

# Construction Notice for Philo-Howard 138 kV Mid-Span Structure Project



An **AEP** Company

BOUNDLESS ENERGY™

PUCO Case No. 21-0976-EL-BNR

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

Submitted by:  
Ohio Power Company

September 28, 2021

# CONSTRUCTION NOTICE FOR PHILO-HOWARD 138 kV MID-SPAN STRUCTURE PROJECT

## CONSTRUCTION NOTICE

### Ohio Power Company Philo-Howard 138 kV Mid-Span Structure Project

**4906-6-05**

Ohio Power Company (the “Company”) provides the following information to the Ohio Power Siting Board (“OPSB”) pursuant to Ohio Administrative Code Section 4906-6-05.

#### **4906-6-5(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 Construction Notice.**

The Company proposes the Philo-Howard 138 kV Mid-Span Structure Project (the “Project”) related to the “Salerno 138 kV Line Extension” project (PUCO Case No. 21-0678-EL-BNR - approved 9/14/21)), located in Washington Township, Richland County, Ohio. The previously filed Salerno 138 kV Line Extension project will be installing two new 138 kV single circuit transmission lines, totaling approximately 0.13 miles in length, to a new non-jurisdictional distribution (138/12 kV) substation called Salerno Station. Due to the new configuration on the Philo-Howard 138 kV transmission line, there is a need to construct a mid-span structure on the eastern Howard-North Bellville 138 kV circuit of transmission line to keep the conductors from potentially swinging into the proposed western circuits after existing structures are removed.

Figure 1 in Appendix A shows the location of the Project area in relation to the surrounding vicinity. Figure 2 in Appendix A shows the Project area for the transmission line installation. Technical features of this Project are discussed in Section B(9).

The Project meets the requirements for a Construction Notice (“CN”) because it is within the types of projects defined by item (2)(a) of Appendix A to O.A.C. 4906-1-01, *Application Requirement Matrix for Electric Power Transmission Lines*. This item states:

*(2) Adding new circuits on existing structures designed for multiple circuit use, replacing conductors on existing structures with larger or bundled conductors, adding structures to an existing transmission line, or replacing structures with a different type of structure, for a distance of:*

*(a) Two miles or less.*

The Project has been assigned PUCO Case No. 21-0976-EL-BNR

## CONSTRUCTION NOTICE FOR PHILO-HOWARD 138 kV MID-SPAN STRUCTURE PROJECT

### **B(2) Statement of Need**

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

Ohio Power Company proposes the Philo-Howard 138kV Mid-Span Structure Project related to the “Salerno 138 kV Line Extension” project located in Washington Township, Richland County, Ohio. The Salerno 138 kV Line Extension project will be installing two new 138 kV single circuit transmission lines, totaling approximately 0.13 miles in length, to a new non-jurisdictional distribution (138/12 kV) substation called Salerno Station. This station will serve AEP Ohio Transmission Company, Inc. (AEP Ohio Transco) customers in the area by installing a 138 kV bus with a single 138/12 kV transformer. The Salerno 138 kV North Extension transmission line will tie Salerno Station to the Philo-Howard 138 kV transmission line using the Academia-North Lexington 138 kV circuit. The Salerno 138 kV South Extension transmission line will also tie Salerno Station to the Philo-Howard 138 kV transmission line and using the Academia-North Lexington 138 kV circuit. The Project will also include the removal/relocation of approximately 0.25 miles of the Philo-Howard 138 kV transmission line for the Salerno Station connection. The installation of the two 138 kV transmission lines will serve to support the high growth rate in the Lexington area. With this new configuration on the Philo-Howard 138kV transmission line, there is a need to construct a mid-span structure on the eastern Howard-North Bellville 138 kV circuit of line to keep the conductors from potentially swinging into the proposed western circuits after existing structures are removed.

Ohio Power Company is obligated to serve this AEP Ohio Transco service request in Washington Township, Ohio. Failure to build this project will result in the inability to serve additional load growth in the area.

The need and solution were presented and reviewed with stakeholders at the January 17, 2020 and July 17, 2020 PJM SRRTEP Western meeting. The project was subsequently assigned PJM project number S2343. This Project was included in the Ohio Power Company’s most recent 2021 Long-Term Forecast Report on page 92 (Form FE-T10) (See Appendix B).

### **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.**

The Project is located in Washington Township, Richland County, Ohio. Figures 1 and 2 in Appendix A show the location of the proposed Project in relation to the existing 138 kV transmission lines.

### **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.**

## CONSTRUCTION NOTICE FOR PHILO-HOWARD 138 kV MID-SPAN STRUCTURE PROJECT

The Project is located within pasture habitat and entirely within existing right-of-way, with no anticipated impacts to wetlands, streams, or known cultural resource areas. Additionally, the Project is located on a parcel of land owned by Ohio Power Company and given the existing transmission lines, the location of the Salerno Station, and minimal construction constraints in the Project area, no other alternatives were considered for the Project. Any alternative would add additional length to the Project without any additional benefit. Therefore, this Project represents the most suitable and least impactful alternative. Socioeconomic, land use, and ecological information is presented in Section B(10).

### **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 maintains a website (<http://aeptransmission.com/ohio/>) which provides the public access to an electronic copy of this CN. An electronic copy of the CN will be served to the public library in each political subdivision affected by this proposed Project. Lastly, the Company also retains ROW land agents who discuss project timelines, construction, and restoration activities with 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 is planned to start in December of 2021. The in-service date (completion date) of the Project is expected to be May of 2022.

### **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.**

Figure 1 in Appendix A provides a topographical map of existing and proposed facilities at 1:24,000, and Figure 2 in Appendix A provides an aerial image from 2019 showing roads and highways, clearly marked with Project components.

To visit the Project from Columbus, take I-71 N for 56.7 miles. Take exit 165 for OH-97 toward Lexington/Bellville and turn left onto OH-97 W (0.6 mi). Take a slight right turn onto Middle Bellville Road (1.4 mi). The Project will be on the right, east of Middle Bellville Road.

### **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.**



## CONSTRUCTION NOTICE FOR PHILO-HOWARD 138 kV MID-SPAN STRUCTURE PROJECT

The Project will be located entirely within existing right-of-way on property owned by Ohio Power Company (Parcel No. 0533703306001). No other property easements, options, or land use agreements are necessary to construct the 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 transmission line construction is estimated to include the following:

Voltage:	138 kV
Conductors:	556.5KCM ACSR 26/7 Dove
Static Wire:	159KCM ACSR 12/7 Guinea
Insulators:	138BP NCI
ROW Width:	100 Feet
Structure Types:	One (1) single circuit galvanized (WPE) steel pole, braced post structure

#### **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.**

This Project is not located within 100 feet of any occupied residences or institutions. Therefore, this section is not applicable.

#### **B(9)(c) Project Cost**

**The estimated capital cost of the project.**

The capital cost estimate for the proposed Project, which is comprised of applicable tangible and capital costs, is approximately \$50,000 using a Class 4 estimate. Pursuant to the PJM OATT, the costs for this Project will be recovered in the Ohio Power Company's FERC formula rate (Attachment H-14 to the PJM OATT) and allocated to the AEP Zone.

### **B(10) Social and Economic Impacts**

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

#### **B(10)(a) Land Use Characteristics**

## CONSTRUCTION NOTICE FOR PHILO-HOWARD 138 kV MID-SPAN STRUCTURE PROJECT

### **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 Project is located within existing right-of-way within a parcel owned by Ohio Power Company in Washington Township, Richland County, Ohio. The Richland County Auditor Geographic Information System (“GIS”) data lists the land use of this parcel as “400 C - Commercial Vacant Land”. Field observations indicated that the Project area is entirely comprised of pasture (0.23 acre). No streams or wetlands will be impacted by the Project (see Figures 2 and 3 in Appendix D). No tree clearing will be required for the Project. Additionally, no environmental or significant cultural resources are expected to be impacted as a result of this Project.

No residences, cemeteries, churches, schools, or other community facilities are located within 1,000 feet of the Project area.

No unique ecological sites, geologic features, animal assemblages, scenic rivers, state wildlife areas, state nature preserves, state or national parks, state or national forests, national wildlife refuges, or other protected natural areas are located within 1,000 feet of the Project (see Appendix C).

### **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.**

The parcel is classified on the Richland County Auditor website as “400 C – Commercial Vacant Land.” Based on field surveys, there are approximately 0.23 acre of pasture within the Project area. As verified by the Richland County Auditor’s Office on September 27, 2021, there are no parcels within the Project area that are enrolled in the agricultural district land program.

### **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.**

Phase I archaeological and history/architectural surveys were conducted by the Company’s consultant for the entire parcel on which the Project will be located in May of 2020. No sites listed on, or eligible for listing on, the National Register of Historic Places were identified within the Project area or adjacent portions of the parcels surveyed for cultural resources. Correspondence from the State Historic Preservation Office (“SHPO”) was received on August 6, 2020 and is included in Appendix C. The SHPO stated that they agree the Project will not affect historic properties and no further coordination is necessary.

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

Ohio Power Company  
September 2021

Philo-Howard 138 kV Mid-Span Structure Project  
21-0976-EL-BNR

## CONSTRUCTION NOTICE FOR PHILO-HOWARD 138 kV MID-SPAN STRUCTURE PROJECT

**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.**

Best management practices (BMPs) will be implemented and maintained to minimize erosion and control sediment to protect surface water quality during storm events. A project-specific Storm Water Pollution Prevention Plan (SWPPP) will be prepared for the Project and a Notice of Intent (NOI) will be filed with the Ohio Environmental Protection Agency ("OEPA") for authorization of construction storm water discharges under General Permit OHC000005.

There are no wetlands or open waters located within the Project area. However, one intermittent stream was identified east of the eastern boundary of the Project area (see Ecological Resources Inventory Report provided in Appendix D). No impacts to the stream are anticipated. Therefore, the Project is not expected to require a Clean Water Act Section 404 Permit from the U.S. Army Corps of Engineers ("USACE") or Clean Water Act Section 401 Water Quality Certification from the OEPA.

The Project is not crossed by Federal Emergency Management Agency ("FEMA") 100-year floodplains or floodways. Therefore, no floodplain permitting is required for the Project. There are no other known local, state, or federal permitting requirements that must be met prior to commencement of the Project.

### **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.**

The U.S. Fish and Wildlife Service ("USFWS") Ohio Ecological Services Field Office list of federally endangered, threatened, and candidate species in Ohio by County (available at <https://www.fws.gov/midwest/ohio/EndangeredSpecies/pdf/SpeciesListByCountyApril2018.pdf>) was reviewed to determine threatened and endangered species known to occur or potentially occur within Richland County. The USFWS lists the following threatened or endangered species as occurring or having the potential to occur in Richland County: Indiana bat (*Myotis sodalis*; federally endangered), northern long-eared bat (*Myotis septentrionalis*; federally threatened), and eastern massasauga (*Sistrurus catenatus*; federally threatened).

A coordination letter was submitted to the USFWS Ohio Ecological Services Field Office seeking technical assistance on the Project for potential impacts to threatened or endangered species. The June 1, 2020 response letter from USFWS (Appendix C) stated that if no caves or mines (potential bat hibernacula) are present and seasonal tree cutting (clearing of trees  $\geq 3$  inches diameter at breast height between October 1 and March 31) is implemented, adverse effects to Indiana and northern long-eared bats can be avoided.

## CONSTRUCTION NOTICE FOR PHILO-HOWARD 138 kV MID-SPAN STRUCTURE PROJECT

No tree clearing is necessary for the Project. Therefore, no impacts to the Indiana bat or northern long-eared bat are anticipated.

Additionally, due to the Project type, size, and location, the USFWS does not anticipate adverse effects to any other federally endangered, threatened, proposed, or candidate species. The USFWS recommended that the proposed Project avoid and minimize water quality impacts and impacts to high quality fish and wildlife habitat. The use of best management practices was also recommended to minimize erosion.

Several state-listed threatened and endangered species are listed by the Ohio Department of Natural Resources (“ODNR”) (<https://ohiodnr.gov/static/documents/wildlife/state-listed-species/richland.pdf>) as occurring, or potentially occurring, in Richland County. State-listed species occurring in Richland County are addressed in detail in the Ecological Resources Inventory Report included in Appendix D. An environmental review request letter was submitted to the ODNR Office of Real Estate and a response letter was received July 22, 2020 (Appendix C).

According to the ODNR, the Indiana bat (state-listed endangered and federally listed endangered), little brown bat (*Myotis lucifugus*; state-listed endangered), northern long-eared bat (state-listed endangered and federally listed threatened), and tri-colored bat (*Perimyotis subflavus*; state-listed endangered) occur statewide in Ohio. These species also roost in trees during the summer months and the little brown bat and tri-colored bat also roost in buildings. No potentially suitable winter hibernacula or suitable summer roosting habitat for these species was observed within the Project area and no tree clearing will be required for the Project. Additionally, no buildings will be removed as part of the Project. Therefore, no impacts to the Indiana bat, northern long-eared bat, little brown bat, or tri-colored bat are anticipated.

The response letter received from the ODNR Office of Real Estate also states that the Project is within the range of the following aquatic state-listed endangered and/or threatened species: Iowa darter (*Etheostoma exile*; a state-listed endangered), greater redhorse (*Moxostoma valenciennesi*; state-listed threatened), and eastern hellbender (*Cryptobranchus alleganiensis alleganiensis*; state-listed endangered and federal species of concern). However, due to the Project location, and that there is no in-water work proposed in a perennial stream, the ODNR states that this Project is not likely to impact these species.

The Project is also within the range of the eastern massasauga (*Sistrurus catenatus*; state-listed endangered and federally threatened). The eastern massasauga uses a range of habitats including wet prairies, fens, and other wetlands, as well as drier upland habitat. The ODNR response letter states that due to the location, type of habitat within the Project area, and the type of work proposed, the Project is not likely to impact this species.

According to the ODNR, the Project is also within the range of the following state-listed endangered and/or threatened bird species: sandhill crane (*Grus canadensis*; state-listed threatened), trumpeter swan (*Cygnus buccinator*; state-listed threatened), and upland sandpiper (*Bartramia longicauda*; state-listed endangered). Sandhill crane nesting habitat includes open grasslands, marshes, marshy edges of lakes and ponds, and riverbanks. Nests are on the ground or in shallow water on open tundra, large marshes, bogs, fens, or wet forest meadows. Trumpeter swans nest in open grasslands, marshes, marshy edges of lakes and ponds, and riverbanks. Nests are on the ground or in shallow water on open tundra, large marshes, bogs, fens, or wet forest meadows. No suitable nesting habitat for the sandhill crane or trumpeter swan was observed in the Project area. The ODNR response letter states that, if these types of habitats will not be impacted, the Project is not likely to impact these species. Upland sandpipers nest in dry grasslands

## CONSTRUCTION NOTICE FOR PHILO-HOWARD 138 kV MID-SPAN STRUCTURE PROJECT

including native grasslands, seeded grasslands, grazed and ungrazed pasture, hayfields, and grasslands established through the Conservation Reserve Program. Potentially suitable nesting habitat (pasture) for this species was observed within the majority of the Project area. However, the Company's consultant completed a habitat assessment for the upland sandpiper in June 2020 and concluded that the Project area is located within a pasture/grassland/hayfield complex that is likely not large enough to attract nesting upland sandpipers and also contains vegetation that is likely too tall on average to be suitable as upland sandpiper nesting habitat. The ODNR responded concurring that the Project area is unlikely to be suitable upland sandpiper nesting habitat (Appendix C). Therefore, there are no seasonal construction restrictions related to the upland sandpiper nesting period.

### **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.**

The USFWS response letter states that there are no federal wilderness areas, wildlife refuges, or designated critical habitat within the vicinity of the Project area (Appendix C). Additionally, the ODNR Office of Real Estate response letter indicates that they are not aware of any unique ecological sites, geologic features, animal assemblages, scenic rivers, state wildlife areas, state nature preserves, state or national parks, state or national forests, national wildlife refuges, or other protected natural areas that are located within a one-mile radius of the Project area (Appendix C).

The FEMA Flood Insurance Rate Map with coverage of the Project area was consulted to identify any floodplains/flood hazard areas that have been mapped in the Project area (specifically, map number 39139C0216E). Based on this map, no mapped FEMA floodplains or floodways are located within the Project area.

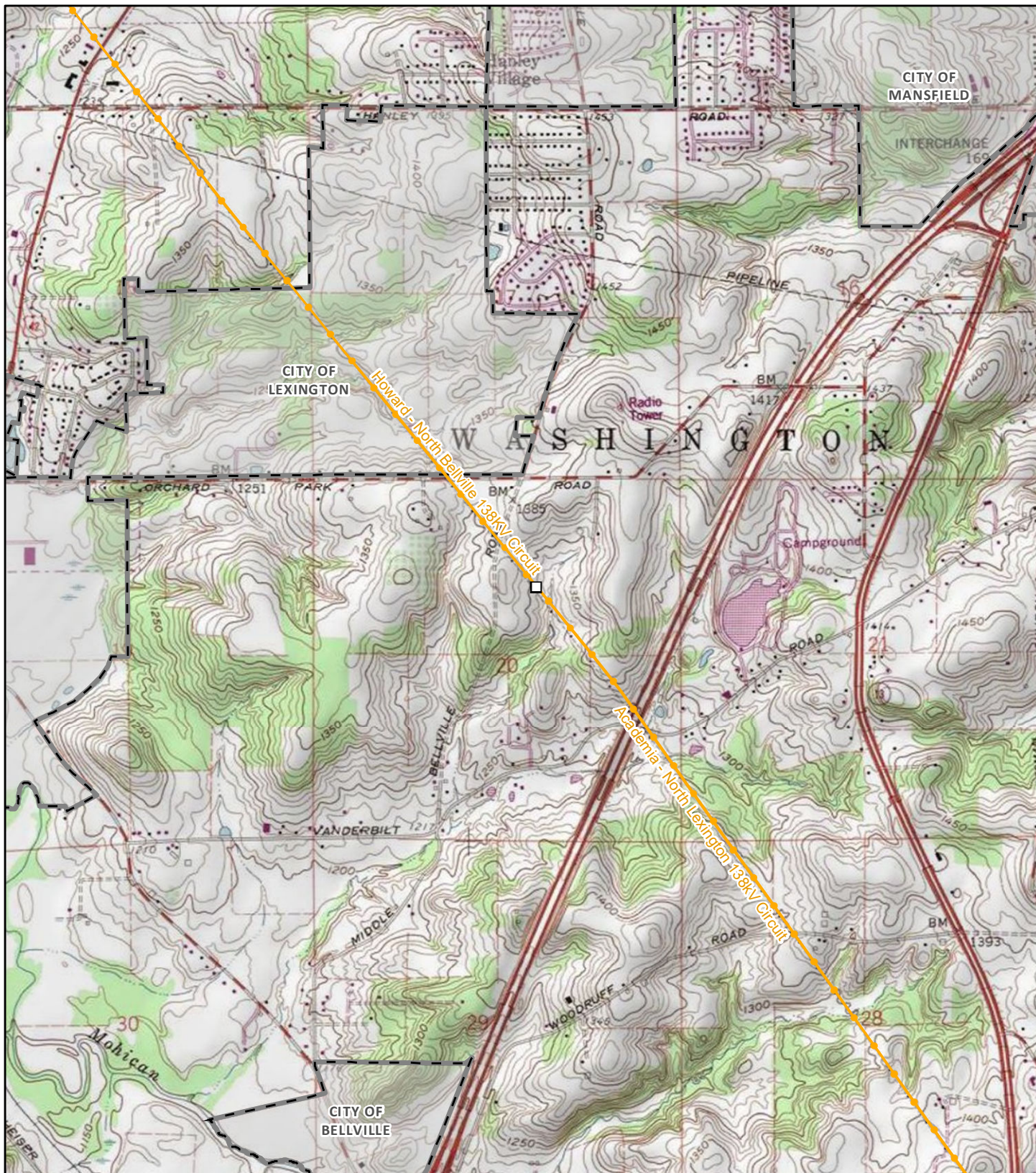
An ecological resources inventory and wetland and waterbody delineation study was completed by the Company's consultant within the Project area in June of 2020. The Ecological Resources Inventory Report is included in Appendix D. No wetlands or open waters were observed in the Project area. An intermittent stream was identified to the east of the Project area outside of the proposed Project footprint. Therefore, no wetlands or waterbodies are anticipated to be impacted by the Project.

### **B(10)(g) 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 Figures**





#### Legend

- Proposed Mid-Span Structure
- Existing 138 kV Transmission Line
- Municipal Boundary

Data Sources Include:  
Stantec, AEP, USGS

Coordinate System  
and Datum  
NAD 1983 State Plane  
Ohio North FIPS 3401 Feet



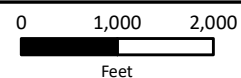
September 10, 2021



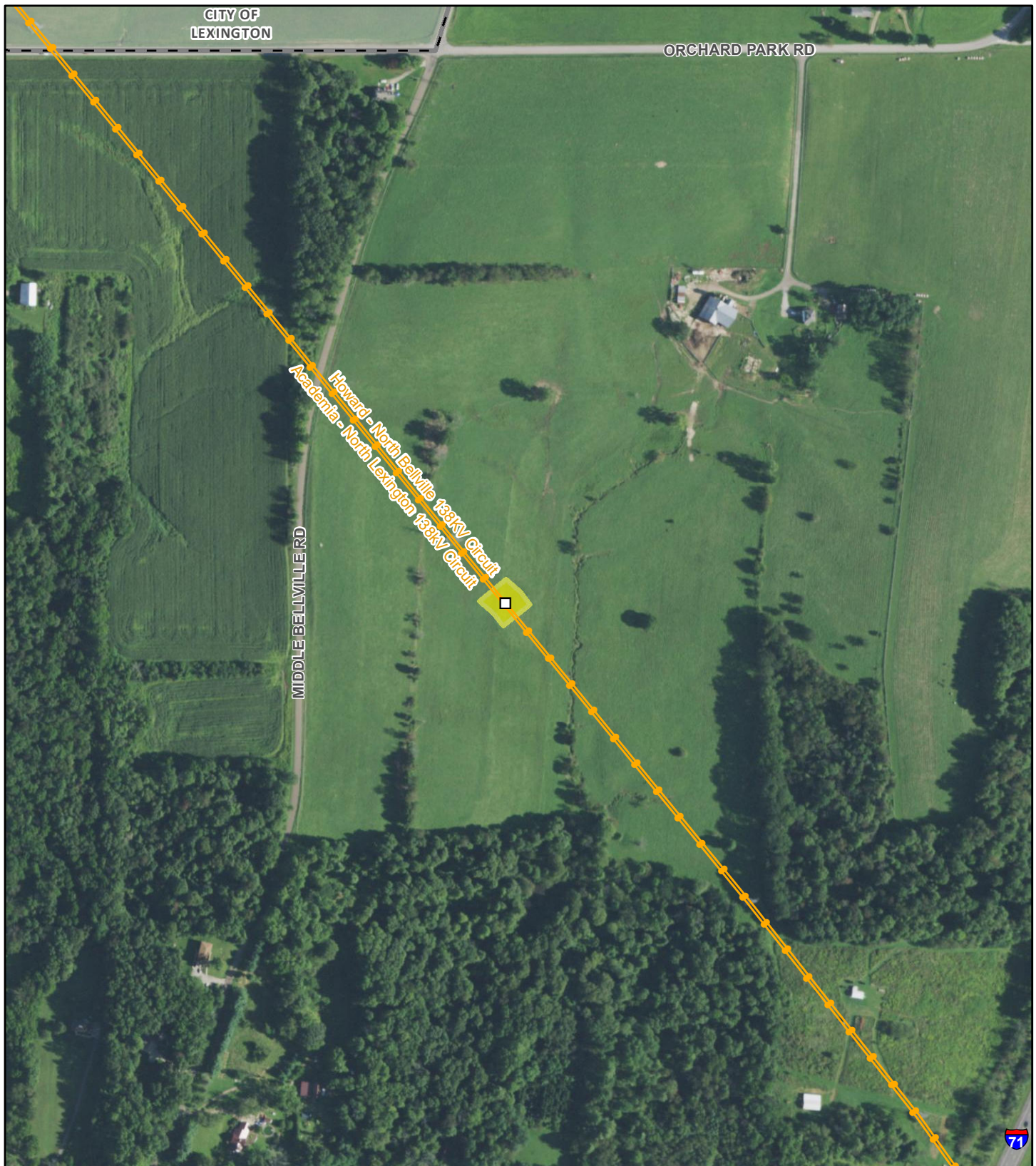
#### FIGURE 1 TOPOGRAPHIC OVERVIEW MAP







Philo-Howard 138 kV  
Mid-Span Structure Project







**Legend**

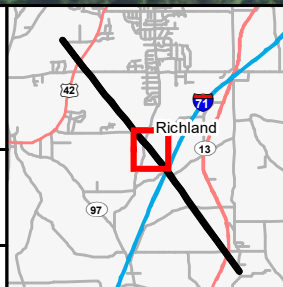
-  Proposed Mid-Span Structure
-  Existing 138 kV Transmission Line
-  Proposed ROW
-  Municipal Boundary

Data Sources Include:  
Stantec, AEP, OGRIP, NADS  
Imagery: NAIP 2019

Coordinate System  
and Datum  
NAD 1983 State Plane  
Ohio North FIPS 3401 Feet



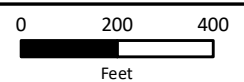
September 10, 2021



**FIGURE 2  
AERIAL MAP**



**Philo-Howard 138 kV  
Mid-Span Structure Project**





# APPENDIX B    PJM Submittal and Long Term Forecast Report

Company: AEP Ohio  
PUCO Form FE-T10  
Summary of Proposed Substations

Substation Name	Voltage(s) (kV)	Type Distribution (D) Transmission (T)	Timing	Line Association(s)	Line Existing or Proposed	Minimum Substation Site Acreage
West Moulton	138	T	2021-22	W Moulton - Gemini	E/P	2
Ridgely	138	D	2020	Kirk - Newark Center 138kV	E	Approx. 3
Newcomerstown	138/69/34.5/12	T	44896	Broom Road - Newcomerstown 69kV	E	Approx. 4
Newcomerstown	138/69/34.5/12	T	44896	Newcomerstown - Newport 69kV	E	Approx. 4
Newcomerstown	138/69/34.5/12	T	44896	Newcomerstown - Ray 69kV	E	Approx. 4
Newcomerstown	138/69/34.5/12	T	44896	Newcomerstown - South Coshocton 138kV	E	Approx. 4
Newcomerstown	138/69/34.5/12	T	44896	Newcomerstown - West Cambridge 138kV	E	Approx. 4
Newcomerstown	138/69/34.5/12	T	44896	Newcomerstown - West New Philadelphia 138kV	E	Approx. 4
Copeland	69/12	D	2024	Stuart - Seaman 69 kV	E	TBD
Copeland	69/12	D	2024	Copeland Extension	P	TBD
Fort Fizzle (Glenmont)	69/7	D	2023-2025	Stillwell - Killbuck 69 kV	P	3 to 5
Millersburg	69/4	D	2023-2025	Berlin - West Millersburg 69 kV	E	TBD
Simmons Run	69/12	D	2023-2025	South Coshocton - Simmons Run 69 kV	P	TBD
Simmons Run	69/12	D	2023-2025	Killbuck - Simmons Run	P	TBD
South Coshocton	138/69/34.5	T	2023-2025	South Coshocton - Simmons Run 69 kV	P	TBD
South Coshocton	138/69/34.5	T	2023-2025	South Coshocton - Coshocton 69 kV	E	TBD
South Coshocton	138/69/34.5	T	2023-2025	South Coshocton - North Coshocton 69 kV	E	TBD
South Coshocton	138/69/34.5	T	2023-2025	South Coshocton - Ohio Central 138 kV	E	TBD
South Coshocton	138/69/34.5	T	2023-2025	South Coshocton - Newcomerstown 138 kV	E	TBD
Salermo (s2343)	138/13 kV	D	2022	North Lexington - Academia 138 kV	E	2 to 3
East Arlington (s2395)	69/12 kV	D	2023-2025	West Crawford - East Arlington 69 kV	P	TBD
East Arlington (s2395)	69/12 kV	D	2023-2025	Rangeline - East Arlington 69 kV	P	TBD

# AEP Transmission Zone M-3 Process Salerno 138kV

**Need Number:** AEP-2020-OH002

**Process Stage:** Solutions Meeting 07/17/2020

**Previously Presented:**

Need Meeting 01/17/2020

**Supplemental Project Driver:**

Customer Service

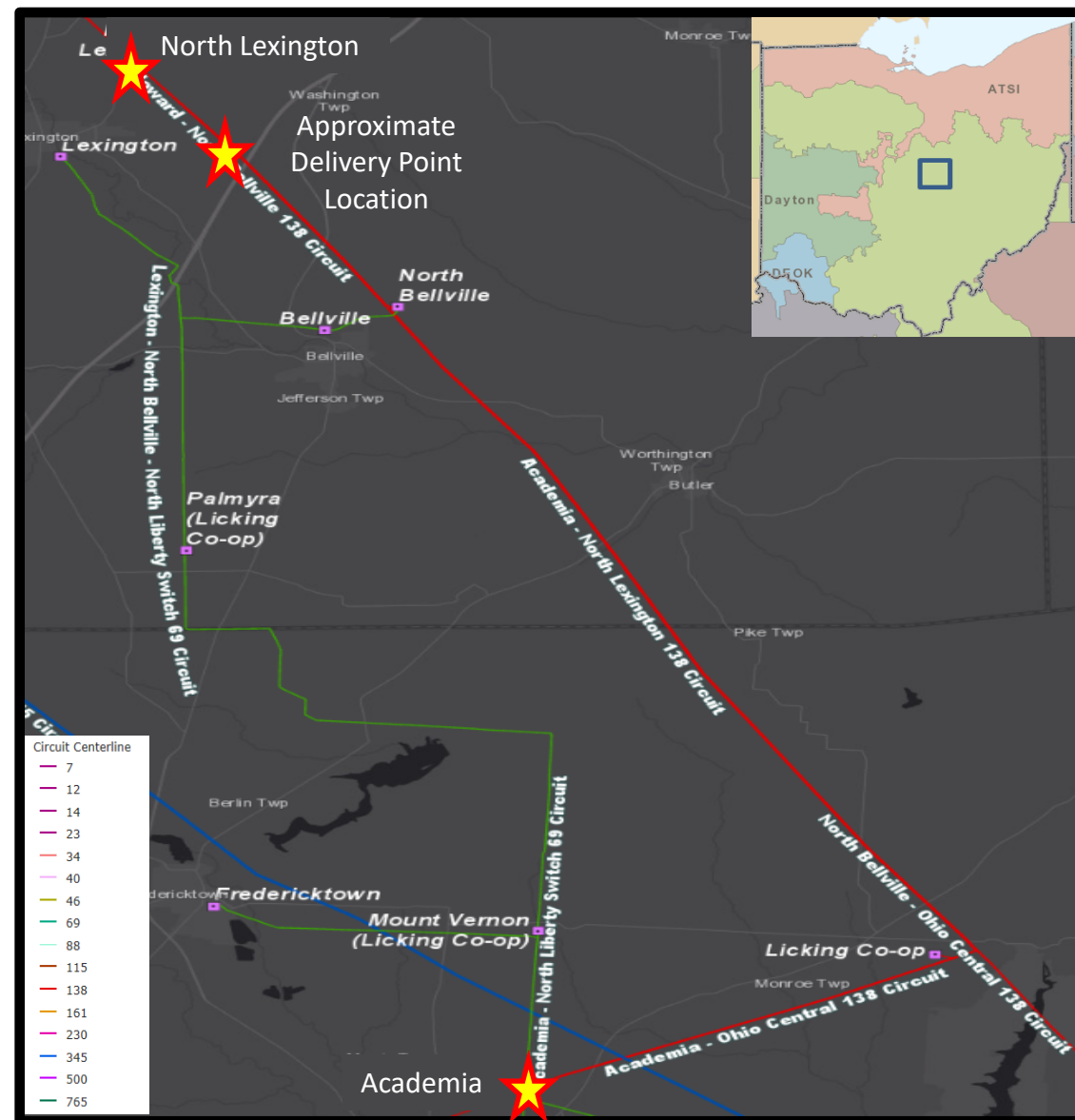
**Specific Assumption Reference:**

AEP Guidelines for Transmission Owner Identified Needs (AEP Assumptions slide 7)

**Problem Statement:**

- AEP Ohio is requesting a new 138kV delivery point on the Academia – North Lexington 138 kV circuit by May 2023. Anticipated load is approximately 15 MVA.

**Model:** 2024 RTEP



# AEP Transmission Zone M-3 Process Salerno 138kV

**Need Number:** AEP-2020-OH002

**Process Stage:** Solutions Meeting 07/17/2020

**Proposed Solution:**

- Install a greenfield 138kV in-out station (“Salerno”) with one auto sectionalizing switch on the line exit towards Academia one non-auto sectionalizing switch on the line exit towards North Lexington. **Estimated Cost: \$1.4M**
- Install two 138kV single circuit lines, approximately 0.1 miles each, to tie the greenfield Salerno station to the Academia-North Lexington 138kV circuit with 795 ACSR. **Estimated Cost: \$0.6M**
- Remove/Relocate approximately 0.1 mile of line on the Philo – Howard Line asset. Install ~1.7 miles of fiber to provide SCADA connectivity to Salerno. **Estimated Cost: \$0.3M**

**Total Estimated Transmission Cost: \$2.3M**

**Alternatives Considered:**

Considering the location of the customer request, no viable cost-effective transmission alternative was identified. AEP Ohio already owns land in this area for the delivery point.

**Projected In-Service:** 05/16/2022

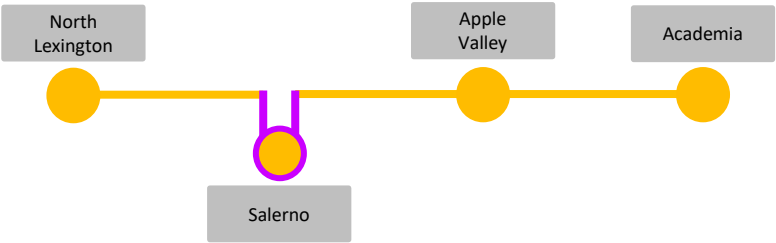
**Project Status:** Scoping

**Model:** 2024 RTEP

**Existing:**



**Proposed:**



Legend	
500 kV	<span style="color: red;">—</span>
345 kV	<span style="color: blue;">—</span>
138 kV	<span style="color: orange;">—</span>
69 kV	<span style="color: green;">—</span>
34.5 kV	<span style="color: red;">—</span>
23 kV	<span style="color: brown;">—</span>
New	<span style="color: purple;">—</span>

## **APPENDIX C   Agency Correspondence**



# Ohio Department of Natural Resources

MIKE DeWINE, GOVERNOR

MARY MERTZ, DIRECTOR

## Office of Real Estate

*John Kessler, Chief*

2045 Morse Road – Bldg. E-2

Columbus, OH 43229

Phone: (614) 265-6621

Fax: (614) 267-4764

July 22, 2020

Dan Godec  
Stantec  
1500 Lake Shore Drive Suite 100  
Columbus OH 43204-3800

**Re:** 20-554; Salerno Station and 138 kV Line Extension Project

**Project:** The proposed project involves the construction of a new 138 kV substation (Salerno Station), and construction/extension of two 0.1-mile segments of new greenfield 138 kV transmission line within new right-of-way and remove/relocate .025 mile of the Philo Howard 138 kV transmission line.

**Location:** The proposed project is located in Washington Township, Richland County, Ohio.

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:** The Natural Heritage Database has no records at or within a one-mile radius of the project area.

A review of the Ohio Natural Heritage Database indicates there are no other records of state endangered or threatened plants or animals within the project area. There are also no records of state potentially threatened plants, special interest or species of concern animals, or any federally listed species. In addition, we are unaware of any unique ecological sites, geologic features, animal assemblages, scenic rivers, state wildlife areas, state nature preserves, state or national parks, state or national forests, national wildlife refuges, or other protected natural areas within the project area. The review was performed on the project area you specified in your request as well as an additional one-mile radius. 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. Although all types of plant communities have been surveyed, we only maintain records on the highest quality areas.

**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 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 threatened 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 species of bats predominately roost in trees behind loose, exfoliating bark, in crevices and cavities, or in the leaves. However, these species are also dependent on the forest structure surrounding roost trees. If trees are present within the project area, and trees must be cut, the DOW recommends cutting 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 DBH  $\geq 20$  if possible. If trees are present within the project area, and trees must be cut during the summer months, the DOW recommends a mist net survey or acoustic survey be conducted from June 1 through August 15, prior to any cutting. Mist net and acoustic surveys should be conducted in accordance with the most recent version of the “OHIO DIVISION OF WILDLIFE GUIDANCE FOR BAT SURVEYS AND TREE CLEARING”. If state listed bats are documented, DOW recommends cutting only occur from October 1 through March 31, however, limited summer tree cutting may be acceptable after consultation with DOW (contact Sarah Stankavich, [sarah.stankavich@dnr.state.oh.us](mailto:sarah.stankavich@dnr.state.oh.us)).

The DOW also recommends that a desktop or field-based habitat assessment is conducted to determine if there are potential hibernaculum(a) present within the project area. Habitat assessments should be conducted in accordance with the current USFWS “Range-wide Indiana Bat Survey Guidelines” and submitted to Sarah Stankavich, [sarah.stankavich@dnr.state.oh.us](mailto:sarah.stankavich@dnr.state.oh.us) if potential hibernacula are present within .25 miles of the project area. If a potential hibernaculum is found, the DOW recommends a 0.25-mile tree cutting and subsurface disturbance buffer around the hibernaculum entrance, however, limited summer or winter tree cutting may be acceptable after consultation with DOW. If no tree cutting or subsurface impacts to a hibernaculum are proposed, this project is not likely to impact these species.

The project is within the range of the Iowa darter (*Etheostoma exile*), a state endangered fish, and the greater redhorse (*Moxostoma valenciennesi*), a state threatened fish. The DOW recommends no in-water work in perennial streams from April 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 eastern hellbender (*Cryptobranchus alleganiensis alleganiensis*), a state endangered species and a federal species of concern. Due to the location, and that there is no in-water work proposed in a perennial stream of sufficient size to provide suitable habitat, this project is not likely to impact this species.

The project is within the range of the eastern massasauga (*Sistrurus catenatus*), a state endangered and federally threatened snake species. The eastern massasauga uses a range of habitats including wet prairies, fens, and other wetlands, as well as drier upland habitat. 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 least bittern (*Ixobrychus exilis*), a state threatened bird. This secretive marsh species prefers dense emergent wetlands with thick stands of cattails, sedges, sawgrass or other semiaquatic vegetation interspersed with woody vegetation and open water. If this type of habitat will be impacted, construction should be avoided in this habitat during the species' nesting period of May 1 to July 31. If this type of habitat will not be impacted, this project is not likely to impact this species.

The project is within the range of the sandhill crane (*Grus canadensis*), a state threatened species. Sandhill cranes are primarily a wetland-dependent species. On their wintering grounds, they will utilize agricultural fields; however, they roost in shallow, standing water or moist bottomlands. On breeding grounds, they require a rather large tract of wet meadow, shallow marsh, or bog for nesting. If grassland, prairie, or wetland habitat will be impacted, construction should be avoided in this habitat during the species' nesting period of April 1 to September 1. If this habitat will not be impacted, this project is not likely to have an impact on this species.

The project is within the range of the trumpeter swan (*Cygnus buccinator*), a state threatened bird. Trumpeter swans prefer large marshes and lakes ranging in size from 40 to 150 acres. They like shallow wetlands one to three feet deep with a diverse mix of plenty of emergent and submergent vegetation and open water. If this type of habitat will be impacted, construction should be avoided in this habitat during the species' nesting period of April 15 to June 15. If this habitat will not be impacted, this project is not likely to have an impact on this species.

The project is within the range of the upland sandpiper (*Bartramia longicauda*), a state endangered bird. Nesting upland sandpipers utilize dry grasslands including native grasslands, seeded grasslands, grazed and ungrazed pasture, hayfields, and grasslands established through the Conservation Reserve Program (CRP). If this type of habitat will be impacted, construction should be avoided in this habitat during the species' nesting period of April 15 to July 31. If this type of habitat will not be impacted, this project is not likely to impact this species.

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

**Water Resources:** The Division of Water Resources has the following comment.

The local floodplain administrator should be contacted concerning the possible need for any floodplain permits or approvals for this project. Your local floodplain administrator contact information can be found at the website below.

[http://water.ohiodnr.gov/portals/soilwater/pdf/floodplain/Floodplain%20Manager%20Community%20Contact%20List\\_8\\_16.pdf](http://water.ohiodnr.gov/portals/soilwater/pdf/floodplain/Floodplain%20Manager%20Community%20Contact%20List_8_16.pdf)

ODNR appreciates the opportunity to provide these comments. Please contact Sarah Tebbe, Environmental Specialist, at (614) 265-6397 or [Sarah.Tebbe@dnr.state.oh.us](mailto:Sarah.Tebbe@dnr.state.oh.us) if you have questions about these comments or need additional information.

Mike Pettegrew  
Environmental Services Administrator (Acting)





## OHIO DIVISION OF WILDLIFE GUIDANCE FOR BAT SURVEYS AND TREE CLEARING JUNE 2020

### Agency Contacts:

**ODNR-DOW Permit Coordinator:** Wildlife.Permits@dnr.state.oh.us, (614) 265-6315

**ODNR-DOW Bat Survey Coordinator:** Sarah Stankavich, sarah.stankavich@dnr.state.oh.us, (614) 265-6764

Due to the evolving situation with COVID-19, we are temporarily suspending bat-handling activities until more is known about the risk to North American bats. This document has been updated with new state guidance for the 2020 field season only, or until bat-handling activities are reinstated. These guidelines replace previous guidelines released in March 2020.

*This guidance applies to state recommendations only. Contact the USFWS to determine if federal consultation is also necessary to comply with federal law.*

### Ohio Mist Net Surveys:

Mist-netting for presence/absence surveys, education events, or research activities will not be authorized for the 2020 season.

### Ohio Acoustic Surveys:

Acoustic bat surveys for presence/absence will be accepted by ODNR for the 2020 season. Surveys should follow guidelines laid out in the USFWS Range-wide Indiana Bat Survey Guidelines (March 2020) with the following exceptions:

- Ohio survey dates are June 1 – August 15, 2020
- After conducting automated analyses using one or more of the currently available ‘approved’ acoustic bat ID programs<sup>1</sup>, qualitative analysis (i.e., manual vetting) of any calls recorded from state-endangered species (*Myotis sodalis*, *M. septentrionalis*<sup>2</sup>, *M. lucifugus*<sup>2</sup>, and *Perimyotis subflavus*<sup>2</sup>) must be completed.
  - At a minimum, for each detector site/night a program considered presence of state-listed bats likely, review all files (including no IDs) from that site/night. If more than one acoustic bat ID program is used, qualitative analysis must also include a comparison of the results of each program by site and night.

### During Field Season:

- **Prior to initiation of field work (a minimum of two weeks in advance)**, permittees must provide proposed survey plans to ODNR-DOW via e-mail. **Plans must be reviewed and approved by ODNR-DOW before ANY surveys take place.** Study plans must specify objectives, location details, dates of proposed work, and all other relevant details.

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<sup>1</sup> <https://www.fws.gov/midwest/Endangered/mammals/inba/surveys/inbaAcousticSoftware.html>

<sup>2</sup> State listing as endangered effective July 1, 2020

**After Field Season:**

- By March 15, you must submit your final ODNR-DOW report(s) from the previous summer. You are not required to fill out the ODNR-DOW Wildlife Diversity Bat Excel Spreadsheet; instead, please forward your USFWS Midwestern US Spreadsheet (found here: <http://www.fws.gov/midwest/endangered/mammals/inba/inbasummersurveyguidance.html>) to the ODNR-DOW Bat Survey Coordinator and ODNR-DOW Permit Coordinator and include your state permit number along with an electronic copy of the project report. Electronic summaries emailed during the field season are NOT considered as full compliance of this reporting requirement.

## **Ohio Environmental Review Recommendations for projects involving disturbance near potential/known bat hibernacula (cliffs, caves, mines) or tree cutting:**

**Step 1:** Coordinate with Ohio Division of Wildlife (DOW) regarding existing records for state-listed endangered bat summer and/or winter occurrence information.

If project site contains a known bat hibernaculum(a) –

- For state-listed endangered species other than the Indiana bat, a recommendation of 0.25-mile tree cutting buffer around all known entrances to protect existing conditions at the hibernaculum(a). If the project involves subsurface disturbance, consultation with DOW is required.
- Limited summer and winter tree cutting may be permitted within the buffer following guidelines detailed below. Coordinate with DOW before cutting.

If a project site does not contain known bat hibernaculum(a)

- Conduct a habitat assessment (desktop or field-based, using methods detailed in current USFWS Range-wide Indiana Bat Guidelines) to determine if a potential hibernaculum(a) is present within the action area.

**Step 2:** When conducted, a presence/absence survey must follow current DOW guidelines.

**Step 3:** If a state-listed endangered bat is captured or recorded during the survey:

- Recommendation of no summer tree cutting, or limited cutting following guidelines detailed below, within 5 miles of the capture site if a roost is not located.
- Recommendation of no summer tree cutting, or limited cutting following guidelines detailed below, within 2.5 miles of a roost tree if located.

If no state-listed endangered bat is captured or recorded during the survey:

- Summer tree cutting may proceed for 5 years before a new survey is needed under state guidance.

**Limited summer tree cutting guidance for bats that are only state-listed endangered:** Limited tree cutting in summer may be permitted after consultation with DOW, but clearing trees with the following characteristics should be avoided unless they pose a hazard: dead or live trees of any size with loose, shaggy bark; crevices, holes, or cavities; live trees of any species with DBH  $\geq$  20.

## **FREQUENTLY ASKED QUESTIONS**

### **When does the Bat Survey protocol have to be used?**

This protocol should be used anytime Indiana bat, northern long-eared bat, little brown bat, or tricolored bat summer presence/probable absence surveys are conducted in the state of Ohio. For 2020 only, acoustic surveys will meet the ODNR-DOW requirements unless new guidance allowing for the handling of bats during presence/absence surveys is released from USFWS.

### **How many net surveys are required for presence/probably absence?**

As described in the current USFWS Range-wide Indiana Bat Guidelines: Linear projects: a minimum of 2 detector nights per km (0.6 miles) of suitable summer habitat

Non-linear projects: a minimum of 8 detector nights per 123 acres (0.5 km<sup>2</sup>) of suitable summer habitat. At least 2 detector locations per 123 acre "site" shall be sampled until at least 8 detector nights has been completed over the course of at least 2 calendar nights (may be consecutive). For example:

- 4 detectors for 2 nights each (can sample the same location or move within the site)
- 2 detectors for 4 nights each (can sample the same location or move within the site)
- 1 detector for 8 nights (must sample at least 2 locations and move within the site)

### **How long are the results of the surveys valid for an assessment of an area?**

Mist-net or acoustic surveys documenting probable absence of state-listed endangered bats are valid for five years.

### **When can acoustic surveys occur in Ohio?**

In Ohio, acoustic surveys may only be conducted from June 1 through August 15 unless indicated otherwise in your state permit. Any surveys outside of the June 1 - August 15 timeframe cannot be used in Ohio to assess the presence/probable absence of state-listed bats.

### **Can a presence/probable absence survey be conducted within a known Indiana bat and/or northern long-eared bat capture/detection buffer?**

Surveys generally cannot be used to document presence/probable absence of state-listed endangered bats where presence of the species has already been confirmed by prior surveys.

### **What if a project is proposing to clear trees between April 1 and September 30 when bats may be present but no bat records exist in the project area?**

Any Ohio project that is not within a known bat record buffer, and tree clearing between April 1 and September 31 is being proposed, may have a presence/absence survey conducted between June 1 and August 15 following the range-wide guidance. If a presence/absence survey is not performed, presence of listed bats is assumed.

### **How does take of northern long-eared bats differ from Indiana bats?**

Under Ohio law, there is no exemption for take of any listed bat species.

**From:** [Ohio, FW3](#)  
**To:** [Godec, Daniel](#)  
**Cc:** [nathan.reardon@dnr.state.oh.us](mailto:nathan.reardon@dnr.state.oh.us); [Parsons, Kate](#)  
**Subject:** AEP Stalerno Station and 138kV Line Extension, Richland County  
**Date:** Monday, June 1, 2020 7:45:12 PM  
**Attachments:** [Letterhead for Emails 2.jpg](#)  
[Patrice Sign Small.jpg](#)

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TAILS# 03E15000-2020-TA-1525

Dear Mr. Godec,

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 threatened 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  $\geq 3$  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. Northern long-eared bats have also been observed roosting in human-made structures, such as buildings, barns, bridges, 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 Tree Clearing for Federally Listed Bat Species: Should the proposed project site contain trees  $\geq 3$  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  $\geq 3$  inches dbh cannot be avoided, we recommend removal of any trees  $\geq 3$  inches dbh only occur between October 1 and March 31. Seasonal clearing is recommended to avoid adverse effects to Indiana bats and northern long-eared bats. While incidental take of northern long-eared bats from most tree clearing is exempted by a 4(d) rule (see <http://www.fws.gov/midwest/endangered/mammals/nleb/index.html>), incidental take of Indiana bats is still prohibited without a project-specific exemption. Thus, seasonal clearing is recommended where Indiana bats are assumed present.

If implementation of this seasonal tree cutting recommendation is not possible, a summer presence/absence survey may be conducted for Indiana bats. If Indiana bats are not detected during the survey, then tree clearing may occur at any time of the year. Surveys must be

conducted by an approved surveyor and be designed and conducted in coordination with the Ohio Field Office. Surveyors must have a valid federal permit. Please note that in Ohio summer mist net surveys may only be conducted between June 1 and August 15.

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.

Stream and Wetland Avoidance: Over 90% of the wetlands in Ohio have been drained, filled, or modified by human activities, thus it is important to conserve the functions and values of the remaining wetlands in Ohio ([https://epa.ohio.gov/portals/47/facts/ohio\\_wetlands.pdf](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, Acting Environmental Services Administrator, at (614) 265-6387 or at [mike.pettegrew@dnr.state.oh.us](mailto:mike.pettegrew@dnr.state.oh.us).

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](mailto:ohio@fws.gov).

Sincerely,



Patrice Ashfield  
Field Office Supervisor

cc: Nathan Reardon, ODNR-DOW  
Kate Parsons, ODNR-DOW

**From:** [Mia R Hall](#)  
**To:** ["Nathan.Reardon@dnr.state.oh.us"](mailto:Nathan.Reardon@dnr.state.oh.us)  
**Cc:** [Kevin M Stotts](#)  
**Subject:** AEP Salerno Station - Upland Sandpiper Habitat Assessment  
**Date:** Thursday, December 10, 2020 4:54:59 PM  
**Attachments:** [Salerno Station and 138 kV Line Extension Project Upland Sandpiper Habitat Assessment Report 11-30-2020 Final.pdf](#)  
[image001.png](#)

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Good afternoon Nathan,

AEP is proposing to build a new 138 kV substation project (Salerno Station) in Richland County, Ohio. The project involve construction of a new substation and two approximately 0.1 mile transmission line tie-ins to the station, as well as an approximately 0.25 mile removal of existing transmission line. This project will be subject to review by the Ohio Power Siting Board.

Stantec received an environmental review response letter from ODNR that indicates that this project is within range of the upland sandpiper. Stantec completed a habitat survey for the upland sandpiper and has concluded that, "the Project area is located within a pasture/grassland/hayfield complex that is likely not large enough to attract nesting upland sandpipers and also contains vegetation that is likely too tall on average to be suitable as upland sandpiper nesting habitat."

We request your concurrence with the findings in the attached report and with Stantec's opinion that seasonal construction restrictions (where construction activities should not take place during the upland sandpiper nesting period of April 15 through July 31) should not be required for this project. Please let me know if you have questions or need additional information to complete your review. Thank you!

-Mia Hall



**MIA R HALL | ENVIRONMENTAL SPECIALIST SR**  
[MRHALL@AEP.COM](mailto:MRHALL@AEP.COM) | D:380.205.5239 | C:614.561.3590  
8600 SMITHS MILL ROAD, NEW ALBANY, OH 43054



**From:** [Nathan.Reardon@dnr.ohio.gov](mailto:Nathan.Reardon@dnr.ohio.gov)  
**To:** [Mia R Hall](#)  
**Cc:** [Kevin M Stotts](#)  
**Subject:** [EXTERNAL] RE: AEP Salerno Station - Upland Sandpiper Habitat Assessment  
**Date:** Monday, December 14, 2020 7:49:05 AM  
**Attachments:** [image004.png](#)  
[image001.png](#)

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Hi Mia,

Thank you for providing the habitat assessment report. I would concur that upland sandpipers are unlikely to nest within the project area. However, I would like to point out that after hay is cut, an area may become more suitable. Therefore, if a cutting is planned between field assessment and construction, vegetation height alone should not determine the suitability of habitat.

Thank you,  
Nathan

**Nathan Reardon**  
Compliance Coordinator  
ODNR Division of Wildlife  
2045 Morse Road  
Columbus, OH 43229  
Phone: 614-265-6741  
Email: [nathan.reardon@dnr.ohio.gov](mailto:nathan.reardon@dnr.ohio.gov)

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**From:** Mia R Hall <[mrhall@aep.com](mailto:mrhall@aep.com)>  
**Sent:** Thursday, December 10, 2020 4:55 PM  
**To:** Reardon, Nathan <[Nathan.Reardon@dnr.ohio.gov](mailto:Nathan.Reardon@dnr.ohio.gov)>  
**Cc:** Kevin M Stotts <[kmstotts@aep.com](mailto:kmstotts@aep.com)>  
**Subject:** AEP Salerno Station - Upland Sandpiper Habitat Assessment

Good afternoon Nathan,

AEP is proposing to build a new 138 kV substation project (Salerno Station) in Richland County, Ohio. The project involve construction of a new substation and two approximately 0.1 mile transmission line tie-ins to the station, as well as an approximately 0.25 mile removal of existing transmission line. This project will be subject to review by the Ohio Power Siting Board.

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We request your concurrence with the findings in the attached report and with Stantec's opinion that seasonal construction restrictions (where construction activities should not take place during the upland sandpiper nesting period of April 15 through July 31) should not be required for this project. Please let me know if you have questions or need additional information to complete your review. Thank you!

-Mia Hall



**MIA R HALL | ENVIRONMENTAL SPECIALIST SR**

[MRHALL@AEP.COM](mailto:MRHALL@AEP.COM) | D:380.205.5239 | C:614.561.3590

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**From:** [Nathan.Reardon@dnr.ohio.gov](mailto:Nathan.Reardon@dnr.ohio.gov)  
**To:** [Mia R Hall](#)  
**Subject:** [EXTERNAL] RE: AEP Salerno Station - Upland Sandpiper Habitat Assessment  
**Date:** Tuesday, February 2, 2021 7:12:45 AM  
**Attachments:** [image004.png](#)  
[image001.png](#)  
[image006.png](#)  
[image007.png](#)  
[image008.png](#)

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Mia,

My concurrence was based on the project location rather than vegetation height. The vegetation height comment was more of an FYI. I appreciate you checking though.

Thank you,  
Nathan

**Nathan Reardon**  
Compliance Coordinator  
ODNR Division of Wildlife  
2045 Morse Road  
Columbus, OH 43229  
Phone: 614-265-6741  
Email: [nathan.reardon@dnr.ohio.gov](mailto:nathan.reardon@dnr.ohio.gov)

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**From:** Mia R Hall <[mrhall@aep.com](mailto:mrhall@aep.com)>  
**Sent:** Monday, February 1, 2021 4:14 PM  
**To:** Reardon, Nathan <[Nathan.Reardon@dnr.ohio.gov](mailto:Nathan.Reardon@dnr.ohio.gov)>  
**Subject:** RE: AEP Salerno Station - Upland Sandpiper Habitat Assessment

Nathan,

Sure! Attached is the report.

**MIA R HALL | ENVIRONMENTAL SPECIALIST SR**  
[MRHALL@AEP.COM](mailto:MRHALL@AEP.COM) | D:380.205.5239 | C:614.561.3590



8600 SMITHS MILL ROAD, NEW ALBANY, OH 43054

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**From:** [Nathan.Reardon@dnr.ohio.gov](mailto:Nathan.Reardon@dnr.ohio.gov) <[Nathan.Reardon@dnr.ohio.gov](mailto:Nathan.Reardon@dnr.ohio.gov)>  
**Sent:** Monday, February 1, 2021 3:46 PM  
**To:** Mia R Hall <[mrhall@aep.com](mailto:mrhall@aep.com)>  
**Subject:** [EXTERNAL] RE: AEP Salerno Station - Upland Sandpiper Habitat Assessment

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Mia,

Can you resend the areas of concern? I look at so many maps and reports, I want to confirm I am recalling correctly. Thank you.

Nathan Reardon  
Compliance Coordinator  
ODNR Division of Wildlife  
2045 Morse Road  
Columbus, OH 43229  
Phone: 614-265-6741  
Email: [nathan.reardon@dnr.ohio.gov](mailto:nathan.reardon@dnr.ohio.gov)

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**From:** Mia R Hall <[mrhall@aep.com](mailto:mrhall@aep.com)>  
**Sent:** Monday, February 1, 2021 3:32 PM  
**To:** Reardon, Nathan <[Nathan.Reardon@dnr.ohio.gov](mailto:Nathan.Reardon@dnr.ohio.gov)>  
**Subject:** RE: AEP Salerno Station - Upland Sandpiper Habitat Assessment

Hi Nathan,

Sorry, I should have thought about that. We are working from home still, as well.

I understand your comment that vegetation height alone should not determine the suitability of habitat. Stantec also concluded that the Project area is located within a pasture/grassland/hayfield complex that is likely not large enough to attract nesting upland sandpipers. I wanted to double-

check that you were concurring that upland sandpipers are unlikely to nest within the project area regardless of vegetation height.

Thanks,



**MIA R HALL | ENVIRONMENTAL SPECIALIST SR**  
[MRHALL@AEP.COM](mailto:MRHALL@AEP.COM) | D:380.205.5239 | C:614.561.3590  
8600 SMITHS MILL ROAD, NEW ALBANY, OH 43054

---

**From:** [Nathan.Reardon@dnr.ohio.gov](mailto:Nathan.Reardon@dnr.ohio.gov) <[Nathan.Reardon@dnr.ohio.gov](mailto:Nathan.Reardon@dnr.ohio.gov)>  
**Sent:** Monday, February 1, 2021 2:41 PM  
**To:** Mia R Hall <[mrhall@aep.com](mailto:mrhall@aep.com)>  
**Subject:** [EXTERNAL] RE: AEP Salerno Station - Upland Sandpiper Habitat Assessment

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Hi Mia,

I got your voicemail. Because we are still working from home, the easiest way to communicate is through email.

Nathan Reardon  
Compliance Coordinator  
ODNR Division of Wildlife  
2045 Morse Road  
Columbus, OH 43229  
Phone: 614-265-6741  
Email: [nathan.reardon@dnr.ohio.gov](mailto:nathan.reardon@dnr.ohio.gov)

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**From:** Reardon, Nathan  
**Sent:** Monday, December 14, 2020 7:49 AM  
**To:** Mia R Hall <[mrhall@aep.com](mailto:mrhall@aep.com)>  
**Cc:** Kevin M Stotts <[kmstotts@aep.com](mailto:kmstotts@aep.com)>  
**Subject:** RE: AEP Salerno Station - Upland Sandpiper Habitat Assessment

Hi Mia,

Thank you for providing the habitat assessment report. I would concur that upland sandpipers are unlikely to nest within the project area. However, I would like to point out that after hay is cut, an area may become more suitable. Therefore, if a cutting is planned between field assessment and construction, vegetation height alone should not determine the suitability of habitat.

Thank you,  
Nathan

**Nathan Reardon**  
Compliance Coordinator  
ODNR Division of Wildlife  
2045 Morse Road  
Columbus, OH 43229  
Phone: 614-265-6741  
Email: [nathan.reardon@dnr.ohio.gov](mailto:nathan.reardon@dnr.ohio.gov)

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**From:** Mia R Hall <[mrhall@aep.com](mailto:mrhall@aep.com)>  
**Sent:** Thursday, December 10, 2020 4:55 PM  
**To:** Reardon, Nathan <[Nathan.Reardon@dnr.ohio.gov](mailto:Nathan.Reardon@dnr.ohio.gov)>  
**Cc:** Kevin M Stotts <[kmstotts@aep.com](mailto:kmstotts@aep.com)>  
**Subject:** AEP Salerno Station - Upland Sandpiper Habitat Assessment

Good afternoon Nathan,

AEP is proposing to build a new 138 kV substation project (Salerno Station) in Richland County, Ohio. The project involve construction of a new substation and two approximately 0.1 mile transmission line tie-ins to the station, as well as an approximately 0.25 mile removal of existing transmission line. This project will be subject to review by the Ohio Power Siting Board.

Stantec received an environmental review response letter from ODNR that indicates that this project is within range of the upland sandpiper. Stantec completed a habitat survey for the upland sandpiper and has concluded that, "the Project area is located within a pasture/grassland/hayfield complex that is likely not large enough to attract nesting upland sandpipers and also contains

vegetation that is likely too tall on average to be suitable as upland sandpiper nesting habitat.”

We request your concurrence with the findings in the attached report and with Stantec’s opinion that seasonal construction restrictions (where construction activities should not take place during the upland sandpiper nesting period of April 15 through July 31) should not be required for this project. Please let me know if you have questions or need additional information to complete your review. Thank you!

-Mia Hall



**MIA R HALL | ENVIRONMENTAL SPECIALIST SR**

[MRHALL@AEP.COM](mailto:MRHALL@AEP.COM) | D:380.205.5239 | C:614.561.3590

8600 SMITHS MILL ROAD, NEW ALBANY, OH 43054

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In reply, refer to  
2020-RIC-49009

August 6, 2020

Mr. Ryan J. Weller  
Weller & Associates, Inc.  
1395 West Fifth Avenue  
Columbus, Ohio 43212

**RE: New Salerno Station Project, Washington Township, Richland County, Ohio**

Dear Mr. Weller:

This letter is in response to the correspondence received on July 8, 2020 regarding the proposed New Salerno Station Project, Washington Township, Richland 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 rules for siting this project (OAC 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 the *Phase I Cultural Resource Management Investigations for the 3.6 ha (8.9 ac) New Salerno Station Project in Washington Township, Richland County, Ohio* by Weller & Associates, Inc. (2020).

A literature review, visual inspection, and shovel test unit excavation was completed as part of the investigations. No previously identified archaeological sites are located within the project area and no new archaeological sites were identified during the investigations. Our office agrees no further archaeological work is necessary.

A literature review and field survey were completed as part of the investigations. One property fifty years of age or older was identified within the project area and/or 1,000' study area that may have a direct line of sight to the project. It is Weller's recommendation that the identified property is not eligible for inclusion in the National Register of Historic Places (NRHP). Our office agrees with Weller's recommendations of eligibility.

Based on the information provided, we agree the project will not affect historic properties. No further coordination with this office is necessary, unless the project changes or unless new or additional historic properties are discovered during implementation of this project. In such a situation, this office should be contacted. If you have any questions, please contact me at (614) 298-2022, or by e-mail at [khorrocks@ohiohistory.org](mailto:khorrocks@ohiohistory.org). Thank you for your cooperation.

Sincerely,

A handwritten signature in blue ink, appearing to read "Krista Horrocks".

Krista Horrocks, Project Reviews Manager  
Resource Protection and Review

RPR Serial No: 1084775



# APPENDIX D   Ecological Resources Inventory Report



**Salerno Station and 138 kV Line  
Extension Project, Richland County,  
Ohio**

**Ecological Resources Inventory  
Report**

Prepared for:

AEP Ohio Transmission Company, Inc.  
8600 Smiths Mill Road,  
New Albany, OH 43054

Prepared by:

Stantec Consulting Services Inc.  
11687 Lebanon Road  
Cincinnati, OH 45241

June 11, 2021

## **Table of Contents**

<b>1.0</b>	<b>INTRODUCTION .....</b>	<b>1</b>
<b>2.0</b>	<b>METHODS.....</b>	<b>2</b>
2.1	WETLAND DELINEATION.....	2
2.2	STREAM DELINEATION.....	2
2.3	RARE SPECIES .....	2
<b>3.0</b>	<b>RESULTS .....</b>	<b>3</b>
3.1	TERRESTRIAL HABITAT .....	3
3.2	WETLANDS .....	4
3.3	STREAMS .....	4
3.4	OPEN WATERS .....	5
3.5	RARE, THREATENED, OR ENDANGERED SPECIES HABITAT.....	6
<b>4.0</b>	<b>CONCLUSIONS AND RECOMMENDATIONS.....</b>	<b>12</b>
<b>5.0</b>	<b>REFERENCES.....</b>	<b>14</b>

### **LIST OF TABLES**

Table 1. Vegetation Communities and Land Cover Found within the Salerno Station and 138 kV Line Extension Project Area, Richland County, Ohio .....	3
Table 2. Summary of Stream Resources Found within the Salerno Station and 138 kV Line Extension Project Area, Richland County, Ohio .....	5
Table 3. Summary of Potential Ohio State-Listed Species within the Salerno Station and 138 kV Line Extension Project Area, Richland County, Ohio .....	6
Table 4. Summary of Potential Federally Listed Species within the Salerno Station and 138 kV Line Extension Project Area, Richland County, Ohio .....	11

### **LIST OF APPENDICES**

<b>APPENDIX A</b>	<b>FIGURES</b> .....	<b>A.1</b>
	Figure 1 – Project Location Map.....	A.1
	Figure 2 – Wetland and Waterbody Delineation Map .....	A.2
	Figure 3 – Habitat Assessment Map .....	A.3
<b>APPENDIX B</b>	<b>AGENCY CORRESPONDENCE</b> .....	<b>B.1</b>
<b>APPENDIX C</b>	<b>REPRESENTATIVE PHOTOGRAPHS</b> .....	<b>C.1</b>
	Wetland and Waterbody Photographs.....	C.1
	Habitat Photographs .....	C.2
<b>APPENDIX D</b>	<b>DATA FORMS</b> .....	<b>D.1</b>
	Wetland Determination Data Forms .....	D.1

**SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO**

HHEI Data Form .....D.2

# **SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO**

Introduction  
June 11, 2021

## **1.0 Introduction**

AEP Ohio Transmission Company, Inc. (AEP) is proposing to build a new 138 kV substation (Salerno Station), construct/extend two 0.1-mile segments of new greenfield 138 kV transmission line within the new right-of-way to energize the new substation, and remove/relocate approximately 0.25 miles of the existing Philo-Howard 138 kV transmission line in Richland County, Ohio (Figure 1, Appendix A). The Salerno Station and 138 kV Line Extension Project (the Project) area is located east of the Village of Lexington and west of Interstate 70. The Project area is approximately 8 acres in size and was surveyed for wetlands, waterbodies, open water features, and potential threatened, endangered, and rare species habitat by Stantec Consulting Services Inc. (Stantec) biologists on June 9, 2020. The approximate locations of features located up to 50 feet outside of the survey corridor were also recorded during the field surveys, where landowner access was permitted. However, no data forms were collected on features that did not extend into the survey corridor. These features are shown on the Figure 2 maps in Appendix A as "approximate" wetlands, waterways (streams), open waters, and upland drainage features.

Methods  
June 11, 2021

## **2.0 Methods**

### **2.1 WETLAND DELINEATION**

Prior to completing the field surveys, a desktop review of the Project area was conducted using U.S. Geological Survey (USGS) topographic mapping, National Wetlands Inventory (NWI) maps, U.S. Department of Agriculture (USDA) Natural Resources Conservation Service (NRCS) soil survey data, and aerial imagery mapping. Stantec completed a wetland delineation study in accordance with the *Corps of Engineers Wetlands Delineation Manual* (USACE 1987) and the *Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Northcentral and Northeast Region* (Version 2.0) (USACE 2012). Wetland categories were classified using the Ohio Rapid Assessment Method (ORAM) for Wetlands Version 5.0 (Mack 2001).

### **2.2 STREAM DELINEATION**

Streams that demonstrated a continuously defined channel (bed and bank), ordinary high water mark (OHWM), and the disturbance of terrestrial vegetation were delineated within the Project area, per the protocols outlined in the USACE's *Guidance on Ordinary High Water Mark Identification* (Regulatory Guidance Letter, No. 05-05) (USACE 2005). Delineated streams were classified as ephemeral, intermittent, or perennial per definitions in the Federal Register/Vol. 67, No. 10 (USACE 2002 ) and determined as potential Waters of the U.S. (WOTUS) per "The Navigable Waters Protection Rule" published in the Federal Register/Vol. 85, No. 77 (USACE 2020). Functional assessment of streams identified within the Project area was based on completion of the Ohio Environmental Protection Agency's (OEPA) Headwater Habitat Evaluation Index (HHEI; OEPA 2018) and/or Qualitative Habitat Evaluation Index (QHEI; OEPA 2006). The centerline of each waterway (stream) was identified and surveyed using a handheld sub-meter accuracy GPS unit and mapped with GIS software. Additionally, the locations of ponds/open water features and upland drainage features (which lacked a continuously defined bed and bank/OHWM) identified within the Project area were also recorded with a sub-meter accuracy GPS unit during the field surveys.

### **2.3 RARE SPECIES**

Prior to conducting the field surveys, Stantec contacted the Ohio Department of Natural Resources (ODNR) and the U.S. Fish and Wildlife Service (USFWS) for information regarding rare, threatened, or endangered species and their habitats of concern within the Project area and its vicinity (Appendix B – Agency Correspondence). To assess potential impacts to rare, threatened, and endangered species, Stantec scientists conducted a pedestrian reconnaissance of the proposed Project area, collected information on existing habitats within the Project area, and assessed the potential for these habitats to be used by these species.

## SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO

Results

June 11, 2021

### 3.0 Results

#### 3.1 TERRESTRIAL HABITAT

Stantec completed field surveys within the Project area on June 9, 2020, for potentially suitable habitats for threatened and endangered species. Figure 3 (Appendix A) shows the land cover, vegetation communities, and locations of any identified rare, threatened, or endangered species habitat observed within the Project area during the habitat assessment surveys. Representative photographs of the vegetation communities/habitats identified within the Project area are included in Appendix C of this report (photo locations of habitats are shown on Figure 3, Appendix A). Information regarding the vegetation communities/habitats identified within the Project area is provided in Table 1.

**Table 1. Vegetation Communities and Land Cover Found within the Salerno Station and 138 kV Line Extension Project Area, Richland County, Ohio**

Vegetation Communities and Land Cover Types within the Project Area	Degree of Human-Related Ecological Disturbance	Unique, Rare, or High Quality?	Approximate Acreage Within Project Area
Pasture	Moderate Disturbance/Ruderal Community (dominated by opportunistic invaders, planted non-native species, and/or native highly tolerant taxa). Common plant species included red clover ( <i>Trifolium pratense</i> ), white clover ( <i>Trifolium repens</i> ), tall fescue ( <i>Schedonorus arundinaceus</i> ), bladder campion ( <i>Silene latifolia</i> ), orchardgrass ( <i>Dactylis glomerata</i> ), common dandelion ( <i>Taraxacum officinale</i> ), multiflora rose ( <i>Rosa multiflora</i> ), ground ivy ( <i>Glechoma hederacea</i> ), eastern daisy fleabane ( <i>Erigeron annuus</i> ), curly dock ( <i>Rumex crispus</i> ), birdsfoot trefoil ( <i>Coronilla scorpioides</i> ), butterweed ( <i>Packera glabella</i> ), common boneset ( <i>Eupatorium perfoliatum</i> ), Canada goldenrod ( <i>Solidago canadensis</i> ), tall buttercup ( <i>Ranunculus acris</i> ), and Carolina horsenettle ( <i>Solanum carolinense</i> ).	No	9.09
Early Successional Deciduous Tree Line	Moderate Disturbance/Ruderal Community (dominated by opportunistic invaders and/or native highly tolerant taxa). Common plant species included black elderberry ( <i>Sambucus nigra</i> ), black walnut ( <i>Juglans nigra</i> ), multiflora rose, grape	No	0.32



## SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO

Results

June 11, 2021

<b>Vegetation Communities and Land Cover Types within the Project Area</b>	<b>Degree of Human-Related Ecological Disturbance</b>	<b>Unique, Rare, or High Quality?</b>	<b>Approximate Acreage Within Project Area</b>
	( <i>Vitis</i> sp.), and flowering dogwood ( <i>Cornus florida</i> ).		
Existing Roadway	Extreme Disturbance/Ruderal Community (little to no vegetation is present in these habitats).	No	0.11
<b>Total</b>			<b>9.52</b>

### 3.2 WETLANDS

Stantec completed field surveys for wetlands within the Project area on June 9, 2020. No wetlands were identified within the Project area. Two wetland determination sample points were established within the Project area. Sample point SP 01 was established in an area where hydrophytic plants were observed. SP 01 was found to have hydric soil but did not meet the hydrology or vegetation requirements to be considered a wetland. SP 02 was established in an area that appeared discolored on the aerial photograph. SP 02 was not found to contain hydric soil, hydrophytic vegetation, or wetland hydrology. Figure 2 (Appendix A) shows the locations of the sample points established by Stantec within the Project area. Representative photographs of the sample points are included in Appendix C of this report (photo locations are shown on Figure 2, Appendix A). Completed wetland determination data forms are included in Appendix D.

### 3.3 STREAMS

Stantec completed field surveys for waterbodies (streams) within the Project area on June 9, 2020. Stantec identified one intermittent stream within the Project area. No USGS named streams were found within the Project area. Figure 2 (Appendix A) shows the location of Stream 1 within the Project area. Representative photographs of the stream are included in Appendix C of this report (photo locations are shown on Figure 2, Appendix A). The completed HHEI data form for Stream 1 is included in Appendix D. Additional information regarding Stream 1 is provided in Table 2.

## SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO

Results

June 11, 2021

**Table 2. Summary of Stream Resources Found within the Salerno Station and 138 kV Line Extension Project Area, Richland County, Ohio**

Stream Name	Figure 2 Photo Location <sup>1</sup>	Receiving Waters	Stream Flow Regime <sup>2</sup>	Stream Evaluation Method	Stream Evaluation Score	Approximate OHWM Width (feet) <sup>3</sup>	Delineated Length (feet) within Project Area
Stream 1	2, 3	Clear Fork Mohican River	Intermittent	HHEI	50	3	493
<b>TOTAL</b>							<b>493</b>
<sup>1</sup> Figure 2 and Appendix C – Representative Photographs							
<sup>2</sup> Stream classification is based on Federal Register/Vol. 67, No. 10 (USACE 2002)							
<sup>3</sup> OHWM = Ordinary High Water Mark							

### 3.4 OPEN WATERS

No open waters (ponds; lakes) were delineated within the Project area during the field surveys completed on June 9, 2020.

Results  
June 11, 2021

3.5 RARE, THREATENED, OR ENDANGERED SPECIES HABITAT

Table 3. Summary of Potential Ohio State-Listed Species within the Salerno Station and 138 kV Line Extension Project Area, Richland County, Ohio

Common Name	Scientific Name	State Listing <sup>1</sup>	Known to Occur Within Richland County? <sup>2</sup>	Known Within One Mile of Project Area? <sup>3</sup>	Habitat Preference	Potential Habitat Observed in Project Area?	Impact Assessment	ODNR Comments/Recommendations
Mammals								
Indiana Bat	<i>Myotis sodalis</i>	E	Yes	No	<p>The Indiana bat is likely distributed over the entire State of Ohio, though not uniformly. This species generally forages in openings and edge habitats within upland and floodplain forest, but they also forage over old fields and pastures (Brack et al. 2010). Natural roost structures include trees (live or dead) with exfoliating bark, and exposure to solar radiation. Other important factors for roost trees include relative location to other trees, a permanent water source and foraging areas; Dead trees are preferred as maternity roosts; however, live trees are often used as secondary roosts depending on microclimate conditions (USFWS 2007; USFWS 2017). Roosts have also occasionally been found to consist of cracks and hollows in trees, utility poles, buildings, and bat boxes. Primarily use caves for hibernacula, although are also known to hibernate in abandoned underground mines (Brack et al. 2010).</p>	Yes	<p>No potential roost trees or hibernacula were observed within the Project area. However, potentially suitable summer foraging habitat was observed (early successional deciduous forest). AEP intends to avoid areas with potential summer roost habitat to the extent possible and intends to clear forested habitat between October 1 and March 31, as necessary. AEP will determine if any summer tree clearing is necessary in areas containing suitable roost habitat and will proceed accordingly.</p>	<p>If suitable habitat occurs within the Project area, ODNR recommends trees be conserved. If suitable habitat occurs within the Project area and trees must be cut, ODNR recommends cutting occur between October 1 and March 31, conserving trees with loose, shaggy bark and/or crevices, holes, or cavities, as well as trees with DBH &gt;20 if possible. If suitable trees must be cut during the summer months, ODNR recommends a net survey be conducted between June 1 and August 15, prior to any cutting. The Division of Wildlife also recommends that a desktop or field-based habitat assessment is conducted to determine if there are potential hibernaculum within the Project area.</p>
Northern Long-eared Bat	<i>Myotis septentrionalis</i>	T	Yes	No	<p>The northern long-eared bat is found throughout Ohio. This species generally forages in forested habitat and openings in forested habitat and utilizes cracks, cavities, and loose bark within live and dead trees, as well as buildings as roosting habitat (Brack et al. 2010; USFWS 2016). The species utilizes caves and abandoned mines as winter hibernacula. Various sized caves are used providing they have a constant temperature, high humidity, and little to no air current (Brack et al. 2010).</p>	Yes	<p>No potential roost trees or hibernacula were observed within the Project area. However, potentially suitable summer foraging habitat was observed (early successional deciduous forest). AEP intends to avoid areas with potential summer roost habitat to the extent possible and intends to clear forested habitat between October 1 and March 31, as necessary. AEP will determine if any summer tree clearing is necessary in areas containing suitable roost habitat and will proceed accordingly.</p>	<p>If suitable habitat occurs within the Project area, ODNR recommends trees be conserved. If suitable habitat occurs within the Project area and trees must be cut, ODNR recommends cutting occur between October 1 and March 31, conserving trees with loose, shaggy bark and/or crevices, holes, or cavities, as well as trees with DBH &gt;20 if possible. If suitable trees must be cut during the summer months, ODNR recommends a net survey be conducted between June 1 and August 15, prior to any cutting. The Division of Wildlife also recommends that a desktop or</p>

SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO

Results  
June 11, 2021

Common Name	Scientific Name	State Listing <sup>1</sup>	Known to Occur Within Richland County? <sup>2</sup>	Known Within One Mile of Project Area? <sup>3</sup>	Habitat Preference	Potential Habitat Observed in Project Area?	Impact Assessment	ODNR Comments/Recommendations
								field-based habitat assessment is conducted to determine if there are potential hibernaculum within the Project area.
Little Brown Bat	<i>Myotis lucifugus</i>	E	Yes	No	The little brown bat is found throughout Ohio. This species seems to prefer to forage over water but also forages among trees in rather open areas (Harvey et al. 1999). During summer, it typically inhabits buildings, attics, church belfries, barns and outbuildings, and occasionally more natural habitats such as sloughing bark of a dead tree. During summer, two types of roosts are utilized: day roosts and night roosts. Day roosts are the maternity colony roost, while little brown bats often roost in other areas where they rest and congregate to digest their food in between foraging bouts. In Ohio, this species typically utilizes caves and mines as hibernacula, although at least one hibernaculum was found to be located in an attic of an old building (Brack et al. 2010).	Yes	No potential hibernacula, roost trees, or other summer roosting habitats were observed within the Project area. However, potentially suitable summer foraging habitat was observed (early successional deciduous forest; pasture; streamside habitats). AEP intends to avoid areas with potential summer roost habitat to the extent possible and intends to clear forested habitat between October 1 and March 31, as necessary. AEP will determine if any summer tree clearing is necessary in areas containing suitable roost habitat and will proceed accordingly.	If suitable habitat occurs within the Project area, ODNR recommends trees be conserved. If suitable habitat occurs within the Project area and trees must be cut, ODNR recommends cutting occur between October 1 and March 31, conserving trees with loose, shaggy bark and/or crevices, holes, or cavities, as well as trees with DBH >20 if possible. If suitable trees must be cut during the summer months, ODNR recommends a net survey be conducted between June 1 and August 15, prior to any cutting. The Division of Wildlife also recommends that a desktop or field-based habitat assessment is conducted to determine if there are potential hibernaculum within the Project area.
Tri-colored Bat	<i>Perimyotis subflavus</i>	E	No	No	The tricolored bat is found throughout Ohio. This species has been found to forage above and within a variety of habitats, including woodlands, agricultural fields, grassy areas, and over streamside vegetation (Sparks et al. 2011). Maternity colonies have often been found within clusters of dead leaves, hanging in trees. Maternity colonies have also been found in or on buildings. Little is known of male tri-colored bats in summer, but it is thought that they are probably solitary and spend their days in similar situations, as well as crevices, caves and mines (Brack et al. 2010). In Ohio, this species typically utilizes caves and mines as hibernacula, utilizing a variety of situations, including very cold areas near cave entrances to deeper passages that seem to be too warm for other species of bats (Brack et al. 2010).	Yes	No potential roost trees or other roosting habitats were observed within the Project area. However, potentially suitable summer foraging habitat was observed (early successional deciduous forest; pasture; streamside habitats). AEP intends to avoid areas with potential summer roost habitat to the extent possible and intends to clear forested habitat between October 1 and March 31, as necessary. AEP will determine if any summer tree clearing is necessary in areas containing suitable roost habitat and will proceed accordingly.	If suitable habitat occurs within the Project area, ODNR recommends trees be conserved. If suitable habitat occurs within the Project area and trees must be cut, ODNR recommends cutting occur between October 1 and March 31, conserving trees with loose, shaggy bark and/or crevices, holes, or cavities, as well as trees with DBH >20 if possible. If suitable trees must be cut during the summer months, ODNR recommends a net survey be conducted between June 1 and August 15, prior to any cutting. The Division of Wildlife also recommends that a desktop or field-based habitat assessment is conducted to determine if there

**SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO**

Results  
June 11, 2021

Common Name	Scientific Name	State Listing <sup>1</sup>	Known to Occur Within Richland County? <sup>2</sup>	Known Within One Mile of Project Area? <sup>3</sup>	Habitat Preference	Potential Habitat Observed in Project Area?	Impact Assessment	ODNR Comments/Recommendations
								are potential hibernaculum within the Project area.
Black Bear	<i>Ursus americanus</i>	E	Yes	No	Black bears inhabit forests and nearby openings, including forested wetlands. When inactive, they occupy dens under fallen trees, ground-level or above-ground tree cavities or hollow logs, underground cave-like sites, or the ground surface in dense cover. Young are born in a den (NatureServe 2020).	No	No suitable habitat was observed within the Project area. Therefore, impacts to this species are not anticipated.	No comments received.
Birds								
Trumpeter Swan	<i>Cygnus buccinator</i>	T	Yes	No	Trumpeter swan habitat includes ponds, lakes, and marshes, with breeding in areas of reeds, sedges or similar emergent vegetation. The species primarily breeds in freshwater, on edges of large inland waters, typically in emergent marsh vegetation, or on a muskrat house, beaver lodge, or island (NatureServe 2020).	No	No suitable habitat was observed within the Project area. Therefore, impacts to this species are not anticipated.	If suitable habitat will be impacted, construction should be avoided in this habitat during the species' nesting period of April 15 to June 15. If this habitat will not be impacted, this Project is not likely to have an impact on this species.
Sandhill Crane	<i>Grus canadensis</i>	T	Yes	No	Sandhill crane breeding habitat includes open grasslands, marshes, marshy edges of lakes and ponds, and riverbanks. Nests are on the ground or in shallow water on open tundra, large marshes, bogs, fens, or wet forest meadows. Individuals exhibit high fidelity to breeding territories. During the nonbreeding season, sandhill cranes roost at night in shallow water along river channels, on alluvial islands of braided rivers, or in natural basin wetlands. A communal roost site consisting of an open expanse of shallow water is a key feature of wintering habitat. Feeding and resting often occur in fields and agricultural lands (NatureServe 2020).	No	No suitable habitat was observed within the Project area. Therefore, impacts to this species are not anticipated.	If grassland, prairie, or wetland habitat will be impacted, construction should be avoided in this habitat during the species' nesting period of April 1 to September 1. If this habitat will not be impacted, this Project is not likely to have an impact on this species.
Least Bittern	<i>Ixobrychus exilis</i>	T	Yes	No	Habitats vary throughout North America, but nesting usually occurs among dense, tall growths of emergent vegetation, particularly cattails, sedges, bulrush, or common reed interspersed with some woody vegetation and open, fresh water (NatureServe 2020).	No	No suitable habitat was observed within the Project area. Therefore, impacts to this species are not anticipated.	If suitable habitat will be impacted, construction should be avoided in this habitat during the species' nesting period of May 1 to July 31. If this type of habitat will not be impacted, this Project is not likely to impact this species.
Barn Owl	<i>Tyto alba</i>	T	Yes	No	Fields of dense grass. Open and partly open country such as grassland, marsh, lightly grazed pasture, and hayfields in a wide variety of situations, often around human habitation. Nests in buildings (church steeples, attics, platforms in silos and barns, wooden water tanks, duckblinds), caves, crevices on cliffs, burrows, and hollow trees, rarely in trees with dense foliage (NatureServe 2020).	No	No suitable nesting habitat was observed within the Project area. Therefore, impacts to this species are not anticipated.	No comments received.
Upland Sandpiper	<i>Bartramia longicauda</i>	E	Yes	No	Preferred habitat includes large areas of short grass for feeding and courtship with interspersed or adjacent taller grasses for nesting and brood cover. In the northeastern U.S., airfields currently provide the majority of suitable habitat, though grazed pastures and grassy fields also are used. Nests	Yes	Potentially suitable habitat was present in the Project area (pasture). However, this species is not known to occur within one mile of the Project area. Therefore, impacts to	If suitable habitat will be impacted, construction should be avoided in this habitat during the species' nesting period of April 15 to July 31. If this type of habitat will not be impacted, this

**SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO**

Results  
June 11, 2021

Common Name	Scientific Name	State Listing <sup>1</sup>	Known to Occur Within Richland County? <sup>2</sup>	Known Within One Mile of Project Area? <sup>3</sup>	Habitat Preference	Potential Habitat Observed in Project Area?	Impact Assessment	ODNR Comments/Recommendations
					on ground among grasses; sometimes along prairie sloughs (NatureServe 2020).		this species are not anticipated.	Project is not likely to impact this species.
Insects								
Lilypad Forktail	<i>Ischnura kellicotti</i>	E	Yes	No	Ranging in eastern United States, the lilypad forktail has been observed to be closely associated with lily pads (Nuphar and Nymphaea species) in ponds (WNDR 2020).	No	No suitable habitat was observed within the Project area. Therefore, impacts to this species are not anticipated.	No comments received.
Amphibians								
Eastern Hellbender	<i>Cryptobranchus alleganiensis alleganiensis</i>	E	Yes	No	The eastern hellbender is found in rocky, clear creeks and rivers, usually where there are large shelter rocks. It usually avoids water warmer than 20° C. Males prepare nests and attend eggs beneath large flat rocks or submerged logs. This salamander, considered a "habitat specialist," has adapted to fill a specific niche within a very specific environment, and is labeled as such because its success is dependent on a constancy of dissolved oxygen, temperature and flow found in swift water areas, which in turn limits it to a narrow spectrum of stream/river choices. As a result of this specialization, hellbenders are generally found in areas with large, irregularly shaped, and intermittent rocks and swiftly moving water, while they tend to avoid wider, slow-moving waters with muddy banks and/or slab rock bottoms (NatureServe 2020).	No	No suitable habitat was observed within the Project area. Therefore, impacts to this species are not anticipated.	Due to the location, and that there is no in-water work proposed in a perennial stream of sufficient size to provide suitable habitat, this Project is not likely to impact this species.
Reptiles								
Eastern Massasauga	<i>Sistrurus catenatus</i>	E	No	No	Habitats range from sphagnum bogs, fens, swamps, marshes, shrub-dominated peatlands, wet meadows, and floodplains to dry woodland; this snake prefers seasonal wetlands with a mixture of open grass-sedge areas and short closed canopy (edge situations) (NatureServe 2020).	No	No suitable habitat was observed within the Project area. Therefore, impacts to this species are not anticipated.	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.
Fish								
Iowa Darter	<i>Etheostoma exile</i>	E	Yes	No	Habitat includes clear sluggish vegetated headwaters, creeks, and small to medium rivers; weedy portions of glacial lakes, marshes, ponds; over substrates of sand, peat, and/or organic debris. This darter occurs in deeper lake waters and in stream pools when not breeding. Spawning occurs in shallow water of lake margins and quiet areas of streams; eggs are laid on submerged roots or debris, occasionally on gravel and sand (NatureServe 2020).	No	No suitable habitat was observed within the Project area. Therefore, impacts to this species are not anticipated.	The ODNR recommends that no in-water work in perennial streams from April 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 this species.
Greater Redhorse	<i>Moxostoma valenciennesi</i>	T	No	No	Typical habitat is moderate to fast-flowing, medium-sized to large rivers; sometimes occurs in river reservoirs and large lakes; prefers clear water with substrates of clean sand, gravel, or boulders. Spawning habitat is largely the same as nonspawning habitat- shallow runs with sand and gravel substrates. The habitat of the greater redhorse in Ohio is large streams with clear water throughout most of the year and	No	No suitable habitat was observed within the Project area. Therefore, impacts to this species are not anticipated.	The ODNR recommends that no in-water work in perennial streams from April 15 through June 30 to reduce impacts to indigenous aquatic species and their habitat. If no in-water work is proposed in a perennial

SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO

Results  
June 11, 2021

Common Name	Scientific Name	State Listing <sup>1</sup>	Known to Occur Within Richland County? <sup>2</sup>	Known Within One Mile of Project Area? <sup>3</sup>	Habitat Preference	Potential Habitat Observed in Project Area?	Impact Assessment	ODNR Comments/Recommendations
					bottoms of clean sand, gravel or boulders (NatureServe 2020).			stream, this Project is not likely to impact this species.
<sup>1</sup> E=Endangered; T=Threatened; SC=Species of Concern <sup>2</sup> According to Ohio Department of Natural Resources, State Listed Wildlife Species by County (ODNR 2020a). <sup>3</sup> According to Ohio Natural Heritage Program (Appendix B).								



Results  
June 11, 2021

Table 4. Summary of Potential Federally Listed Species within the Salerno Station and 138 kV Line Extension Project Area, Richland County, Ohio

Common Name	Scientific Name	Federal Listing <sup>1</sup>	Known to Richland County?	Habitat Preference	Potential Habitat Observed in Project Area?	Impact Assessment	USFWS Comments/ Recommendations
Mammals							
Indiana Bat	<i>Myotis sodalis</i>	E	Yes	The Indiana bat is likely distributed over the entire State of Ohio, though not uniformly. This species generally forages in openings and edge habitats within upland and floodplain forest, but they also forage over old fields and pastures (Brack et al. 2010). Natural roost structures include trees (live or dead) with exfoliating bark, and exposure to solar radiation. Other important factors for roost trees include relative location to other trees, a permanent water source and foraging areas; Dead trees are preferred as maternity roosts; however, live trees are often used as secondary roosts depending on microclimate conditions (USFWS 2007; USFWS 2017). Roosts have also occasionally been found to consist of cracks and hollows in trees, utility poles, buildings, and bat boxes. Primarily use caves for hibernacula, although are also known to hibernate in abandoned underground mines (Brack et al. 2010).	Yes	No potential roost trees or hibernacula were observed within the Project area. However, potentially suitable summer foraging habitat was observed (early successional deciduous forest). AEP intends to avoid areas with potential summer roost habitat to the extent possible and intends to clear forested habitat between October 1 and March 31, as necessary. AEP will determine if any summer tree clearing is necessary in areas containing suitable roost habitat and will proceed accordingly.	Should the proposed site contain trees greater than or equal to 3 inches dbh, USFWS recommends that trees be saved wherever possible. If no caves or abandoned mines are present and trees greater than 3 inches dbh cannot be avoided, USFWS recommends that removal of any trees greater than 3 inches dbh only occur between October 1 and March 31. If implementation of seasonal tree cutting is not possible, summer surveys may be conducted to document presence or probable absence of Indiana bats during the summer.
Northern Long-eared Bat	<i>Myotis septentrionalis</i>	T	Yes	The northern long-eared bat is found throughout Ohio. This species generally forages in forested habitat and openings in forested habitat and utilizes cracks, cavities, and loose bark within live and dead trees, as well as buildings as roosting habitat (Brack et al. 2010; USFWS 2016). The species utilizes caves and abandoned mines as winter hibernacula. Various sized caves are used providing they have a constant temperature, high humidity, and little to no air current (Brack et al. 2010).	Yes	No potential roost trees or hibernacula were observed within the Project area. However, potentially suitable summer foraging habitat was observed (early successional deciduous forest). AEP intends to avoid areas with potential summer roost habitat to the extent possible and intends to clear forested habitat between October 1 and March 31, as necessary. AEP will determine if any summer tree clearing is necessary in areas containing suitable roost habitat and will proceed accordingly.	Should the proposed site contain trees greater than or equal to 3 inches dbh, USFWS recommends that trees be saved wherever possible. If no caves or abandoned mines are present and trees greater than 3 inches dbh cannot be avoided, USFWS recommends that removal of any trees greater than 3 inches dbh only occur between October 1 and March 31. Incidental take of northern long-eared bats from most tree clearing is exempted by a 4(d) rule.
Reptiles							
Eastern Massasauga	<i>Sistrurus catenatus</i>	T	Yes	This snake is found in wet prairies, sedge meadows, and early successional fields. Preferred wetland habitats are marshes and fens (ODNR 2020b).	No	No suitable habitat was observed within the Project area. Therefore, impacts to this species are not anticipated.	No comments received.
<sup>1</sup> E=Endangered; T=Threatened <sup>2</sup> According to USFWS (2018).							

## **4.0 Conclusions and Recommendations**

Stantec conducted wetland and waterbody delineation field surveys and a preliminary habitat assessment for threatened and endangered species within the Project area on June 9, 2020. During the field surveys, no wetlands were identified within the Project area. One intermittent stream totaling approximately 493 linear feet in length, was delineated within the Project area. The information provided by Stantec regarding wetland and stream boundaries is based on an analysis of the wetland and upland conditions present within the Project area at the time of the fieldwork. The delineations were performed by experienced and qualified professionals using regulatory agency-accepted practices and sound professional judgment.

Table 4 provides summary information for all state-listed species known to occur within Richland County. An ODNR Ohio Natural Heritage Program (NHP) data request and environmental review request letter was sent to the ODNR Office of Real Estate on May 27, 2020. According to the ODNR response letter, dated July 22, 2020, the Project area is located within range of the following state-listed endangered and/or threatened species: Indiana bat, northern long-eared bat, little brown bat, tri-colored bat, greater redhorse, Iowa darter, eastern hellbender, eastern massasauga, least bittern, sandhill crane, trumpeter swan, and upland sandpiper.

If suitable bat roosting habitat occurs within the Project area, ODNR recommends trees be conserved. If suitable habitat occurs in the Project area and trees must be cut, ODNR recommends cutting occur between October 1 and March 31. If suitable trees must be cut during summer months, ODNR recommends a net survey be conducted between June 1 and August 15, prior to any cutting. If no tree removal is proposed, this Project is not likely to impact this species. The Division of Wildlife also recommends that a desktop or field-based habitat assessment is conducted to determine if there are potential hibernacula within the Project area. No suitable summer bat roost habitat or winter bat hibernacula were observed in the Project area during the field surveys. However, suitable summer bat foraging habitat was observed in the Project area. AEP intends to avoid areas with summer roost habitat to the extent possible. AEP will determine if any summer tree clearing is necessary in areas containing suitable roost habitat and will proceed accordingly.

The ODNR response letter states that due to the location of the Project, and the type of work proposed, this Project is not likely to impact the eastern hellbender, greater redhorse, Iowa darter, or eastern massasauga.

No suitable habitat was observed for the least bittern, sandhill crane, or trumpeter swan. Therefore, impacts to these species are not anticipated. Potentially suitable upland sandpiper nesting habitat (large areas of pasture) was observed within the Project area. However, this species is not known to occur within a one mile radius of the Project area. Therefore, impacts to the upland sandpiper are not anticipated.

The ODNR response stated there are no other records of state endangered or threatened plants or animals within the Project area. There are also no records of state potentially threatened plants, special interest or species of concern animals, or any federally listed species. In addition, we are unaware of any unique ecological sites, geologic features, animal assemblages, scenic rivers, state wildlife areas, state nature preserves, state or national parks, state or national forests, national wildlife refuges, or other protected natural areas within the Project area.

## **SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO**

### Conclusions and Recommendations

June 11, 2021

A technical assistance request letter was also submitted to the USFWS on May 27, 2020. The USFWS response letter dated June 1, 2020, recommends that project impacts to all wetland habitats (e.g., forests, streams, vernal pools) be avoided or minimized to the fullest extent possible, and that best management practices be utilized to minimize erosion and sedimentation (Appendix B).

The Project area includes potential foraging habitat for the federally endangered Indiana bat and federally threatened northern long-eared bat (USFWS; Appendix B). No suitable winter hibernacula for these species were observed in the Project area. AEP intends to avoid areas with summer roost habitat to the extent possible. AEP will determine if any summer tree clearing is necessary in areas containing suitable roost habitat and will proceed accordingly. Should the Project site contain trees  $\geq 3$  inches dbh, the USFWS recommends trees be saved whenever possible. If any caves or abandoned mines may be disturbed, further coordination is requested. If no caves or abandoned mines are present and trees  $\geq 3$  inches dbh cannot be avoided, USFWS recommends that removal of trees  $\geq 3$  inches dbh only occur between October 1 and March 31 to avoid adverse effects to this species. If implementation of seasonal tree clearing is not possible, USFWS recommends summer presence/absence surveys be conducted between June 1 and August 15.

Due to the Project type, size, and location, USFWS does not anticipate adverse effects to any other federally endangered, threatened, proposed, or candidate species.

## **SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO**

References  
June 11, 2021

### **5.0 References**

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## **SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO**

### References

June 11, 2021

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June 11, 2021

## **Appendix A Figures**

### **A.1 FIGURE 1 – PROJECT LOCATION MAP**



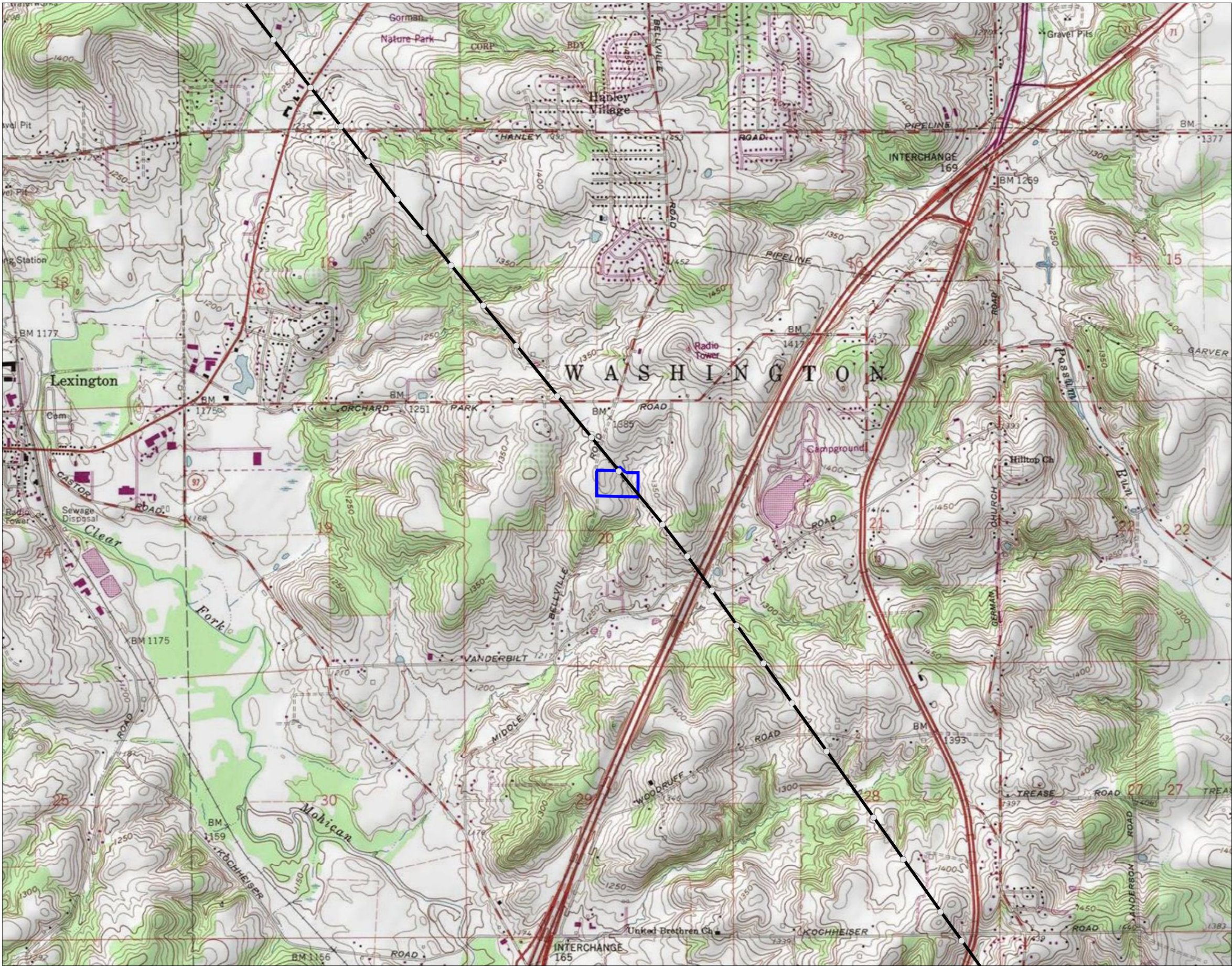


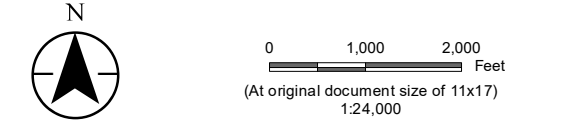
Figure No. 1  
Title  
**Project Location Map**

Client/Project  
AEP Ohio Transmission Company, Inc.  
Salerno Station and 138 kV Line Extension Project

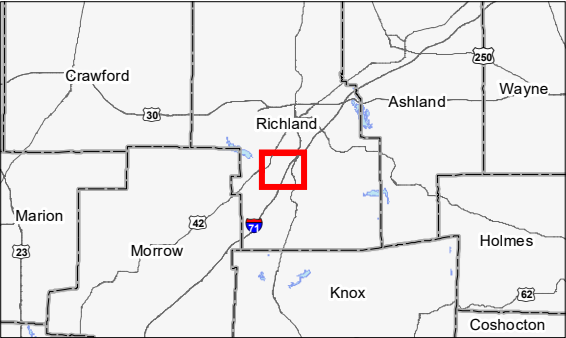
Project Location  
Richland County, Ohio

193707665

Prepared by JLH on 2021-06-11  
TR by KB on 2021-06-11  
IR by DJG on 2021-06-11



- Legend
- Existing Structure
  - Existing Transmission Line
  - Project Area



Notes  
1. Coordinate System: NAD 1983 StatePlane Ohio North FIPS 3401 Feet  
2. Data Sources: Stantec, AEP, USGS, OGRIP, NADS  
3. Background: USGS 7.5' Topographic Quadrangles - Mansfield South, OH (1983)





# **SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO**

June 11, 2021

## **A.2      FIGURE 2 – WETLAND AND WATERBODY DELINEATION MAP**

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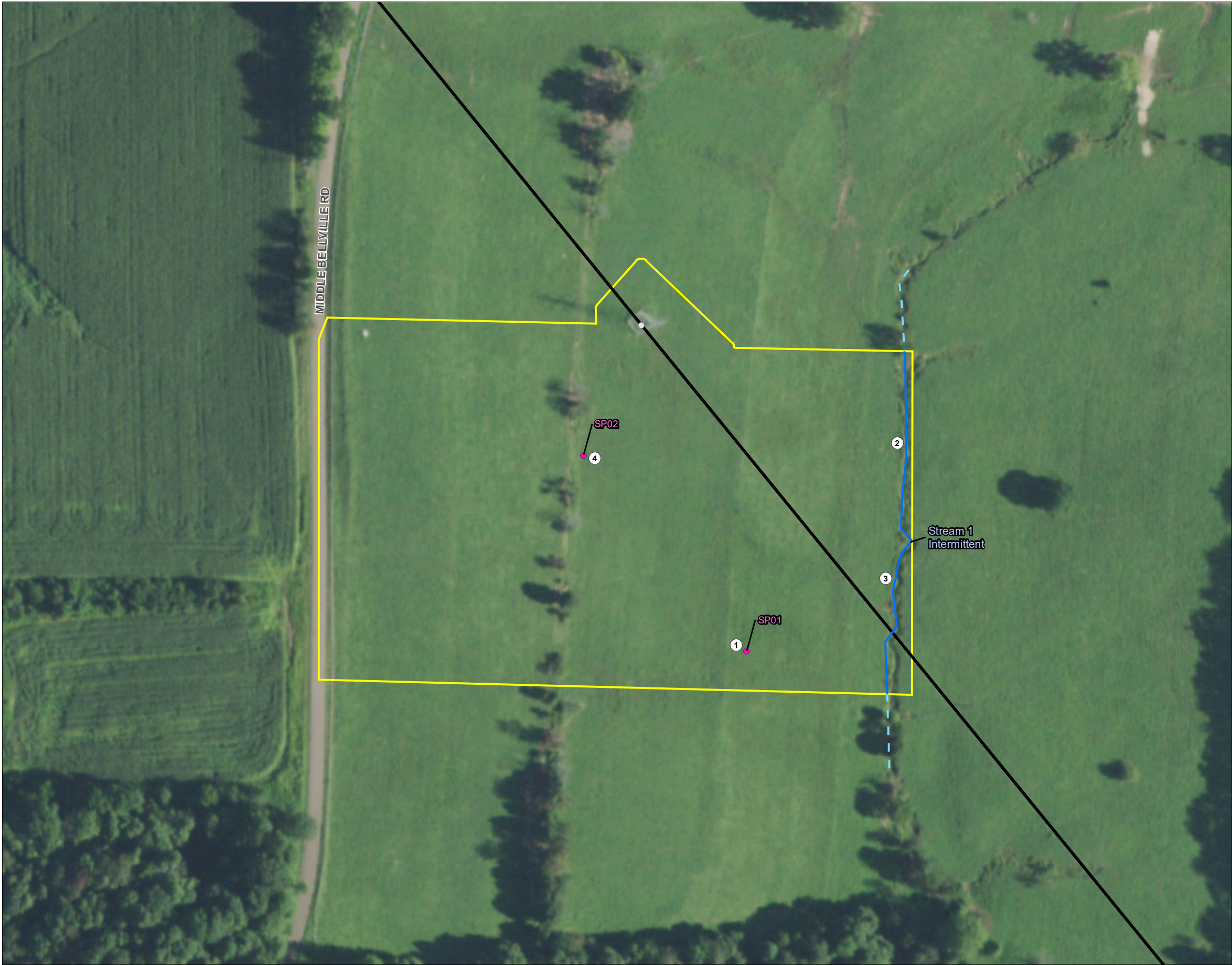


Figure No.  
**2**

Title  
**Wetland and Waterbody Delineation Map**

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Client/Project  
AEP Ohio Transmission Company, Inc.  
Salerno Station and 138 kV Line Extension Project

193707665

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Project Location  
Richland County, Ohio

Prepared by J.L.H. on 2021-06-11  
TR by K.B. on 2021-06-11  
IR by D.J.G. on 2021-06-11

N

0 75 150 Feet  
(At original document size of 11x17)  
1:1,673

Legend

- Existing Structure
- Existing Transmission Line
- Project Area
- Photo Location
- Wetland Determination Sample Point
- Field Delineated Waterway
- Approximate Waterway
- FEMA Flood Hazard Area\*
  - 100-year Floodplain
  - Floodway

\*No features within data frame

Richland

Notes

- Coordinate System: NAD 1983 StatePlane Ohio North FIPS 3401 Feet
- Data Sources: Stantec, AEP, USGS, FEMA, OGRIP, NADS
- Background: 2017 NAIP



## **SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO**

June 11, 2021

### **A.3     FIGURE 3 – HABITAT ASSESSMENT MAP**



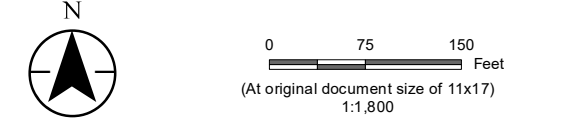
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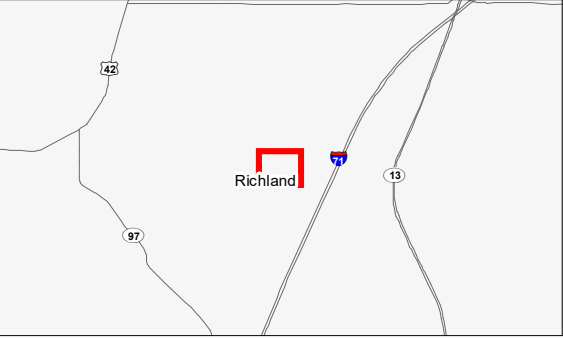
Figure No.  
**3**  
Title  
**Habitat Assessment Map**

Client/Project  
AEP Ohio Transmission Company, Inc.  
Salerno Station and 138 kV Line Extension Project  
193707665

Project Location  
Richland County, Ohio  
Prepared by J.L.H. on 2021-06-11  
TR by K.B. on 2021-06-11  
IR by D.J.G. on 2021-06-11



- Legend
- Existing Structure
  - Existing Transmission Line
  - Project Area
  - Photo Location
  - Field Delineated Waterway
  - Approximate Waterway
  - Habitat Area
    - Pasture
    - Early Successional Deciduous Forest
    - Existing Roadway



Notes  
1. Coordinate System: NAD 1983 StatePlane Ohio North FIPS 3401 Feet  
2. Data Sources: Stantec, AEP, USGS, OGRIP, NADS  
3. Background: 2017 NAIP



June 11, 2021

## **Appendix B Agency Correspondence**





# Ohio Department of Natural Resources

MIKE DeWINE, GOVERNOR

MARY MERTZ, DIRECTOR

## Office of Real Estate

*John Kessler, Chief*

2045 Morse Road – Bldg. E-2

Columbus, OH 43229

Phone: (614) 265-6621

Fax: (614) 267-4764

July 22, 2020

Dan Godec  
Stantec  
1500 Lake Shore Drive Suite 100  
Columbus OH 43204-3800

**Re:** 20-554; Salerno Station and 138 kV Line Extension Project

**Project:** The proposed project involves the construction of a new 138 kV substation (Salerno Station), and construction/extension of two 0.1-mile segments of new greenfield 138 kV transmission line within new right-of-way and remove/relocate .025 mile of the Philo Howard 138 kV transmission line.

**Location:** The proposed project is located in Washington Township, Richland County, Ohio.

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:** The Natural Heritage Database has no records at or within a one-mile radius of the project area.

A review of the Ohio Natural Heritage Database indicates there are no other records of state endangered or threatened plants or animals within the project area. There are also no records of state potentially threatened plants, special interest or species of concern animals, or any federally listed species. In addition, we are unaware of any unique ecological sites, geologic features, animal assemblages, scenic rivers, state wildlife areas, state nature preserves, state or national parks, state or national forests, national wildlife refuges, or other protected natural areas within the project area. The review was performed on the project area you specified in your request as well as an additional one-mile radius. 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. Although all types of plant communities have been surveyed, we only maintain records on the highest quality areas.

**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 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 threatened 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 species of bats predominately roost in trees behind loose, exfoliating bark, in crevices and cavities, or in the leaves. However, these species are also dependent on the forest structure surrounding roost trees. If trees are present within the project area, and trees must be cut, the DOW recommends cutting 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 DBH  $\geq 20$  if possible. If trees are present within the project area, and trees must be cut during the summer months, the DOW recommends a mist net survey or acoustic survey be conducted from June 1 through August 15, prior to any cutting. Mist net and acoustic surveys should be conducted in accordance with the most recent version of the “OHIO DIVISION OF WILDLIFE GUIDANCE FOR BAT SURVEYS AND TREE CLEARING”. If state listed bats are documented, DOW recommends cutting only occur from October 1 through March 31, however, limited summer tree cutting may be acceptable after consultation with DOW (contact Sarah Stankavich, [sarah.stankavich@dnr.state.oh.us](mailto:sarah.stankavich@dnr.state.oh.us)).

The DOW also recommends that a desktop or field-based habitat assessment is conducted to determine if there are potential hibernaculum(a) present within the project area. Habitat assessments should be conducted in accordance with the current USFWS “Range-wide Indiana Bat Survey Guidelines” and submitted to Sarah Stankavich, [sarah.stankavich@dnr.state.oh.us](mailto:sarah.stankavich@dnr.state.oh.us) if potential hibernacula are present within .25 miles of the project area. If a potential hibernaculum is found, the DOW recommends a 0.25-mile tree cutting and subsurface disturbance buffer around the hibernaculum entrance, however, limited summer or winter tree cutting may be acceptable after consultation with DOW. If no tree cutting or subsurface impacts to a hibernaculum are proposed, this project is not likely to impact these species.

The project is within the range of the Iowa darter (*Etheostoma exile*), a state endangered fish, and the greater redhorse (*Moxostoma valenciennesi*), a state threatened fish. The DOW recommends no in-water work in perennial streams from April 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 eastern hellbender (*Cryptobranchus alleganiensis alleganiensis*), a state endangered species and a federal species of concern. Due to the location, and that there is no in-water work proposed in a perennial stream of sufficient size to provide suitable habitat, this project is not likely to impact this species.

The project is within the range of the eastern massasauga (*Sistrurus catenatus*), a state endangered and federally threatened snake species. The eastern massasauga uses a range of habitats including wet prairies, fens, and other wetlands, as well as drier upland habitat. 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 least bittern (*Ixobrychus exilis*), a state threatened bird. This secretive marsh species prefers dense emergent wetlands with thick stands of cattails, sedges, sawgrass or other semiaquatic vegetation interspersed with woody vegetation and open water. If this type of habitat will be impacted, construction should be avoided in this habitat during the species' nesting period of May 1 to July 31. If this type of habitat will not be impacted, this project is not likely to impact this species.

The project is within the range of the sandhill crane (*Grus canadensis*), a state threatened species. Sandhill cranes are primarily a wetland-dependent species. On their wintering grounds, they will utilize agricultural fields; however, they roost in shallow, standing water or moist bottomlands. On breeding grounds, they require a rather large tract of wet meadow, shallow marsh, or bog for nesting. If grassland, prairie, or wetland habitat will be impacted, construction should be avoided in this habitat during the species' nesting period of April 1 to September 1. If this habitat will not be impacted, this project is not likely to have an impact on this species.

The project is within the range of the trumpeter swan (*Cygnus buccinator*), a state threatened bird. Trumpeter swans prefer large marshes and lakes ranging in size from 40 to 150 acres. They like shallow wetlands one to three feet deep with a diverse mix of plenty of emergent and submergent vegetation and open water. If this type of habitat will be impacted, construction should be avoided in this habitat during the species' nesting period of April 15 to June 15. If this habitat will not be impacted, this project is not likely to have an impact on this species.

The project is within the range of the upland sandpiper (*Bartramia longicauda*), a state endangered bird. Nesting upland sandpipers utilize dry grasslands including native grasslands, seeded grasslands, grazed and ungrazed pasture, hayfields, and grasslands established through the Conservation Reserve Program (CRP). If this type of habitat will be impacted, construction should be avoided in this habitat during the species' nesting period of April 15 to July 31. If this type of habitat will not be impacted, this project is not likely to impact this species.

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

**Water Resources:** The Division of Water Resources has the following comment.

The local floodplain administrator should be contacted concerning the possible need for any floodplain permits or approvals for this project. Your local floodplain administrator contact information can be found at the website below.

[http://water.ohiodnr.gov/portals/soilwater/pdf/floodplain/Floodplain%20Manager%20Community%20Contact%20List\\_8\\_16.pdf](http://water.ohiodnr.gov/portals/soilwater/pdf/floodplain/Floodplain%20Manager%20Community%20Contact%20List_8_16.pdf)

ODNR appreciates the opportunity to provide these comments. Please contact Sarah Tebbe, Environmental Specialist, at (614) 265-6397 or [Sarah.Tebbe@dnr.state.oh.us](mailto:Sarah.Tebbe@dnr.state.oh.us) if you have questions about these comments or need additional information.

Mike Pettegrew  
Environmental Services Administrator (Acting)





## OHIO DIVISION OF WILDLIFE GUIDANCE FOR BAT SURVEYS AND TREE CLEARING JUNE 2020

### Agency Contacts:

**ODNR-DOW Permit Coordinator:** Wildlife.Permits@dnr.state.oh.us, (614) 265-6315

**ODNR-DOW Bat Survey Coordinator:** Sarah Stankavich, sarah.stankavich@dnr.state.oh.us, (614) 265-6764

Due to the evolving situation with COVID-19, we are temporarily suspending bat-handling activities until more is known about the risk to North American bats. This document has been updated with new state guidance for the 2020 field season only, or until bat-handling activities are reinstated. These guidelines replace previous guidelines released in March 2020.

*This guidance applies to state recommendations only. Contact the USFWS to determine if federal consultation is also necessary to comply with federal law.*

### Ohio Mist Net Surveys:

Mist-netting for presence/absence surveys, education events, or research activities will not be authorized for the 2020 season.

### Ohio Acoustic Surveys:

Acoustic bat surveys for presence/absence will be accepted by ODNR for the 2020 season. Surveys should follow guidelines laid out in the USFWS Range-wide Indiana Bat Survey Guidelines (March 2020) with the following exceptions:

- Ohio survey dates are June 1 – August 15, 2020
- After conducting automated analyses using one or more of the currently available ‘approved’ acoustic bat ID programs<sup>1</sup>, qualitative analysis (i.e., manual vetting) of any calls recorded from state-endangered species (*Myotis sodalis*, *M. septentrionalis*<sup>2</sup>, *M. lucifugus*<sup>2</sup>, and *Perimyotis subflavus*<sup>2</sup>) must be completed.
  - At a minimum, for each detector site/night a program considered presence of state-listed bats likely, review all files (including no IDs) from that site/night. If more than one acoustic bat ID program is used, qualitative analysis must also include a comparison of the results of each program by site and night.

### During Field Season:

- **Prior to initiation of field work (a minimum of two weeks in advance)**, permittees must provide proposed survey plans to ODNR-DOW via e-mail. **Plans must be reviewed and approved by ODNR-DOW before ANY surveys take place.** Study plans must specify objectives, location details, dates of proposed work, and all other relevant details.

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<sup>1</sup> <https://www.fws.gov/midwest/Endangered/mammals/inba/surveys/inbaAcousticSoftware.html>

<sup>2</sup> State listing as endangered effective July 1, 2020

**After Field Season:**

- By March 15, you must submit your final ODNR-DOW report(s) from the previous summer. You are not required to fill out the ODNR-DOW Wildlife Diversity Bat Excel Spreadsheet; instead, please forward your USFWS Midwestern US Spreadsheet (found here: <http://www.fws.gov/midwest/endangered/mammals/inba/inbasummersurveyguidance.html>) to the ODNR-DOW Bat Survey Coordinator and ODNR-DOW Permit Coordinator and include your state permit number along with an electronic copy of the project report. Electronic summaries emailed during the field season are NOT considered as full compliance of this reporting requirement.

## **Ohio Environmental Review Recommendations for projects involving disturbance near potential/known bat hibernacula (cliffs, caves, mines) or tree cutting:**

**Step 1:** Coordinate with Ohio Division of Wildlife (DOW) regarding existing records for state-listed endangered bat summer and/or winter occurrence information.

If project site contains a known bat hibernaculum(a) –

- For state-listed endangered species other than the Indiana bat, a recommendation of 0.25-mile tree cutting buffer around all known entrances to protect existing conditions at the hibernaculum(a). If the project involves subsurface disturbance, consultation with DOW is required.
- Limited summer and winter tree cutting may be permitted within the buffer following guidelines detailed below. Coordinate with DOW before cutting.

If a project site does not contain known bat hibernaculum(a)

- Conduct a habitat assessment (desktop or field-based, using methods detailed in current USFWS Range-wide Indiana Bat Guidelines) to determine if a potential hibernaculum(a) is present within the action area.

**Step 2:** When conducted, a presence/absence survey must follow current DOW guidelines.

**Step 3:** If a state-listed endangered bat is captured or recorded during the survey:

- Recommendation of no summer tree cutting, or limited cutting following guidelines detailed below, within 5 miles of the capture site if a roost is not located.
- Recommendation of no summer tree cutting, or limited cutting following guidelines detailed below, within 2.5 miles of a roost tree if located.

If no state-listed endangered bat is captured or recorded during the survey:

- Summer tree cutting may proceed for 5 years before a new survey is needed under state guidance.

**Limited summer tree cutting guidance for bats that are only state-listed endangered:** Limited tree cutting in summer may be permitted after consultation with DOW, but clearing trees with the following characteristics should be avoided unless they pose a hazard: dead or live trees of any size with loose, shaggy bark; crevices, holes, or cavities; live trees of any species with DBH  $\geq$  20.

## **FREQUENTLY ASKED QUESTIONS**

### **When does the Bat Survey protocol have to be used?**

This protocol should be used anytime Indiana bat, northern long-eared bat, little brown bat, or tricolored bat summer presence/probable absence surveys are conducted in the state of Ohio. For 2020 only, acoustic surveys will meet the ODNR-DOW requirements unless new guidance allowing for the handling of bats during presence/absence surveys is released from USFWS.

### **How many net surveys are required for presence/probably absence?**

As described in the current USFWS Range-wide Indiana Bat Guidelines: Linear projects: a minimum of 2 detector nights per km (0.6 miles) of suitable summer habitat

Non-linear projects: a minimum of 8 detector nights per 123 acres (0.5 km<sup>2</sup>) of suitable summer habitat. At least 2 detector locations per 123 acre "site" shall be sampled until at least 8 detector nights has been completed over the course of at least 2 calendar nights (may be consecutive). For example:

- 4 detectors for 2 nights each (can sample the same location or move within the site)
- 2 detectors for 4 nights each (can sample the same location or move within the site)
- 1 detector for 8 nights (must sample at least 2 locations and move within the site)

### **How long are the results of the surveys valid for an assessment of an area?**

Mist-net or acoustic surveys documenting probable absence of state-listed endangered bats are valid for five years.

### **When can acoustic surveys occur in Ohio?**

In Ohio, acoustic surveys may only be conducted from June 1 through August 15 unless indicated otherwise in your state permit. Any surveys outside of the June 1 - August 15 timeframe cannot be used in Ohio to assess the presence/probable absence of state-listed bats.

### **Can a presence/probable absence survey be conducted within a known Indiana bat and/or northern long-eared bat capture/detection buffer?**

Surveys generally cannot be used to document presence/probable absence of state-listed endangered bats where presence of the species has already been confirmed by prior surveys.

### **What if a project is proposing to clear trees between April 1 and September 30 when bats may be present but no bat records exist in the project area?**

Any Ohio project that is not within a known bat record buffer, and tree clearing between April 1 and September 31 is being proposed, may have a presence/absence survey conducted between June 1 and August 15 following the range-wide guidance. If a presence/absence survey is not performed, presence of listed bats is assumed.

### **How does take of northern long-eared bats differ from Indiana bats?**

Under Ohio law, there is no exemption for take of any listed bat species.

**From:** [Ohio, FW3](#)  
**To:** [Godec, Daniel](#)  
**Cc:** [nathan.reardon@dnr.state.oh.us](mailto:nathan.reardon@dnr.state.oh.us); [Parsons, Kate](#)  
**Subject:** AEP Stalerno Station and 138kV Line Extension, Richland County  
**Date:** Monday, June 1, 2020 7:45:12 PM  
**Attachments:** [Letterhead for Emails 2.jpg](#)  
[Patrice Sign Small.jpg](#)

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TAILS# 03E15000-2020-TA-1525

Dear Mr. Godec,

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 threatened 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  $\geq 3$  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. Northern long-eared bats have also been observed roosting in human-made structures, such as buildings, barns, bridges, 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 Tree Clearing for Federally Listed Bat Species:** Should the proposed project site contain trees  $\geq 3$  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  $\geq 3$  inches dbh cannot be avoided, we recommend removal of any trees  $\geq 3$  inches dbh only occur between October 1 and March 31. Seasonal clearing is recommended to avoid adverse effects to Indiana bats and northern long-eared bats. While incidental take of northern long-eared bats from most tree clearing is exempted by a 4(d) rule (see <http://www.fws.gov/midwest/endangered/mammals/nleb/index.html>), incidental take of Indiana bats is still prohibited without a project-specific exemption. Thus, seasonal clearing is recommended where Indiana bats are assumed present.

If implementation of this seasonal tree cutting recommendation is not possible, a summer presence/absence survey may be conducted for Indiana bats. If Indiana bats are not detected during the survey, then tree clearing may occur at any time of the year. Surveys must be

conducted by an approved surveyor and be designed and conducted in coordination with the Ohio Field Office. Surveyors must have a valid federal permit. Please note that in Ohio summer mist net surveys may only be conducted between June 1 and August 15.

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.

Stream and Wetland Avoidance: Over 90% of the wetlands in Ohio have been drained, filled, or modified by human activities, thus it is important to conserve the functions and values of the remaining wetlands in Ohio ([https://epa.ohio.gov/portals/47/facts/ohio\\_wetlands.pdf](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, Acting Environmental Services Administrator, at (614) 265-6387 or at [mike.pettegrew@dnr.state.oh.us](mailto:mike.pettegrew@dnr.state.oh.us).

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](mailto:ohio@fws.gov).

Sincerely,



Patrice Ashfield  
Field Office Supervisor

cc: Nathan Reardon, ODNR-DOW  
Kate Parsons, ODNR-DOW

June 11, 2021

## **Appendix C Representative Photographs**

### **C.1 WETLAND AND WATERBODY PHOTOGRAPHS**





Photo Location 1. View of pasture habitat at non-jurisdictional sample point SP 1. Photograph taken facing south.



Photo Location 1. View of pasture habitat at non-jurisdictional sample point SP 1. Photograph taken facing east.





Photo Location 1. View of soil sample pit at non-jurisdictional sample point SP 1.



Photo Location 2. View of Stream 1. Photograph taken facing upstream/north.





Photo Location 2. View of Stream 1. Photograph taken facing downstream/south.



Photo Location 2. View of substrates of Stream 1.



AEP Ohio Transmission Company, Inc.  
Salerno Station and 138 kV Line Extension Project  
Richland County, Ohio



Photo Location 3. View of Stream 1. Photograph taken facing upstream/north.



Photo Location 3. View of Stream 1. Photograph taken facing downstream/south.





Photo Location 3. View of substrates of Stream 1.



Photo Location 4. View of pasture habitat at non-jurisdictional sample point SP 2. Photograph taken facing west.





Photo Location 4. View of pasture habitat at non-jurisdictional sample point SP 2. Photograph taken facing north.



Photo Location 4. View of soil sample pit at non-jurisdictional sample point SP 2.

## **SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO**

June 11, 2021

### **C.2 HABITAT PHOTOGRAPHS**



AEP Ohio Transmission Company, Inc.  
Salerno Station and 138 kV Line Extension Project  
Richland County, Ohio



Photo Location 1. Representative view of pasture habitat. Photograph taken facing north.



Photo Location 2. Representative view of early successional deciduous tree line. Photograph taken facing north.



AEP Ohio Transmission Company, Inc.  
Salerno Station and 138 kV Line Extension Project  
Richland County, Ohio



Photo Location 3. Representative view of pasture habitat. Photograph taken facing south.



Photo Location 4. Representative view of pasture habitat. Photograph taken facing east.

June 11, 2021

## **Appendix D Data Forms**

### **D.1 WETLAND DETERMINATION DATA FORMS**

# WETLAND DETERMINATION DATA FORM – Northcentral and Northeast Region

Project/Site: Salerno Station and 138 kV Line Extension Project City/County: Lexington/Richland County Sampling Date: 6/9/2020  
 Applicant/Owner: AEP Ohio Transmission Company, Inc. State: OH Sampling Point: SP01  
 Investigator(s): Kate Bomar, Charlie Allen Section, Township, Range: S20 T20N R18W

Landform (hillside, terrace, etc.): hillside Local relief (concave, convex, none): None Slope %: 3%

Subregion (LRR or MLRA): LRR R, MLRA 139 Lat: 40.676093 Long: -82.537992 Datum: NAD 83

Soil Map Unit Name: LvD- Loudonville silt loam, 12-18% slopes NWI classification: UPL

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>    </u> No <u>X</u>	<b>Is the Sampled Area within a Wetland?</b> Yes <u>    </u> No <u>X</u> If yes, optional Wetland Site ID: <u>    </u>
Hydric Soil Present? Yes <u>X</u> No <u>    </u>	
Wetland Hydrology Present? Yes <u>    </u> No <u>X</u>	
Remarks: (Explain alternative procedures here or in a separate report.) Sedges on hillslope with cattle disturbance	

## HYDROLOGY

<b>Wetland Hydrology Indicators:</b> <u>Primary Indicators (minimum of one is required; check all that apply)</u> <u>    </u> Surface Water (A1) <u>    </u> Water-Stained Leaves (B9) <u>    </u> High Water Table (A2) <u>    </u> Aquatic Fauna (B13) <u>    </u> Saturation (A3) <u>    </u> Marl Deposits (B15) <u>    </u> Water Marks (B1) <u>    </u> Hydrogen Sulfide Odor (C1) <u>    </u> Sediment Deposits (B2) <u>    </u> Oxidized Rhizospheres on Living Roots (C3) <u>    </u> Drift Deposits (B3) <u>    </u> Presence of Reduced Iron (C4) <u>    </u> Algal Mat or Crust (B4) <u>    </u> Recent Iron Reduction in Tilled Soils (C6) <u>    </u> Iron Deposits (B5) <u>    </u> Thin Muck Surface (C7) <u>    </u> Inundation Visible on Aerial Imagery (B7) <u>    </u> Other (Explain in Remarks) <u>    </u> Sparsely Vegetated Concave Surface (B8)		<u>Secondary Indicators (minimum of two required)</u> <u>    </u> Surface Soil Cracks (B6) <u>    </u> Drainage Patterns (B10) <u>    </u> Moss Trim Lines (B16) <u>    </u> Dry-Season Water Table (C2) <u>    </u> Crayfish Burrows (C8) <u>    </u> Saturation Visible on Aerial Imagery (C9) <u>    </u> Stunted or Stressed Plants (D1) <u>    </u> Geomorphic Position (D2) <u>    </u> Shallow Aquitard (D3) <u>    </u> Microtopographic Relief (D4) <u>X</u> FAC-Neutral Test (D5)
<b>Field Observations:</b> Surface Water Present? Yes <u>    </u> No <u>X</u> Depth (inches): <u>    </u> Water Table Present? Yes <u>    </u> No <u>X</u> Depth (inches): <u>    </u> Saturation Present? Yes <u>    </u> No <u>X</u> Depth (inches): <u>    </u> (includes capillary fringe)		<b>Wetland Hydrology Present?</b> Yes <u>    </u> No <u>X</u>
Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:		
Remarks:		

**VEGETATION** – Use scientific names of plants.

 Sampling Point: SP01

Tree Stratum (Plot size: <u>15</u> )	Absolute % Cover	Dominant Species?	Indicator Status																	
1. _____	_____	_____	_____	<b>Dominance Test worksheet:</b>  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>50.0%</u> (A/B)																
2. _____	_____	_____	_____																	
3. _____	_____	_____	_____																	
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=Total Cover				<b>Prevalence Index worksheet:</b>  <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>15</u></td> <td>x 1 = <u>15</u></td> </tr> <tr> <td>FACW species <u>25</u></td> <td>x 2 = <u>50</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0</u></td> </tr> <tr> <td>FACU species <u>60</u></td> <td>x 4 = <u>240</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0</u></td> </tr> <tr> <td>Column Totals: <u>100</u> (A)</td> <td><u>305</u> (B)</td> </tr> <tr> <td colspan="2" style="text-align: center;">Prevalence Index = B/A = <u>3.05</u></td> </tr> </table>	Total % Cover of:	Multiply by:	OBL species <u>15</u>	x 1 = <u>15</u>	FACW species <u>25</u>	x 2 = <u>50</u>	FAC species <u>0</u>	x 3 = <u>0</u>	FACU species <u>60</u>	x 4 = <u>240</u>	UPL species <u>0</u>	x 5 = <u>0</u>	Column Totals: <u>100</u> (A)	<u>305</u> (B)	Prevalence Index = B/A = <u>3.05</u>	
Total % Cover of:	Multiply by:																			
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Sapling/Shrub Stratum (Plot size: <u>30</u> )																				
1. _____	_____	_____	_____																	
2. _____	_____	_____	_____																	
3. _____	_____	_____	_____																	
4. _____	_____	_____	_____																	
5. _____	_____	_____	_____																	
6. _____	_____	_____	_____																	
7. _____	_____	_____	_____																	
=Total Cover																				
Herb Stratum (Plot size: <u>5</u> )																				
1. <u>Agrostis gigantea</u>	<u>25</u>	<u>Yes</u>	<u>FACW</u>	<b>Hydrophytic Vegetation Indicators:</b> <u>1</u> - Rapid Test for Hydrophytic Vegetation <u>2</u> - Dominance Test is >50% <u>3</u> - Prevalence Index is ≤3.0 <sup>1</sup> <u>4</u> - Morphological Adaptations <sup>1</sup> (Provide supporting data in Remarks or on a separate sheet) <u>  </u> Problematic Hydrophytic Vegetation <sup>1</sup> (Explain) <sup>1</sup> Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.																
2. <u>Schedonorus arundinaceus</u>	<u>60</u>	<u>Yes</u>	<u>FACU</u>																	
3. <u>Carex stipata</u>	<u>15</u>	<u>No</u>	<u>OBL</u>																	
4. _____	_____	_____	_____																	
5. _____	_____	_____	_____																	
6. _____	_____	_____	_____																	
7. _____	_____	_____	_____																	
8. _____	_____	_____	_____																	
9. _____	_____	_____	_____																	
10. _____	_____	_____	_____																	
11. _____	_____	_____	_____																	
12. _____	_____	_____	_____																	
100 =Total Cover																				
Woody Vine Stratum (Plot size: <u>15</u> )																				
1. _____	_____	_____	_____																	
2. _____	_____	_____	_____																	
3. _____	_____	_____	_____																	
4. _____	_____	_____	_____																	
=Total Cover																				
Remarks: (Include photo numbers here or on a separate sheet.)																				

## SOIL

Sampling Point SP01

[illegible]

# WETLAND DETERMINATION DATA FORM – Northcentral and Northeast Region

Project/Site: Salerno Station and 138 kV Line Extension Project City/County: Lexington/Richland County Sampling Date: 6/9/2020  
 Applicant/Owner: AEP Ohio Transmission Company, Inc. State: OH Sampling Point: SP02  
 Investigator(s): Kate Bomar, Charlie Allen Section, Township, Range: S20 T20N R18W

Landform (hillside, terrace, etc.): hillside Local relief (concave, convex, none): None Slope %: 3%

Subregion (LRR or MLRA): LRR R, MLRA 139 Lat: 40.676836 Long: -82.538808 Datum: NAD 83

Soil Map Unit Name: LvD- Loudonville silt loam, 12-18% slopes NWI classification: UPL

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>    </u> No <u>X</u>	<b>Is the Sampled Area within a Wetland?</b> Yes <u>    </u> No <u>X</u> If yes, optional Wetland Site ID: <u>    </u>
Hydric Soil Present? Yes <u>    </u> No <u>X</u>	
Wetland Hydrology Present? Yes <u>    </u> No <u>X</u>	
Remarks: (Explain alternative procedures here or in a separate report.) Slight discoloration on aerial imagery	

## HYDROLOGY

<b>Wetland Hydrology Indicators:</b> <u>Primary Indicators (minimum of one is required; check all that apply)</u> <u>    </u> Surface Water (A1) <u>    </u> Water-Stained Leaves (B9) <u>    </u> High Water Table (A2) <u>    </u> Aquatic Fauna (B13) <u>    </u> Saturation (A3) <u>    </u> Marl Deposits (B15) <u>    </u> Water Marks (B1) <u>    </u> Hydrogen Sulfide Odor (C1) <u>    </u> Sediment Deposits (B2) <u>    </u> Oxidized Rhizospheres on Living Roots (C3) <u>    </u> Drift Deposits (B3) <u>    </u> Presence of Reduced Iron (C4) <u>    </u> Algal Mat or Crust (B4) <u>    </u> Recent Iron Reduction in Tilled Soils (C6) <u>    </u> Iron Deposits (B5) <u>    </u> Thin Muck Surface (C7) <u>    </u> Inundation Visible on Aerial Imagery (B7) <u>    </u> Other (Explain in Remarks) <u>    </u> Sparsely Vegetated Concave Surface (B8)		<u>Secondary Indicators (minimum of two required)</u> <u>    </u> Surface Soil Cracks (B6) <u>    </u> Drainage Patterns (B10) <u>    </u> Moss Trim Lines (B16) <u>    </u> Dry-Season Water Table (C2) <u>    </u> Crayfish Burrows (C8) <u>    </u> Saturation Visible on Aerial Imagery (C9) <u>    </u> Stunted or Stressed Plants (D1) <u>    </u> Geomorphic Position (D2) <u>    </u> Shallow Aquitard (D3) <u>    </u> Microtopographic Relief (D4) <u>    </u> FAC-Neutral Test (D5)
<b>Field Observations:</b> Surface Water Present? Yes <u>    </u> No <u>X</u> Depth (inches): <u>    </u> Water Table Present? Yes <u>    </u> No <u>X</u> Depth (inches): <u>    </u> Saturation Present? Yes <u>    </u> No <u>X</u> Depth (inches): <u>    </u> (includes capillary fringe)	<b>Wetland Hydrology Present?</b> Yes <u>    </u> No <u>X</u>	
Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:		
Remarks:		



**VEGETATION** – Use scientific names of plants.

 Sampling Point: SP02

Tree Stratum (Plot size: <u>15</u> )	Absolute % Cover	Dominant Species?	Indicator Status																	
1. _____	_____	_____	_____	<b>Dominance Test worksheet:</b>  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	<b>Prevalence Index worksheet:</b>  <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</u></td> </tr> <tr> <td>FACW species <u>5</u></td> <td>x 2 = <u>10</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0</u></td> </tr> <tr> <td>FACU species <u>95</u></td> <td>x 4 = <u>380</u></td> </tr> <tr> <td>UPL species <u>0</u></td> <td>x 5 = <u>0</u></td> </tr> <tr> <td>Column Totals: <u>100</u> (A)</td> <td><u>390</u> (B)</td> </tr> <tr> <td colspan="2" style="text-align: center;">Prevalence Index = B/A = <u>3.90</u></td> </tr> </table>	Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0</u>	FACW species <u>5</u>	x 2 = <u>10</u>	FAC species <u>0</u>	x 3 = <u>0</u>	FACU species <u>95</u>	x 4 = <u>380</u>	UPL species <u>0</u>	x 5 = <u>0</u>	Column Totals: <u>100</u> (A)	<u>390</u> (B)	Prevalence Index = B/A = <u>3.90</u>	
Total % Cover of:	Multiply by:																			
OBL species <u>0</u>	x 1 = <u>0</u>																			
FACW species <u>5</u>	x 2 = <u>10</u>																			
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UPL species <u>0</u>	x 5 = <u>0</u>																			
Column Totals: <u>100</u> (A)	<u>390</u> (B)																			
Prevalence Index = B/A = <u>3.90</u>																				
			=Total Cover																	
Sapling/Shrub Stratum (Plot size: <u>30</u> )																				
1. _____	_____	_____	_____																	
2. _____	_____	_____	_____																	
3. _____	_____	_____	_____																	
4. _____	_____	_____	_____																	
5. _____	_____	_____	_____																	
6. _____	_____	_____	_____																	
7. _____	_____	_____	_____																	
			=Total Cover																	
Herb Stratum (Plot size: <u>5</u> )																				
1. <u>Schedonorus arundinaceus</u>	<u>75</u>	<u>Yes</u>	<u>FACU</u>	<b>Hydrophytic Vegetation Indicators:</b> <u>1</u> - Rapid Test for Hydrophytic Vegetation <u>2</u> - Dominance Test is >50% <u>3</u> - Prevalence Index is ≤3.0 <sup>1</sup> <u>4</u> - Morphological Adaptations <sup>1</sup> (Provide supporting data in Remarks or on a separate sheet) <u>  </u> Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)  <sup>1</sup> Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.																
2. <u>Trifolium pratense</u>	<u>10</u>	<u>No</u>	<u>FACU</u>																	
3. <u>Plantago lanceolata</u>	<u>5</u>	<u>No</u>	<u>FACU</u>																	
4. <u>Trifolium hybridum</u>	<u>5</u>	<u>No</u>	<u>FACU</u>																	
5. <u>Packera glabella</u>	<u>5</u>	<u>No</u>	<u>FACW</u>																	
6. _____	_____	_____	_____																	
7. _____	_____	_____	_____																	
8. _____	_____	_____	_____																	
9. _____	_____	_____	_____																	
10. _____	_____	_____	_____																	
11. _____	_____	_____	_____																	
12. _____	_____	_____	_____																	
			<u>100</u> =Total Cover																	
Woody Vine Stratum (Plot size: <u>15</u> )																				
1. _____	_____	_____	_____																	
2. _____	_____	_____	_____																	
3. _____	_____	_____	_____																	
4. _____	_____	_____	_____																	
			=Total Cover																	
Remarks: (Include photo numbers here or on a separate sheet.)																				

## SOIL

Sampling Point      SP02

[illegible]

## **SALERNO STATION AND 138 KV LINE EXTENSION PROJECT, RICHLAND COUNTY, OHIO**

June 11, 2021

### **D.2 HHEI DATA FORM**



## Primary Headwater Habitat Field Evaluation Form

HHEI Score (sum of metrics 1+2+3)

50

SITE NAME/LOCATION Stream 1 / Salerno Station and 138 kV Line Extension Project / Richland Co.  
 SITE NUMBER Stream 1 RIVER BASIN Muskingum RIVER CODE        DRAINAGE AREA (m<sup>2</sup>) 0.01 mi<sup>2</sup>  
 LENGTH OF STREAM REACH (ft) 200 LAT 40.16710651°N LONG 82.537242°W RIVER MILE         
 DATE 11/9/20 SCORER KLB COMMENTS       

NOTE: Complete All Items On This Form - Refer to "Field Evaluation Manual for Ohio's PWH Streams" for Instructions

STREAM CHANNEL MODIFICATIONS: ☐ NONE / NATURAL CHANNEL ☐ RECOVERED ☐ RECOVERING ☐ RECENT OR NO RECOVERY

<b>1. SUBSTRATE</b> (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.				<b>HHEI Metric Points</b> Substrate Max = 40 <div style="border: 1px solid black; padding: 5px; width: 40px; text-align: center;">15</div>																																									
<table border="0"> <tr> <th>TYPE</th> <th></th> <th>PERCENT</th> <th>TYPE</th> <th></th> <th>PERCENT</th> </tr> <tr> <td><input type="checkbox"/> BDLR SLABS [16 pts]</td> <td></td> <td></td> <td><input checked="" type="checkbox"/> SILT [3 pt]</td> <td></td> <td>30</td> </tr> <tr> <td><input type="checkbox"/> BOULDER (&gt;256 mm) [16 pts]</td> <td></td> <td></td> <td><input type="checkbox"/> LEAF PACK/WOODY DEBRIS [3 pts]</td> <td></td> <td></td> </tr> <tr> <td><input type="checkbox"/> BEDROCK [16 pts]</td> <td></td> <td></td> <td><input type="checkbox"/> FINE DETRITUS [3 pts]</td> <td></td> <td></td> </tr> <tr> <td><input type="checkbox"/> COBBLE (65-256 mm) [12 pts]</td> <td></td> <td>5</td> <td><input type="checkbox"/> CLAY or HARDPAN [0 pt]</td> <td></td> <td></td> </tr> <tr> <td><input checked="" type="checkbox"/> GRAVEL (2-64 mm) [9 pts]</td> <td></td> <td>15</td> <td><input type="checkbox"/> MUCK [0 pts]</td> <td></td> <td></td> </tr> <tr> <td><input type="checkbox"/> SAND (&lt;2 mm) [6 pts]</td> <td></td> <td></td> <td><input type="checkbox"/> ARTIFICIAL [3 pts]</td> <td></td> <td></td> </tr> </table>	TYPE		PERCENT		TYPE		PERCENT	<input type="checkbox"/> BDLR SLABS [16 pts]			<input checked="" type="checkbox"/> SILT [3 pt]		30	<input type="checkbox"/> BOULDER (>256 mm) [16 pts]			<input type="checkbox"/> LEAF PACK/WOODY DEBRIS [3 pts]			<input type="checkbox"/> BEDROCK [16 pts]			<input type="checkbox"/> FINE DETRITUS [3 pts]			<input type="checkbox"/> COBBLE (65-256 mm) [12 pts]		5	<input type="checkbox"/> CLAY or HARDPAN [0 pt]			<input checked="" type="checkbox"/> GRAVEL (2-64 mm) [9 pts]		15	<input type="checkbox"/> MUCK [0 pts]			<input type="checkbox"/> SAND (<2 mm) [6 pts]			<input type="checkbox"/> ARTIFICIAL [3 pts]			Total of Percentages of Bldr Slabs, Boulder, Cobble, Bedrock <u>5</u> (A) <u>12</u> (B) <u>3</u>	
TYPE		PERCENT	TYPE			PERCENT																																							
<input type="checkbox"/> BDLR SLABS [16 pts]			<input checked="" type="checkbox"/> SILT [3 pt]			30																																							
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<input type="checkbox"/> SAND (<2 mm) [6 pts]			<input type="checkbox"/> ARTIFICIAL [3 pts]																																										
SCORE OF TWO MOST PREDOMINATE SUBSTRATE TYPES: <u>12</u> TOTAL NUMBER OF SUBSTRATE TYPES: <u>3</u>				A + B <u>15</u>																																									
<b>2. Maximum Pool Depth</b> (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):				<b>Pool Depth</b> Max = 30 <div style="border: 1px solid black; padding: 5px; width: 40px; text-align: center;">15</div>																																									
<table border="0"> <tr> <td><input type="checkbox"/> &gt; 30 centimeters [20 pts]</td> <td><input checked="" type="checkbox"/> 5 cm - 10 cm [15 pts]</td> </tr> <tr> <td><input type="checkbox"/> &gt; 22.5 - 30 cm [30 pts]</td> <td><input type="checkbox"/> &lt; 5 cm [5 pts]</td> </tr> <tr> <td><input type="checkbox"/> &gt; 10 - 22.5 cm [25 pts]</td> <td><input type="checkbox"/> NO WATER OR MOIST CHANNEL [0 pts]</td> </tr> </table>					<input type="checkbox"/> > 30 centimeters [20 pts]	<input checked="" type="checkbox"/> 5 cm - 10 cm [15 pts]	<input type="checkbox"/> > 22.5 - 30 cm [30 pts]	<input type="checkbox"/> < 5 cm [5 pts]	<input type="checkbox"/> > 10 - 22.5 cm [25 pts]	<input type="checkbox"/> NO WATER OR MOIST CHANNEL [0 pts]																																			
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<input type="checkbox"/> > 10 - 22.5 cm [25 pts]	<input type="checkbox"/> NO WATER OR MOIST CHANNEL [0 pts]																																												
COMMENTS <u>      </u> MAXIMUM POOL DEPTH (centimeters): <u>8</u>																																													
<b>3. BANK FULL WIDTH</b> (Measured as the average of 3-4 measurements) (Check ONLY one box):				<b>Bankfull Width</b> Max=30 <div style="border: 1px solid black; padding: 5px; width: 40px; text-align: center;">20</div>																																									
<table border="0"> <tr> <td><input type="checkbox"/> &gt; 4.0 meters (&gt; 13') [30 pts]</td> <td><input type="checkbox"/> &gt; 1.0 m - 1.5 m (&gt; 3' 3" - 4' 8") [15 pts]</td> </tr> <tr> <td><input checked="" type="checkbox"/> &gt; 3.0 m - 4.0 m (&gt; 9' 7" - 13') [25 pts]</td> <td><input type="checkbox"/> ≤ 1.0 m (≤ 3' 3") [5 pts]</td> </tr> <tr> <td><input checked="" type="checkbox"/> &gt; 1.5 m - 3.0 m (&gt; 4' 8" - 9' 7") [20 pts]</td> <td></td> </tr> </table>					<input type="checkbox"/> > 4.0 meters (> 13') [30 pts]	<input type="checkbox"/> > 1.0 m - 1.5 m (> 3' 3" - 4' 8") [15 pts]	<input checked="" type="checkbox"/> > 3.0 m - 4.0 m (> 9' 7" - 13') [25 pts]	<input type="checkbox"/> ≤ 1.0 m (≤ 3' 3") [5 pts]	<input checked="" type="checkbox"/> > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]																																				
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<input checked="" type="checkbox"/> > 1.5 m - 3.0 m (> 4' 8" - 9' 7") [20 pts]																																													
COMMENTS <u>      </u> AVERAGE BANKFULL WIDTH (meters) <u>2</u>																																													

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)

L	R	
<input type="checkbox"/>	<input type="checkbox"/>	Wide >10m
<input type="checkbox"/>	<input type="checkbox"/>	Moderate 5-10m
<input type="checkbox"/>	<input type="checkbox"/>	Narrow <5m
<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	None

## FLOODPLAIN QUALITY (Most Predominant per Bank)

L	R		L	R	
<input type="checkbox"/>	<input type="checkbox"/>	Mature Forest, Wetland	<input type="checkbox"/>	<input type="checkbox"/>	Conservation Tillage
<input type="checkbox"/>	<input type="checkbox"/>	Immature Forest, Shrub or Old Field	<input type="checkbox"/>	<input type="checkbox"/>	Urban or Industrial
<input type="checkbox"/>	<input type="checkbox"/>	Residential, Park, New Field	<input type="checkbox"/>	<input type="checkbox"/>	Open Pasture, Row Crop
<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	Fenced Pasture	<input type="checkbox"/>	<input type="checkbox"/>	Mining or Construction

COMMENTS Pasture

FLOW REGIME (At Time of Evaluation) (Check ONLY one box):

<input checked="" type="checkbox"/> Stream Flowing	<input type="checkbox"/> Moist Channel, isolated pools, no flow (intermittent)
<input type="checkbox"/> Subsurface flow with isolated pools (interstitial)	<input type="checkbox"/> Dry channel, no water (ephemeral)

COMMENTS Intermittent

SINUOSITY (Number of bends per 61 m (200 ft) of channel) (Check ONLY one box):

<input type="checkbox"/> None	<input checked="" type="checkbox"/> 1.0	<input type="checkbox"/> 2.0	<input type="checkbox"/> 3.0
<input type="checkbox"/> 0.5	<input type="checkbox"/> 1.5	<input type="checkbox"/> 2.5	<input type="checkbox"/> >3

## STREAM GRADIENT ESTIMATE

<input type="checkbox"/> Flat (0.5 #/100 ft)	<input checked="" type="checkbox"/> Flat to Moderate	<input type="checkbox"/> Moderate (2 #/100 ft)	<input type="checkbox"/> Moderate to Severe	<input type="checkbox"/> Severe (10 #/100 ft)
--	--	--	---	---

BF  
 $w = 6'$   
 $h = 6'$   
 OHWM  
 $w = 3'$   
 $h = 0.5'$

Stream 1

**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: Clear Fork Mohican River Distance from Evaluated Stream ~2mi  
☐ 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: East Liberty NRCS Soil Map Page: 1 NRCS Soil Map Stream Order: 1  
 County: Richland Township/City: Lexington

**MISCELLANEOUS**Base Flow Conditions? (Y/N): Y Date of last precipitation: 6/2/2020 Quantity: 0.07"

Photo-documentation Notes: \_\_\_\_\_

Elevated Turbidity? (Y/N): N Canopy (% open): 100Were samples collected for water chemistry? (Y/N): N Lab Sample # or ID (attach results): 1Field Measures: Temp (°C) ✓ Dissolved Oxygen (mg/l) ✓ pH (S.U.) 8.1 Conductivity (umhos/cm) ✓Is the sampling reach representative of the stream (Y/N) Y If not, explain: \_\_\_\_\_Additional comments/description of pollution impacts: Erosion from cattle activity**BIOLOGICAL OBSERVATIONS**

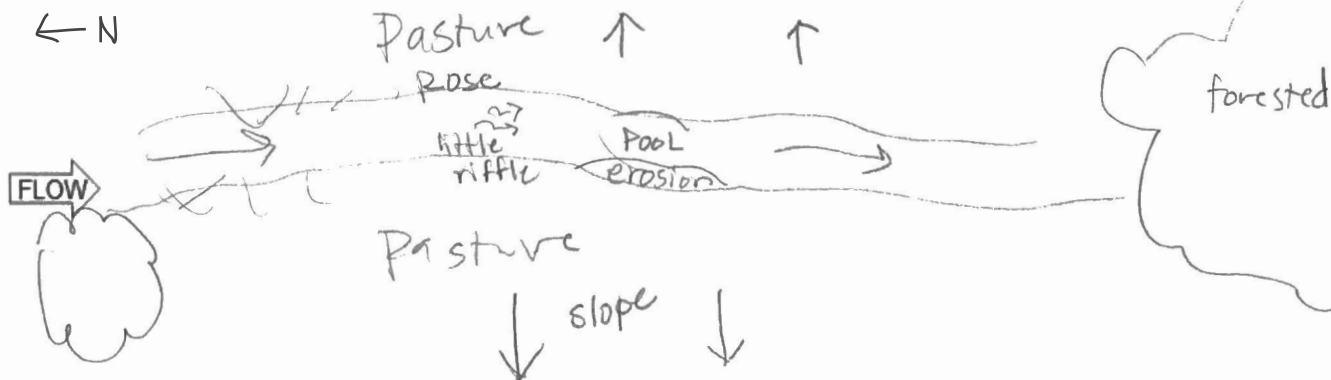
(Record all observations below)

Fish Observed? (Y/N) N Species observed (if known): \_\_\_\_\_Frogs or Tadpoles Observed? (Y/N) N Species observed (if known): \_\_\_\_\_Salamanders Observed? (Y/N) N Species observed (if known): \_\_\_\_\_Aquatic Macroinvertebrates Observed? (Y/N) Y Species observed (if known): aquatic isopod

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



**This foregoing document was electronically filed with the Public Utilities**

**Commission of Ohio Docketing Information System on**

**9/28/2021 4:14:07 PM**

**in**

**Case No(s). 21-0976-EL-BNR**

Summary: Notice Philo-Howard 138 kV Mid-Span Structure Project electronically filed by Hector Garcia-Santana on behalf of Ohio Power Company