m (<15.7in) (1)

3e. Modifications to natural hydrologic regime. Score one or double check and average.

- ☐ None or none apparent (12)
- ☐ Recovered (7)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

3b. Connectivity. Score all that apply.

- ☐ 100 year floodplain (1)
- ☐ Between stream/lake and other human use (1)
- ☐ Part of wetland/upland (e.g. forest), complex (1)
- ☐ Part of riparian or upland corridor (1)

3d. Duration inundation/saturation. Score one or dbl check.

- ☐ Semi- to permanently inundated/saturated (4)
- ☐ Regularly inundated/saturated (3)
- ☐ Seasonally inundated (2)
- ☒ Seasonally saturated in upper 30cm (12in) (1)

Check all disturbances observed	
☐ ditch ☐ tile ☐ dike ☐ weir ☒ stormwater input	☐ point source (nonstormwater) ☐ filling/grading ☐ road bed/RR track ☐ dredging ☐ other _____

7.0	20.0	Metric 4. Habitat Alteration and Development.
max 20 pts.	subtotal	

4a. Substrate disturbance. Score one or double check and average.

- ☐ None or none apparent (4)
- ☒ Recovered (3)
- ☐ Recovering (2)
- ☐ Recent or no recovery (1)

4b. Habitat development. Select only one and assign score.

- ☐ Excellent (7)
- ☐ Very good (6)
- ☐ Good (5)
- ☐ Moderately good (4)
- ☐ Fair (3)
- ☐ Poor to fair (2)
- ☒ Poor (1)

4c. Habitat alteration. Score one or double check and average.

- ☐ None or none apparent (9)
- ☐ Recovered (6)
- ☒ Recovering (3)
- ☐ Recent or no recovery (1)

Check all disturbances observed	
☒ mowing ☐ grazing ☐ clearcutting ☐ selective cutting ☐ woody debris removal ☐ toxic pollutants	☐ shrub/sapling removal ☐ herbaceous/aquatic bed removal ☐ sedimentation ☐ dredging ☐ farming ☐ nutrient enrichment

20.0

subtotal this page

Site: Wetland MD-13	Rater(s): JFW	Date: 2026-07-14
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20.0

subtotal first page

0.0	20.0
--	---

max 10 pts.

subtotal

Metric 5. Special Wetlands.

Check all that apply and score as indicated.

- ☐ Bog (10)
- ☐ Fen (10)
- ☐ Old growth forest (10)
- ☐ Mature forested wetland (5)
- ☐ Lake Erie coastal/tributary wetland-unrestricted hydrology (10)
- ☐ Lake Erie coastal/tributary wetland-restricted hydrology (5)
- ☐ Lake Plain Sand Prairies (Oak Openings) (10)
- ☐ Relict Wet Prairies (10)
- ☐ Known occurrence state/federal threatened or endangered species (10)
- ☐ Significant migratory songbird/water fowl habitat or usage (10)
- ☐ Category 1 Wetland. See Question 1 Qualitative Rating (-10)

-4.0	16.0
---	---

max 20 pts.

subtotal

Metric 6. Plant communities, interspersions, microtopography.

6a. Wetland Vegetation Communities.

Score all present using 0 to 3 scale.

- 0

 Aquatic bed
- 1

 Emergent
- 0

 Shrub
- 0

 Forest
- 0

 Mudflats
- 0

 Open water
- 0

 Other _____

6b. horizontal (plan view) Interspersion.

Select only one.

- ☐ High (5)
- ☐ Moderately high(4)
- ☐ Moderate (3)
- ☐ Moderately low (2)
- ☐ Low (1)
- X

 None (0)

6c. Coverage of invasive plants. Refer to Table 1 ORAM long form for list. Add or deduct points for coverage

- X

 Extensive >75% cover (-5)
- ☐ Moderate 25-75% cover (-3)
- ☐ Sparse 5-25% cover (-1)
- ☐ Nearly absent <5% cover (0)
- ☐ Absent (1)

6d. Microtopography.

Score all present using 0 to 3 scale.

- 0

 Vegetated hummocks/tussocks
- 0

 Coarse woody debris >15cm (6in)
- 0

 Standing dead >25cm (10in) dbh
- 0

 Amphibian breeding pools

Vegetation Community Cover Scale

0	Absent or comprises <0.1ha (0.2471 acres) contiguous area
1	Present and either comprises small part of wetland's vegetation and is of moderate quality, or comprises a significant part but is of low quality
2	Present and either comprises significant part of wetland's vegetation and is of moderate quality or comprises a small part and is of high quality
3	Present and comprises significant part, or more, of wetland's vegetation and is of high quality

Narrative Description of Vegetation Quality

low	Low spp diversity and/or predominance of nonnative or disturbance tolerant native species
mod	Native spp are dominant component of the vegetation, although nonnative and/or disturbance tolerant native spp can also be present, and species diversity moderate to moderately high, but generally w/o presence of rare threatened or endangered spp
high	A predominance of native species, with nonnative spp and/or disturbance tolerant native spp absent or virtually absent, and high spp diversity and often, but not always, the presence of rare, threatened, or endangered spp

Mudflat and Open Water Class Quality

0	Absent <0.1ha (0.247 acres)
1	Low 0.1 to <1ha (0.247 to 2.47 acres)
2	Moderate 1 to <4ha (2.47 to 9.88 acres)
3	High 4ha (9.88 acres) or more

Microtopography Cover Scale

0	Absent
1	Present very small amounts or if more common of marginal quality
2	Present in moderate amounts, but not of highest quality or in small amounts of highest quality
3	Present in moderate or greater amounts and of highest quality

16.0

GRAND TOTAL (max 100 pts)

Appendix D

Designated Use Stream Photographs

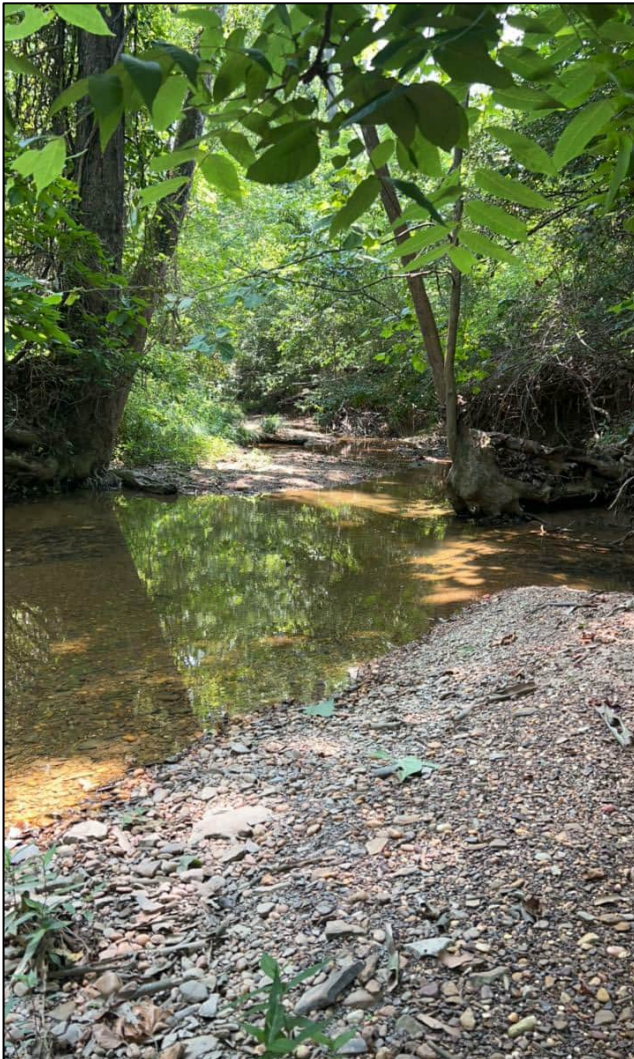
Stream ID: Stream MD-02

Stream Name: Little Beaver Creek

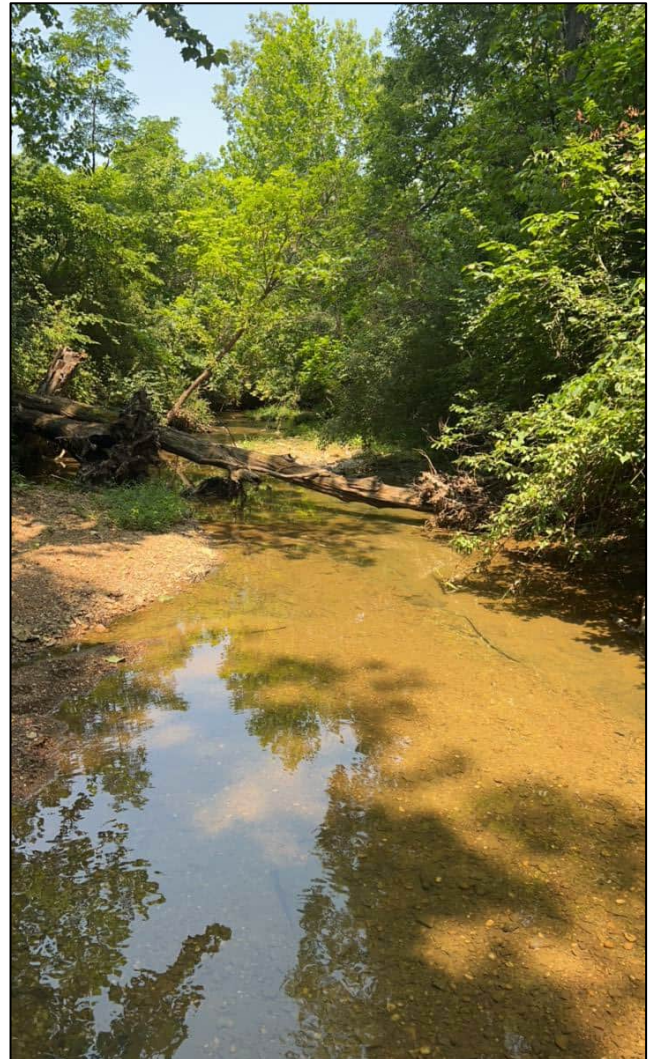
Designation: WWH



Substrate



Upstream



Downstream

Appendix E

HHEI Stream Forms



Headwater Habitat Evaluation Index Field Form

HHEI Score (sum of metrics 1+2+3)
20

 SITE NAME/LOCATION Stream MD-01 Monza-Don Marquis Transmission Line

 SITE NUMBER S-JFW-072326-03 RIVER BASIN 05060002 RIVER CODE _____ DRAINAGE AREA (mi²) 0.001

 LENGTH OF STREAM REACH (ft) 200 LAT 39.00693 LONG -82.97532 RIVER MILE _____

 DATE 07/23/2026 SCORER JFW COMMENTS _____

NOTE: Complete All Items On This Form - Refer to "Headwater Habitat Evaluation Index Field Manual" for Instructions
STREAM CHANNEL MODIFICATIONS: ☐ NONE / NATURAL CHANNEL ☐ RECOVERED ☒ RECOVERING ☐ RECENT OR NO RECOVERY

1. SUBSTRATE (Estimate percent of every type present). Check <i>ONLY</i> <u>two</u> predominant substrate <i>TYPE</i> boxes. (Max of 32). Add total number of significant substrate types found (Max of 8). Final metric score is sum of boxes A & B				HHEI Metric Points Substrate Max = 40 15 A + B
TYPE	PERCENT	TYPE	PERCENT	
☐ BLDR SLABS [16 pts] ☐ BOULDER (>256 mm) [16 pts] ☐ BEDROCK [16 pts] ☐ COBBLE (65-256 mm) [12 pts] ☒ GRAVEL (2-64 mm) [9 pts] ☐ SAND (<2 mm) [6 pts]	_____ _____ 10 70 _____	☒ SILT [3 pt] ☐ LEAF PACK/WOODY DEBRIS [3 pts] ☐ FINE DETRITUS [3 pts] ☐ CLAY or HARDPAN [0 pt] ☐ MUCK [0 pts] ☐ ARTIFICIAL [3 pts]	20 _____ _____ _____ _____ _____	
Total of Percentages of Bldr Slabs, Boulder, Cobble, Bedrock <u>10</u>		(A) 12	(B) 3	
SCORE OF TWO MOST PREDOMINATE SUBSTRATE TYPES:				
2. Maximum Pool Depth (Measure the <u>maximum</u> pool depth within the 61 meter (200 feet) evaluation reach at the time of evaluation. Avoid plunge pools from road culverts or storm water pipes) (Check <i>ONLY</i> one box):				Pool Depth Max = 30 0
☐ > 30 centimeters [20 pts] ☐ > 22.5 - 30 cm [30 pts] ☐ > 10 - 22.5 cm [25 pts]	☐ 5 cm - 10 cm [15 pts] ☐ < 5 cm [5pts] ☒ NO WATER OR MOIST CHANNEL [0pts]			
COMMENTS _____		MAXIMUM POOL DEPTH (inches): 0.0		
3. BANK FULL WIDTH (Measured as the average of 3 - 4 measurements) (Check <i>ONLY</i> one box):				Bankfull Width Max=30 5
☐ > 4.0 meters (> 13') [30 pts] ☐ > 3.0 m - 4.0 m (> 9' 7" - 13') [25 pts] ☐ > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]	☐ > 1.0 m - 1.5 m (> 3' 3" - 4' 8") [15 pts] ☒ ≤ 1.0 m (≤ 3' 3") [5 pts]			
COMMENTS _____		AVERAGE BANKFULL WIDTH (feet): 3.0		

 This information must also be completed

RIPARIAN ZONE AND FLOODPLAIN QUALITY ★ NOTE: River Left (L) and Right (R) as looking downstream ★

RIPARIAN WIDTH		FLOODPLAIN QUALITY (Most Predominant per Bank)	
L	R	L	R
☒	☒	☐	☐
☐	☐	☒	☒
☐	☐	☐	☐
☐	☐	☐	☐

COMMENTS _____

FLOW REGIME (At Time of Evaluation) (Check *ONLY* one box):

☐ Stream Flowing ☐ Subsurface flow with isolated pools (interstitial)	☐ Moist Channel, isolated pools, no flow (intermittent) ☒ Dry channel, no water (ephemeral)
--	---

COMMENTS _____

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check *ONLY* one box):

☐ None ☐ 0.5	☒ 1.0 ☐ 1.5	☐ 2.0 ☐ 2.5	☐ 3.0 ☐ >3
---	---	--	---

STREAM GRADIENT ESTIMATE

☐ Flat (0.5 ft/100 ft)	☐ Flat to Moderate	☒ Moderate (2 ft/100 ft)	☐ Moderate to Severe	☐ Severe (10 ft/100 ft)
---	---	--	---	--

ADDITIONAL STREAM INFORMATION (This Information Must Also be Completed):QHEI PERFORMED? ☐ Yes ☒ No QHEI Score _____ (If Yes, Attach Completed QHEI form)**DOWNSTREAM DESIGNATED USE(S)**

☒ WWH Name: Little Beaver Creek Distance from Evaluated Stream 0, direct tributary

☐ CWH Name: _____ Distance from Evaluated Stream _____

☐ EWH Name: _____ Distance from Evaluated Stream _____

MAPPING: ATTACH COPIES OF MAPS, INCLUDING THE ENTIRE WATERSHED AREA. CLEARLY MARK THE SITE LOCATION.

USGS Quadrangle Name: Waverly South NRCS Soil Map Page: _____ NRCS Soil Map Stream Order: _____

County: Pike Township/City: Scioto

MISCELLANEOUSBase Flow Conditions? (Y/N): Yes Date of last precipitation: 7/19/26 Quantity: 0.36

Photo-documentation Notes: _____

Elevated Turbidity? (Y/N): No Canopy (% open): 10.0Were samples collected for water chemistry? (Y/N): No Lab Sample # or ID (attach results): _____

Field Measures: Temp (°C) _____ Dissolved Oxygen (mg/l) _____ pH (S.U.) _____ Conductivity (umhos/cm) _____

Is the sampling reach representative of the stream (Y/N) Yes If not, explain: _____

Additional comments/description of pollution impacts: _____

BIOLOGICAL OBSERVATIONS

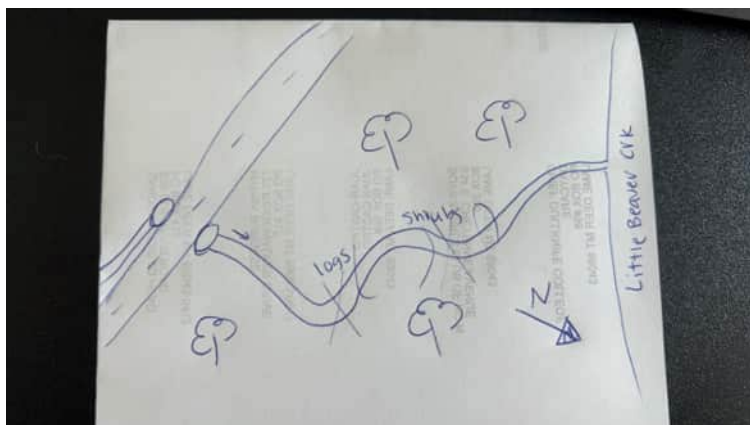
(Record all observations below)

Fish Observed? (Y/N) No Species observed (if known): _____Frogs or Tadpoles Observed? (Y/N) No Species observed (if known): _____Salamanders Observed? (Y/N) No Species observed (if known): _____Aquatic Macroinvertebrates Observed? (Y/N) No Species observed (if known): _____

Comments Regarding Biology: _____

DRAWING AND NARRATIVE DESCRIPTION OF STREAM REACH (This must be completed)

Include important landmarks and other features of interest for site evaluation and a narrative description of the stream's location





Upstream



Downstream



Substrate



Headwater Habitat Evaluation Index Field Form

HHEI Score (sum of metrics 1+2+3)

32

SITE NAME/LOCATION Stream MD-03 Monza-Don Marquis Transmission LineSITE NUMBER S-JFW-072326-01 RIVER BASIN 05060002 RIVER CODE _____ DRAINAGE AREA (mi²) 0.001LENGTH OF STREAM REACH (ft) 200 LAT 39.00936 LONG -82.97821 RIVER MILE _____DATE 07/23/2026 SCORER JFW COMMENTS _____**NOTE: Complete All Items On This Form - Refer to "Headwater Habitat Evaluation Index Field Manual" for Instructions****STREAM CHANNEL MODIFICATIONS:** ☐ NONE / NATURAL CHANNEL ☐ RECOVERED ☒ RECOVERING ☐ RECENT OR NO RECOVERY

1. SUBSTRATE (Estimate percent of every type present). Check <i>ONLY</i> <u>two</u> predominant substrate <i>TYPE</i> boxes. (Max of 32). Add total number of significant substrate types found (Max of 8). Final metric score is sum of boxes A & B				HHEI Metric Points Substrate Max = 40 12 A + B																											
<table border="0"> <tr> <th>TYPE</th> <th>PERCENT</th> <th>TYPE</th> <th>PERCENT</th> </tr> <tr> <td>☐ ☐ BLDR SLABS [16 pts]</td> <td>_____</td> <td>☐ ☐ SILT [3 pt]</td> <td>_____</td> </tr> <tr> <td>☐ ☐ BOULDER (>256 mm) [16 pts]</td> <td>_____</td> <td>☐ ☐ LEAF PACK/WOODY DEBRIS [3 pts]</td> <td>_____</td> </tr> <tr> <td>☐ ☐ BEDROCK [16 pts]</td> <td>_____</td> <td>☐ ☐ FINE DETRITUS [3 pts]</td> <td>_____</td> </tr> <tr> <td>☐ ☐ COBBLE (65-256 mm) [12 pts]</td> <td><u>20</u></td> <td>☐ ☒ CLAY or HARDPAN [0 pt]</td> <td><u>30</u></td> </tr> <tr> <td>☒ ☐ GRAVEL (2-64 mm) [9 pts]</td> <td><u>50</u></td> <td>☐ ☐ MUCK [0 pts]</td> <td>_____</td> </tr> <tr> <td>☐ ☐ SAND (<2 mm) [6 pts]</td> <td>_____</td> <td>☐ ☐ ARTIFICIAL [3 pts]</td> <td>_____</td> </tr> </table>	TYPE	PERCENT	TYPE		PERCENT	☐ ☐ BLDR SLABS [16 pts]	_____	☐ ☐ SILT [3 pt]	_____	☐ ☐ BOULDER (>256 mm) [16 pts]	_____	☐ ☐ LEAF PACK/WOODY DEBRIS [3 pts]	_____	☐ ☐ BEDROCK [16 pts]	_____	☐ ☐ FINE DETRITUS [3 pts]	_____	☐ ☐ COBBLE (65-256 mm) [12 pts]	<u>20</u>	☐ ☒ CLAY or HARDPAN [0 pt]	<u>30</u>	☒ ☐ GRAVEL (2-64 mm) [9 pts]	<u>50</u>	☐ ☐ MUCK [0 pts]	_____	☐ ☐ SAND (<2 mm) [6 pts]	_____	☐ ☐ ARTIFICIAL [3 pts]	_____	Total of Percentages of Bldr Slabs, Boulder, Cobble, Bedrock <u>20</u>	
TYPE	PERCENT	TYPE	PERCENT																												
☐ ☐ BLDR SLABS [16 pts]	_____	☐ ☐ SILT [3 pt]	_____																												
☐ ☐ BOULDER (>256 mm) [16 pts]	_____	☐ ☐ LEAF PACK/WOODY DEBRIS [3 pts]	_____																												
☐ ☐ BEDROCK [16 pts]	_____	☐ ☐ FINE DETRITUS [3 pts]	_____																												
☐ ☐ COBBLE (65-256 mm) [12 pts]	<u>20</u>	☐ ☒ CLAY or HARDPAN [0 pt]	<u>30</u>																												
☒ ☐ GRAVEL (2-64 mm) [9 pts]	<u>50</u>	☐ ☐ MUCK [0 pts]	_____																												
☐ ☐ SAND (<2 mm) [6 pts]	_____	☐ ☐ ARTIFICIAL [3 pts]	_____																												
SCORE OF TWO MOST PREDOMINATE SUBSTRATE TYPES: (A) 9		TOTAL NUMBER OF SUBSTRATE TYPES: (B) 3																													
2. Maximum Pool Depth (Measure the <u>maximum</u> pool depth within the 61 meter (200 feet) evaluation reach at the time of evaluation. Avoid plunge pools from road culverts or storm water pipes) (Check <i>ONLY</i> one box):				Pool Depth Max = 30 15																											
<table border="0"> <tr> <td>☐ > 30 centimeters [20 pts]</td> <td>☒ 5 cm - 10 cm [15 pts]</td> </tr> <tr> <td>☐ > 22.5 - 30 cm [30 pts]</td> <td>☐ < 5 cm [5pts]</td> </tr> <tr> <td>☐ > 10 - 22.5 cm [25 pts]</td> <td>☐ NO WATER OR MOIST CHANNEL [0pts]</td> </tr> </table>					☐ > 30 centimeters [20 pts]	☒ 5 cm - 10 cm [15 pts]	☐ > 22.5 - 30 cm [30 pts]	☐ < 5 cm [5pts]	☐ > 10 - 22.5 cm [25 pts]	☐ NO WATER OR MOIST CHANNEL [0pts]																					
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COMMENTS _____				MAXIMUM POOL DEPTH (inches): 3.0																											
3. BANK FULL WIDTH (Measured as the average of 3 - 4 measurements) (Check <i>ONLY</i> one box):				Bankfull Width Max=30 5																											
<table border="0"> <tr> <td>☐ > 4.0 meters (> 13') [30 pts]</td> <td>☐ > 1.0 m - 1.5 m (> 3' 3" - 4' 8") [15 pts]</td> </tr> <tr> <td>☐ > 3.0 m - 4.0 m (> 9' 7" - 13') [25 pts]</td> <td>☒ ≤ 1.0 m (≤ 3' 3") [5 pts]</td> </tr> <tr> <td>☐ > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]</td> <td></td> </tr> </table>					☐ > 4.0 meters (> 13') [30 pts]	☐ > 1.0 m - 1.5 m (> 3' 3" - 4' 8") [15 pts]	☐ > 3.0 m - 4.0 m (> 9' 7" - 13') [25 pts]	☒ ≤ 1.0 m (≤ 3' 3") [5 pts]	☐ > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]																						
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☐ > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]																															
COMMENTS _____				AVERAGE BANKFULL WIDTH (feet): 3.0																											

This information must also be completed**RIPARIAN ZONE AND FLOODPLAIN QUALITY** ★ NOTE: River Left (L) and Right (R) as looking downstream ★

RIPARIAN WIDTH (Per Bank)		FLOODPLAIN QUALITY (Most Predominant per Bank)	
L	R	L	R
☒ ☒	Wide >10m	☐ ☐	Mature Forest, Wetland
☐ ☐	Moderate 5-10m	☒ ☒	Immature Forest, Shrub or Old Field
☐ ☐	Narrow <5m	☐ ☐	Residential, Park, New Field
☐ ☐	None	☐ ☐	Fenced Pasture
☐ ☐		☐ ☐	Conservation Tillage
		☐ ☐	Urban or Industrial
		☐ ☐	Open Pasture, Row Crop
		☐ ☐	Mining or Construction

COMMENTS _____

FLOW REGIME (At Time of Evaluation) (Check *ONLY* one box):

☐ Stream Flowing	☐ Moist Channel, isolated pools, no flow (intermittent)
☒ Subsurface flow with isolated pools (interstitial)	☐ Dry channel, no water (ephemeral)

COMMENTS _____

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check *ONLY* one box):

☐ None	☐ 1.0	☒ 2.0	☐ 3.0
☐ 0.5	☐ 1.5	☐ 2.5	☐ >3

STREAM GRADIENT ESTIMATE

☐ Flat (0.5 ft/100 ft)	☐ Flat to Moderate	☒ Moderate (2 ft/100 ft)	☐ Moderate to Severe	☐ Severe (10 ft/100 ft)
---	---	--	---	--

ADDITIONAL STREAM INFORMATION (This Information Must Also be Completed):QHEI PERFORMED? ☐ Yes ☒ No QHEI Score _____ (If Yes, Attach Completed QHEI form)

DOWNSTREAM DESIGNATED USE(S)

☒ WWH Name: Little Beaver Creek Distance from Evaluated Stream 0, direct tributary

☐ CWH Name: _____ Distance from Evaluated Stream _____

☐ EWH Name: _____ Distance from Evaluated Stream _____

MAPPING: ATTACH COPIES OF MAPS, INCLUDING THE ENTIRE WATERSHED AREA. CLEARLY MARK THE SITE LOCATION.

USGS Quadrangle Name: Waverly South NRCS Soil Map Page: _____ NRCS Soil Map Stream Order: _____

County: Pike Township/City: Scioto

MISCELLANEOUS

Base Flow Conditions? (Y/N): Yes Date of last precipitation: 7/19/26 Quantity: 0.36

Photo-documentation Notes: _____

Elevated Turbidity? (Y/N): No Canopy (% open): 10.0Were samples collected for water chemistry? (Y/N): No Lab Sample # or ID (attach results): _____

Field Measures: Temp (°C) _____ Dissolved Oxygen (mg/l) _____ pH (S.U.) _____ Conductivity (umhos/cm) _____

Is the sampling reach representative of the stream (Y/N) Yes If not, explain: _____

Additional comments/description of pollution impacts: _____

BIOLOGICAL OBSERVATIONS

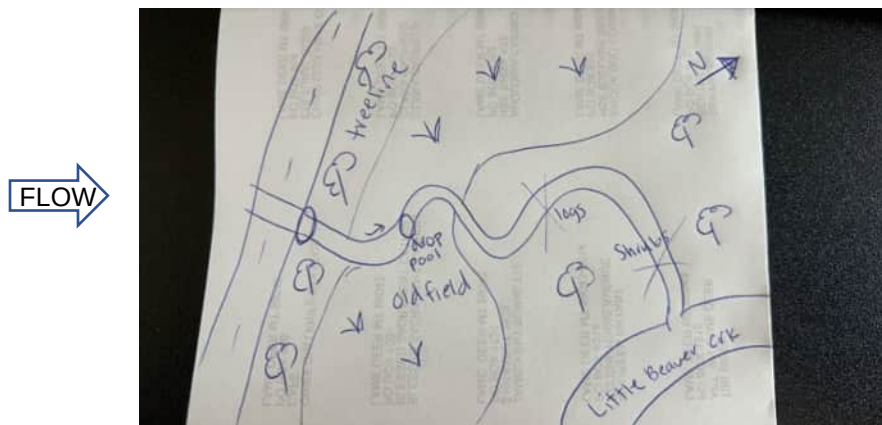
(Record all observations below)

Fish Observed? (Y/N) No Species observed (if known): _____Frogs or Tadpoles Observed? (Y/N) No Species observed (if known): _____Salamanders Observed? (Y/N) No Species observed (if known): _____Aquatic Macroinvertebrates Observed? (Y/N) No Species observed (if known): _____

Comments Regarding Biology: _____

DRAWING AND NARRATIVE DESCRIPTION OF STREAM REACH (This must be completed)

Include important landmarks and other features of interest for site evaluation and a narrative description of the stream's location





Upstream



Downstream



Substrate



Headwater Habitat Evaluation Index Field Form

HHEI Score (sum of metrics 1+2+3)

36

SITE NAME/LOCATION Stream MD-04 Monza-Don Marquis Transmission Line

SITE NUMBER S-JFW-072326-02 RIVER BASIN 05060002 RIVER CODE DRAINAGE AREA (mi²) 0.001

LENGTH OF STREAM REACH (ft) 200 LAT 39.01030 LONG -82.97942 RIVER MILE

DATE 07/23/2026 SCORER JFW COMMENTS

NOTE: Complete All Items On This Form - Refer to "Headwater Habitat Evaluation Index Field Manual" for Instructions

STREAM CHANNEL MODIFICATIONS: ☐ NONE / NATURAL CHANNEL ☐ RECOVERED ☒ RECOVERING ☐ RECENT OR NO RECOVERY

1. **SUBSTRATE (Estimate percent of every type present).** Check *ONLY* two predominant substrate *TYPE* boxes. (Max of 32). Add total number of significant substrate types found (Max of 8). Final metric score is sum of boxes A & B

TYPE	PERCENT	TYPE	PERCENT
☐ BLDR SLABS [16 pts]		☒ SILT [3 pt]	20
☐ BOULDER (>256 mm) [16 pts]		☐ LEAF PACK/WOODY DEBRIS [3 pts]	
☐ BEDROCK [16 pts]		☐ FINE DETRITUS [3 pts]	
☐ COBBLE (65-256 mm) [12 pts]	10	☐ CLAY or HARDPAN [0 pt]	10
☒ GRAVEL (2-64 mm) [9 pts]	60	☐ MUCK [0 pts]	
☐ SAND (<2 mm) [6 pts]		☐ ARTIFICIAL [3 pts]	

Total of Percentages of Bldr Slabs, Boulder, Cobble, Bedrock 10

(A) 12

(B) 4

SCORE OF TWO MOST PREDOMINATE SUBSTRATE TYPES:

TOTAL NUMBER OF SUBSTRATE TYPES:

HHEI
Metric
PointsSubstrate
Max = 40

16

A + B

2. **Maximum Pool Depth (Measure the maximum pool depth within the 61 meter (200 feet) evaluation reach at the time of evaluation. Avoid plunge pools from road culverts or storm water pipes) (Check *ONLY* one box):**

☐ > 30 centimeters [20 pts]	☐ 5 cm - 10 cm [15 pts]
☐ > 22.5 - 30 cm [30 pts]	☐ < 5 cm [5pts]
☐ > 10 - 22.5 cm [25 pts]	☒ NO WATER OR MOIST CHANNEL [0pts]

COMMENTS

MAXIMUM POOL DEPTH (inches):

0.0

Pool Depth
Max = 30

0

3. **BANK FULL WIDTH (Measured as the average of 3 - 4 measurements) (Check *ONLY* one box):**

☐ > 4.0 meters (> 13') [30 pts]	☐ > 1.0 m - 1.5 m (> 3' 3" - 4' 8") [15 pts]
☐ > 3.0 m - 4.0 m (> 9' 7" - 13') [25 pts]	☐ ≤ 1.0 m (≤ 3' 3") [5 pts]
☒ > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]	

COMMENTS

AVERAGE BANKFULL WIDTH (feet):

5.0

Bankfull
Width
Max=30

20

This information must also be completed

RIPARIAN ZONE AND FLOODPLAIN QUALITY ★ NOTE: River Left (L) and Right (R) as looking downstream ★

RIPARIAN WIDTH		FLOODPLAIN QUALITY (Most Predominant per Bank)	
L	R	L	R
☒	☒	☐	☐
		☒	☒
		☐	☐
		☐	☐

COMMENTS

FLOW REGIME (At Time of Evaluation) (Check *ONLY* one box):

☐ Stream Flowing	☐ Moist Channel, isolated pools, no flow (intermittent)
☐ Subsurface flow with isolated pools (interstitial)	☒ Dry channel, no water (ephemeral)

COMMENTS

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check *ONLY* one box):

☐ None	☐ 1.0	☒ 2.0	☐ 3.0
☐ 0.5	☐ 1.5	☐ 2.5	☐ >3

STREAM GRADIENT ESTIMATE

☐ Flat (0.5 ft/100 ft)
☐ Flat to Moderate
☒ Moderate (2 ft/100 ft)
☐ Moderate to Severe
☐ Severe (10 ft/100 ft)

ADDITIONAL STREAM INFORMATION (This Information Must Also be Completed):QHEI PERFORMED? ☐ Yes ☒ No QHEI Score _____ (If Yes, Attach Completed QHEI form)

DOWNSTREAM DESIGNATED USE(S)

☒ WWH Name: Little Beaver Creek Distance from Evaluated Stream 0, direct tributary

☐ CWH Name: _____ Distance from Evaluated Stream _____

☐ EWH Name: _____ Distance from Evaluated Stream _____

MAPPING: ATTACH COPIES OF MAPS, INCLUDING THE ENTIRE WATERSHED AREA. CLEARLY MARK THE SITE LOCATION.

USGS Quadrangle Name: Waverly South NRCS Soil Map Page: _____ NRCS Soil Map Stream Order: _____

County: Pike Township/City: Scioto

MISCELLANEOUS

Base Flow Conditions? (Y/N): Yes Date of last precipitation: 7/19/26 Quantity: 0.36

Photo-documentation Notes: _____

Elevated Turbidity? (Y/N): No Canopy (% open): 0.0Were samples collected for water chemistry? (Y/N): No Lab Sample # or ID (attach results): _____

Field Measures: Temp (°C) _____ Dissolved Oxygen (mg/l) _____ pH (S.U.) _____ Conductivity (umhos/cm) _____

Is the sampling reach representative of the stream (Y/N) Yes If not, explain: _____

Additional comments/description of pollution impacts: _____

BIOLOGICAL OBSERVATIONS

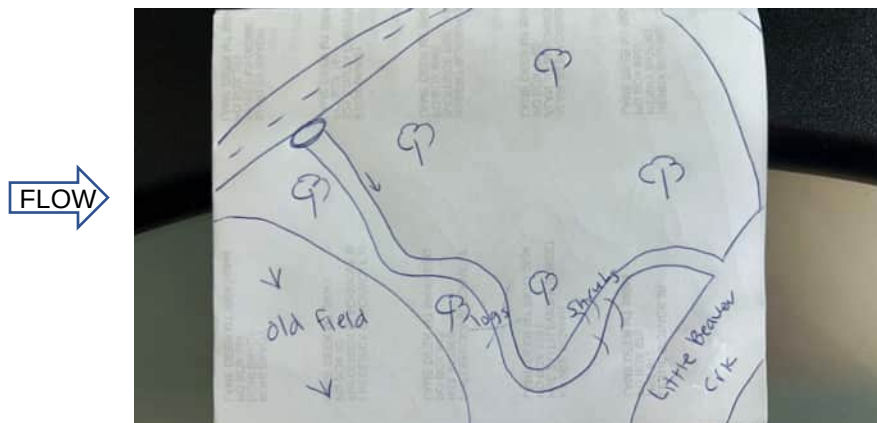
(Record all observations below)

Fish Observed? (Y/N) No Species observed (if known): _____Frogs or Tadpoles Observed? (Y/N) No Species observed (if known): _____Salamanders Observed? (Y/N) No Species observed (if known): _____Aquatic Macroinvertebrates Observed? (Y/N) No Species observed (if known): _____

Comments Regarding Biology: _____

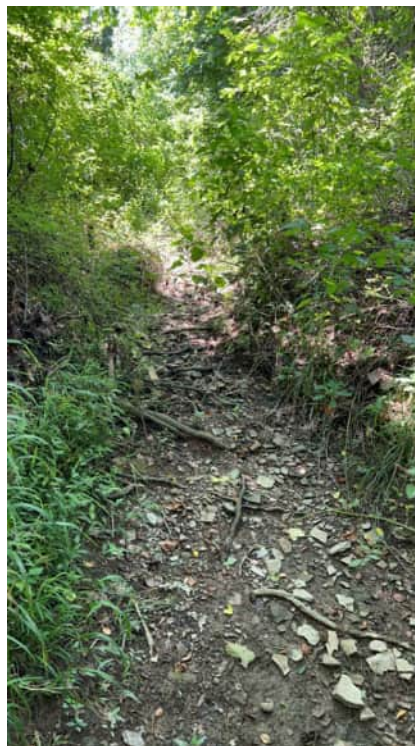
DRAWING AND NARRATIVE DESCRIPTION OF STREAM REACH (This must be completed)

Include important landmarks and other features of interest for site evaluation and a narrative description of the stream's location





Downstream



Upstream



Substrate



Headwater Habitat Evaluation Index Field Form

HHEI Score (sum of metrics 1+2+3)

74

SITE NAME/LOCATION Stream MD-05 Monza-Don Marquis Transmission Line

SITE NUMBER S-JFW-071526-03 RIVER BASIN 05060002 RIVER CODE DRAINAGE AREA (mi²) 0.52

LENGTH OF STREAM REACH (ft) 120 LAT 39.01327 LONG -82.98007 RIVER MILE

DATE 07/15/2026 SCORER JFW COMMENTS

NOTE: Complete All Items On This Form - Refer to "Headwater Habitat Evaluation Index Field Manual" for Instructions

STREAM CHANNEL MODIFICATIONS: ☒ NONE / NATURAL CHANNEL ☐ RECOVERED ☐ RECOVERING ☐ RECENT OR NO RECOVERY

1. **SUBSTRATE (Estimate percent of every type present).** Check *ONLY* two predominant substrate *TYPE* boxes. (Max of 32). Add total number of significant substrate types found (Max of 8). Final metric score is sum of boxes A & B

TYPE	PERCENT	TYPE	PERCENT
☐ BLDR SLABS [16 pts]		☐ SILT [3 pt]	5
☐ BOULDER (>256 mm) [16 pts]		☐ LEAF PACK/WOODY DEBRIS [3 pts]	
☐ BEDROCK [16 pts]		☐ FINE DETRITUS [3 pts]	
☐ COBBLE (65-256 mm) [12 pts]	10	☐ CLAY or HARDPAN [0 pt]	
☒ GRAVEL (2-64 mm) [9 pts]	85	☐ MUCK [0 pts]	
☐ SAND (<2 mm) [6 pts]		☐ ARTIFICIAL [3 pts]	

Total of Percentages of Bldr Slabs, Boulder, Cobble, Bedrock 10

(A) 21

(B) 3

SCORE OF TWO MOST PREDOMINATE SUBSTRATE TYPES:

TOTAL NUMBER OF SUBSTRATE TYPES:

HHEI
Metric
PointsSubstrate
Max = 40

24

A + B

2. **Maximum Pool Depth (Measure the maximum pool depth within the 61 meter (200 feet) evaluation reach at the time of evaluation. Avoid plunge pools from road culverts or storm water pipes) (Check *ONLY* one box):**

☐ > 30 centimeters [20 pts]	☐ 5 cm - 10 cm [15 pts]
☐ > 22.5 - 30 cm [30 pts]	☐ < 5 cm [5pts]
☒ > 10 - 22.5 cm [25 pts]	☐ NO WATER OR MOIST CHANNEL [0pts]

COMMENTS

MAXIMUM POOL DEPTH (inches):

6.0

Pool Depth
Max = 30

25

3. **BANK FULL WIDTH (Measured as the average of 3 - 4 measurements) (Check *ONLY* one box):**

☐ > 4.0 meters (> 13') [30 pts]	☐ > 1.0 m - 1.5 m (> 3' 3" - 4' 8") [15 pts]
☒ > 3.0 m - 4.0 m (> 9' 7" - 13') [25 pts]	☐ ≤ 1.0 m (≤ 3' 3") [5 pts]
☐ > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]	

COMMENTS

AVERAGE BANKFULL WIDTH (feet):

12.0

Bankfull
Width
Max=30

25

This information must also be completed

RIPARIAN ZONE AND FLOODPLAIN QUALITY ★ NOTE: River Left (L) and Right (R) as looking downstream ★

RIPARIAN WIDTH		FLOODPLAIN QUALITY (Most Predominant per Bank)	
L	R	L	R
☒	☐	☒	☐
	☒	☐	☐
☐	☐	☐	☐
☐	☐	☐	☐

COMMENTS

FLOW REGIME (At Time of Evaluation) (Check *ONLY* one box):

☒ Stream Flowing	☐ Moist Channel, isolated pools, no flow (intermittent)
☐ Subsurface flow with isolated pools (interstitial)	☐ Dry channel, no water (ephemeral)

COMMENTS

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check *ONLY* one box):

☒ None	☐ 1.0	☐ 2.0	☐ 3.0
☐ 0.5	☐ 1.5	☐ 2.5	☐ >3

STREAM GRADIENT ESTIMATE

☒ Flat (0.5 ft/100 ft)
 ☐ Flat to Moderate
 ☐ Moderate (2 ft/100 ft)
 ☐ Moderate to Severe
 ☐ Severe (10 ft/100 ft)

ADDITIONAL STREAM INFORMATION (This Information Must Also be Completed):QHEI PERFORMED? ☐ Yes ☒ No QHEI Score _____ (If Yes, Attach Completed QHEI form)

DOWNSTREAM DESIGNATED USE(S)

☒ WWH Name: Little Beaver Creek Distance from Evaluated Stream 0, direct tributary

☐ CWH Name: _____ Distance from Evaluated Stream _____

☐ EWH Name: _____ Distance from Evaluated Stream _____

MAPPING: ATTACH COPIES OF MAPS, INCLUDING THE ENTIRE WATERSHED AREA. CLEARLY MARK THE SITE LOCATION.

USGS Quadrangle Name: Waverly South NRCS Soil Map Page: _____ NRCS Soil Map Stream Order: _____

County: Pike Township/City: Scioto

MISCELLANEOUS

Base Flow Conditions? (Y/N): Yes Date of last precipitation: 7/11/26 Quantity: 1.25

Photo-documentation Notes: _____

Elevated Turbidity? (Y/N): No Canopy (% open): 10.0Were samples collected for water chemistry? (Y/N): No Lab Sample # or ID (attach results): _____

Field Measures: Temp (°C) _____ Dissolved Oxygen (mg/l) _____ pH (S.U.) _____ Conductivity (umhos/cm) _____

Is the sampling reach representative of the stream (Y/N) Yes If not, explain: _____

Additional comments/description of pollution impacts: _____

BIOLOGICAL OBSERVATIONS

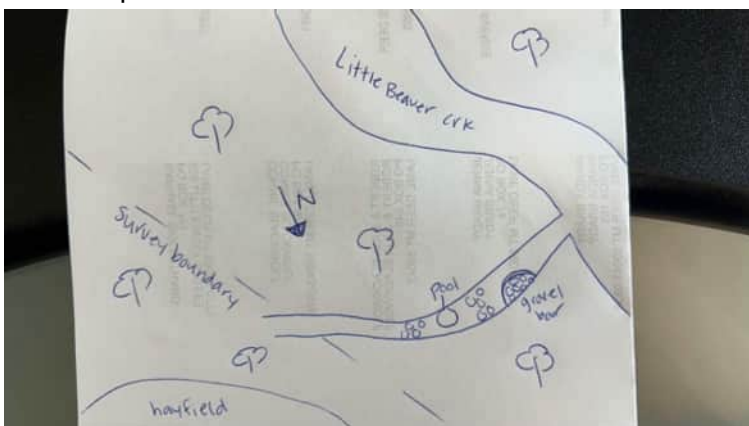
(Record all observations below)

Fish Observed? (Y/N) Yes Species observed (if known): _____Frogs or Tadpoles Observed? (Y/N) Yes Species observed (if known): _____Salamanders Observed? (Y/N) No Species observed (if known): _____Aquatic Macroinvertebrates Observed? (Y/N) Yes Species observed (if known): _____

Comments Regarding Biology: _____

DRAWING AND NARRATIVE DESCRIPTION OF STREAM REACH (This must be completed)

Include important landmarks and other features of interest for site evaluation and a narrative description of the stream's location





Upstream



Downstream



Substrate



Headwater Habitat Evaluation Index Field Form

HHEI Score (sum of metrics 1+2+3)

38

SITE NAME/LOCATION Stream MD-06 Monza-Don Marquis Transmission Line

SITE NUMBER S-JFW-071526-01 RIVER BASIN 05060002 RIVER CODE DRAINAGE AREA (mi²) 0.19

LENGTH OF STREAM REACH (ft) 200 LAT 39.01685 LONG -82.98395 RIVER MILE

DATE 07/15/2026 SCORER JFW COMMENTS

NOTE: Complete All Items On This Form - Refer to "Headwater Habitat Evaluation Index Field Manual" for Instructions

STREAM CHANNEL MODIFICATIONS: ☐ NONE / NATURAL CHANNEL ☐ RECOVERED ☒ RECOVERING ☐ RECENT OR NO RECOVERY

1. **SUBSTRATE (Estimate percent of every type present).** Check *ONLY* two predominant substrate *TYPE* boxes. (Max of 32). Add total number of significant substrate types found (Max of 8). Final metric score is sum of boxes A & B

TYPE	PERCENT	TYPE	PERCENT
☐ ☐ BLDR SLABS [16 pts]		☒ ☐ SILT [3 pt]	90
☐ ☐ BOULDER (>256 mm) [16 pts]		☐ ☐ LEAF PACK/WOODY DEBRIS [3 pts]	
☐ ☐ BEDROCK [16 pts]		☐ ☐ FINE DETRITUS [3 pts]	
☐ ☐ COBBLE (65-256 mm) [12 pts]		☐ ☐ CLAY or HARDPAN [0 pt]	
☐ ☐ GRAVEL (2-64 mm) [9 pts]		☐ ☐ MUCK [0 pts]	
☐ ☐ SAND (<2 mm) [6 pts]		☐ ☒ ARTIFICIAL [3 pts]	10

Total of Percentages of Bldr Slabs, Boulder, Cobble, Bedrock 0

(A) 6

(B) 2

SCORE OF TWO MOST PREDOMINATE SUBSTRATE TYPES:

TOTAL NUMBER OF SUBSTRATE TYPES:

HHEI
Metric
PointsSubstrate
Max = 40

8

A + B

2. **Maximum Pool Depth (Measure the maximum pool depth within the 61 meter (200 feet) evaluation reach at the time of evaluation. Avoid plunge pools from road culverts or storm water pipes) (Check *ONLY* one box):**

☐ > 30 centimeters [20 pts]	☒ 5 cm - 10 cm [15 pts]
☐ > 22.5 - 30 cm [30 pts]	☐ < 5 cm [5pts]
☐ > 10 - 22.5 cm [25 pts]	☐ NO WATER OR MOIST CHANNEL [0pts]

Pool Depth
Max = 30

15

COMMENTS

MAXIMUM POOL DEPTH (inches): 3.0

3. **BANK FULL WIDTH (Measured as the average of 3 - 4 measurements) (Check *ONLY* one box):**

☐ > 4.0 meters (> 13') [30 pts]	☒ > 1.0 m - 1.5 m (> 3' 3" - 4' 8") [15 pts]
☐ > 3.0 m - 4.0 m (> 9' 7" - 13') [25 pts]	☐ ≤ 1.0 m (≤ 3' 3") [5 pts]
☐ > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]	

Bankfull
Width
Max=30

15

COMMENTS

AVERAGE BANKFULL WIDTH (feet): 4.0

This information must also be completed

RIPARIAN ZONE AND FLOODPLAIN QUALITY ★ NOTE: River Left (L) and Right (R) as looking downstream ★

RIPARIAN WIDTH		FLOODPLAIN QUALITY (Most Predominant per Bank)	
L	R	L	R
☒	☒	☒ ☒ Mature Forest, Wetland	☐ ☐ Conservation Tillage
☐	☐	☐ ☐ Immature Forest, Shrub or Old Field	☐ ☐ Urban or Industrial
☐	☐	☐ ☐ Residential, Park, New Field	☐ ☐ Open Pasture, Row Crop
☐	☐	☐ ☐ Fenced Pasture	☐ ☐ Mining or Construction

COMMENTS

FLOW REGIME (At Time of Evaluation) (Check *ONLY* one box):

☒ Stream Flowing	☐ Moist Channel, isolated pools, no flow (intermittent)
☐ Subsurface flow with isolated pools (interstitial)	☐ Dry channel, no water (ephemeral)

COMMENTS

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check *ONLY* one box):

☒ None	☐ 1.0	☐ 2.0	☐ 3.0
☐ 0.5	☐ 1.5	☐ 2.5	☐ >3

STREAM GRADIENT ESTIMATE

☐ Flat (0.5 ft/100 ft)
☐ Flat to Moderate
☒ Moderate (2 ft/100 ft)
☐ Moderate to Severe
☐ Severe (10 ft/100 ft)

ADDITIONAL STREAM INFORMATION (This Information Must Also be Completed):QHEI PERFORMED? ☐ Yes ☒ No QHEI Score _____ (If Yes, Attach Completed QHEI form)

DOWNSTREAM DESIGNATED USE(S)

☒ WWH Name: Little Beaver Creek Distance from Evaluated Stream 0, direct tributary

☐ CWH Name: _____ Distance from Evaluated Stream _____

☐ EWH Name: _____ Distance from Evaluated Stream _____

MAPPING: ATTACH COPIES OF MAPS, INCLUDING THE ENTIRE WATERSHED AREA. CLEARLY MARK THE SITE LOCATION.

USGS Quadrangle Name: Waverly South NRCS Soil Map Page: _____ NRCS Soil Map Stream Order: _____

County: Pike Township/City: Scioto

MISCELLANEOUS

Base Flow Conditions? (Y/N): Yes Date of last precipitation: 7/11/26 Quantity: 1.25

Photo-documentation Notes: _____

Elevated Turbidity? (Y/N): No Canopy (% open): 0.0Were samples collected for water chemistry? (Y/N): No Lab Sample # or ID (attach results): _____

Field Measures: Temp (°C) _____ Dissolved Oxygen (mg/l) _____ pH (S.U.) _____ Conductivity (umhos/cm) _____

Is the sampling reach representative of the stream (Y/N) Yes If not, explain: _____

Additional comments/description of pollution impacts: _____

BIOLOGICAL OBSERVATIONS

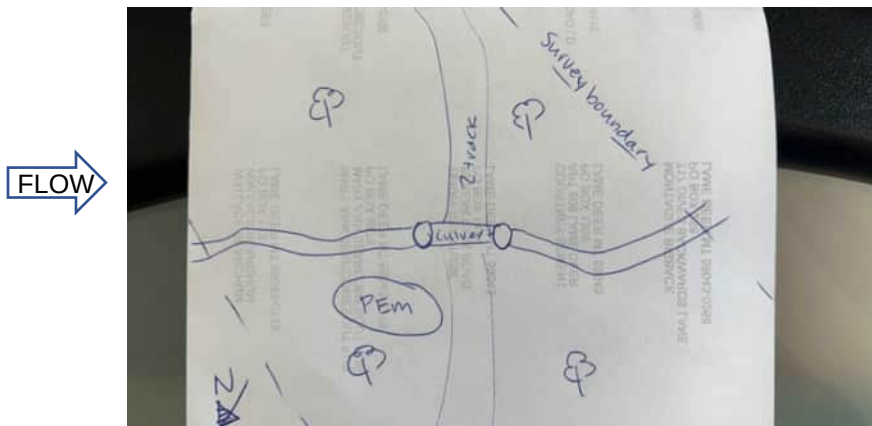
(Record all observations below)

Fish Observed? (Y/N) Yes Species observed (if known): _____Frogs or Tadpoles Observed? (Y/N) No Species observed (if known): _____Salamanders Observed? (Y/N) No Species observed (if known): _____Aquatic Macroinvertebrates Observed? (Y/N) No Species observed (if known): _____

Comments Regarding Biology: _____

DRAWING AND NARRATIVE DESCRIPTION OF STREAM REACH (This must be completed)

Include important landmarks and other features of interest for site evaluation and a narrative description of the stream's location





Upstream



Downstream



Substrate



Headwater Habitat Evaluation Index Field Form

HHEI Score (sum of metrics 1+2+3)

69

SITE NAME/LOCATION Stream MD-07 Monza-Don Marquis Transmission Line

SITE NUMBER S-JFW-071426-06 RIVER BASIN 05060002 RIVER CODE DRAINAGE AREA (mi²) 0.04

LENGTH OF STREAM REACH (ft) 83 LAT 39.02384 LONG -83.00245 RIVER MILE

DATE 07/14/2026 SCORER JFW COMMENTS

NOTE: Complete All Items On This Form - Refer to "Headwater Habitat Evaluation Index Field Manual" for Instructions

STREAM CHANNEL MODIFICATIONS: ☐ NONE / NATURAL CHANNEL ☐ RECOVERED ☒ RECOVERING ☐ RECENT OR NO RECOVERY

1. **SUBSTRATE (Estimate percent of every type present).** Check *ONLY* two predominant substrate *TYPE* boxes. (Max of 32). Add total number of significant substrate types found (Max of 8). Final metric score is sum of boxes A & B

TYPE	PERCENT	TYPE	PERCENT
☐ BLDR SLABS [16 pts]		☐ SILT [3 pt]	55
☐ BOULDER (>256 mm) [16 pts]		☐ LEAF PACK/WOODY DEBRIS [3 pts]	
☐ BEDROCK [16 pts]		☐ FINE DETRITUS [3 pts]	
☒ COBBLE (65-256 mm) [12 pts]	15	☐ CLAY or HARDPAN [0 pt]	
☐ GRAVEL (2-64 mm) [9 pts]	30	☐ MUCK [0 pts]	
☐ SAND (<2 mm) [6 pts]		☐ ARTIFICIAL [3 pts]	

Total of Percentages of Bldr Slabs, Boulder, Cobble, Bedrock 15

(A) 21

(B) 3

SCORE OF TWO MOST PREDOMINATE SUBSTRATE TYPES:

TOTAL NUMBER OF SUBSTRATE TYPES:

HHEI
Metric
PointsSubstrate
Max = 40

24

A + B

2. **Maximum Pool Depth (Measure the maximum pool depth within the 61 meter (200 feet) evaluation reach at the time of evaluation. Avoid plunge pools from road culverts or storm water pipes) (Check *ONLY* one box):**

☐ > 30 centimeters [20 pts]	☐ 5 cm - 10 cm [15 pts]
☐ > 22.5 - 30 cm [30 pts]	☐ < 5 cm [5pts]
☒ > 10 - 22.5 cm [25 pts]	☐ NO WATER OR MOIST CHANNEL [0pts]

COMMENTS

MAXIMUM POOL DEPTH (inches): 7.0

Pool Depth
Max = 30

25

3. **BANK FULL WIDTH (Measured as the average of 3 - 4 measurements) (Check *ONLY* one box):**

☐ > 4.0 meters (> 13') [30 pts]	☐ > 1.0 m - 1.5 m (> 3' 3" - 4' 8") [15 pts]
☐ > 3.0 m - 4.0 m (> 9' 7" - 13') [25 pts]	☐ ≤ 1.0 m (≤ 3' 3") [5 pts]
☒ > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]	

COMMENTS

AVERAGE BANKFULL WIDTH (feet): 5.0

Bankfull
Width
Max=30

20

This information must also be completed

RIPARIAN ZONE AND FLOODPLAIN QUALITY ★ NOTE: River Left (L) and Right (R) as looking downstream ★

RIPARIAN WIDTH		FLOODPLAIN QUALITY (Most Predominant per Bank)	
L	R	L	R
☒	☐	☐	☐
		☒	☐
☐	☒	☐	☐
☐		☐	☐

COMMENTS

FLOW REGIME (At Time of Evaluation) (Check *ONLY* one box):

☒ Stream Flowing	☐ Moist Channel, isolated pools, no flow (intermittent)
☐ Subsurface flow with isolated pools (interstitial)	☐ Dry channel, no water (ephemeral)

COMMENTS

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check *ONLY* one box):

☐ None	☐ 1.0	☐ 2.0	☐ 3.0
☐ 0.5	☒ 1.5	☐ 2.5	☐ >3

STREAM GRADIENT ESTIMATE

☐ Flat (0.5 ft/100 ft)
☐ Flat to Moderate
☒ Moderate (2 ft/100 ft)
☐ Moderate to Severe
☐ Severe (10 ft/100 ft)

ADDITIONAL STREAM INFORMATION (This Information Must Also be Completed):QHEI PERFORMED? ☐ Yes ☒ No QHEI Score _____ (If Yes, Attach Completed QHEI form)

DOWNSTREAM DESIGNATED USE(S)

☒ WWH Name: Little Beaver Creek Distance from Evaluated Stream 0.5 mile
☐ CWH Name: _____ Distance from Evaluated Stream _____
☐ EWH Name: _____ Distance from Evaluated Stream _____

MAPPING: ATTACH COPIES OF MAPS, INCLUDING THE ENTIRE WATERSHED AREA. CLEARLY MARK THE SITE LOCATION.

USGS Quadrangle Name: Piketon NRCS Soil Map Page: _____ NRCS Soil Map Stream Order: _____
 County: Pike Township/City: Scioto

MISCELLANEOUS

Base Flow Conditions? (Y/N): Yes Date of last precipitation: 7/11/26 Quantity: 1.25

Photo-documentation Notes: _____

Elevated Turbidity? (Y/N): No Canopy (% open): 0.0Were samples collected for water chemistry? (Y/N): No Lab Sample # or ID (attach results): _____

Field Measures: Temp (°C) _____ Dissolved Oxygen (mg/l) _____ pH (S.U.) _____ Conductivity (umhos/cm) _____

Is the sampling reach representative of the stream (Y/N) Yes If not, explain: _____

Additional comments/description of pollution impacts: _____

BIOLOGICAL OBSERVATIONS

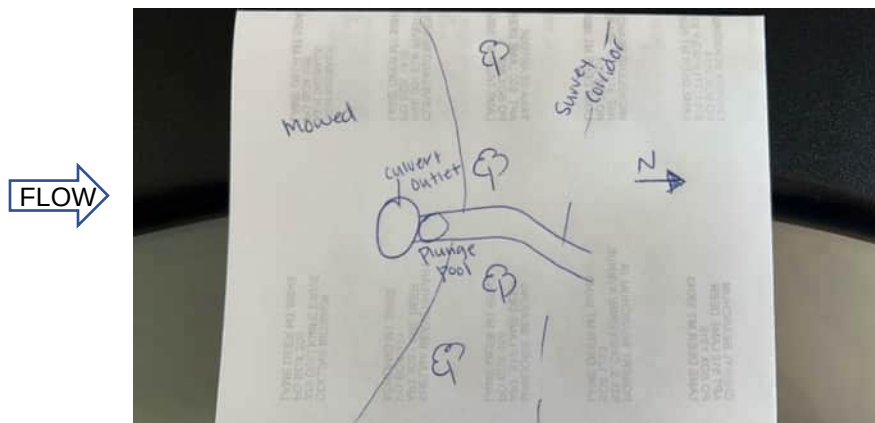
(Record all observations below)

Fish Observed? (Y/N) No Species observed (if known): _____Frogs or Tadpoles Observed? (Y/N) No Species observed (if known): _____Salamanders Observed? (Y/N) No Species observed (if known): _____Aquatic Macroinvertebrates Observed? (Y/N) No Species observed (if known): _____

Comments Regarding Biology: _____

DRAWING AND NARRATIVE DESCRIPTION OF STREAM REACH (This must be completed)

Include important landmarks and other features of interest for site evaluation and a narrative description of the stream's location





Upstream



Downstream



Substrate



Headwater Habitat Evaluation Index Field Form

HHEI Score (sum of metrics 1+2+3)

22

SITE NAME/LOCATION Stream MD-08 Monza-Don Marquis Transmission Line

SITE NUMBER S-JFW-071426-01 RIVER BASIN 05060002 RIVER CODE DRAINAGE AREA (mi²) 0.001

LENGTH OF STREAM REACH (ft) 200 LAT 39.02247 LONG -83.00618 RIVER MILE

DATE 07/14/2026 SCORER JFW COMMENTS

NOTE: Complete All Items On This Form - Refer to "Headwater Habitat Evaluation Index Field Manual" for Instructions

STREAM CHANNEL MODIFICATIONS: ☐ NONE / NATURAL CHANNEL ☐ RECOVERED ☒ RECOVERING ☐ RECENT OR NO RECOVERY

1. SUBSTRATE (Estimate percent of every type present). Check ONLY two predominant substrate TYPE boxes. (Max of 32). Add total number of significant substrate types found (Max of 8). Final metric score is sum of boxes A & B				HHEI Metric Points Substrate Max = 40 2 A + B																											
<table border="1"> <thead> <tr> <th>TYPE</th> <th>PERCENT</th> <th>TYPE</th> <th>PERCENT</th> </tr> </thead> <tbody> <tr> <td>☐ ☐ BLDR SLABS [16 pts]</td> <td></td> <td>☐ ☐ SILT [3 pt]</td> <td></td> </tr> <tr> <td>☐ ☐ BOULDER (>256 mm) [16 pts]</td> <td></td> <td>☐ ☐ LEAF PACK/WOODY DEBRIS [3 pts]</td> <td></td> </tr> <tr> <td>☐ ☐ BEDROCK [16 pts]</td> <td></td> <td>☐ ☐ FINE DETRITUS [3 pts]</td> <td></td> </tr> <tr> <td>☐ ☐ COBBLE (65-256 mm) [12 pts]</td> <td></td> <td>☐ ☐ CLAY or HARDPAN [0 pt]</td> <td></td> </tr> <tr> <td>☐ ☐ GRAVEL (2-64 mm) [9 pts]</td> <td>10</td> <td>☒ ☒ MUCK [0 pts]</td> <td>90</td> </tr> <tr> <td>☐ ☐ SAND (<2 mm) [6 pts]</td> <td></td> <td>☐ ☐ ARTIFICIAL [3 pts]</td> <td></td> </tr> </tbody> </table>	TYPE	PERCENT	TYPE		PERCENT	☐ ☐ BLDR SLABS [16 pts]		☐ ☐ SILT [3 pt]		☐ ☐ BOULDER (>256 mm) [16 pts]		☐ ☐ LEAF PACK/WOODY DEBRIS [3 pts]		☐ ☐ BEDROCK [16 pts]		☐ ☐ FINE DETRITUS [3 pts]		☐ ☐ COBBLE (65-256 mm) [12 pts]		☐ ☐ CLAY or HARDPAN [0 pt]		☐ ☐ GRAVEL (2-64 mm) [9 pts]	10	☒ ☒ MUCK [0 pts]	90	☐ ☐ SAND (<2 mm) [6 pts]		☐ ☐ ARTIFICIAL [3 pts]			
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Total of Percentages of Bldr Slabs, Boulder, Cobble, Bedrock 0		(A) 0 (B) 2																													
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COMMENTS MAXIMUM POOL DEPTH (inches): 3.0																															
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COMMENTS AVERAGE BANKFULL WIDTH (feet): 3.0																															

This information must also be completed

RIPARIAN ZONE AND FLOODPLAIN QUALITY ★ NOTE: River Left (L) and Right (R) as looking downstream ★

RIPARIAN WIDTH (Per Bank)		FLOODPLAIN QUALITY (Most Predominant per Bank)	
L	R	L	R
☐	☐	☐	☐
☐	☐	☒	☐
☐	☐	☐	☐
☒	☒	☐	☐

COMMENTS

FLOW REGIME (At Time of Evaluation) (Check ONLY one box):

☒ Stream Flowing	☐ Moist Channel, isolated pools, no flow (intermittent)
☐ Subsurface flow with isolated pools (interstitial)	☐ Dry channel, no water (ephemeral)

COMMENTS

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check ONLY one box):

☐ None	☐ 1.0	☐ 2.0	☐ 3.0
☒ 0.5	☐ 1.5	☐ 2.5	☐ >3

STREAM GRADIENT ESTIMATE

☒ Flat (0.5 ft/100 ft)	☐ Flat to Moderate	☐ Moderate (2 ft/100 ft)	☐ Moderate to Severe	☐ Severe (10 ft/100 ft)
--	---	---	---	--

ADDITIONAL STREAM INFORMATION (This Information Must Also be Completed):QHEI PERFORMED? ☐ Yes ☒ No QHEI Score _____ (If Yes, Attach Completed QHEI form)**DOWNSTREAM DESIGNATED USE(S)**

☒ WWH Name: Little Beaver Creek Distance from Evaluated Stream 0.6 mile
☐ CWH Name: _____ Distance from Evaluated Stream _____
☐ EWH Name: _____ Distance from Evaluated Stream _____

MAPPING: ATTACH COPIES OF MAPS, INCLUDING THE ENTIRE WATERSHED AREA. CLEARLY MARK THE SITE LOCATION.

USGS Quadrangle Name: Piketon NRCS Soil Map Page: _____ NRCS Soil Map Stream Order: _____
 County: Pike Township/City: Scioto

MISCELLANEOUSBase Flow Conditions? (Y/N): Yes Date of last precipitation: 7/11/26 Quantity: 1.25

Photo-documentation Notes: _____

Elevated Turbidity? (Y/N): No Canopy (% open): 100.0Were samples collected for water chemistry? (Y/N): No Lab Sample # or ID (attach results): _____

Field Measures: Temp (°C) _____ Dissolved Oxygen (mg/l) _____ pH (S.U.) _____ Conductivity (umhos/cm) _____

Is the sampling reach representative of the stream (Y/N) Yes If not, explain: _____

Additional comments/description of pollution impacts: _____

BIOLOGICAL OBSERVATIONS

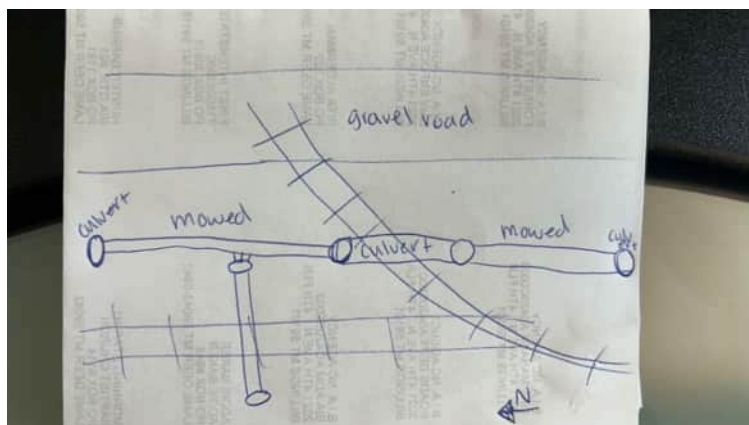
(Record all observations below)

Fish Observed? (Y/N) No Species observed (if known): _____Frogs or Tadpoles Observed? (Y/N) Yes Species observed (if known): FrogSalamanders Observed? (Y/N) No Species observed (if known): _____Aquatic Macroinvertebrates Observed? (Y/N) No Species observed (if known): _____

Comments Regarding Biology: _____

DRAWING AND NARRATIVE DESCRIPTION OF STREAM REACH (This must be completed)

Include important landmarks and other features of interest for site evaluation and a narrative description of the stream's location





Downstream



Upstream



Substrate



Headwater Habitat Evaluation Index Field Form

HHEI Score (sum of metrics 1+2+3)
59

 SITE NAME/LOCATION Stream MD-09 Monza-Don Marquis Transmission Line

 SITE NUMBER S-JFW-071426-05 RIVER BASIN 05060002 RIVER CODE _____ DRAINAGE AREA (mi²) 0.001

 LENGTH OF STREAM REACH (ft) 200 LAT 39.02246 LONG -83.00664 RIVER MILE _____

 DATE 07/14/2026 SCORER JFW COMMENTS _____

NOTE: Complete All Items On This Form - Refer to "Headwater Habitat Evaluation Index Field Manual" for Instructions
STREAM CHANNEL MODIFICATIONS: ☐ NONE / NATURAL CHANNEL ☐ RECOVERED ☒ RECOVERING ☐ RECENT OR NO RECOVERY

1. SUBSTRATE (Estimate percent of every type present). Check <i>ONLY</i> <u>two</u> predominant substrate <i>TYPE</i> boxes. (Max of 32). Add total number of significant substrate types found (Max of 8). Final metric score is sum of boxes A & B				HHEI Metric Points Substrate Max = 40 24 A + B																												
<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;">TYPE</th> <th style="text-align: left;">PERCENT</th> </tr> </thead> <tbody> <tr><td>☐ BLDR SLABS [16 pts]</td><td>_____</td></tr> <tr><td>☐ BOULDER (>256 mm) [16 pts]</td><td>_____</td></tr> <tr><td>☐ BEDROCK [16 pts]</td><td>_____</td></tr> <tr><td>☒ COBBLE (65-256 mm) [12 pts]</td><td>20</td></tr> <tr><td>☐ GRAVEL (2-64 mm) [9 pts]</td><td>20</td></tr> <tr><td>☐ SAND (<2 mm) [6 pts]</td><td>_____</td></tr> </tbody> </table>	TYPE	PERCENT	☐ BLDR SLABS [16 pts]		_____	☐ BOULDER (>256 mm) [16 pts]	_____	☐ BEDROCK [16 pts]	_____	☒ COBBLE (65-256 mm) [12 pts]	20	☐ GRAVEL (2-64 mm) [9 pts]	20	☐ SAND (<2 mm) [6 pts]	_____	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;">TYPE</th> <th style="text-align: left;">PERCENT</th> </tr> </thead> <tbody> <tr><td>☐ SILT [3 pt]</td><td>60</td></tr> <tr><td>☐ LEAF PACK/WOODY DEBRIS [3 pts]</td><td>_____</td></tr> <tr><td>☐ FINE DETRITUS [3 pts]</td><td>_____</td></tr> <tr><td>☐ CLAY or HARDPAN [0 pt]</td><td>_____</td></tr> <tr><td>☐ MUCK [0 pts]</td><td>_____</td></tr> <tr><td>☐ ARTIFICIAL [3 pts]</td><td>_____</td></tr> </tbody> </table>	TYPE	PERCENT	☐ SILT [3 pt]	60	☐ LEAF PACK/WOODY DEBRIS [3 pts]	_____	☐ FINE DETRITUS [3 pts]	_____	☐ CLAY or HARDPAN [0 pt]	_____	☐ MUCK [0 pts]	_____	☐ ARTIFICIAL [3 pts]	_____	Total of Percentages of Bldr Slabs, Boulder, Cobble, Bedrock <u>20</u>	
TYPE	PERCENT																															
☐ BLDR SLABS [16 pts]	_____																															
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☐ CLAY or HARDPAN [0 pt]	_____																															
☐ MUCK [0 pts]	_____																															
☐ ARTIFICIAL [3 pts]	_____																															
SCORE OF TWO MOST PREDOMINATE SUBSTRATE TYPES: (A) 21																																
TOTAL NUMBER OF SUBSTRATE TYPES: (B) 3																																
2. Maximum Pool Depth (Measure the <u>maximum</u> pool depth within the 61 meter (200 feet) evaluation reach at the time of evaluation. Avoid plunge pools from road culverts or storm water pipes) (Check <i>ONLY</i> one box):				Pool Depth Max = 30 15																												
☐ > 30 centimeters [20 pts]	☒ 5 cm - 10 cm [15 pts]	☐ > 22.5 - 30 cm [30 pts]																														
☐ > 10 - 22.5 cm [25 pts]	☐ < 5 cm [5pts]	☐ NO WATER OR MOIST CHANNEL [0pts]																														
COMMENTS _____																																
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COMMENTS _____																																
AVERAGE BANKFULL WIDTH (feet): 8.0																																

 This information must also be completed

RIPARIAN ZONE AND FLOODPLAIN QUALITY ★ NOTE: River Left (L) and Right (R) as looking downstream ★

RIPARIAN WIDTH		FLOODPLAIN QUALITY (Most Predominant per Bank)	
L	R	L	R
☐	☐	☐	☐
☒	☒	☒	☒
☐	☐	☐	☐
☐	☐	☐	☐

COMMENTS _____

FLOW REGIME (At Time of Evaluation) (Check *ONLY* one box):

☒ Stream Flowing	☐ Moist Channel, isolated pools, no flow (intermittent)
☐ Subsurface flow with isolated pools (interstitial)	☐ Dry channel, no water (ephemeral)

COMMENTS _____

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check *ONLY* one box):

☐ None	☐ 1.0	☐ 2.0	☐ 3.0
☐ 0.5	☒ 1.5	☐ 2.5	☐ >3

STREAM GRADIENT ESTIMATE

☐ Flat (0.5 ft/100 ft)	☐ Flat to Moderate	☒ Moderate (2 ft/100 ft)	☐ Moderate to Severe	☐ Severe (10 ft/100 ft)
---	---	--	---	--

ADDITIONAL STREAM INFORMATION (This Information Must Also be Completed):QHEI PERFORMED? ☐ Yes ☒ No QHEI Score _____ (If Yes, Attach Completed QHEI form)**DOWNSTREAM DESIGNATED USE(S)**

☒ WWH Name: Little Beaver Creek Distance from Evaluated Stream 0.7 mile
☐ CWH Name: _____ Distance from Evaluated Stream _____
☐ EWH Name: _____ Distance from Evaluated Stream _____

MAPPING: ATTACH COPIES OF MAPS, INCLUDING THE ENTIRE WATERSHED AREA. CLEARLY MARK THE SITE LOCATION.

USGS Quadrangle Name: Piketon NRCS Soil Map Page: _____ NRCS Soil Map Stream Order: _____
 County: Pike Township/City: Scioto

MISCELLANEOUSBase Flow Conditions? (Y/N): Yes Date of last precipitation: 7/11/26 Quantity: 1.25

Photo-documentation Notes: _____

Elevated Turbidity? (Y/N): No Canopy (% open): 0.0Were samples collected for water chemistry? (Y/N): No Lab Sample # or ID (attach results): _____

Field Measures: Temp (°C) _____ Dissolved Oxygen (mg/l) _____ pH (S.U.) _____ Conductivity (umhos/cm) _____

Is the sampling reach representative of the stream (Y/N) Yes If not, explain: _____

Additional comments/description of pollution impacts: _____

BIOLOGICAL OBSERVATIONS

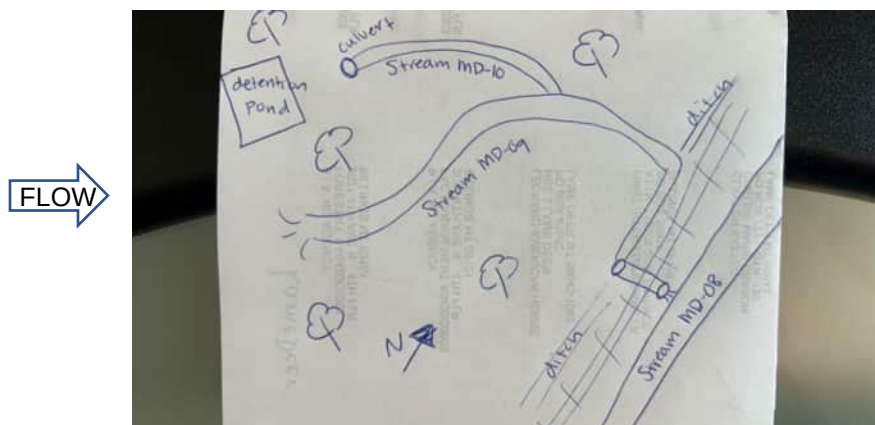
(Record all observations below)

Fish Observed? (Y/N) No Species observed (if known): _____Frogs or Tadpoles Observed? (Y/N) Yes Species observed (if known): _____Salamanders Observed? (Y/N) No Species observed (if known): _____Aquatic Macroinvertebrates Observed? (Y/N) No Species observed (if known): _____

Comments Regarding Biology: _____

DRAWING AND NARRATIVE DESCRIPTION OF STREAM REACH (This must be completed)

Include important landmarks and other features of interest for site evaluation and a narrative description of the stream's location

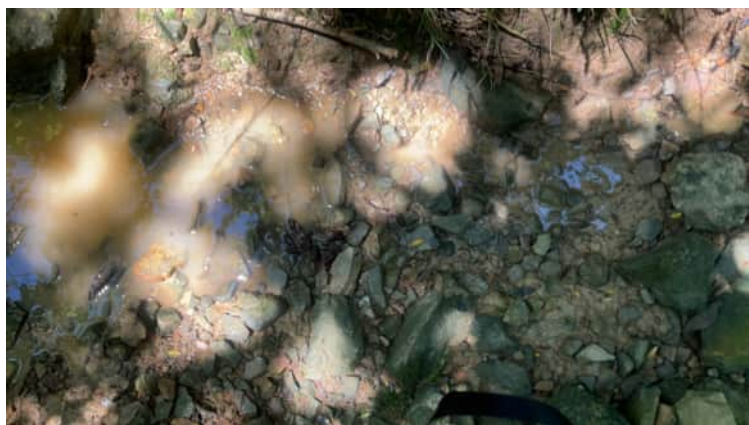




Downstream



Upstream



Substrate



Headwater Habitat Evaluation Index Field Form

HHEI Score (sum of metrics 1+2+3)

15

SITE NAME/LOCATION Stream MD-10 Monza-Don Marquis Transmission Line

SITE NUMBER S-JFW-071426-07 RIVER BASIN 05060002 RIVER CODE DRAINAGE AREA (mi²) 0.001

LENGTH OF STREAM REACH (ft) 176 LAT 39.02241 LONG -83.00710 RIVER MILE

DATE 07/14/2026 SCORER JFW COMMENTS

NOTE: Complete All Items On This Form - Refer to "Headwater Habitat Evaluation Index Field Manual" for Instructions

STREAM CHANNEL MODIFICATIONS: ☐ NONE / NATURAL CHANNEL ☐ RECOVERED ☒ RECOVERING ☐ RECENT OR NO RECOVERY

1. SUBSTRATE (Estimate percent of every type present). Check ONLY <u>two</u> predominant substrate TYPE boxes. (Max of 32). Add total number of significant substrate types found (Max of 8). Final metric score is sum of boxes A & B				HHEI Metric Points Substrate Max = 40 5																											
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TYPE	PERCENT	TYPE	PERCENT																												
☐ ☐ BLDR SLABS [16 pts]		☐ ☐ SILT [3 pt]																													
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Total of Percentages of Bldr Slabs, Boulder, Cobble, Bedrock 0		(A) 3 (B) 2																													
SCORE OF TWO MOST PREDOMINATE SUBSTRATE TYPES:																															
2. Maximum Pool Depth (Measure the <u>maximum</u> pool depth within the 61 meter (200 feet) evaluation reach at the time of evaluation. Avoid plunge pools from road culverts or storm water pipes) (Check ONLY one box):				Pool Depth Max = 30 5																											
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☐ > 22.5 - 30 cm [30 pts]		☒ < 5 cm [5pts]																													
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COMMENTS		MAXIMUM POOL DEPTH (inches): 1.0																													
3. BANK FULL WIDTH (Measured as the average of 3 - 4 measurements) (Check ONLY one box):				Bankfull Width Max=30 5																											
☐ > 4.0 meters (> 13') [30 pts]		☐ > 1.0 m - 1.5 m (> 3' 3" - 4' 8") [15 pts]																													
☐ > 3.0 m - 4.0 m (> 9' 7" - 13') [25 pts]		☒ ≤ 1.0 m (≤ 3' 3") [5 pts]																													
☐ > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]																															
COMMENTS		AVERAGE BANKFULL WIDTH (feet): 2.0																													

This information must also be completed

RIPARIAN ZONE AND FLOODPLAIN QUALITY ★ NOTE: River Left (L) and Right (R) as looking downstream ★

RIPARIAN WIDTH (Per Bank)		FLOODPLAIN QUALITY (Most Predominant per Bank)	
L	R	L	R
☒	☒	☐	☐
☐	☐	☒	☒
☐	☐	☐	☐
☐	☐	☐	☐

COMMENTS

FLOW REGIME (At Time of Evaluation) (Check ONLY one box):

☒ Stream Flowing	☐ Moist Channel, isolated pools, no flow (intermittent)
☐ Subsurface flow with isolated pools (interstitial)	☐ Dry channel, no water (ephemeral)

COMMENTS

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check ONLY one box):

☒ None	☐ 1.0	☐ 2.0	☐ 3.0
☐ 0.5	☐ 1.5	☐ 2.5	☐ >3

STREAM GRADIENT ESTIMATE

☐ Flat (0.5 ft/100 ft)	☒ Flat to Moderate	☐ Moderate (2 ft/100 ft)	☐ Moderate to Severe	☐ Severe (10 ft/100 ft)
---	--	---	---	--

ADDITIONAL STREAM INFORMATION (This Information Must Also be Completed):QHEI PERFORMED? ☐ Yes ☒ No QHEI Score _____ (If Yes, Attach Completed QHEI form)**DOWNSTREAM DESIGNATED USE(S)**

☒ WWH Name: Little Beaver Creek Distance from Evaluated Stream 0.7 mile
☐ CWH Name: _____ Distance from Evaluated Stream _____
☐ EWH Name: _____ Distance from Evaluated Stream _____

MAPPING: ATTACH COPIES OF MAPS, INCLUDING THE ENTIRE WATERSHED AREA. CLEARLY MARK THE SITE LOCATION.

USGS Quadrangle Name: Piketon NRCS Soil Map Page: _____ NRCS Soil Map Stream Order: _____
 County: Pike Township/City: Scioto

MISCELLANEOUSBase Flow Conditions? (Y/N): Yes Date of last precipitation: 7/11/26 Quantity: 1.25

Photo-documentation Notes: _____

Elevated Turbidity? (Y/N): No Canopy (% open): 20.0Were samples collected for water chemistry? (Y/N): No Lab Sample # or ID (attach results): _____

Field Measures: Temp (°C) _____ Dissolved Oxygen (mg/l) _____ pH (S.U.) _____ Conductivity (umhos/cm) _____

Is the sampling reach representative of the stream (Y/N) Yes If not, explain: _____

Additional comments/description of pollution impacts: _____

BIOLOGICAL OBSERVATIONS

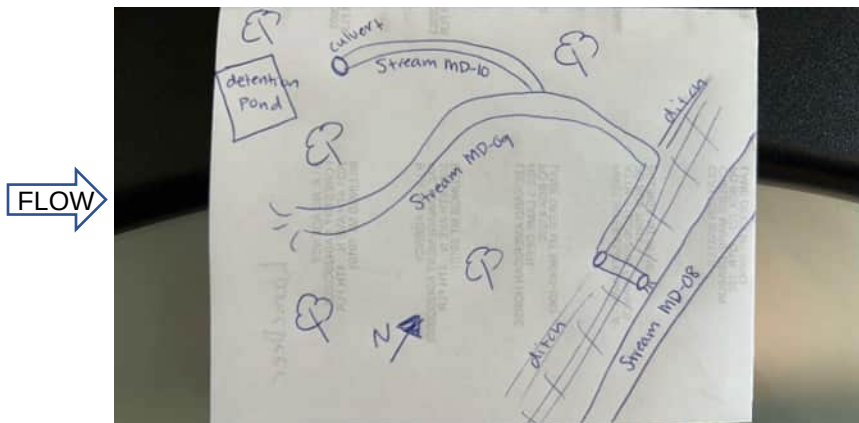
(Record all observations below)

Fish Observed? (Y/N) No Species observed (if known): _____Frogs or Tadpoles Observed? (Y/N) No Species observed (if known): _____Salamanders Observed? (Y/N) No Species observed (if known): _____Aquatic Macroinvertebrates Observed? (Y/N) No Species observed (if known): _____

Comments Regarding Biology: _____

DRAWING AND NARRATIVE DESCRIPTION OF STREAM REACH (This must be completed)

Include important landmarks and other features of interest for site evaluation and a narrative description of the stream's location





Upstream



Downstream



Headwater Habitat Evaluation Index Field Form

HHEI Score (sum of metrics 1+2+3)

34

SITE NAME/LOCATION Stream MD-11 Monza-Don Marquis Transmission LineSITE NUMBER S-JFW-071426-02 RIVER BASIN 05060002 RIVER CODE _____ DRAINAGE AREA (mi²) 0.001LENGTH OF STREAM REACH (ft) 200 LAT 39.02264 LONG -83.00728 RIVER MILE _____DATE 07/14/2026 SCORER JFW COMMENTS _____**NOTE: Complete All Items On This Form - Refer to "Headwater Habitat Evaluation Index Field Manual" for Instructions****STREAM CHANNEL MODIFICATIONS:** ☐ NONE / NATURAL CHANNEL ☐ RECOVERED ☒ RECOVERING ☐ RECENT OR NO RECOVERY

1. **SUBSTRATE (Estimate percent of every type present).** Check *ONLY* two predominant substrate *TYPE* boxes. (Max of 32). Add total number of significant substrate types found (Max of 8). Final metric score is sum of boxes A & B

TYPE	PERCENT	TYPE	PERCENT
☐ BLDR SLABS [16 pts]	_____	☒ SILT [3 pt]	80
☐ BOULDER (>256 mm) [16 pts]	_____	☐ LEAF PACK/WOODY DEBRIS [3 pts]	_____
☐ BEDROCK [16 pts]	_____	☐ FINE DETRITUS [3 pts]	_____
☐ COBBLE (65-256 mm) [12 pts]	_____	☐ CLAY or HARDPAN [0 pt]	_____
☒ GRAVEL (2-64 mm) [9 pts]	20	☐ MUCK [0 pts]	_____
☐ SAND (<2 mm) [6 pts]	_____	☐ ARTIFICIAL [3 pts]	_____

Total of Percentages of
Bldr Slabs, Boulder, Cobble, Bedrock 0(A) **12**(B) **2**

SCORE OF TWO MOST PREDOMINATE SUBSTRATE TYPES:

TOTAL NUMBER OF SUBSTRATE TYPES:

**HHEI
Metric
Points**Substrate
Max = 40**14**

A + B

2. **Maximum Pool Depth (Measure the maximum pool depth within the 61 meter (200 feet) evaluation reach at the time of evaluation. Avoid plunge pools from road culverts or storm water pipes) (Check *ONLY* one box):**

☐ > 30 centimeters [20 pts]	☒ 5 cm - 10 cm [15 pts]
☐ > 22.5 - 30 cm [30 pts]	☐ < 5 cm [5pts]
☐ > 10 - 22.5 cm [25 pts]	☐ NO WATER OR MOIST CHANNEL [0pts]

Pool Depth
Max = 30**15**

COMMENTS _____

MAXIMUM POOL DEPTH (inches): **3.0**

3. **BANK FULL WIDTH (Measured as the average of 3 - 4 measurements) (Check *ONLY* one box):**

☐ > 4.0 meters (> 13') [30 pts]	☐ > 1.0 m - 1.5 m (> 3' 3" - 4' 8") [15 pts]
☐ > 3.0 m - 4.0 m (> 9' 7" - 13') [25 pts]	☒ ≤ 1.0 m (≤ 3' 3") [5 pts]
☐ > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]	

Bankfull
Width
Max=30**5**

COMMENTS _____

AVERAGE BANKFULL WIDTH (feet): **2.0****This information must also be completed****RIPARIAN ZONE AND FLOODPLAIN QUALITY** ★ NOTE: River Left (L) and Right (R) as looking downstream ★

RIPARIAN WIDTH (Per Bank)		FLOODPLAIN QUALITY (Most Predominant per Bank)	
L	R	L	R
☐	☐	☐ Mature Forest, Wetland	☐ Conservation Tillage
☒	☒	☒ Immature Forest, Shrub or Old Field	☒ Urban or Industrial
☐	☐	☐ Residential, Park, New Field	☐ Open Pasture, Row Crop
☐	☐	☐ Fenced Pasture	☐ Mining or Construction

COMMENTS _____

FLOW REGIME (At Time of Evaluation) (Check *ONLY* one box):

☒ Stream Flowing	☐ Moist Channel, isolated pools, no flow (intermittent)
☐ Subsurface flow with isolated pools (interstitial)	☐ Dry channel, no water (ephemeral)

COMMENTS _____

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check *ONLY* one box):

☐ None	☒ 1.0	☐ 2.0	☐ 3.0
☐ 0.5	☐ 1.5	☐ 2.5	☐ >3

STREAM GRADIENT ESTIMATE
☐ Flat (0.5 ft/100 ft)
 ☒ Flat to Moderate
 ☐ Moderate (2 ft/100 ft)
 ☐ Moderate to Severe
 ☐ Severe (10 ft/100 ft)

ADDITIONAL STREAM INFORMATION (This Information Must Also be Completed):QHEI PERFORMED? ☐ Yes ☒ No QHEI Score _____ (If Yes, Attach Completed QHEI form)

DOWNSTREAM DESIGNATED USE(S)

☒ WWH Name: Little Beaver Creek Distance from Evaluated Stream 0.7 mile
☐ CWH Name: _____ Distance from Evaluated Stream _____
☐ EWH Name: _____ Distance from Evaluated Stream _____

MAPPING: ATTACH COPIES OF MAPS, INCLUDING THE ENTIRE WATERSHED AREA. CLEARLY MARK THE SITE LOCATION.

USGS Quadrangle Name: Piketon NRCS Soil Map Page: _____ NRCS Soil Map Stream Order: _____
 County: Pike Township/City: Scioto

MISCELLANEOUS

Base Flow Conditions? (Y/N): Yes Date of last precipitation: 7/11/26 Quantity: 1.25

Photo-documentation Notes: _____

Elevated Turbidity? (Y/N): No Canopy (% open): 100.0Were samples collected for water chemistry? (Y/N): No Lab Sample # or ID (attach results): _____

Field Measures: Temp (°C) _____ Dissolved Oxygen (mg/l) _____ pH (S.U.) _____ Conductivity (umhos/cm) _____

Is the sampling reach representative of the stream (Y/N) Yes If not, explain: _____

Additional comments/description of pollution impacts: _____

BIOLOGICAL OBSERVATIONS

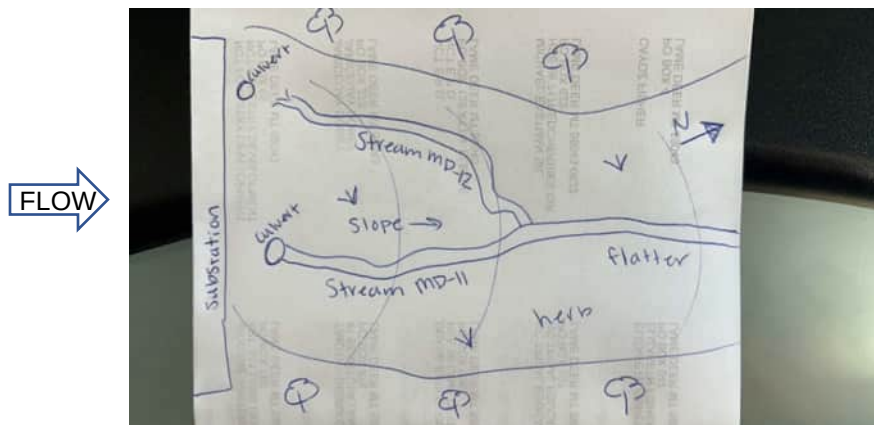
(Record all observations below)

Fish Observed? (Y/N) No Species observed (if known): _____Frogs or Tadpoles Observed? (Y/N) No Species observed (if known): _____Salamanders Observed? (Y/N) No Species observed (if known): _____Aquatic Macroinvertebrates Observed? (Y/N) No Species observed (if known): _____

Comments Regarding Biology: _____

DRAWING AND NARRATIVE DESCRIPTION OF STREAM REACH (This must be completed)

Include important landmarks and other features of interest for site evaluation and a narrative description of the stream's location





Downstream



Upstream



Substrate



Headwater Habitat Evaluation Index Field Form

HHEI Score (sum of metrics 1+2+3)

24

SITE NAME/LOCATION Stream MD-12 Monza-Don Marquis Transmission Line

SITE NUMBER S-JFW-071426-03 RIVER BASIN 05060002 RIVER CODE DRAINAGE AREA (mi²) 0.001

LENGTH OF STREAM REACH (ft) 148 LAT 39.02252 LONG -83.00758 RIVER MILE

DATE 07/14/2026 SCORER JFW COMMENTS

NOTE: Complete All Items On This Form - Refer to "Headwater Habitat Evaluation Index Field Manual" for Instructions

STREAM CHANNEL MODIFICATIONS: ☐ NONE / NATURAL CHANNEL ☐ RECOVERED ☒ RECOVERING ☐ RECENT OR NO RECOVERY

1. **SUBSTRATE (Estimate percent of every type present).** Check *ONLY* two predominant substrate *TYPE* boxes. (Max of 32). Add total number of significant substrate types found (Max of 8). Final metric score is sum of boxes A & B

TYPE	PERCENT	TYPE	PERCENT
☐ BLDR SLABS [16 pts]		☒ SILT [3 pt]	90
☐ BOULDER (>256 mm) [16 pts]		☐ LEAF PACK/WOODY DEBRIS [3 pts]	
☐ BEDROCK [16 pts]		☐ FINE DETRITUS [3 pts]	
☐ COBBLE (65-256 mm) [12 pts]		☐ CLAY or HARDPAN [0 pt]	
☒ GRAVEL (2-64 mm) [9 pts]	10	☐ MUCK [0 pts]	
☐ SAND (<2 mm) [6 pts]		☐ ARTIFICIAL [3 pts]	

Total of Percentages of Bldr Slabs, Boulder, Cobble, Bedrock 0

(A) 12

(B) 2

SCORE OF TWO MOST PREDOMINATE SUBSTRATE TYPES:

TOTAL NUMBER OF SUBSTRATE TYPES:

HHEI Metric Points

Substrate Max = 40

14

A + B

2. **Maximum Pool Depth (Measure the maximum pool depth within the 61 meter (200 feet) evaluation reach at the time of evaluation. Avoid plunge pools from road culverts or storm water pipes) (Check *ONLY* one box):**

☐ > 30 centimeters [20 pts]	☐ 5 cm - 10 cm [15 pts]
☐ > 22.5 - 30 cm [30 pts]	☒ < 5 cm [5pts]
☐ > 10 - 22.5 cm [25 pts]	☐ NO WATER OR MOIST CHANNEL [0pts]

COMMENTS

MAXIMUM POOL DEPTH (inches): 2.0

Pool Depth Max = 30

5

3. **BANK FULL WIDTH (Measured as the average of 3 - 4 measurements) (Check *ONLY* one box):**

☐ > 4.0 meters (> 13') [30 pts]	☐ > 1.0 m - 1.5 m (> 3' 3" - 4' 8") [15 pts]
☐ > 3.0 m - 4.0 m (> 9' 7" - 13') [25 pts]	☒ ≤ 1.0 m (≤ 3' 3") [5 pts]
☐ > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]	

COMMENTS

AVERAGE BANKFULL WIDTH (feet): 3.0

Bankfull Width Max=30

5

This information must also be completed

RIPARIAN ZONE AND FLOODPLAIN QUALITY ★ NOTE: River Left (L) and Right (R) as looking downstream ★

RIPARIAN WIDTH (Per Bank)		FLOODPLAIN QUALITY (Most Predominant per Bank)	
L	R	L	R
☐	☐	☐	☐
☒	☐	☒	☐
☐	☒	☐	☐
☐	☐	☐	☐

COMMENTS

FLOW REGIME (At Time of Evaluation) (Check *ONLY* one box):

☒ Stream Flowing	☐ Moist Channel, isolated pools, no flow (intermittent)
☐ Subsurface flow with isolated pools (interstitial)	☐ Dry channel, no water (ephemeral)

COMMENTS

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check *ONLY* one box):

☐ None	☒ 1.0	☐ 2.0	☐ 3.0
☐ 0.5	☐ 1.5	☐ 2.5	☐ >3

STREAM GRADIENT ESTIMATE

☐ Flat (0.5 ft/100 ft)	☒ Flat to Moderate	☐ Moderate (2 ft/100 ft)	☐ Moderate to Severe	☐ Severe (10 ft/100 ft)
---	--	---	---	--

ADDITIONAL STREAM INFORMATION (This Information Must Also be Completed):QHEI PERFORMED? ☐ Yes ☒ No QHEI Score _____ (If Yes, Attach Completed QHEI form)

DOWNSTREAM DESIGNATED USE(S)

☒ WWH Name: Little Beaver Creek Distance from Evaluated Stream 0.7 mile
☐ CWH Name: _____ Distance from Evaluated Stream _____
☐ EWH Name: _____ Distance from Evaluated Stream _____

MAPPING: ATTACH COPIES OF MAPS, INCLUDING THE ENTIRE WATERSHED AREA. CLEARLY MARK THE SITE LOCATION.

USGS Quadrangle Name: Piketon NRCS Soil Map Page: _____ NRCS Soil Map Stream Order: _____
 County: Pike Township/City: Scioto

MISCELLANEOUS

Base Flow Conditions? (Y/N): Yes Date of last precipitation: 7/11/26 Quantity: 1.25

Photo-documentation Notes: _____

Elevated Turbidity? (Y/N): No Canopy (% open): 90.0Were samples collected for water chemistry? (Y/N): No Lab Sample # or ID (attach results): _____

Field Measures: Temp (°C) _____ Dissolved Oxygen (mg/l) _____ pH (S.U.) _____ Conductivity (umhos/cm) _____

Is the sampling reach representative of the stream (Y/N) Yes If not, explain: _____

Additional comments/description of pollution impacts: _____

BIOLOGICAL OBSERVATIONS

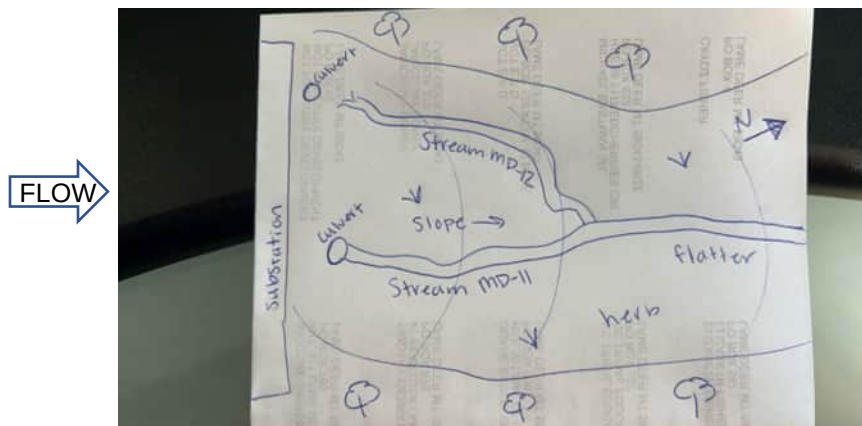
(Record all observations below)

Fish Observed? (Y/N) No Species observed (if known): _____Frogs or Tadpoles Observed? (Y/N) No Species observed (if known): _____Salamanders Observed? (Y/N) No Species observed (if known): _____Aquatic Macroinvertebrates Observed? (Y/N) No Species observed (if known): _____

Comments Regarding Biology: _____

DRAWING AND NARRATIVE DESCRIPTION OF STREAM REACH (This must be completed)

Include important landmarks and other features of interest for site evaluation and a narrative description of the stream's location





Substrate



Upstream



Downstream



Headwater Habitat Evaluation Index Field Form

HHEI Score (sum of metrics 1+2+3)

35

SITE NAME/LOCATION Stream MD-13 Monza-Don Marquis Transmission LineSITE NUMBER S-JFW-071426-04 RIVER BASIN 05060002 RIVER CODE _____ DRAINAGE AREA (mi²) 0.001LENGTH OF STREAM REACH (ft) 200 LAT 39.02269 LONG -83.00772 RIVER MILE _____DATE 07/14/2026 SCORER JFW COMMENTS _____**NOTE: Complete All Items On This Form - Refer to "Headwater Habitat Evaluation Index Field Manual" for Instructions****STREAM CHANNEL MODIFICATIONS:** ☐ NONE / NATURAL CHANNEL ☐ RECOVERED ☒ RECOVERING ☐ RECENT OR NO RECOVERY

1. **SUBSTRATE (Estimate percent of every type present).** Check *ONLY* two predominant substrate *TYPE* boxes. (Max of 32). Add total number of significant substrate types found (Max of 8). Final metric score is sum of boxes A & B

TYPE	PERCENT	TYPE	PERCENT
☐ ☐ BLDR SLABS [16 pts]	_____	☒ ☐ SILT [3 pt]	65
☐ ☐ BOULDER (>256 mm) [16 pts]	_____	☐ ☐ LEAF PACK/WOODY DEBRIS [3 pts]	_____
☐ ☐ BEDROCK [16 pts]	_____	☐ ☐ FINE DETRITUS [3 pts]	_____
☐ ☐ COBBLE (65-256 mm) [12 pts]	10	☐ ☐ CLAY or HARDPAN [0 pt]	_____
☐ ☒ GRAVEL (2-64 mm) [9 pts]	15	☐ ☐ MUCK [0 pts]	_____
☐ ☐ SAND (<2 mm) [6 pts]	_____	☐ ☐ ARTIFICIAL [3 pts]	_____

Total of Percentages of Bldr Slabs, Boulder, Cobble, Bedrock 10(A) **12**(B) **3**

SCORE OF TWO MOST PREDOMINATE SUBSTRATE TYPES:

TOTAL NUMBER OF SUBSTRATE TYPES:

HHEI
Metric
PointsSubstrate
Max = 40

15

A + B

2. **Maximum Pool Depth (Measure the maximum pool depth within the 61 meter (200 feet) evaluation reach at the time of evaluation. Avoid plunge pools from road culverts or storm water pipes) (Check *ONLY* one box):**

☐ > 30 centimeters [20 pts]	☐ 5 cm - 10 cm [15 pts]
☐ > 22.5 - 30 cm [30 pts]	☒ < 5 cm [5pts]
☐ > 10 - 22.5 cm [25 pts]	☐ NO WATER OR MOIST CHANNEL [0pts]

Pool Depth
Max = 30

5

COMMENTS _____

MAXIMUM POOL DEPTH (inches): **2.0**

3. **BANK FULL WIDTH (Measured as the average of 3 - 4 measurements) (Check *ONLY* one box):**

☐ > 4.0 meters (> 13') [30 pts]	☒ > 1.0 m - 1.5 m (> 3' 3" - 4' 8") [15 pts]
☐ > 3.0 m - 4.0 m (> 9' 7" - 13') [25 pts]	☐ ≤ 1.0 m (≤ 3' 3") [5 pts]
☐ > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]	

Bankfull
Width
Max=30

15

COMMENTS _____

AVERAGE BANKFULL WIDTH (feet): **4.0****This information must also be completed****RIPARIAN ZONE AND FLOODPLAIN QUALITY** ★ NOTE: River Left (L) and Right (R) as looking downstream ★

RIPARIAN WIDTH		FLOODPLAIN QUALITY (Most Predominant per Bank)	
L	R	L	R
☐ ☐ Wide >10m		☐ ☐ Mature Forest, Wetland	☐ ☐ Conservation Tillage
☒ ☒ Moderate 5-10m		☒ ☐ Immature Forest, Shrub or Old Field	☐ ☒ Urban or Industrial
☐ ☐ Narrow <5m		☐ ☐ Residential, Park, New Field	☐ ☐ Open Pasture, Row Crop
☐ ☐ None		☐ ☐ Fenced Pasture	☐ ☐ Mining or Construction

COMMENTS _____

FLOW REGIME (At Time of Evaluation) (Check *ONLY* one box):

☒ Stream Flowing	☐ Moist Channel, isolated pools, no flow (intermittent)
☐ Subsurface flow with isolated pools (interstitial)	☐ Dry channel, no water (ephemeral)

COMMENTS _____

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check *ONLY* one box):

☐ None	☐ 1.0	☐ 2.0	☐ 3.0
☐ 0.5	☒ 1.5	☐ 2.5	☐ >3

STREAM GRADIENT ESTIMATE
☐ Flat (0.5 ft/100 ft)
 ☐ Flat to Moderate
 ☐ Moderate (2 ft/100 ft)
 ☒ Moderate to Severe
 ☐ Severe (10 ft/100 ft)

ADDITIONAL STREAM INFORMATION (This Information Must Also be Completed):QHEI PERFORMED? ☐ Yes ☒ No QHEI Score _____ (If Yes, Attach Completed QHEI form)

DOWNSTREAM DESIGNATED USE(S)

☒ WWH Name: Little Beaver Creek Distance from Evaluated Stream 0.7 mile
☐ CWH Name: _____ Distance from Evaluated Stream _____
☐ EWH Name: _____ Distance from Evaluated Stream _____

MAPPING: ATTACH COPIES OF MAPS, INCLUDING THE ENTIRE WATERSHED AREA. CLEARLY MARK THE SITE LOCATION.

USGS Quadrangle Name: Piketon NRCS Soil Map Page: _____ NRCS Soil Map Stream Order: _____
 County: Pike Township/City: Scioto

MISCELLANEOUS

Base Flow Conditions? (Y/N): Yes Date of last precipitation: 7/11/26 Quantity: 1.25

Photo-documentation Notes: _____

Elevated Turbidity? (Y/N): No Canopy (% open): 65.0Were samples collected for water chemistry? (Y/N): No Lab Sample # or ID (attach results): _____

Field Measures: Temp (°C) _____ Dissolved Oxygen (mg/l) _____ pH (S.U.) _____ Conductivity (umhos/cm) _____

Is the sampling reach representative of the stream (Y/N) Yes If not, explain: _____

Additional comments/description of pollution impacts: _____

BIOLOGICAL OBSERVATIONS

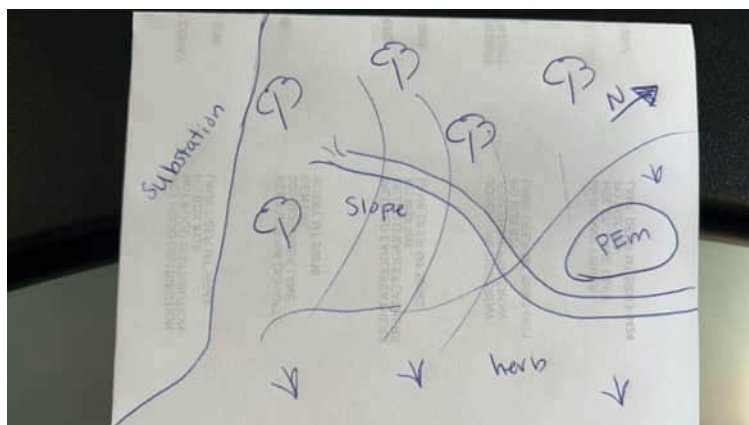
(Record all observations below)

Fish Observed? (Y/N) No Species observed (if known): _____Frogs or Tadpoles Observed? (Y/N) No Species observed (if known): _____Salamanders Observed? (Y/N) No Species observed (if known): _____Aquatic Macroinvertebrates Observed? (Y/N) No Species observed (if known): _____

Comments Regarding Biology: _____

DRAWING AND NARRATIVE DESCRIPTION OF STREAM REACH (This must be completed)

Include important landmarks and other features of interest for site evaluation and a narrative description of the stream's location





Substrate



Downstream



Substrate



Upstream

Appendix F

Jacobs Pond Forms

POND DATA SHEET

FEATURE ID Pond MD-01		ASSOCIATED FEATURES:	
SURVEY TYPE: Wetland and waterbodies delineation			
DATE: 07/15/2026		CLIENT/PROJECT NAME: AEP Monza-Don Marquis 345kV Transmission Line Project	
INVESTIGATORS: JFW		ROUTE:	
STATE/COUNTY: OH Pike		IS THIS A MAPPED NWI FEATURE?: no	
WATERBODY CHARACTERISTICS			
WATERBODY TYPE:		Detention pond	
AVG. DEPTH:		1 ft	
AVG. WIDTH (WATER SURFACE):		50 ft	
APPROXIMATE SIZE:		0.2 ac	
QUALITATIVE ATTRIBUTES			
AVERAGE WATER APPEARANCE:		Algae	
PRIMARY SUBSTRATE (IF OBSERVED):		Silt	
POTENTIAL HABITAT FOR:		Frogs and insects	
SURROUNDING LAND USE:		Mowed	
WETLAND FRINGE (IF PRESENT):		PEM	
COMMENTS			



NE



SW

POND DATA SHEET

FEATURE ID Pond MD-02		ASSOCIATED FEATURES:	
SURVEY TYPE: Wetland and waterbodies delineation			
DATE: 07/14/2026	CLIENT/PROJECT NAME: AEP		Monza-Don Marquis 345kV Transmission Line Project
INVESTIGATORS: JFW		ROUTE:	
STATE/COUNTY: OH Pike		IS THIS A MAPPED NWI FEATURE?: no	
WATERBODY CHARACTERISTICS			
WATERBODY TYPE:	Detention pond		
AVG. DEPTH:	1 ft		
AVG. WIDTH (WATER SURFACE):	50 ft		
APPROXIMATE SIZE:	0.05 ac		
QUALITATIVE ATTRIBUTES			
AVERAGE WATER APPEARANCE:	cloudy		
PRIMARY SUBSTRATE (IF OBSERVED):			
POTENTIAL HABITAT FOR:	insects, amphibians		
SURROUNDING LAND USE:	young forest		
WETLAND FRINGE (IF PRESENT):	none		
COMMENTS			



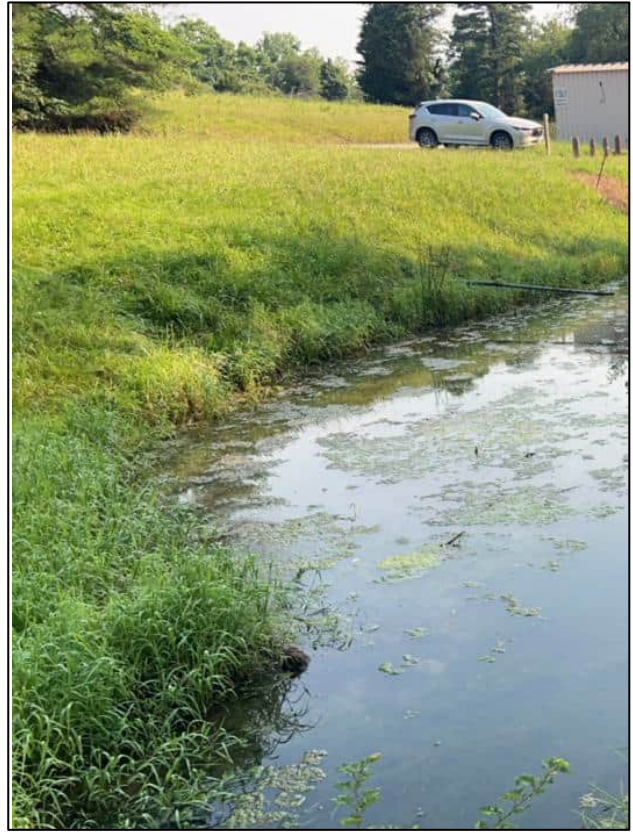
W

Appendix G

Representative Land Use Photographs



Representative photo of **agriculture**



Representative photo of **delineated pond**



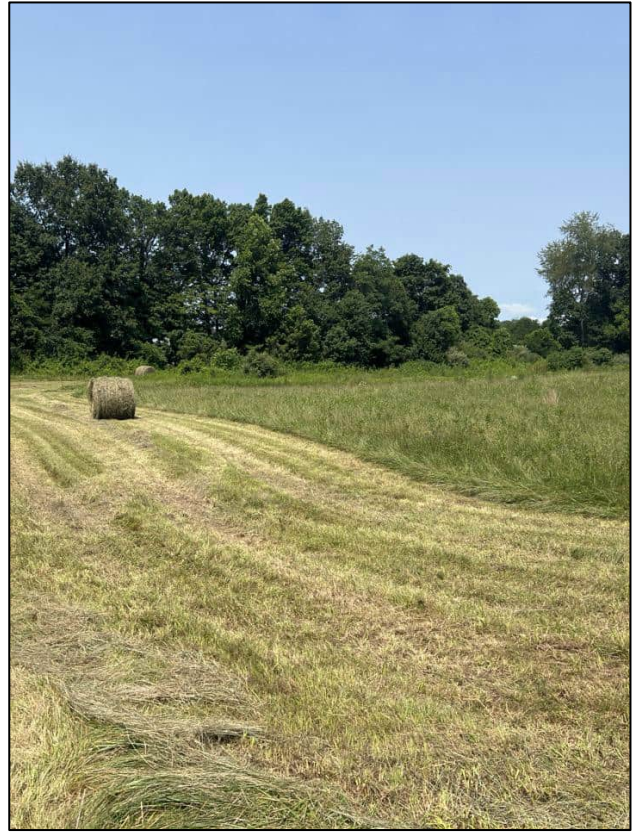
Representative photo of **delineated stream**



Representative photo of **delineated wetland**



Representative photo of **forested**



Representative photo of **grassland**



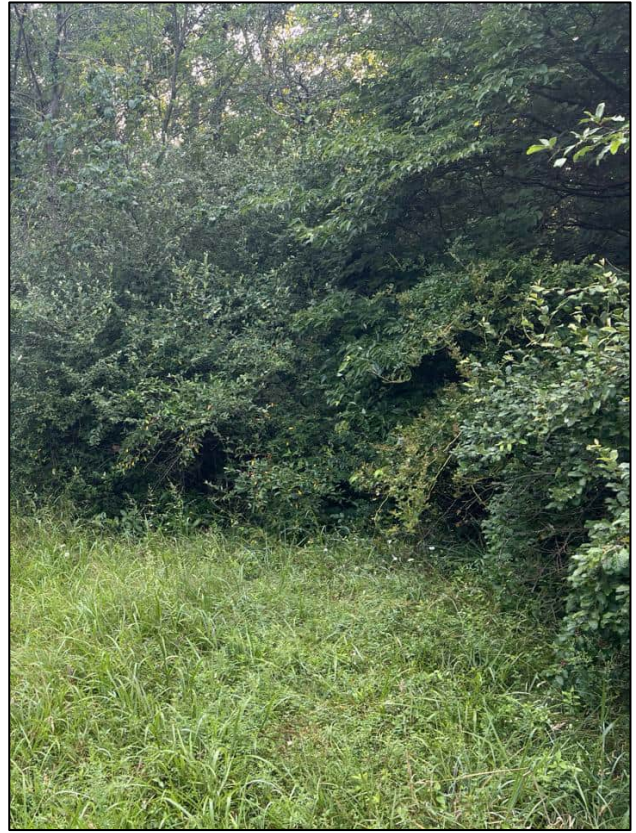
Representative photo of **impervious surface**



Representative photo of **maintained lawn**



Representative photo of **old field**

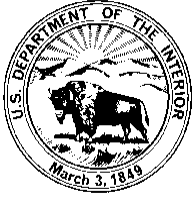


Representative photo of **scrub/shrub**

Appendix H

Agency Coordination

United States Department of the Interior



FISH AND WILDLIFE SERVICE

Ecological Services
4625 Morse Road, Suite 104
Columbus, Ohio 43230
(614) 416-8993 / FAX (614) 416-8994



August 13, 2026

Project Code: 2026-0090867

Dear Mr. Lubbers:

The U.S. Fish and Wildlife Service (Service) has received your recent correspondence requesting information about the subject proposal. We offer the following comments and recommendations to assist you in minimizing and avoiding adverse impacts to threatened and endangered species pursuant to the Endangered Species Act of 1973 (16 U.S.C. 1531 et seq), as amended (ESA).

Federally Threatened and Endangered Species: The endangered Indiana bat (*Myotis sodalis*) and northern long-eared bat (*Myotis septentrionalis*) occur throughout the State of Ohio. The Indiana bat and northern long-eared bat may be found wherever suitable habitat occurs unless a presence/absence survey has been performed to document absence. Suitable summer habitat for Indiana bats and northern long-eared bats consists of a wide variety of forested/wooded habitats where they roost, forage, and breed that may also include adjacent and interspersed non-forested habitats such as emergent wetlands and adjacent edges of agricultural fields, woodlots, fallow fields, and pastures. Roost trees for both species include live and standing dead trees ≥ 3 inches diameter at breast height (dbh) that have any exfoliating bark, cracks, crevices, hollows and/or cavities. These roost trees may be located in forested habitats as well as linear features such as fencerows, riparian forests, and other wooded corridors. Individual trees may be considered suitable habitat when they exhibit the characteristics of a potential roost tree and are located within 1,000 feet of other forested/wooded habitat. Bridges and culverts have also been used as roosts. Additionally, northern long-eared bats have been observed roosting in other human-made structures, such as buildings, barns, and bat houses; therefore, these structures should also be considered potential summer habitat. In the winter, Indiana bats and northern long-eared bats hibernate in caves, rock crevices and abandoned mines.

Seasonal Restrictions for Federally Listed Bat Species: Should the proposed project site contain trees ≥ 3 inches dbh, we recommend avoiding tree removal wherever possible. If any caves or abandoned mines may be disturbed, further coordination with this office is requested to determine if fall or spring portal surveys are warranted. If no caves or abandoned mines are present and trees ≥ 3 inches dbh cannot be avoided, we recommend removal of any trees ≥ 3 inches dbh only occur between October 1 and March 31. If bridges or culverts will be impacted, we recommend reviewing Appendix K in the most recent "Range-Wide Indiana Bat & Northern Long-Eared Bat Survey Guidelines" to determine if the bridge/culvert may be suitable roost habitat. We recommend impacts to suitable bridges and culverts only occur from October 1 and March 31. These seasonal restrictions are recommended to avoid adverse effects to Indiana bats and northern long-eared bats. Please note that, because Indiana bat and/or northern long-eared

bat presence has already been confirmed in the project vicinity, any additional summer surveys would not constitute presence/absence surveys for these species.

Federally Proposed Species: On September 14, 2022, the Service proposed to list the tricolored bat (*Perimyotis subflavus*) as endangered under the ESA. The bat faces extinction due to the impacts of white-nose syndrome, a deadly disease affecting cave-dwelling bats across the continent. During spring, summer, and fall, this species roosts primarily among leaf clusters of live or recently dead trees, emerging at dusk to hunt for insects over waterways and forest edges. While white-nose syndrome is by far the most serious threat to the tricolored bat, other threats now have an increased significance due to the dramatic decline in the species' population. These threats include disturbance to bats in roosting, foraging, commuting, and over-wintering habitats. Mortality due to collision with wind turbines, especially during migration, has also been documented across their range. Conservation measures for the Indiana bat and northern long-eared bat will also help to conserve the tricolored bat.

On December 12, 2024 the Service proposed to list the monarch butterfly (*Danaus plexippus plexippus*) as threatened under the ESA. Monarch butterflies are found throughout Ohio and some populations migrate vast distances across multiple generations each year. Many monarchs fly between the U.S., Mexico and Canada – a journey of over 3,000 miles. Monarch populations have declined significantly in recent years. Threats include habitat loss – particularly the loss of milkweed, the monarch caterpillar's sole food source – and mortality resulting from pesticide use. The Service recommends the following actions to maintain habitat and avoid impacts to monarchs in Ohio: revegetate disturbed areas with native plant species including nectar-producing plants and milkweed endemic to the area; limit mowing monarch habitat from March 15 to August 31 when monarchs are breeding and from September 1 to October 31 when large numbers of monarchs are migrating; and avoid the use of pesticides and herbicides in and near monarch habitat.

Section 7 Coordination: If there is a federal nexus for the project (e.g., federal funding provided, federal permits required to construct), then no tree clearing should occur on any portion of the project area until consultation under section 7 of the ESA, between the Service and the federal action agency, is completed. We recommend the federal action agency submit a determination of effects to this office, relative to the Indiana bat and northern long-eared bat, for our review and concurrence. This letter provides technical assistance only and does not serve as a completed section 7 consultation document.

Bald Eagle: The project is in the range of the bald eagle (*Haliaeetus leucocephalus*), which is protected under the Bald and Golden Eagle Protection Act (16 U.S.C. 668-668d). We recommend that you visit <https://ohiodnr.gov/discover-and-learn/animals/birds/bald-eagle> to determine if the project is within 0.5 mile of a documented eagle nest. Additionally, because not all eagle nests in the state have been mapped, we recommend that an on-site examination be conducted to determine if any large stick nests are visible from project area. If the project is within 0.5 mile of a documented eagle nest or the on-site examination reveals the presence of a potential eagle nest, we recommend visiting <https://www.fws.gov/story/do-i-need-eagle-take-permit> to determine if an eagle take permit is required.

Stream and Wetland Avoidance: Over 90% of the wetlands in Ohio have been drained, filled, or modified by human activities, thus is it important to conserve the functions and values of the

remaining wetlands in Ohio (https://epa.ohio.gov/portals/47/facts/ohio_wetlands.pdf). We recommend avoiding and minimizing project impacts to all wetland habitats (e.g., forests, streams, vernal pools) to the maximum extent possible in order to benefit water quality and fish and wildlife habitat. Additionally, natural buffers around streams and wetlands should be preserved to enhance beneficial functions. If streams or wetlands will be impacted, the U.S. Army Corps of Engineers should be contacted to determine whether a Clean Water Act section 404 permit is required. Best management practices should be used to minimize erosion, especially on slopes. Disturbed areas should be mulched and revegetated with native plant species. In addition, prevention of non-native, invasive plant establishment is critical in maintaining high quality habitats.

Due to the project type, size, and location, we do not anticipate adverse effects to any other federally endangered, threatened, or proposed species, or proposed or designated critical habitat. Should the project design change, or additional information on listed or proposed species or their critical habitat become available, or if new information reveals effects of the action that were not previously considered, coordination with the Service should be initiated to assess any potential impacts.

Thank you for your efforts to conserve listed species and sensitive habitats in Ohio. We recommend coordinating with the Ohio Department of Natural Resources due to the potential for the proposed project to affect state listed species and/or state lands. Contact Mike Pettegrew, Environmental Services Administrator, at (614) 265-6387 or at mike.pettegrew@dnr.ohio.gov.

If you have questions, or if we can be of further assistance in this matter, please contact our office at (614) 416-8993 or ohio@fws.gov.

Sincerely,



Erin Knoll
Field Office Supervisor

cc: Matthew.Stooksbury@dnr.ohio.gov
Eileen.Wyza@dnr.ohio.gov



United States Department of the Interior

FISH AND WILDLIFE SERVICE

Ohio Ecological Services Field Office

4625 Morse Road, Suite 104

Columbus, OH 43230-8355

Phone: (614) 416-8993 Fax: (614) 416-8994



In Reply Refer To:

07/17/2026 21:34:10 UTC

Project Code: 2026-0090867

Project Name: Monza-Don Marquis 345kV Transmission Line Project

Subject: List of threatened and endangered species that may occur in your proposed project location or may be affected by your proposed project

To Whom It May Concern:

The enclosed species list identifies threatened, endangered, proposed and candidate species, as well as proposed and final designated critical habitat, that may occur within the boundary of your proposed project and/or may be affected by your proposed project. The species list fulfills the requirements of the U.S. Fish and Wildlife Service (Service) under section 7(c) of the Endangered Species Act (Act) of 1973, as amended (16 U.S.C. 1531 *et seq.*).

New information based on updated surveys, changes in the abundance and distribution of species, changed habitat conditions, or other factors could change this list. Please feel free to contact us if you need more current information or assistance regarding the potential impacts to federally proposed, listed, and candidate species and federally designated and proposed critical habitat. Please note that under 50 CFR 402.12(e) of the regulations implementing section 7 of the Act, the accuracy of this species list should be verified after 90 days. This verification can be completed formally or informally as desired. The Service recommends that verification be completed by visiting the IPaC website at regular intervals during project planning and implementation for updates to species lists and information. An updated list may be requested through the IPaC system by completing the same process used to receive the enclosed list.

The purpose of the Act is to provide a means whereby threatened and endangered species and the ecosystems upon which they depend may be conserved. Under sections 7(a)(1) and 7(a)(2) of the Act and its implementing regulations (50 CFR 402 *et seq.*), Federal agencies are required to utilize their authorities to carry out programs for the conservation of threatened and endangered species and to determine whether projects may affect threatened and endangered species and/or designated critical habitat.

A Biological Assessment is required for construction projects (or other undertakings having similar physical impacts) that are major Federal actions significantly affecting the quality of the human environment as defined in the National Environmental Policy Act (42 U.S.C. 4332(2) (c)). For projects other than major construction activities, the Service suggests that a biological

evaluation similar to a Biological Assessment be prepared to determine whether the project may affect listed or proposed species and/or designated or proposed critical habitat. Recommended contents of a Biological Assessment are described at 50 CFR 402.12.

If a Federal agency determines, based on the Biological Assessment or biological evaluation, that listed species and/or designated critical habitat may be affected by the proposed project, the agency is required to consult with the Service pursuant to 50 CFR 402. In addition, the Service recommends that candidate species, proposed species and proposed critical habitat be addressed within the consultation. More information on the regulations and procedures for section 7 consultation, including the role of permit or license applicants, can be found in the "Endangered Species Consultation Handbook" at:

<https://www.fws.gov/sites/default/files/documents/endangered-species-consultation-handbook.pdf>

Migratory Birds: In addition to responsibilities to protect threatened and endangered species under the Endangered Species Act (ESA), there are additional responsibilities under the Migratory Bird Treaty Act (MBTA) and the Bald and Golden Eagle Protection Act (BGEPA) to protect native birds from project-related impacts. Any activity resulting in take of migratory birds, including eagles, is prohibited unless otherwise permitted by the U.S. Fish and Wildlife Service (50 C.F.R. Sec. 10.12 and 16 U.S.C. Sec. 668(a)). For more information regarding these Acts, see <https://www.fws.gov/program/migratory-bird-permit/what-we-do>.

It is the responsibility of the project proponent to comply with these Acts by identifying potential impacts to migratory birds and eagles within applicable NEPA documents (when there is a federal nexus) or a Bird/Eagle Conservation Plan (when there is no federal nexus). Proponents should implement conservation measures to avoid or minimize the production of project-related stressors or minimize the exposure of birds and their resources to the project-related stressors. For more information on avian stressors and recommended conservation measures, see <https://www.fws.gov/library/collections/threats-birds>.

In addition to MBTA and BGEPA, Executive Order 13186: *Responsibilities of Federal Agencies to Protect Migratory Birds*, obligates all Federal agencies that engage in or authorize activities that might affect migratory birds, to minimize those effects and encourage conservation measures that will improve bird populations. Executive Order 13186 provides for the protection of both migratory birds and migratory bird habitat. For information regarding the implementation of Executive Order 13186, please visit <https://www.fws.gov/partner/council-conservation-migratory-birds>.

We appreciate your concern for threatened and endangered species. The Service encourages Federal agencies to include conservation of threatened and endangered species into their project planning to further the purposes of the Act. Requests for additional technical assistance or consultation from the Ohio Field Office should be submitted following guidance on the following page <https://www.fws.gov/office/ohio-ecological-services/request-project-review>. Please include the Consultation Code in the header of this letter with any request for consultation or correspondence about your project that you submit to our office.

Attachment(s):

- Official Species List

OFFICIAL SPECIES LIST

This list is provided pursuant to Section 7 of the Endangered Species Act, and fulfills the requirement for Federal agencies to "request of the Secretary of the Interior information whether any species which is listed or proposed to be listed may be present in the area of a proposed action".

This species list is provided by:

Ohio Ecological Services Field Office
4625 Morse Road, Suite 104
Columbus, OH 43230-8355
(614) 416-8993

PROJECT SUMMARY

Project Code: 2026-0090867

Project Name: Monza-Don Marquis 345kV Transmission Line Project

Project Type: Distribution Line - New Construction - Above Ground

Project Description: ×

Project description

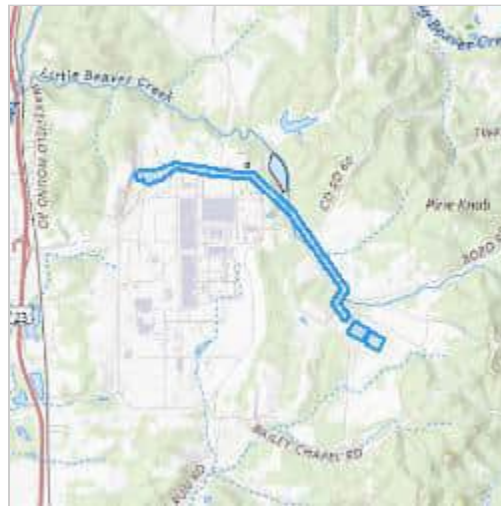
The Monza-Don Marquis 345kV Transmission Line Project consists of the construction of two greenfield, approximately 2.5-mile 345kV transmission lines and the installation of two new, approximately 10-acre 345kV Stations. The Project alignment generally parallels Perimeter Road and Dutch Run Road east of the existing Monza Don Marquis substation (39.0221, -83.0101), ending at two proposed substation sites just south of the intersection of Loop Road and Dutch Run Road, located in Pike County, Ohio approximately 19 miles north of the City of Portsmouth.

The project scope includes project management services, Rare, Threatened and Endangered Species Coordination, Ecological Survey and Report, and Stormwater Pollution Prevention Plan (SWPPP).

Overall project schedule: April 2026-December 2026

Project Location:

The approximate location of the project can be viewed in Google Maps: <https://www.google.com/maps/@39.00248035,-82.9718706,14z>



Counties: Pike County, Ohio

ENDANGERED SPECIES ACT SPECIES

There is a total of 8 threatened, endangered, or candidate species on this species list.

Species on this list should be considered in an effects analysis for your project and could include species that exist in another geographic area. For example, certain fish may appear on the species list because a project could affect downstream species.

IPaC does not display listed species or critical habitats under the sole jurisdiction of NOAA Fisheries¹, as USFWS does not have the authority to speak on behalf of NOAA and the Department of Commerce.

See the "Critical habitats" section below for those critical habitats that lie wholly or partially within your project area under this office's jurisdiction. Please contact the designated FWS office if you have questions.

-
1. [NOAA Fisheries](#), also known as the National Marine Fisheries Service (NMFS), is an office of the National Oceanic and Atmospheric Administration within the Department of Commerce.

MAMMALS

NAME	STATUS
Indiana bat <i>Myotis sodalis</i> There is final critical habitat for this species. Your location does not overlap the critical habitat. Species profile: https://ecos.fws.gov/ecp/species/5949	Endangered
Northern Long-Eared Bat <i>Myotis septentrionalis</i> No critical habitat has been designated for this species. Species profile: https://ecos.fws.gov/ecp/species/9045	Endangered
Tricolored bat <i>Perimyotis subflavus</i> No critical habitat has been designated for this species. Species profile: https://ecos.fws.gov/ecp/species/10515	Proposed Endangered

CLAMS

NAME	STATUS
Clubshell <i>Pleurobema clava</i> Population: Wherever found; Except where listed as Experimental Populations No critical habitat has been designated for this species. Species profile: https://ecos.fws.gov/ecp/species/3789	Endangered
Northern riffleshell <i>Epioblasma rangiana</i> No critical habitat has been designated for this species. Species profile: https://ecos.fws.gov/ecp/species/527	Endangered
Rayed Bean <i>Villosa fabalis</i> There is final critical habitat for this species. Your location does not overlap the critical habitat. Species profile: https://ecos.fws.gov/ecp/species/5862	Endangered
Salamander mussel <i>Simpsonaias ambigua</i> There is proposed critical habitat for this species. Your location does not overlap the critical habitat. Species profile: https://ecos.fws.gov/ecp/species/6208	Proposed Endangered

INSECTS

NAME	STATUS
Monarch butterfly <i>Danaus plexippus</i> There is proposed critical habitat for this species. Your location does not overlap the critical habitat. Species profile: https://ecos.fws.gov/ecp/species/9743	Proposed Threatened

CRITICAL HABITATS

THERE ARE NO CRITICAL HABITATS WITHIN YOUR PROJECT AREA UNDER THIS OFFICE'S JURISDICTION.

YOU ARE STILL REQUIRED TO DETERMINE IF YOUR PROJECT(S) MAY HAVE EFFECTS ON ALL ABOVE LISTED SPECIES.

IPAC USER CONTACT INFORMATION

Agency: Jacobs

Name: Maria Fagin

Address: 2 Crowne Pt.

City: Cincinnati

State: OH

Zip: 45241

Email: maria.fagin@jacobs.com

Phone: 5132802778



**Department of
Natural Resources**
ohiodnr.gov

Mike DeWine, Governor
Jim Tressel, Lt. Governor
Mary Mertz, Director

Office of Real Estate & Land Management

Tara Paciorek - Chief
2045 Morse Road – E-2
Columbus, Ohio 43229-6693

August 18, 2026

Jake Lubbers
Jacobs Engineering Group, Inc.
2 Crowne Point Court, Suite 100
Cincinnati, Ohio 45241

Re: 26-1204_Monza-Don Marquis 345kV

Project: The proposed project involves the construction of two greenfield 345kV transmission lines (total of approximately 2.5-mile) and the installation of two new, approximately 10-acre 345kV stations.

Location: The proposed project is located in Scioto Township, Pike County, Ohio.

Approximate Center Coordinates: 39.0197, -82.9873

The Ohio Department of Natural Resources (ODNR) has completed a review of the above referenced project. These comments were generated by an inter-disciplinary review within the Department. These comments have been prepared under the authority of the Fish and Wildlife Coordination Act (48 Stat. 401, as amended; 16 U.S.C. 661 et seq.), the National Environmental Policy Act, the Coastal Zone Management Act, Ohio Revised Code and other applicable laws and regulations. These comments are also based on ODNR's experience as the state natural resource management agency and do not supersede or replace the regulatory authority of any local, state, or federal agency nor relieve the applicant of the obligation to comply with any local, state, or federal laws or regulations.

Natural Heritage Database: A review of the Ohio Natural Heritage Database indicates there are no records of state or federally listed plants or animals within one mile of the specified project area. Records searched date from 1980.

Please note that Ohio has not been completely surveyed and we rely on receiving information from many sources. Therefore, a lack of records for any particular area is not a statement that rare species or unique features are absent from that area.

Fish and Wildlife: The Division of Wildlife (DOW) has the following comments.

The DOW recommends that impacts to streams, wetlands and other water resources be avoided and minimized to the fullest extent possible, and that Best Management Practices be utilized to minimize erosion and sedimentation.

The project is within the vicinity of records for the northern long-eared bat (*Myotis septentrionalis*), a state endangered and federally endangered species, the little brown bat (*Myotis lucifugus*), a state endangered species, and the tricolored bat (*Perimyotis subflavus*), a state endangered species. Because presence of state endangered bat species has been established in the area, summer tree clearing is not recommended, and additional summer surveys would not constitute presence/absence in the area. However, limited summer tree clearing inside this buffer may be acceptable after further consultation with DOW (contact Eileen Wyza at Eileen.Wyza@dnr.ohio.gov).

In addition, the entire state of Ohio is within the range of the Indiana bat (*Myotis sodalis*), a state endangered and federally endangered species, the northern long-eared bat (*Myotis septentrionalis*), a state endangered and federally endangered species, the little brown bat (*Myotis lucifugus*), a state endangered species, and the tricolored bat (*Perimyotis subflavus*), a state endangered species. During the spring and summer (April 1 through September 30), these bat species predominately roost in trees behind loose, exfoliating bark, in crevices and cavities, or in clusters of dead leaves on tree limbs. However, these species are also dependent on the forest structure surrounding roost trees. The DOW recommends tree and/or tree limb clearing only occur from October 1 through March 31, conserving trees with loose, shaggy bark and/or crevices, holes, or cavities, as well as trees with a Diameter Breast Height (DBH) ≥ 20 " if possible.

For every project, the DOW also recommends that a winter bat habitat assessment is conducted to determine if potential hibernacula are present within the project area. This is to limit possible disturbances that seasonal tree clearing and/or subsurface work (e.g., trenching, blasting, etc.) may cause to hibernating bats. Potential hibernacula include rocky outcroppings, caves, and underground mines. Direction on how to conduct winter habitat assessments can be found in the joint guidance [OHIO DIVISION OF WILDLIFE AND U.S. FISH AND WILDLIFE SERVICE \(OH-FIELD OFFICE\) JOINT GUIDANCE FOR BAT SURVEYS](#). If a potential or known hibernaculum is found, the DOW recommends a 0.25-mile permanent tree clearing buffer around the hibernaculum entrance. Limited summer or winter tree clearing may be acceptable after consultation with the DOW. If a habitat assessment for projects involving subsurface disturbance finds that a potential hibernaculum is present within 5 miles of the project area, please consult with Eileen Wyza for project recommendations. If no tree clearing or subsurface impacts to a hibernaculum are proposed, this project is not likely to impact these species.

The DOW recommends that all impacts to karst features be avoided to the greatest extent practicable. Subsurface ground disturbance and tree clearing around cave entrances have the potential to affect

sensitive species that reside within karst habitats. To help identify known and potential karst features, refer to the Division of Geological Survey's [online interactive karst map](#).

The project is within the range of the following listed mussel species.

Federally Endangered

clubshell (*Pleurobema clava*)

Northern riffleshell (*Epioblasma torulosa rangiana*)

rayed bean (*Villosa fabalis*)

State Endangered

Ohio pigtoe (*Pleurobema cordatum*)

washboard (*Megaloniaias nervosa*)

yellow sandshell (*Lampsilis teres*)

Due to the location, and that there is no in-water work proposed in a perennial stream of sufficient size, this project is not likely to impact these species.

The project is within the range of the following listed fish species.

State Endangered

bigeye shiner (*Notropis boops*)

goldeye (*Hiodon alosoides*),

popeye shiner (*Notropis ariommus*),

shoal chub (*Macrhybopsis hyostoma*),

shortnose gar (*Lepisosteus platostomus*),

shovelnose sturgeon (*Scaphirhynchus platyrhynchus*),

State Threatened

blue sucker (*Cycleptus elongatus*),

channel darter (*Percina copelandi*),

paddlefish (*Polyodon spathula*)

river darter (*Percina shumardi*),

The DOW recommends no in-water work in perennial streams from March 15 through June 30 to reduce impacts to indigenous aquatic species and their habitat. If no in-water work is proposed in a perennial stream, this project is not likely to impact these or other aquatic species.

The project is within the range of the timber rattlesnake (*Crotalus horridus*), a state endangered species, and a federal species of concern. The timber rattlesnake is a woodland species. In addition to using wooded areas, the timber rattlesnake also utilizes sunlit gaps in the canopy for basking and

deep rock crevices known as den sites for overwintering. Due to the location, the type of habitat within the project area, and the type of work proposed, this project is not likely to impact this species.

The project is within the range of the eastern spadefoot toad (*Scaphiopus holbrookii*), a state endangered species. This species is found in areas of sandy soils that are associated with river valleys. Breeding habitats may include flooded agricultural fields or other water holding depressions. Due to the location, the type of habitat within the project area, and the type of work proposed, this project is not likely to impact this species.

The project is within the range of the midland mud salamander (*Pseudotriton montanus diastictus*), a state threatened species. Due to the location, the type of habitat within the project area, and the type of work proposed, this project is not likely to impact this species.

The project is within the range of the eastern harvest mouse (*Reithrodontomys humulis*), a state threatened species. This species relies on early successional habitats dominated by herbaceous vegetation with less than 30% woody material. The DOW recommends that early successional habitats be preserved where possible. If early successional habitats won't be impacted, this project is not likely to impact this species.

Due to the potential for impacts to federally listed species, as well as to state-listed species, we recommend that this project be coordinated with the US Fish & Wildlife Service.

The Divisions of Water Resources, Forestry, and Mineral Resources Management have not conducted a project specific review and/or comments; however, the guidance provided below should be reviewed by the Environmental Review applicant for applicability on this project and subsequent compliance as applicable.

Water Resources: If the subject project is in a floodplain regulated by the Federal Emergency Management Agency (FEMA), the [local floodplain administrator](#) should be contacted concerning the possible need for any floodplain permits or approvals. The FEMA National Flood Hazard Layer (NHFL) Viewer [website](#) can be utilized to see if the project is in a FEMA regulated floodplain. If the project is not in a FEMA regulated floodplain, then no further action is required.

Ohio Revised Code (ORC) Section 1521.16 mandates that any owner of a property or a facility that has the capacity of withdrawing 100,000 gallons per day (gpd) of water from groundwater, surface water, or both must register with the Division of Water Resources' [Water Withdrawal Facilities Registration \(WWFR\) Program](#) and report their withdrawals annually.

Additional coordination may be required depending on the location of the withdrawal and consumptive use. Permitting may be required for:

- New or increased consumptive use of water averaging 2 million gallons per day (mgd) within 30 days within the Ohio River basin.
- New or increased withdrawal and consumptive water use in the Lake Erie watershed averaging 1 million gallons per day (mgd) or more in 90 days.
- New or increased water withdrawal directly from Lake Erie averaging 2.5 million gallons per day (mgd) or more in 90 days.
- Diversion or movement of water across the Ohio River and Lake Erie basin divide.

If the project does not involve activities that are subject to water withdrawal regulatory requirements as described above, then no further action is required. For more information, visit the [Water Inventory & Planning website](#).

Forestry: The Division of Forestry recommends that construction projects preserve existing trees to the greatest extent possible. Failing to consider trees during any phase of project development (e.g. planning, design, preconstruction, construction, landscaping and/or postconstruction) can compromise tree health and structural integrity. Preserving trees during a construction project involves protecting the soil, roots, trunks, and crowns of trees. Protection barriers should be visible and extend around the root zone, the area under the tree that extends beyond the drip zone. There should be no storage of material or traffic within this established zone. Trees should be monitored throughout the project and steps taken to remedy any impacts. Projects should consider Best Management Practices (BMPs) during construction and the [Purdue Extension document Construction and Trees: Guidelines for Protection](#) is recommended as a resource for BMPs. Certified arborists can be located through the [International Society of Arboriculture website](#). Please note that tree preservation practices may also be required under municipal ordinances.

Mineral Resources: For projects requiring earth disturbance, the Ohio Mines Locator ([ODNR Mines of Ohio Viewer](#)) should be referenced. Both current and abandoned mines with either underground or surface features should be identified, and project impacts evaluated. Please reference the [Ask Before You Build](#) development guide for information about abandoned mine land features. Division of Mineral Resources Management may be contacted for further information and guidance regarding development of mined lands. Contact minerals@dnr.ohio.gov for further information.

ODNR appreciates the opportunity to provide these comments. Please contact Mike Pettegrew (Environmental Services Administrator) at mike.pettegrew@dnr.ohio.gov if you have questions about these comments or need additional information.

Expiration: *ODNR Environmental Reviews are typically valid for 2 years from the issuance date. If the scope of work, project area, construction limits, and/or anticipated impacts to natural resources have changed significantly from the original project submittal, then a new Environmental Review request should be submitted.*

**This foregoing document was electronically filed with the Public Utilities
Commission of Ohio Docketing Information System on**

9/3/2026 3:44:08 PM

in

Case No(s). 26-0866-EL-BLN

Summary: Application LON, Monza Station Project electronically filed by Jared M
Klaus on behalf of AEP Ohio Transmission Company, Inc..