

**AMERICAN TRANSMISSION SYSTEMS,
INCORPORATED
A FIRSTENERGY COMPANY**

LETTER OF NOTIFICATION

**BROADVIEW SUBSTATION EXPANSION PROJECT
OPSB CASE NO.: 26-0137-EL-BLN**

June 8, 2026

**American Transmission Systems, Incorporated
341 White Pond Drive
Akron, OH 44320-1119**

LETTER OF NOTIFICATION
BROADVIEW SUBSTATION EXPANSION PROJECT
OPSB CASE No. 26-0137-EL-BLN

The following information is being provided in accordance with the procedures in the Ohio Administrative Code (“Adm.Code”) Chapter 4906-6 for the application and review of Accelerated Certificate Applications. Based upon the requirements found in Appendix A to Adm.Code 4906-1-01, this Project qualifies for submittal to the Ohio Power Siting Board (“OPSB”) as a Letter of Notification application.

4906-6-05: ACCELERATED APPLICATION REQUIREMENTS

4906-6-05 (B)(1): Name and Reference Number

Name of Project: Broadview Substation Expansion (“Project”)

Reference Number: 235

4906-6-05 (B)(1): Brief Description of the Project

In this Project, American Transmission Systems, Incorporated (“ATSI”), a FirstEnergy company, proposes to expand the existing Broadview Substation for the installation of a new 138 kV 75 Megavolt-ampere reactive (“MVAR”) shunt reactor. A shunt reactor is a large inductor connected in parallel (shunt) with a transmission line or bus to absorb excess reactive power and stabilize voltage in high-voltage power systems. To facilitate this, the Substation will expand from its existing square footage of approximately 106,260 square feet to approximately 137,060 square feet. This will result in an approximate 29 percent increase in square footage. Additionally, the Project will install (3) 138kV breakers, associated breaker disconnect switches, and one (1) set of three (3) CCVTs.

The Project is in Moorefield Township, Clark County, Ohio. The general location of the Project is shown in **Exhibit 1**, a partial copy of the United States Geologic Survey, Clark County, OH, Quad Map. **Exhibit 2** is a copy of ESRI aerial imagery of the Project area. The general layout of the Project is shown in **Exhibit 3**.

4906-6-05 (B)(1): Letter of Notification Requirement

The Project meets the requirements for a Letter of Notification application because the Project is within the types of projects defined by Item (4)(b) of the Application Requirement Matrix for Electric Power Transmission Lines. Appendix A of Adm. Code 4906-1-01. This item states:

(4) Constructing additions to existing electric power transmission stations or converting distribution stations to transmission stations where:

(b) There is a greater than twenty percent expansion of the fenced area.

The proposed Project is within the requirements of Item (4)(b) as it involves the expansion of the Broadview Substation by an amount greater than 20 percent of the existing fenced area.

4906-6-05 (B)(2): Need for the Project

The proposed Broadview Substation Expansion Project (“Project”) includes extending the 138 kV bus by installing two additional 138 kV circuit breakers (see **Figure 1** *infra* p. 4). The Project includes adding a 75 MVAR reactor and associated circuit breaker to the Broadview Substation 138 kV yard. The Project will expand the existing substation fence at Broadview Substation to extend the 138 kV bus to accommodate the reactor and associated equipment.

The Project is needed to address the identified risk of high voltage on the transmission system that results from the loss of the Edgewood–Urbana 69 kV Transmission Line under light load conditions. Specifically, the Project mitigates a high voltage violation identified under North American Electric Reliability Corporation (“NERC”) Standard TPL-001-5.1¹ for a P1-2 planning event. A P1-2 planning event is the loss of a single transmission line.

¹ <https://www.nerc.com/pa/Stand/Reliability%20Standards/TPL-001-5.1.pdf>

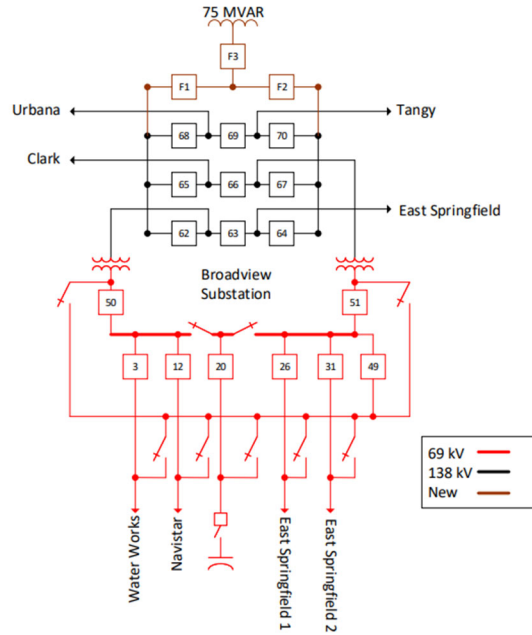
Baseline upgrades are identified as part of the reliability planning and economic planning analysis. The analysis consists of a comprehensive series of detailed studies that are designed to satisfy not only PJM’s reliability planning criteria, but also those of the applicable transmission owners, including FirstEnergy Transmission Planning Criteria, as well as the NERC and Reliability First Corporation (“RF”) reliability standards. The transmission planning process and the baseline RTEP projects selected for construction under that process are required by the applicable reliability and planning criteria and once approved by PJM, become mandatory. Specifically, transmission owners are obligated to build these projects under Section 1.7 of Schedule 6 of the PJM Operating Agreement². These projects are identified with an upgrade identification number starting with the letter “b” followed by a four-digit number.

The proposed Project was developed to mitigate a high voltage violation of FirstEnergy’s Planning Criteria that was identified through the FERC Form 715 study as part of a series of PJM’s 2020 RTEP analyses for model year 2025. Upon loss of the Edgewood–Urbana 69 kV Transmission Line in the light load case, the bus voltages at Broadview, Tech II, and Moorefield Substations exceed the maximum voltage limit of 1.05 per unit (“p.u.”).

The installation of the 75 MVAR reactor and associated substation equipment meets the statutory definition of “advanced transmission technology” because they are “hardware and software technologies that increase the *** reliability or safety of an existing *** transmission system.” R.C. 4906.01(M) (as amended by Substitute House Bill 15 (2025)).

² <https://www.pjm.com/directory/merged-tariffs/oa.pdf>

FIGURE 1



The proposed Project was presented at the October 16, 2020, PJM Subregional RTEP Committee Western meeting³ and the November 20, 2020, Subregional RTEP Committee Western meeting⁴. The baseline upgrade identification number, b3236, was assigned to the Project with a projected in-service date of June 1, 2025. The in-service date has subsequently been updated to June 1, 2027. The PJM SRRTEP-Western presentation slide is included as **Exhibit 4**.

4906-6-05 (B)(3): Location of the Project Relative to Existing or Proposed Lines

The location of the Project relative to existing or proposed transmission lines is shown in the ATSI Transmission Network Map, included as part of the confidential portion of the FirstEnergy Corp. 2026 Long-Term Forecast Report (“LTFR”). This map was submitted to the PUCO in Case No. 26-0504-EL-FOR under Rule 4901:5-5:04 (C)(2)(b) of the Ohio Administrative Code. The map is incorporated by reference only. This map shows ATSI’s

³ <https://www.pjm.com/-/media/DotCom/committees-groups/committees/srrtep-w/2020/20201016/20201016-item-03-reliability-analysis-update.pdf>

⁴ <https://www.pjm.com/-/media/DotCom/committees-groups/committees/srrtep-w/2020/20201120/20201120-item-03-reliability-analysis-update.pdf>

345 kV and 138 kV transmission lines and transmission substations. The general location and layout of the Project area are shown in **Exhibits 1 and 2**. The Project layout is shown in **Exhibit 3**.

4906-6-05 (B)(4): Alternatives Considered

The only alternative to the proposed Project was to maintain the existing conditions at Broadview Substation and the elevated risk of exposure to outages. There were no other reasonable alternatives considered. As noted above, the Project became mandatory once approved under the PJM RTEP process.

4906-6-05 (B)(5): Public Information Program

ATSI's manager of External Affairs will advise local officials of features and the status of the proposed Project as necessary. ATSI will maintain a copy of this Letter of Notification, along with other Project information, on FirstEnergy's website:

https://www.firstenergycorp.com/about/transmission_projects/ohio.html .

ATSI will publish notice of the Project in the Springfield News-Sun and Dayton Daily News within 7 days of filing this Letter of Notification application. The notice will comply with Adm.Code 4906-6-08(A)(1)-(6).

During all phases of this Project, the public may contact ATSI through the transmission projects hotline at 1-888-311-4737 or via email at: transmissionprojects@firstenergycorp.com.

4906-6-05 (B)(6): Construction Schedule

Construction on this Project is expected to begin as early as November 1, 2026, and be completed by June 1, 2027.

4906-6-05 (B)(7): Area Map

The general location of the Project is shown in **Exhibit 1**, a partial copy of the United States Geologic Survey, Clark County OH, Quad Map. **Exhibit 2** is a copy of ESRI aerial imagery of the Project area.

4906-6-05 (B)(8): Properties List

The Project is located entirely on Ohio Edison owned property. No new easements will be required.

4906-6-05 (B)(9): TECHNICAL FEATURES OF THE PROJECT

4906-6-05 (B)(9)(a): Operating Characteristics

The equipment and facilities described below are associated with the substation expansion:

Voltage: 138 kV Max System Voltage

- Reactor: 138 kV 75 MVAR Shunt Reactor – Qty. 1:
 - 2 sets of (3) High side CTs
 - 2 sets of (3) Low side CTs
 - 1 neutral CT
- Breakers: 138 kV, 3000A, 40kAIC Circuit Breaker – (Qty. 1)
138 kV, 3000A, 40kAIC Circuit Breaker for bus extension – (Qty. 2)
 - 4 sets of (3) CTs (2 sets per side)
- Switches: 138 kV, 2000A, Breaker Disconnect Switches – Qty. 5:
- CCVT's: 138 kV CCVTs Set of (3) – Qty. 1:
- Structures: Steel stands for equipment and bus support – Qty. 1

4906-6-05 (B)(9)(b): Electric and Magnetic Fields

There are no occupied residences within 100 feet of the Project and therefore no Electric and Magnetic Field (“EMF”) calculations are required by this code provision.

4906-6-05 (B)(9)(c): Estimated Cost

The estimated cost for the proposed Project is \$12,300,000. Although not statutorily required for approval, at the request of OPSB Staff, the estimated cost is a Class 3 estimate

and ATSI confirms that ATSI's costs will be captured and allocated via FERC formula rates for the ATSI Transmission Zone, Attachment H-21 in the PJM OATT.

4906-6-05 (B)(10): SOCIAL AND ECOLOGICAL IMPACTS

4906-6-05 (B)(10)(a): Land Uses

The Project is in Moorefield Township, Clark County, Ohio. The main land use around the Project area is utility and agricultural. Because the proposed Project consists of expanding an existing substation, no significant changes to the current land use are anticipated.

4906-6-05 (B)(10)(b): Agricultural Land

Agricultural land (primarily cultivated cropland) exists within the Project's Area of Potential Effect ("APE"). Parcel No. 2200300023600001 is not designated as part of an Agricultural District.

4906-6-05 (B)(10)(c): Archaeological or Cultural Resources

As part of the investigation for this Letter of Notification, TRC Companies, Inc. ("TRC") submitted a request to the Ohio Historic Preservation Office ("SHPO") on behalf of ATSI to review the Project Study Area (Area of Potential Effects or "APE") within a one (1)-mile search radius. On December 9, 2025, SHPO replied to the request and the response is attached as **Exhibit 5**.

The SHPO database includes the locations of previously recorded historic properties that are listed in or eligible for listing in the National Register of Historic Places ("NRHP"), including districts, sites, building, structures, and objects that are significant in American history, architecture, archeology, engineering, and culture. The SHPO database review revealed that there are no historic properties or Determinations of Eligibility ("DOE") recorded within one (1)-mi of the proposed Project.

The SHPO database also includes listings on the Ohio Historic Inventory ("OHI"), the Ohio Archaeological Inventory ("OAI"), previous cultural resource surveys, and the Ohio

Genealogical Society (“OGS”) cemetery inventory. There are no above-ground historic resources or OGS cemeteries recorded within one (1)-mi of the Project Study Area.

Six (6) archaeological surveys are recorded within one (1)-mi of the Project Study Area. Five (5) of these surveys overlap with portions of the Project Study Area, particularly along the western, northern, and central locations. There is one (1) previously recorded archaeological site, an early to middle twentieth century historic site, recorded 0.76 mi to the northeast, within a previously surveyed area.

SHPO requested a Phase I Archaeological Survey for the entire 23.73-ac APE. Since the submission date, preliminary plans for the substation expansion have been completed and the APE was reduced to only those locations in which disturbances for the substation expansion will occur, measuring approximately 4.75 ac in size. Of these, 0.9 ac were within areas that had not yet been previously surveyed or previously disturbed. Therefore, a Phase I Archaeological Survey of 0.9 ac of the reduced 4.75 ac APE was completed on January 20, 2026, and no artifacts or archaeological sites were identified during the investigation. The technical report of investigations was submitted to SHPO, and SHPO provided concurrence on March 2, 2026, included as **Exhibit 5A**, that it is their opinion that the Project, as proposed, will have no effect on historic properties.

The Project Study Area consists of existing, maintained utility right-of-way (“ROW”), existing substation with access, and open agricultural fields. Currently, as proposed, no new tree clearing is anticipated within or outside the Project Study Area. The proposed Project is not expected to have any adverse effects on known historic properties.

4906-6-05 (B)(10)(d): Local, State, and Federal Requirements

Coordination with Moorefield Township will be completed to obtain the ROW permits necessary for work along Willow Road, based on the proposed Project scope. More than one (1) acre of earth disturbance is proposed in the Project scope; therefore, a submittal of a Notice of Intent (NOI) application to the Ohio EPA will be required for coverage under the general construction stormwater permit (OHC000006). The Storm Water Pollution Prevention Plan (SWPPP) will be submitted to the Clark County Engineer’s Office and

Clark County Soil & Water Conservation District (SWCD). The Project scope is not proposed within a 100-year FEMA floodplain and therefore will not require a Floodplain Hazard Development Permit. All permitting and/or coordination necessary to comply with local, state, and federal agencies with jurisdiction regarding this Project will be completed prior to the commencement of construction. A list of potential government agency requirements is provided in **Table 1** below.

Table 1. List of Government Agency Requirements

Agency	Requirement
Ohio EPA	General NPDES Construction Storm Water Permit OHC000006
Clark County Engineer’s Office Clark County Soil & Water Conservation District	SWPPP Review
Moorefield Township	ROW Permit

4906-6-05 (B)(10)(e): Endangered, Threatened, and Rare Species Investigation

As part of the investigation, ATSI retained TRC to conduct necessary surveys. TRC submitted a request to the Ohio Department of Natural Resources (“ODNR”) Office of Real Estate to conduct an Environmental Review. As part of the Environmental Review, the ODNR Office of Real Estate conducted a search of the ODNR Division of Wildlife’s Natural Heritage Database to research the presence of any endangered, threatened, or rare species within one (1) mile of the Project Study Area. The ODNR’s Office of Real Estate’s response on August 9, 2024, indicated that there are no records of state or federally listed plants or animals within one mile of the Project Study Area. However, the Project is within the range of eleven (11) state and/or federally listed animal species. A list of all endangered, threatened, and rare species, as identified by ODNR, within the range of the Project is provided in **Table 2**. A copy of ODNR’s Office of Real Estate’s response is included as **Exhibit 6**.

Table 2. List of Endangered and Threatened Species within range of Project Study Area

Common Name	Scientific Name	Federal Listed Status	State Listed Status	Affected Habitat
Mammals				

Indiana bat	<i>Myotis sodalis</i>	Endangered	Endangered	Trees, forests, caves, and caverns.
Little brown bat	<i>Myotis lucifugus</i>	N/A	Endangered	Trees, forests, caves, and caverns.
Northern long-eared bat	<i>Myotis septentrionalis</i>	Endangered	Endangered	Trees, forests, caves, and caverns.
Tricolored bat	<i>Perimyotis subflavus</i>	Proposed Endangered	Endangered	Trees, forests, caves, and caverns.
Fish				
Iowa darter	<i>Etheostoma exile</i>	N/A	Endangered	Perennial streams.
Tonguetied minnow	<i>Exoglossum laurae</i>	N/A	Threatened	Perennial streams.
Mussels				
Rayed bean	<i>Villosa fabalis</i>	Endangered	Endangered	Perennial streams.
Snuffbox	<i>Epioblasma triquetra</i>	Endangered	Endangered	Perennial streams.
Reptiles				
Eastern massasauga	<i>Sistrurus catenatus</i>	Threatened	Endangered	Wet prairies, fens, and other wetlands, as well as drier upland habitat.
Kirtland's snake	<i>Clonophis kirtlandii</i>	N/A	Threatened	Wet fields and meadows.
Spotted turtle	<i>Clemmys guttata</i>	N/A	Threatened	Fens, bogs and marshes, wet prairies, meadows, pond edges, wet woods, and the shallow sluggish waters of small streams and ditches.

Based on the information received from correspondence with ODNR, the Project is within the ranges of the Indiana bat (*Myotis sodalis*), the northern long-eared bat (*Myotis septentrionalis*), the little brown bat (*Myotis lucifugus*), and the tricolored bat (*Perimyotis subflavus*). These bat species predominantly roost in trees behind loose, exfoliating bark, in crevices, and cavities, or in the leaves. These species are dependent on the forest structure

surrounding the roost tress. The DOW recommended a desktop bat hibernaculum assessment be completed for the Project, which TRC completed for ATSI and submitted to ODNR for concurrence on September 13, 2024. ODNR responded on September 16, 2024, concurring that no caves, cliffs, or mine openings occur in the Project Study Area, this response is included as **Exhibit 6A**. Therefore, the Project is not likely to impact hibernating bats. In assessing compliance with NWP General Condition 18, TRC determined that tree clearing is not anticipated within the Project Study Area. If minor tree clearing is needed as a result of this Project, it will take place within the US Fish and Wildlife Service (“USFWS”) recommended tree clearing dates (October 1–March 31); therefore, no impacts to bat species are anticipated as a result of the construction of this Project.

The Project is within the range of the rayed bean (*Villosa fabalis*), a state endangered and federally endangered mussel, and the snuffbox (*Epioblasma triquetra*), a state endangered and federally endangered mussel. Due to the location, and that there is no in-water work proposed in a perennial stream, 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 tonguetied minnow (*Exoglossum laurae*), a state threatened fish. Due to the location, and that there is no in-water work proposed in a perennial stream, this Project is not likely to impact these 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 Study Area, and the type of work proposed, this Project is not likely to impact this species.

The Project is within the range of the Kirtland’s snake (*Clonophis kirtlandii*), a state threatened species. This secretive species prefers wet meadows and other wetlands. Due to the location, the type of habitat within the Project Study Area, and the type of work proposed, this Project is not likely to impact this species.

The Project is within the range of the spotted turtle (*Clemmys guttata*), a state threatened species. This species prefers fens, bogs, and marshes, but is also known to inhabit wet prairies, meadows, pond edges, wet woods, and the shallow sluggish waters of small streams and ditches. Due to the location, the type of habitat within the Project Study Area, and the type of work proposed, this Project is not likely to impact this species.

As part of the investigation, TRC submitted a request to USFWS on August 20, 2024, to research the presence of any endangered, threatened, rare, or designated species within the Project Study Area. A copy of the USFWS' response, dated August 8, 2024, is included as **Exhibit 7**. The response indicated that due to the Project type, size, location, and the proposed implementation of seasonal tree cutting (clearing of trees ≥ 3 inches diameter at breast height between October 1 and March 31) to avoid impacts to the Indiana bat, northern long-eared bat, and tricolored bat, no adverse effects to any federally endangered, threatened, or proposed species, or proposed or designated critical habitat are anticipated.

4906-6-05 (B)(10)(f): Areas of Ecological Concern

TRC conducted a wetland and waterways delineation located within the 23.73 ac Project Study Area on June 11, 2024. No wetlands or surface waters were delineated or identified within the Project Study Area. A Surface Water Delineation Technical Memorandum of the Project Study Area is included in **Exhibit 8**.

The Project Study Area consists of an existing, maintained utility ROW, substation, and gravel access drive, surrounded by agricultural land use. TRC did not observe the presence of any of the ODNR or federally listed species during the field investigation due to the highly maintained nature of the utility ROW and surrounding agricultural land use. Therefore, no impacts are anticipated to any of the listed species detailed in the ODNR correspondence.

The Limits of Disturbance (“LOD”) will be completely within the Project Study Area and include utilizing an existing access drive from Willow Road for the expansion of the existing Broadview Substation within the agricultural field to the north. NWP 57 (effective March 15, 2026, and expiring on March 15, 2031), authorizes the construction of access roads for

the construction and maintenance of electric utility lines or telecommunication lines, including overhead lines and substations, in nontidal waters of the United States, provided the activity does not cause the loss of greater than 0.5-acre of waters of the United States. Nationwide Permit Regional General Conditions were reviewed regarding this Project. This Project is in Moorefield Township, Clark County, Ohio, which is within the USACE Huntington Regulatory District. The Project location is listed in Appendix 1 to Regional General Condition 5(a) (Endangered Species and Threatened Species); however, no jurisdictional resources were identified or delineated within the Project Study Area and therefore will not be impacted by the proposed Project activity. Therefore, NWP 57 conditions are met and there is no potential trigger for a Section 404 PCN to USACE.

A review of the USGS Protected Areas Database (www.usgs.gov/programs/gap-analysis-project/science/protected-areas) revealed no conservation easements within the Project Study Area. The National Conservation Easement Database is no longer in use due to the database no longer being actively updated and supported.

4906-6-05(B)(10)(g): Other Information

Construction and operation of the proposed Project will be in accordance with the requirements specified in the latest revision of the National Electrical Safety Code as adopted by the PUCO and will meet all applicable safety standards established by the Occupational Safety and Health Administration.

No other or unusual conditions are expected that will result in significant environmental, social, health or safety impacts.

4906-6-07: Documentation of Letter of Notification Transmittal and Availability for Public Review

This Letter of Notification application is being provided concurrently with its docketing with the OPSB to the following officials in Moorefield Township and Clark County, Ohio.

Clark County

Commissioner Sasha Rittenhouse
Clark County Commissioners
Board of County Commissioners
3130 East Main Street
Springfield, OH 45503
Commission@clarkcountyohio.gov

Commissioner Charles Patterson
Clark County Commissioners
Commissioners' Office
3130 East Main Street
Springfield, OH 45503
Commission@clarkcountyohio.gov

Jennifer Hutchinson
Clark County Administrator
Board of County Commissioners
3130 East Main Street
Springfield, OH 45503
jhutchinson@clarkcountyohio.gov

Moorefield Township

Mr. Jack McKee
Moorefield Township Trustee
1616 Moorefield Road
Springfield, OH 45502
jack.mckee@moorefieldtownshipclark.gov

Mr. Joe Mosier
Moorefield Township Trustee
1616 Moorefield Road
Springfield, OH 45502
joe.mosier@moorefieldtownshipclark.gov

Library

Mr. Matt Naylor, Interim Director
Clark County Public Library
201 South Fountain Avenue,
Springfield, OH 45506
mnaylor@ccploho.org

Johnathan A. Burr, P.E., P.S
Clark County Engineer
4075 Laybourne Road
Springfield, OH 45505
engineer@clarkcountyohio.gov

Mr. Mark Scholl, Chairperson
Clark County Planning Commission
3130 East Main Street
Springfield, OH 45503
communitydevelopment@clarkcountyohio.gov

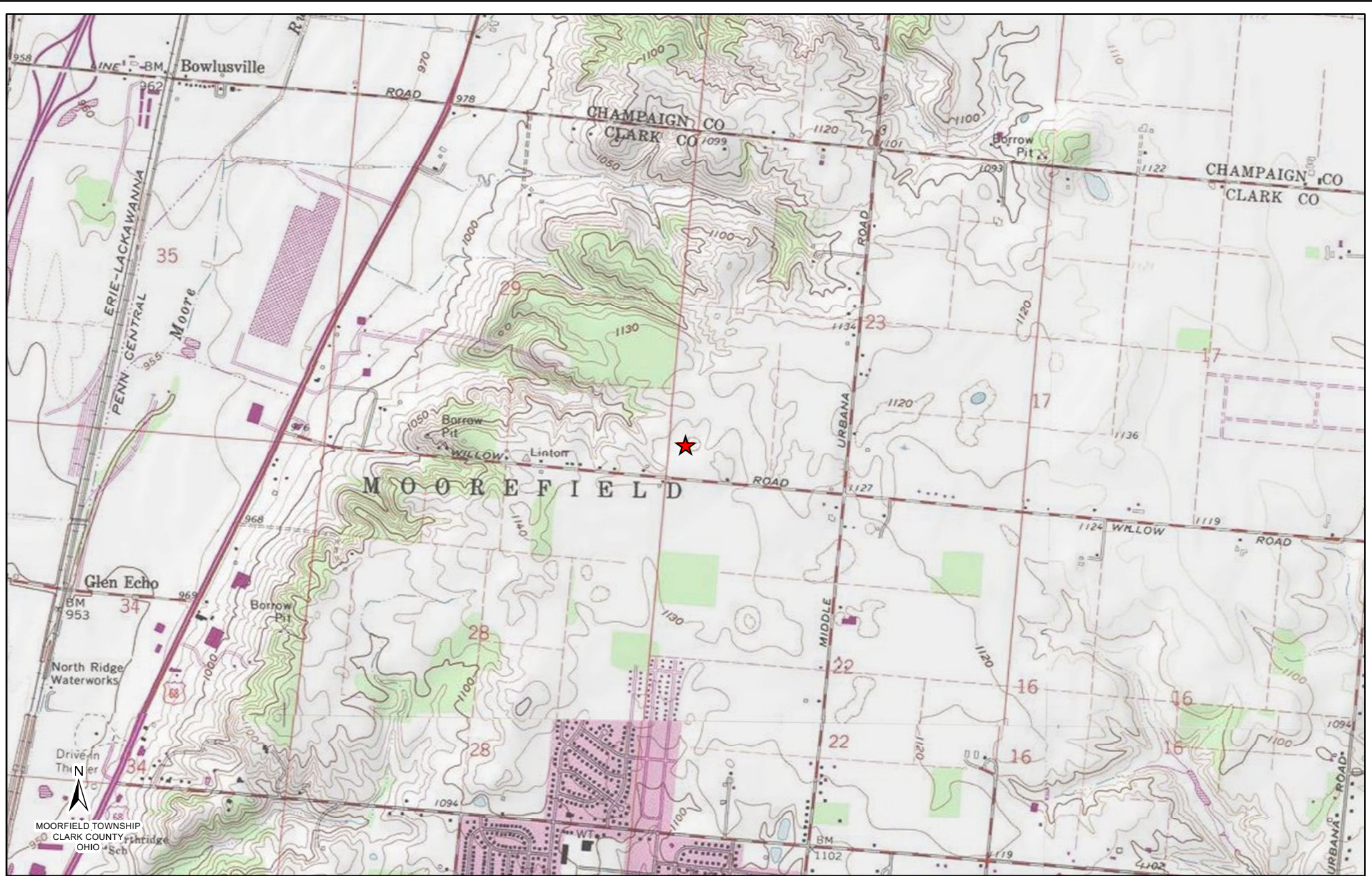
Mr. Chris Simpson, District Director
Clark County
Soil and Water Conservation District
3130 East National Rd.
Springfield, OH 45505
info@clarkcountyohio.gov

Mr. Daren Cotter
Moorefield Township Trustee
1616 Moorefield Road
Springfield, OH 45502
daren.cotter@moorefieldtownshipclark.gov

Ms. Andrea Smith, Fiscal Officer
Moorefield Township
1616 Moorefield Road
Springfield, OH 45502
andrea.smith@moorefieldtownshipclark.gov

Per Adm.Code 4906-6-07(B), exemplar copies of the notice letters sent to local government officials and to the library have been included with this application as proof of compliance with requirements of Adm.Code 4906-6-07(A)(1) and 4906-6-07(A)(2).

Information is posted at www.firstenergycorp.com/about/transmission_project/ohio.html on how to request an electronic or paper copy of this Letter of Notification application. The link to this website is being provided in accordance with Adm.Code 4906-6-07(B), which requires ATSI to provide the OPSB with proof of compliance with Adm.Code 4906-6-07(A)(3).



LEGEND:

★ Project Location

0 1,000 2,000 4,000
Feet

Reference:
USGS Topographical Overlay

Coordinate System:
NAD 1983 StatePlane Ohio North FIPS 3401 Feet
Projection: Lambert Conformal Conic; Units: Foot US

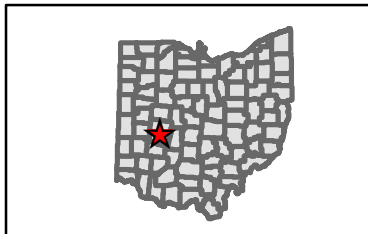
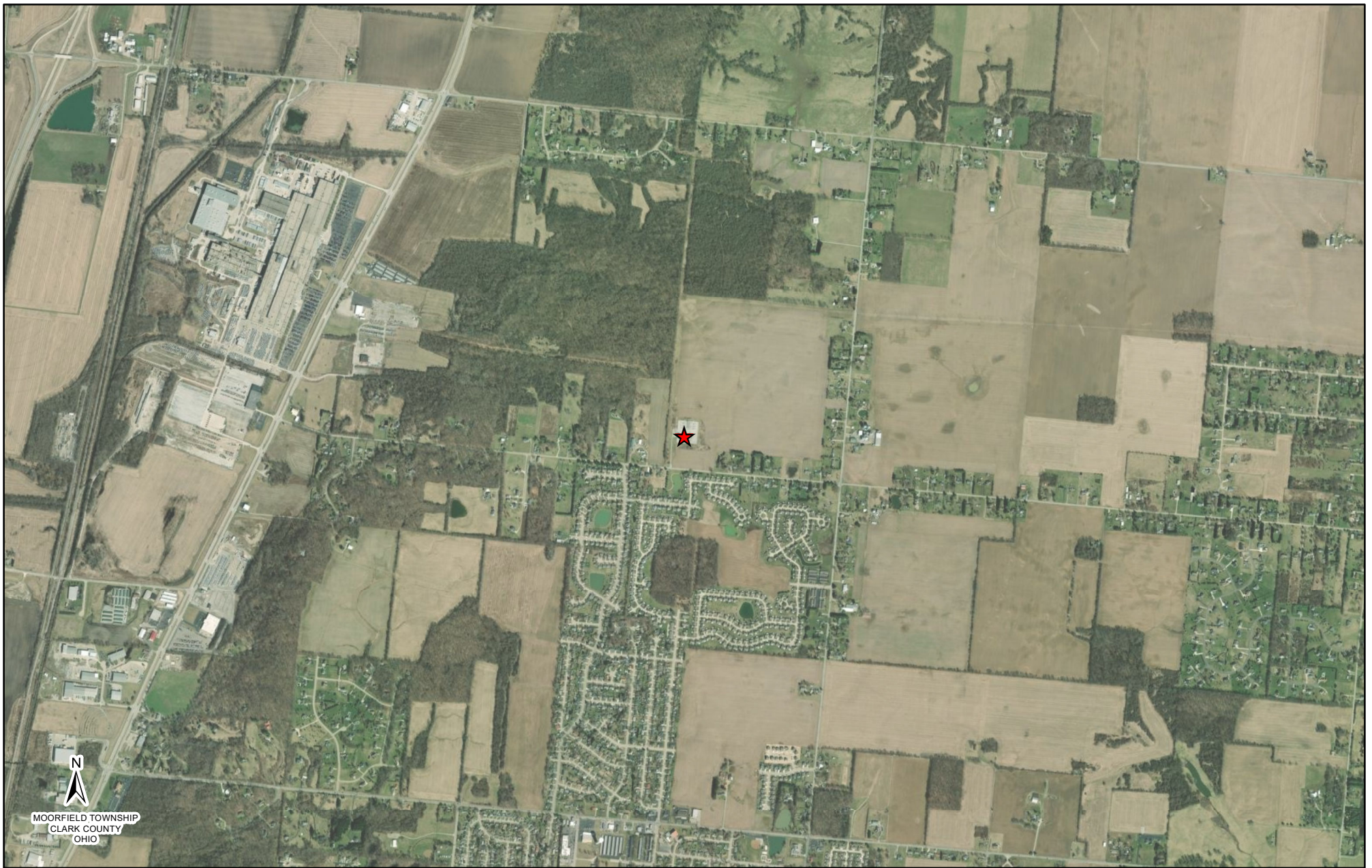


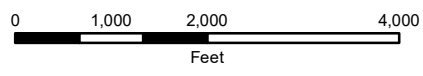
EXHIBIT 1

ATSI
American Transmission Systems, Inc.
a subsidiary of FirstEnergy Corp.

Broadview Substation Expansion Project



MOORFIELD TOWNSHIP
CLARK COUNTY
OHIO



Reference:
ESRI Aerial Imagery, ODOT

Coordinate System:
NAD 1983 StatePlane Ohio North FIPS 3401 Feet
Projection: Lambert Conformal Conic; Units: Foot US

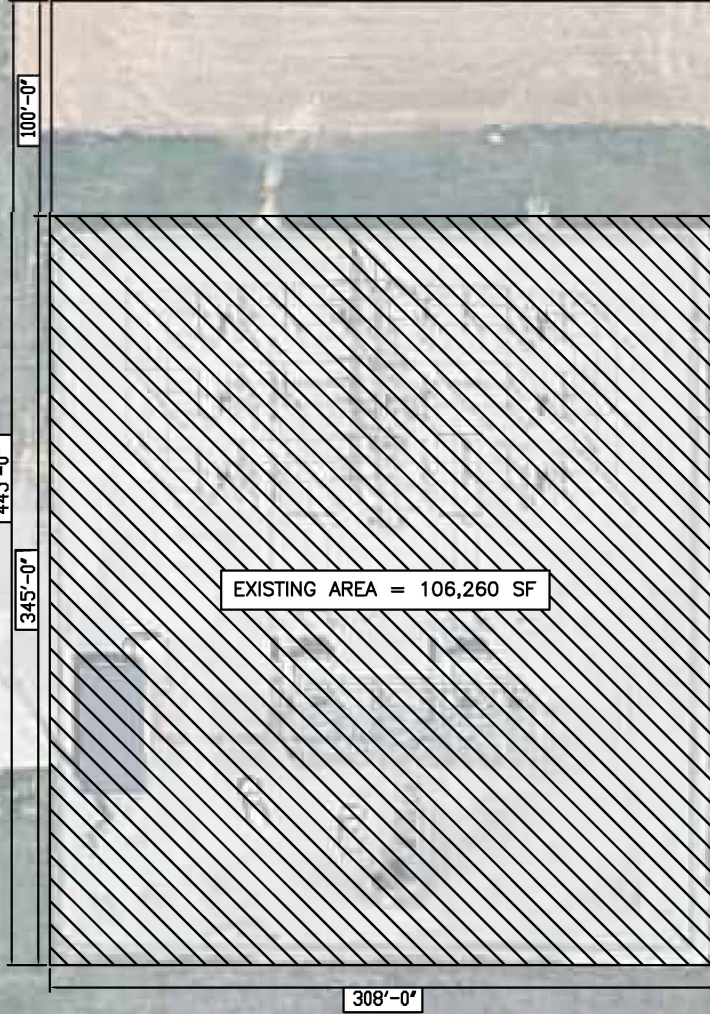


EXHIBIT 2



LEGEND:
★ Project Location

Broadview Substation Expansion Project



BROADVIEW SUBSTATION EXPANSION PROJECT

GENERAL LAYOUT

SCALE: NTS
ISSUED: 05/27/2026

EXHIBIT 3

Process Stage: Recommended Solution

Criteria: ATSI715 Criteria

Assumption Reference: 2025 RTEP assumption

Model Used for Analysis: 2025 RTEP cases

Proposal Window Exclusion: Below 200 kV

Problem Statement:

FG: ATSI-LLVM101, ATSI-LLVM102, ATSI-LLVM103, ATSI-LLVM104, ATSI-LLVM105, ATSI-LLVM106

High Voltage, based on ATSI TO Criteria, observed for voltage magnitude analysis of the Light load case around Broadview, Tech + and Morefield 138 kV busses for the loss of the Edgewood – Urbana 69 kV line.

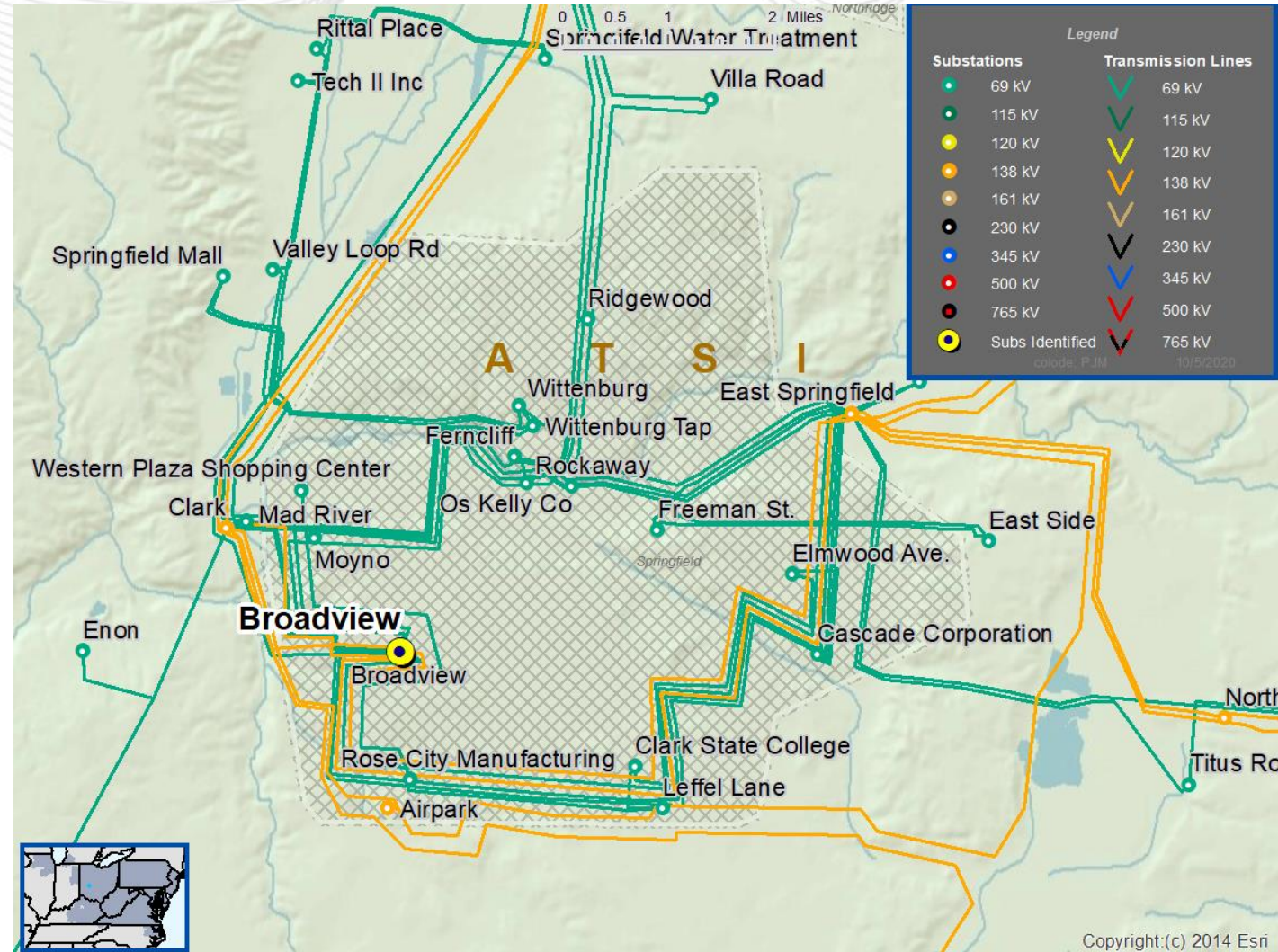
Proposed Solution: Extend the Broadview 138 kV Bus by adding two new breakers and associated equipment and install a 75 MVAR Reactor (B3236)

Estimated Cost: \$4.5M

Alternatives: Larger reactor at Tangy

Required In-Service: 6/1/2025

Previously Presented: 10/16/2020





In reply refer to:
2025-CLA-66924

December 9, 2025

Justin McKissick, MA, RPA
Senior Archaeologist/Project Manager
TRC Environmental Corporation
317 E Carson Street, Suite 113
Pittsburgh, PA 15219
Email: JMcKissick@trccompanies.com

RE: Section 106 Review: Broadview Substation Expansion Project, Moorefield Township, Clark County, Ohio

Dear Mr. McKissick:

This letter is in response to the correspondence received on November 12, 2025, regarding the above-referenced project in Clark 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 requesting cooperation among state agencies in the preservation of historic properties, Ohio Administrative Code Chapters 4906-4, as administered by the Ohio Power Siting Board (OPSB). 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 OPSB is the lead agency for the undertaking.

The proposed undertaking involves the expansion of the existing Broadview substation. This expansion area totals approximately 23.73-acres and is considered the direct Area of Potential Effect (APE). According to our records, there are no historic properties, districts, above-ground resources, or previously recorded archaeological sites within or immediately adjacent to the APE. However, five cultural resource corridor surveys partially overlap the APE. The SHPO recommends a Phase I archaeological survey for the entire APE. The results of the survey will allow for a more informed decision regarding the impact of the project on cultural resources, if present, that may be eligible for listing on the National Register of Historic Places. We look forward to further coordination regarding this project. If you have any questions concerning this review, please contact me by email at sbiehl@ohiohistory.org. Thank you for your cooperation.

Sincerely,

A handwritten signature in blue ink that reads "Stephen M. Biehl".

Stephen M. Biehl, Project Reviews Manager-Archaeology
Resource Protection and Review
State Historic Preservation Office

RPR Serial No. 1111674



In reply refer to:
2025-CLA-66924

March 2, 2026

Justin McKissick, MA, RPA
Senior Archaeologist/Project Manager
TRC Environmental Corporation
317 E Carson Street, Suite 113
Pittsburgh, PA 15219
Email: JMcKissick@trccompanies.com

RE: Section 106 Review: Broadview Substation Expansion Project, Moorefield Township, Clark County, Ohio

Dear Mr. McKissick:

This letter is in response to the receipt on February 3, 2026, of *Phase I Archaeological Survey Report Broadview Substation Expansion, Moorefield Township, Clark County, Ohio* (TRC Environmental Corporation, 2026). 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 requesting cooperation among state agencies in the preservation of historic properties, Ohio Administrative Code Chapters 4906-4, as administered by the Ohio Power Siting Board (OPSB). 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 OPSB is the lead agency for the undertaking.

The proposed undertaking involves the expansion of the existing Broadview substation. This expansion area originally totaled approximately 23.73-acres. However, the finalized project plans have reduced the Area of Potential Effect (APE) to approximately 4.75-acres. The above-referenced survey involved a literature review, visual inspection, and subsurface shovel test unit excavations within the defined APE. The literature review determined no historic properties, districts, above-ground resources, or previously recorded archaeological sites area within or immediately adjacent to the APE. However, previous cultural resource corridor surveys partially overlap the APE. The results of the field investigations did not identify any below ground or above-ground resources within the APE. Therefore, the SHPO agrees that as proposed, no additional cultural resource investigations are warranted. Furthermore, it is the SHPO's opinion that the project, as proposed, will have no effect on historic properties. No further coordination is required unless the scope of the project changes, or archaeological deposits are encountered during project construction. In such a situation, this office should be contacted as required under 36 CFR § 800.13. If you have any questions concerning this review, please contact me by email at sbiehl@ohiohistory.org. Thank you for your cooperation.

Sincerely,

A handwritten signature in blue ink that reads "Stephen M. Biehl".

Stephen M. Biehl, Project Reviews Manager-Archaeology
Resource Protection and Review
State Historic Preservation Office

RPR Serial No. 1112705



Ohio Department of Natural Resources

MIKE DEWINE, GOVERNOR

MARY MERTZ, DIRECTOR

Office of Real Estate
Tara Paciorek, Chief
2045 Morse Road – Bldg. E-2
Columbus, Ohio 43229
Phone: (614) 265-6661
Fax: (614) 267-4764

August 9, 2024

Jenna Slabe
TRC Companies, Inc.
1382 West 9th Street, Suite 400
Cleveland, Ohio 44113

Re: 24-1064_Broadview Substation Expansion

Project: The proposed project involves the expansion of the existing Broadview substation.

Location: The proposed project is located in Moorefield Township, Clark 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: A review of the Ohio Natural Heritage Database indicates there are no records of state or federally listed plants or animals within one mile of the specified project area. Records searched date from 1980.

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

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

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

The entire state of Ohio is within the range of the Indiana bat (*Myotis sodalis*), a state endangered and federally endangered species, the northern long-eared bat (*Myotis septentrionalis*), a state endangered and federally endangered species, the little brown bat (*Myotis lucifugus*), a state endangered species, and the tricolored bat (*Perimyotis subflavus*), a state endangered species. During the spring and summer (April 1 through September 30), these 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 the DOW (contact Eileen Wyza at Eileen.Wyza@dnr.ohio.gov).

The DOW also recommends that a desktop habitat assessment is conducted, followed by a field assessment if needed, to determine if a potential hibernaculum is present within the project area. Direction on how to conduct habitat assessments can be found in the current USFWS "[RANGE-WIDE INDIANA BAT & NORTHERN LONG-EARED BAT SURVEY GUIDELINES](#)." If a habitat assessment finds that a potential hibernaculum is present within 0.25 miles of the project area, please send this information to Eileen Wyza for project recommendations. If a potential or known 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 the 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 rayed bean (*Villosa fabalis*), a state endangered and federally endangered mussel, and the snuffbox (*Epioblasma triquetra*), a state endangered and federally endangered mussel. Due to the location, and that there is no in-water work proposed in a perennial stream, 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 tonguetied minnow (*Exoglossum laurae*), a state threatened fish. Due to the location, and that there is no in-water work proposed in a perennial stream, this project is not likely to impact these species.

The project is within the range of the eastern massasauga (*Sistrurus catenatus*), a state endangered and a 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 Kirtland's snake (*Clonophis kirtlandii*), a state threatened species. This secretive species prefers wet meadows and other wetlands. 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 spotted turtle (*Clemmys guttata*), a state threatened species. This species prefers fens, bogs and marshes, but is also known to inhabit wet prairies, meadows, pond edges, wet woods, and the shallow sluggish waters of small streams and ditches. 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.

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 US 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.

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

Mike Pettegrew
Environmental Services Administrator

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

From: Eileen.Wyza@dnr.ohio.gov
To: [Slabe, Jenna](#)
Cc: [Falkinburg, Brad](#); [Molnar, Maggie](#)
Subject: [EXTERNAL] RE: Desktop Hibernacula Assessment: FirstEnergy's Broadview Substation Expansion Project
Date: Monday, September 16, 2024 12:53:23 PM
Attachments: [image002.png](#)
[image004.png](#)
[image005.png](#)
[image006.png](#)
[image007.png](#)
[image008.png](#)
[image001.png](#)

This is an **External** email. Do not click links or open attachments unless you validate the sender and know the content is safe.

ALWAYS hover over the link to preview the actual URL/site and confirm its legitimacy.

Hello Jenna,

Per review of the desktop survey provided for FirstEnergy's Broadview Substation Expansion Project, the Ohio Division of Wildlife concurs with your assessment that no caves, cliffs, or mine openings occur in the project area. Therefore, the project is not likely to impact hibernating bats.

Should any reported conditions change before or during construction, please contact me for additional guidance.

Thank you,

Eileen Wyza, Ph.D.
(she/her/hers)
Wildlife Biologist
Ohio Division of Wildlife
Phone: 614-265-6764
Email: Eileen.Wyza@dnr.ohio.gov

Support Ohio's wildlife. Buy a license at wildohio.gov.



This message is intended solely for the addressee(s). Should you receive this message by mistake, we would be grateful if you informed us that the message has been sent to you in error. In this case, we also ask that you delete this message and any attachments from your mailbox, and do not forward it or any part of it to anyone else. Thank you for your cooperation and understanding.
Please consider the environment before printing this email.

From: Slabe, Jenna <JSlabe@trccompanies.com>
Sent: Friday, September 13, 2024 8:44 AM
To: Wyza, Eileen <Eileen.Wyza@dnr.ohio.gov>
Cc: Falkinburg, Brad <BFalkinburg@trccompanies.com>; Molnar, Maggie <MMolnar@trccompanies.com>
Subject: Desktop Hibernacula Assessment: FirstEnergy's Broadview Substation Expansion Project

Eileen,

In response to ODNR's DOW recommendations (attached), TRC completed a desktop hibernacula assessment to determine if potential hibernaculum is present within FirstEnergy's proposed Broadview Substation Expansion Project located in Moorefield Township, Clark County, Ohio.

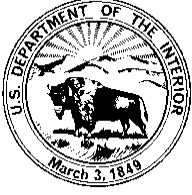
Please let us know if you have any questions on the provided desktop assessment or require any additional information, thank you!

Jenna Slabe
Ecologist
Planning, Permitting, and Licensing



1382 W 9th St, Suite 400, Cleveland, OH 44113
C 330.998.0481
[LinkedIn](#) | TRCcompanies.com

CAUTION: This is an external email and may not be safe. If the email looks suspicious, please do not click links or open attachments and forward the email to csc@ohio.gov or click the Phish Alert Button if available.

United States Department of the Interior**FISH AND WILDLIFE SERVICE**

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



August 8, 2024

Project Code: 2024-0113415

Dear Jenna Slabe:

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: Due to the project type, size, location, and the proposed implementation of seasonal tree cutting (clearing of trees ≥ 3 inches diameter at breast height between October 1 and March 31) to avoid impacts to the endangered Indiana bat (*Myotis sodalis*) and northern long-eared bat (*Myotis septentrionalis*), and the proposed endangered tricolored bat (*Perimyotis subflavus*) 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.

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

species. In addition, prevention of non-native, invasive plant establishment is critical in maintaining high quality habitats.

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

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

Sincerely,

A handwritten signature in blue ink that reads "Erin Knoll". The signature is written in a cursive style with a large initial "E".

Erin Knoll
Field Office Supervisor



1382 West Ninth St.
Suite 400
Cleveland, OH 44113

T 216.344.3072
TRCcompanies.com

July 24, 2024

Mr. Auggie Ruggiero
FirstEnergy Corporation
341 White Pond Drive
Akron, OH 44320

Reference: Technical Memorandum for the Surface Water Delineation of the Broadview Substation Expansion Project located in Moorefield Township, Clark County, Ohio.
(TRC Project No. 429847.0103.0000)

Dear Mr. Ruggiero:

On behalf of FirstEnergy Corporation, TRC Environmental Corporation (TRC) conducted a surface water delineation for the Broadview Substation Expansion Project (Project). The Project is in Moorefield Township, Clark County, Ohio and is approximately 23.73-acres in size (**Attachment A, Figure 1 and 2**). The Project Study Area is located at the following approximate centroid coordinates: 40.011982, -83.769355. This Project involves the expansion of FirstEnergy's existing Broadview Substation.

The delineation was conducted by qualified wetland scientists on June 11, 2024, in accordance with the United States Army Corps of Engineers (USACE) parameters. The objective was to evaluate and delineate potential surface water resources within the Project Study Area, such that the resources could be considered during each phase of the Project. Prior to the site visit, TRC reviewed available secondary source information such as the National Wetlands Inventory (NWI), National Hydrography Dataset (NHD), United States Geological Survey (USGS) topographic maps, County Soil Survey maps, and aerial imagery of the Project Study Area to use in addition to field investigations.

The Project Study Area is shown on the attached map (**Attachment A, Figure 1**), which was derived from the USGS Urbana West, Ohio 7.5-minute quadrangle topographic map. The proposed Project Study Area does not include any mapped NHD or NWI features (**Attachment A, Figure 4**). According to Federal Emergency Management Agency (FEMA) Flood Insurance Rate Map panel, 39023C0070E (eff. 2/17/2010), the proposed Project is not located within a FEMA mapped 100-Year Flood Zone. During the field investigation, land use within the Project Study Area was observed to be an existing, maintained utility right-of-way and substation, including gravel access drive, located within agricultural land. See attached mapping in **Attachment A** and the Photographic Record in **Attachment B** for further details of the Project Study Area.

During the field investigation, no wetlands or surface waters were delineated or identified within the Project Study Area. To verify the absence of wetlands within the Project Study Area an upland data point (U-EKG-1) was collected and is shown on **Figure 5** in **Attachment A**. Data for U-EKG-1 was recorded on the USACE Wetland Determination Data Form – Midwest Region. The Wetland Determination Data Form is provided in **Attachment C**.

This Technical Memorandum represents the conditions within the Project Study Area identified herein, as of the inspection dates. Should you require any additional information or have any questions concerning this letter, please feel free to contact me at (440) 666-2890 or by email at BFalkinburg@TRCCompanies.com.

Kind Regards,

TRC

A handwritten signature in black ink that reads "Brad M. Falkinburg".

Brad M. Falkinburg, PWS
Ecological Office Practice Leader

cc: Maggie Molnar, PWS – TRC

Attachments

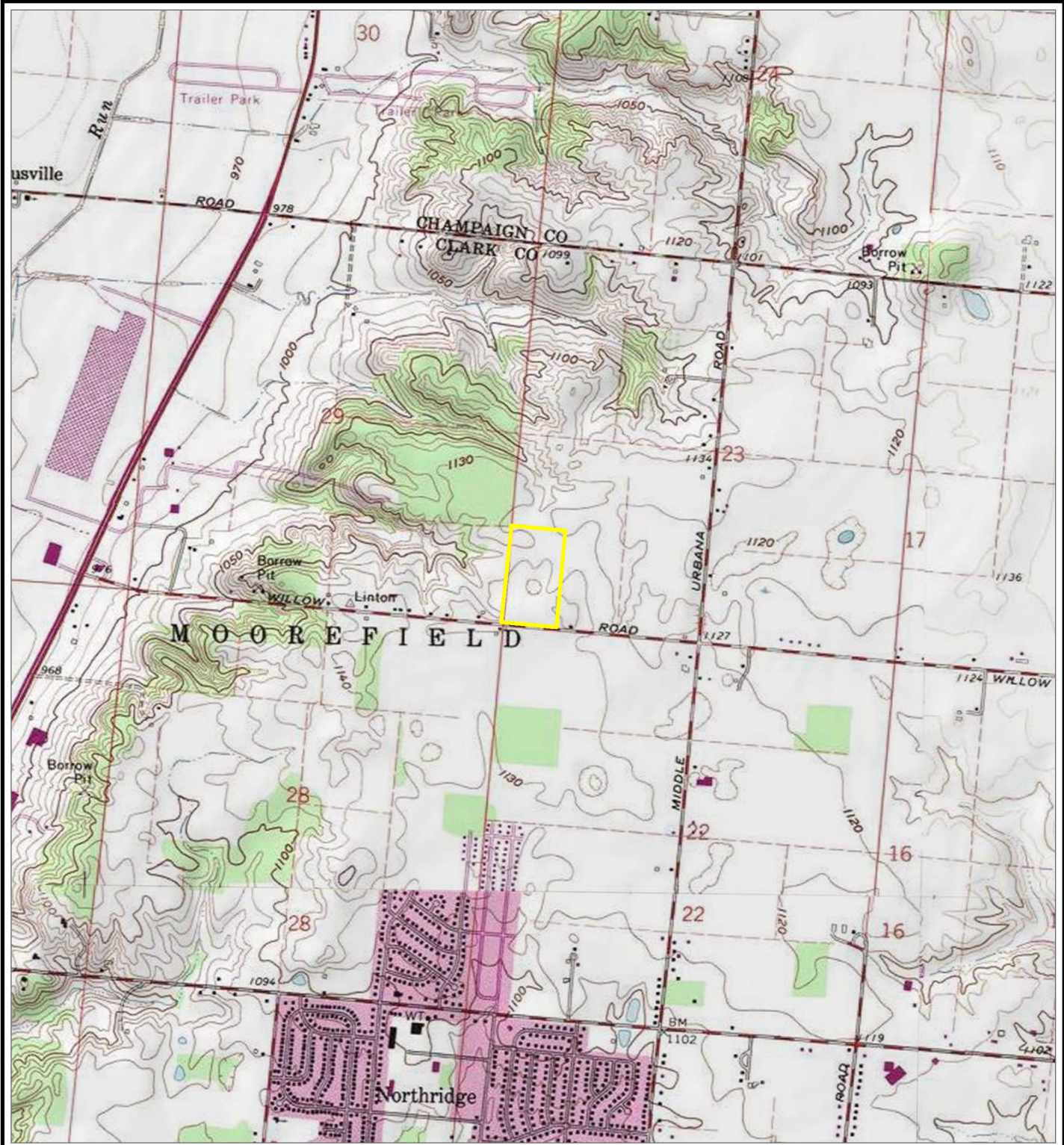
Attachment A: Figures

Attachment B: Photographic Record

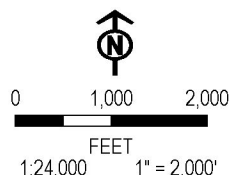
Attachment C: Data Sheet

ATTACHMENT A – Figures

COORDINATE SYSTEM: NAD 1983 STATEPLANE OHIO SOUTH FIPS 3402 FEET; MAP ROTATION: 0
 -- SAVED BY: MOPEL ON 6/13/2024, 08:51:58 AM; FILE PATH: T:\1-PROJECTS\FIRST_ENERGY\429847_0103_BROADVIEW_SUBSTATION_EXPANSION\2-APPROX\DWG_APPX; LAYOUT NAME: FIG01_SLM



 PROJECT STUDY AREA



BASE MAP: USA TOPO MAPS MAP SERVICE, URBANA WEST QUAD

PROJECT: **FIRSTENERGY
 BROADVIEW SUBSTATION EXPANSION PROJECT
 CLARK COUNTY, OH**

TITLE: **SITE LOCATION MAP**

DRAWN BY: M. OPEL	PROJ. NO.: 429847.0103
CHECKED BY: M. MOLNAR	FIGURE 1
APPROVED BY: B. FALKINBURG	
DATE: JUNE 2024	



1382 WEST NINTH STREET
 SUITE 400
 CLEVELAND, OH 44113
 PHONE: 216-344-3072

FILE: WDR

Coordinate System: NAD 1983 StatePlane Ohio South FIPS 3402 Feet; Map Rotation: 0
 -- Saved By: MOPEL on 6/13/2024, 08:51:58 AM; File Path: T:\PROJECTS\Final_Energy\429847_0103_Broadview_Substation_Expansion\Aerial\WDR.aprx; Layout Name: Fig02_Aerial



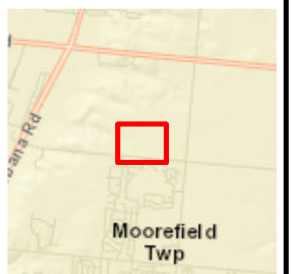
 PROJECT STUDY AREA

BASE MAP: GOOGLE MAPS.



1:2,400
 1" = 200'

0 200 400 FEET



PROJECT: **FIRSTENERGY
 BROADVIEW SUBSTATION EXPANSION PROJECT
 CLARK COUNTY, OH**

TITLE: **AERIAL MAP**

DRAWN BY: M. OPEL PROJ. NO.: 429847.0103

CHECKED BY: M. MOLNAR

APPROVED BY: B. FALKINBURG

DATE: JUNE 2024

FIGURE 2



1382 WEST NINTH STREET
 SUITE 400
 CLEVELAND, OH 44113
 PHONE: 216-344-3072

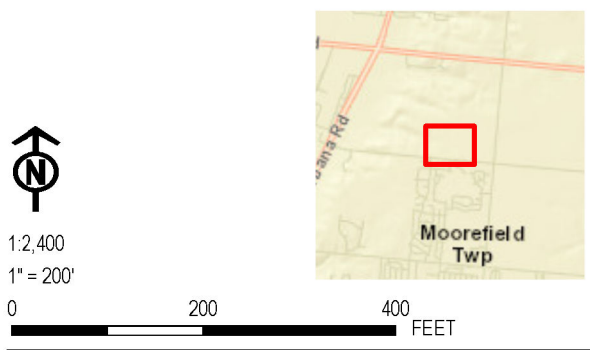
FILE: WDR.aprx

Coordinate System: NAD 1983 StatePlane Ohio South FIPS 3402 Feet; Map Rotation: 0
 -- Saved By: MOPEL on 7/24/2024, 08:46:57 AM; File Path: T:\PROJECTS\Final_Energy\29847_0103_Broadview_Substation_Expansion\B-APPX\WDR.aprx; Layout Name: Fig03_Soils



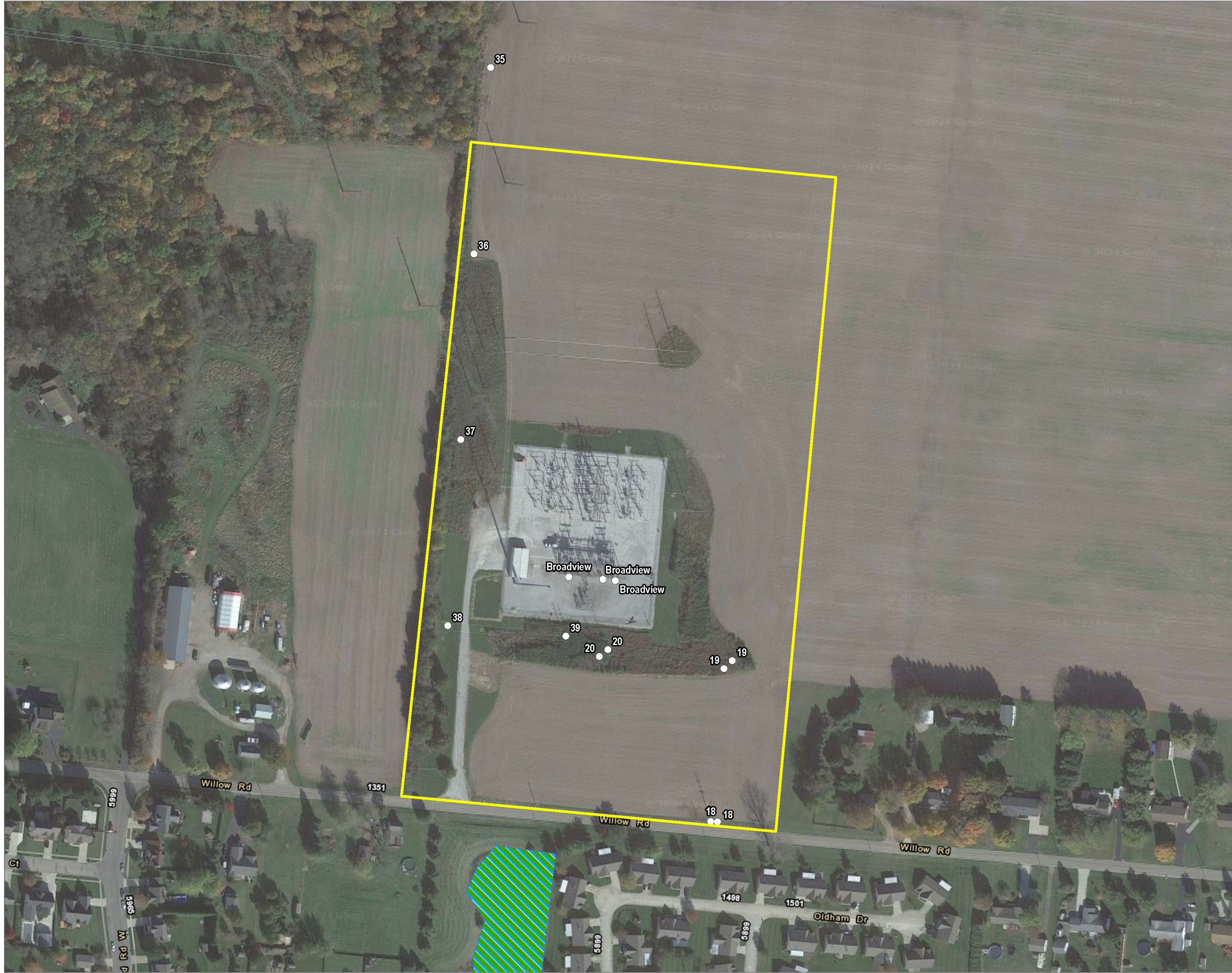
- PROJECT STUDY AREA
- EXISTING STRUCTURE
- HYDRIC SOIL
- NON-HYDRIC W/ HYDRIC INCLUSIONS SOIL
- NON-HYDRIC SOIL

BASE MAP: GOOGLE MAPS
 DATA SOURCES: SOILS DATA ACQUIRED FROM USDA/NRCS SSURGO DATABASE.



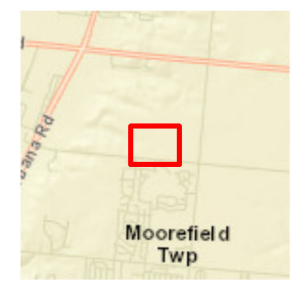
PROJECT: FIRSTENERGY BROADVIEW SUBSTATION EXPANSION PROJECT CLARK COUNTY, OH	
TITLE: SOILS MAP	
DRAWN BY: M. OPEL	PROJ. NO.: 429847.0103
CHECKED BY: M. MOLNAR	FIGURE 3
APPROVED BY: B. FALKINBURG	
DATE: JULY 2024	
1382 WEST NINTH STREET SUITE 400 CLEVELAND, OH 44113 PHONE: 216-344-3072	
FILE:	WDR.aprx

Coordinate System: NAD 1983 StatePlane Ohio South FIPS 3402 Feet; Map Rotation: 0
 -- Saved By: MOPEL on 7/24/2024, 08:44:11 AM; File Path: T:\PROJECTS\First_Energy\Map2847_0103_Broadview_Substation_Expansion\APRX\WDR.aprx; Layout Name: Fig04_Hydro



- PROJECT STUDY AREA
- EXISTING STRUCTURE
- NATIONAL HYDROGRAPHY DATASET (NHD) STREAM
- NATIONAL WETLANDS INVENTORY (NWI) FEATURE
- 100-YEAR FLOOD ZONE

BASE MAP: GOOGLE MAPS.
 DATA SOURCES: WETLAND DATA ACQUIRED FROM U.S. FISH & WILDLIFE SERVICE, NATIONAL WETLANDS INVENTORY (NWI). STREAM DATA ACQUIRED FROM USGS, NATIONAL HYDROGRAPHY DATASET (NHD). FLOOD DATA ACQUIRED FROM FEMA, NATIONAL FLOOD HAZARD LAYER (NFHL).



1:2,400
 1" = 200'



PROJECT: FIRSTENERGY BROADVIEW SUBSTATION EXPANSION PROJECT CLARK COUNTY, OH	
TITLE: NHD, NWI AND FEMA FLOODPLAIN MAP	
DRAWN BY: M. OPEL	PROJ. NO.: 429847.0103
CHECKED BY: M. MOLNAR	FIGURE 4
APPROVED BY: B. FALKINBURG	
DATE: JULY 2024	
1382 WEST NINTH STREET SUITE 400 CLEVELAND, OH 44113 PHONE: 216-344-3072	
FILE:	WDR.aprx

Coordinate System: NAD 1983 StatePlane Ohio South FIPS 3402 Feet; Map Rotation: 0
 -- Saved By: MOPEL on 7/24/2024, 08:41:08 AM; File Path: T:\PROJECTS\Final_Energy\429847_0103_Broadview_Substation_Expansion\GIS\WDR.aprx; Layout Name: Fig05_Delineation

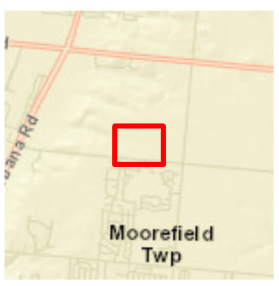
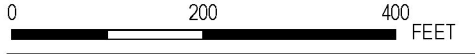


- PROJECT STUDY AREA
- CULVERT
- UPLAND DATA POINT

BASE MAP: GOOGLE MAPS
 DATA SOURCES: TRC WETLAND DELINEATION COMPLETED JUNE 11, 2024.



1:2,400
 1" = 200'



PROJECT: **FIRSTENERGY
 BROADVIEW SUBSTATION EXPANSION PROJECT
 CLARK COUNTY, OH**

TITLE: **DELINEATED RESOURCES MAP**

DRAWN BY: M. OPEL	PROJ. NO.: 429847.0103
CHECKED BY: M. MOLNAR	FIGURE 5
APPROVED BY: B. FALKINBURG	
DATE: JULY 2024	

1382 WEST NINTH STREET
 SUITE 400
 CLEVELAND, OH 44113
 PHONE: 216-344-3072

FILE: WDR.aprx

ATTACHMENT B – Photographic Record

Client Name: FirstEnergy	Site Location: Moorefield Township, Clark County, Ohio	Project No.: 429847.0103.0000
------------------------------------	--	---

Photo No. 1.

Photo Date:
6/11/2024

Description:
Representative photo of upland habitat within the western extent of the Project Study Area, facing east.



Photo No. 2.

Photo Date:
6/11/2024

Description:
Representative photo of the maintained transmission line right-of-way, facing south.



Client Name: FirstEnergy	Site Location: Moorefield Township, Clark County, Ohio	Project No.: 429847.0103.0000
------------------------------------	--	---

Photo No. 3.

Photo Date:
6/11/2024

Description:

Representative photo of row crop agriculture within the northeastern extent of the Project Study Area, facing south.



Photo No. 4.

Photo Date:
6/11/2024

Description:

Representative photo of row crop agriculture within the southern extent of the Project Study Area, facing east.



Client Name: FirstEnergy	Site Location: Moorefield Township, Clark County, Ohio	Project No.: 429847.0103.0000
------------------------------------	--	---

Photo No. 5.

Photo Date:
6/11/2024

Description:

Representative photo of upland habitat within the southern extent of the Project Study Area, facing west.



Photo No. 6.

Photo Date:
6/11/2024

Description:

Representative photo of upland habitat within the northeastern extent of the Project Study Area, facing north.



Client Name: FirstEnergy	Site Location: Moorefield Township, Clark County, Ohio	Project No.: 429847.0103.0000
------------------------------------	--	---

Photo No. 7.

Photo Date:
6/11/2024

Description:

Representative photo of upland forested habitat within the southwestern extent of the Project Study Area, facing north.



Photo No. 8.

Photo Date:
6/11/2024

Description:

Photo of the existing access road, facing south.



ATTACHMENT C – Data Sheet

WETLAND DETERMINATION DATA FORM – Midwest Region

Project/Site: Broadview Substation City/County: Springfield, Clark County Sampling Date: 2024-6-11
 Applicant/Owner: FirstEnergy State: OH Sampling Point: U-EKG-01
 Investigator(s): Emma Given, Jason Merkel Section, Township, Range: 23 5E 10N
 Landform (hillslope, terrace, etc): Hillslope Local relief (concave, convex, none): None
 Slope (%): 1 to 10 Lat: 40.0123628 Long: -83.7704997 Datum: WGS84
 Soil Map Unit Name: Miamian silty clay loam, 2 to 6 percent slopes, eroded NWI Classification: None
 Are climatic / hydrologic conditions on the site typical for this time of year? Yes No (If no, explain in Remarks.)
 Are Vegetation , Soil , or Hydrology significantly disturbed? Are "Normal Circumstances" present? Yes No
 Are Vegetation , Soil , or Hydrology naturally problematic? (If needed, explain any answers in Remarks.)

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

Hydrophytic Vegetation Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> Hydric Soil Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> Wetland Hydrology Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	Is the Sampled Area within a Wetland? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
Remarks: Covertypes is UPL. Based on the absence of all three parameters, this area is an upland.	

VEGETATION – Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status																																	
Tree Stratum (Plot size: <u>30 ft radius</u>)																																				
1. _____	_____	_____	_____	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A) Total Number of Dominant Species Across All Strata: <u>3</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>33.3%</u> (A/B)																																
2. _____	_____	_____	_____																																	
3. _____	_____	_____	_____																																	
4. _____	_____	_____	_____																																	
5. _____	_____	_____	_____																																	
0 = Total Cover				Prevalence Index worksheet: <table style="width:100%; border-collapse: collapse;"> <tr> <td align="center" colspan="2">Total % Cover of:</td> <td align="center" colspan="2">Multiply by:</td> </tr> <tr> <td>OBL species</td> <td align="center">0</td> <td>x 1 =</td> <td align="center">0</td> </tr> <tr> <td>FACW species</td> <td align="center">0</td> <td>x 2 =</td> <td align="center">0</td> </tr> <tr> <td>FAC species</td> <td align="center">20</td> <td>x 3 =</td> <td align="center">60</td> </tr> <tr> <td>FACU species</td> <td align="center">70</td> <td>x 4 =</td> <td align="center">280</td> </tr> <tr> <td>UPL species</td> <td align="center">5</td> <td>x 5 =</td> <td align="center">25</td> </tr> <tr> <td>Column Totals:</td> <td align="center">95</td> <td>(A)</td> <td align="center">365 (B)</td> </tr> <tr> <td align="center" colspan="4">Prevalence Index = B/A = <u>3.8</u></td> </tr> </table>	Total % Cover of:		Multiply by:		OBL species	0	x 1 =	0	FACW species	0	x 2 =	0	FAC species	20	x 3 =	60	FACU species	70	x 4 =	280	UPL species	5	x 5 =	25	Column Totals:	95	(A)	365 (B)	Prevalence Index = B/A = <u>3.8</u>			
Total % Cover of:		Multiply by:																																		
OBL species	0	x 1 =	0																																	
FACW species	0	x 2 =	0																																	
FAC species	20	x 3 =	60																																	
FACU species	70	x 4 =	280																																	
UPL species	5	x 5 =	25																																	
Column Totals:	95	(A)	365 (B)																																	
Prevalence Index = B/A = <u>3.8</u>																																				
Sapling/Shrub Stratum (Plot size: <u>15 ft radius</u>)																																				
1. _____	_____	_____	_____																																	
2. _____	_____	_____	_____																																	
3. _____	_____	_____	_____																																	
4. _____	_____	_____	_____																																	
5. _____	_____	_____	_____																																	
0 = Total Cover																																				
Herb Stratum (Plot size: <u>5 ft radius</u>)																																				
1. <u>Bromus inermis</u>	25	Yes	FACU	Hydrophytic Vegetation Indicators: ___ 1 - Rapid Test for Hydrophytic Vegetation ___ 2 - Dominance Test is >50% ___ 3 - Prevalence Index is ≤3.0 ¹ ___ 4 - Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) ___ Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.																																
2. <u>Poa pratensis</u>	20	Yes	FAC																																	
3. <u>Solidago altissima</u>	20	Yes	FACU																																	
4. <u>Cichorium intybus</u>	15	No	FACU																																	
5. <u>Erigeron strigosus</u>	5	No	FACU																																	
6. <u>Trifolium pratense</u>	5	No	FACU																																	
7. <u>Daucus carota</u>	5	No	UPL																																	
8. _____	_____	_____	_____																																	
9. _____	_____	_____	_____																																	
10. _____	_____	_____	_____																																	
95 = Total Cover																																				
Woody Vine Stratum (Plot size: <u>30 ft radius</u>)																																				
1. _____	_____	_____	_____																																	
2. _____	_____	_____	_____																																	
0 = Total Cover																																				

Remarks:
 No vegetation comments.

SOIL

Sampling Point: U-EKG-01

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)								
Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
0 to 4	10YR 5/3	100					Silty Clay Loam	

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered or Coated Sand Grains. ²Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: <input type="checkbox"/> Histosol (A1) <input type="checkbox"/> Histic Epipedon (A2) <input type="checkbox"/> Black Histic (A3) <input type="checkbox"/> Hydrogen Sulfide (A4) <input type="checkbox"/> Stratified Layers (A5) <input type="checkbox"/> 2 cm Muck (A10) <input type="checkbox"/> Depleted Below Dark Surface (A11) <input type="checkbox"/> Thick Dark Surface (A12) <input type="checkbox"/> Sandy Mucky Mineral (S1) <input type="checkbox"/> 5 cm Muck Peat or Peat (S3)	<input type="checkbox"/> Sandy Gleyed Matrix (S4) <input type="checkbox"/> Sandy Redox (S5) <input type="checkbox"/> Stripped Matrix (S6) <input type="checkbox"/> Loamy Mucky Mineral (F1) <input type="checkbox"/> Loamy Gleyed Matrix (F2) <input type="checkbox"/> Depleted Matrix (F3) <input type="checkbox"/> Redox Dark Surface (F6) <input type="checkbox"/> Depleted Dark Surface (F7) <input type="checkbox"/> Redox Depressions (F8)	Indicators for Problematic Hydric Soils³: <input type="checkbox"/> Coast Prairie Redox (A16) <input type="checkbox"/> Dark Surface (S7) <input type="checkbox"/> Iron-Manganese Masses (F12) <input type="checkbox"/> Very Shallow Dark Surface (TF12) <input type="checkbox"/> Other (Explain in Remarks)
--	--	---

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if present): Type: <u>fill</u> Depth (inches): <u>4</u>	Hydric Soil Present? Yes _____ No <input checked="" type="checkbox"/>
---	--

Remarks:
The criterion for hydric soil is not met.

HYDROLOGY

Wetland Hydrology Indicators: Primary Indicators (minimum of one is required; check all that apply)		Secondary Indicators (minimum of two required)
<input type="checkbox"/> Surface Water (A1) <input type="checkbox"/> High Water Table (A2) <input type="checkbox"/> Saturation (A3) <input type="checkbox"/> Water Marks (B1) <input type="checkbox"/> Sediment Deposits (B2) <input type="checkbox"/> Drift Deposits (B3) <input type="checkbox"/> Algal Mat or Crust (B4) <input type="checkbox"/> Iron Deposits (B5) <input type="checkbox"/> Inundation Visible on Aerial Imagery (B7) <input type="checkbox"/> Sparsely Vegetated Concave Surface (B8)	<input type="checkbox"/> Water-Stained Leaves (B9) <input type="checkbox"/> Aquatic Fauna (B13) <input type="checkbox"/> True Aquatic Plants (B14) <input type="checkbox"/> Hydrogen Sulfide Odor (C1) <input type="checkbox"/> Oxidized Rhizospheres along Living Roots (C3) <input type="checkbox"/> Presence of Reduced Iron (C4) <input type="checkbox"/> Recent Iron Reduction in Tilled Soils (C6) <input type="checkbox"/> Thin Muck Surface (C7) <input type="checkbox"/> Gauge or Well Data (D9)	<input type="checkbox"/> Surface Soil Cracks (B6) <input type="checkbox"/> Drainage Patterns (B10) <input type="checkbox"/> Dry-Season Water Table (C2) <input type="checkbox"/> Crayfish Burrows (C8) <input type="checkbox"/> Saturation Visible on Aerial Imagery (C9) <input type="checkbox"/> Stunted or Stressed Plants (D1) <input type="checkbox"/> Geomorphic Position (D2) <input type="checkbox"/> FAC-Neutral Test (D5) <input type="checkbox"/> Other (Explain in Remarks)

Field Observations: Surface Water Present? Yes _____ No <input checked="" type="checkbox"/> Depth (inches): _____ Water Table Present? Yes _____ No <input checked="" type="checkbox"/> Depth (inches): _____ Saturation Present? Yes _____ No <input checked="" type="checkbox"/> Depth (inches): _____ (includes capillary fringe)	Wetland Hydrology Present? Yes _____ No <input checked="" type="checkbox"/>
--	--

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

Remarks:
The criterion for wetland hydrology is not met.