Northern Missouri Grid

TRANSFORMATION PROGRAM

WELCOME TO OUR OPEN HOUSE!

GOAL OF TODAY'S OPEN HOUSE:

- Learn more about the project
- See what's happening in your county
- Provide input to the project team

We look forward to connecting with community members, landowners and stakeholders to learn as much as we can about your area to help us develop this program. Thank you for your time and feedback as we work to improve energy reliability for your community.

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PART OF A REGIONAL PLAN FOR ENERGY RELIABILITY

The project is part of a larger initiative from Midcontinent Independent System Operator (MISO), an independent member organization that works with midwestern states and Manitoba, Canada, to ensure reliable, resilient and affordable energy for the region.

Visit misoenergy.org to learn more.

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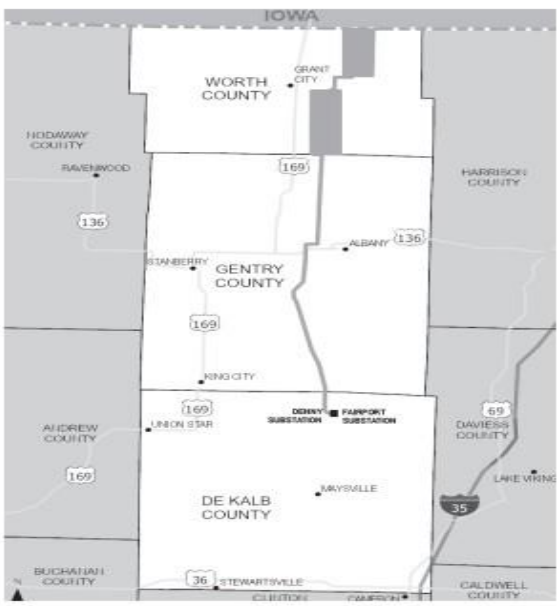
ABOUT THE PROJECT

Ameren Transmission Company of Illinois (ATXI) and Missouri Joint Electric Utility Commission (MJMEUC) are working together to build a more reliable and resilient energy grid for the future.

The Fairport-Denny-Iowa/Missouri border (FDIM) Project includes the construction of approximately 44 miles of 345-kV transmission lines and a new 345-kV substation. The proposed FDIM project will route through DeKalb, Gentry and Worth counties and will include two transmission line segments. The first new 345-kV transmission line segment will connect Associated Electric Cooperative Incorporated's (AECI) existing Fairport substation in DeKalb County to ATXI's new Denny substation approximately one mile away, also in DeKalb County. The second new 345-kV transmission line segment will run from the new Denny substation approximately 43 miles north to the Iowa/Missouri border.

PROJECT MAP



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MJMEUC

Structures in Worth County

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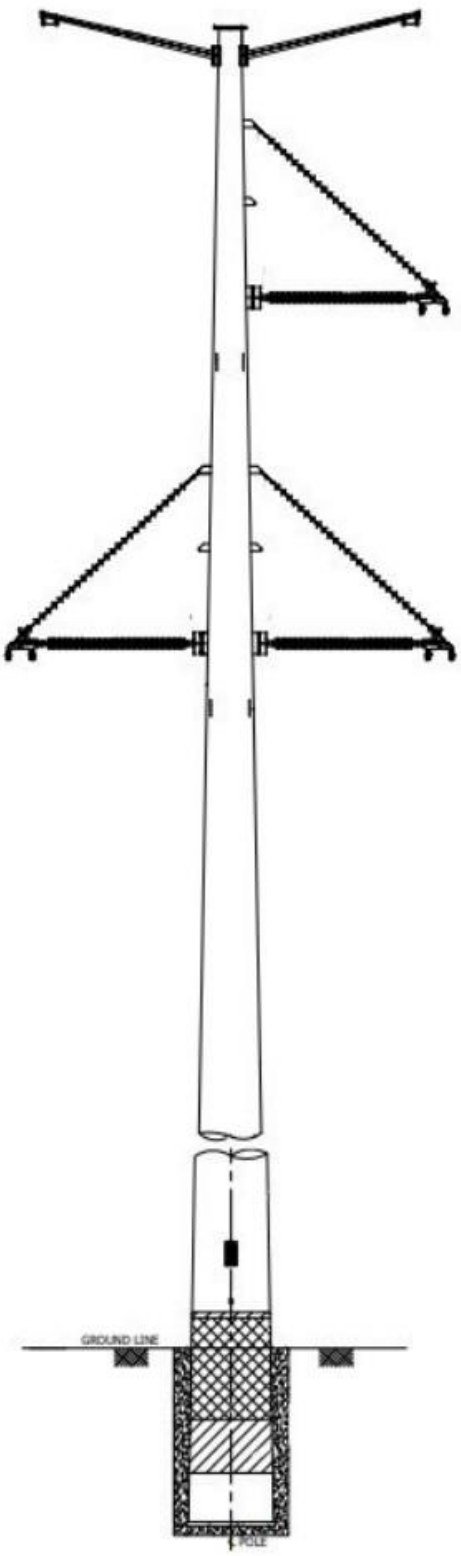

Typical New Structures

345kV

Weathering Steel Monopoles

Average Height
80-140ft

Average Span Length
700-900ft

Structures Per Mile
7-8 per mile

Conductor Clearance
25ft Minimum

A mixture of direct embed steel monopoles and drilled pier foundations will be utilized depending on soil conditions at each location. Drilled pier foundation are regularly used for large angles and dead-end structures. Number of arms on the new structures is dependent upon single or double circuit design and presence of distribution.

** Graphics are intended for information purposes only are not to scale. New structure designs may vary depending on final route.*

Structures in Gentry County

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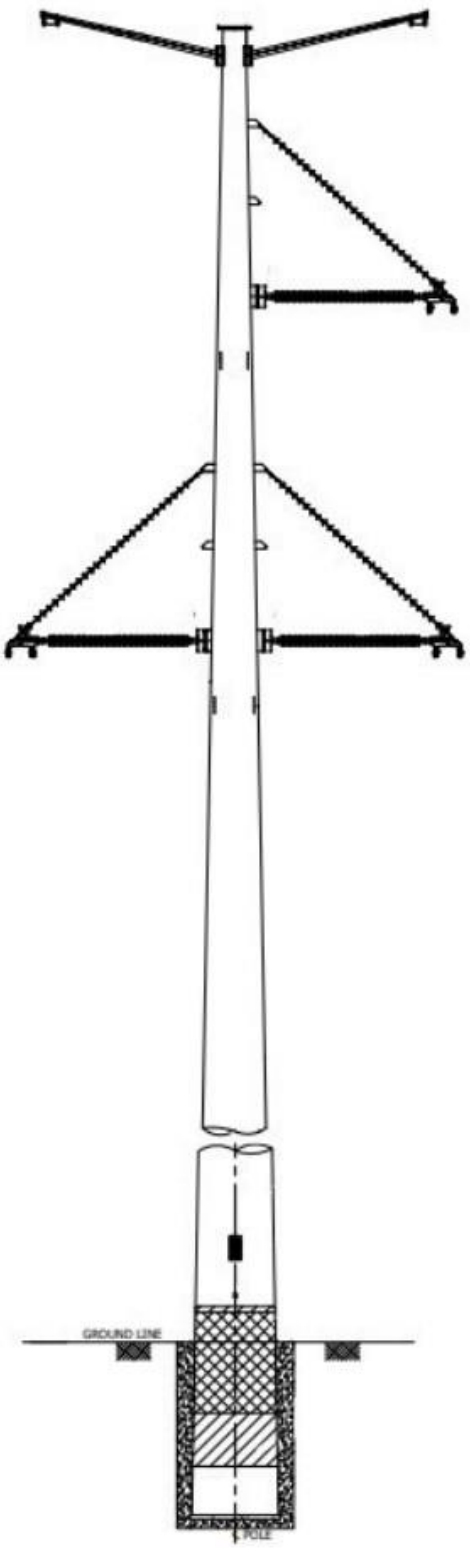

Typical New Structures

345kV

Weathering Steel Monopoles

Average Height
80-140ft

Average Span Length
700-900ft

Structures Per Mile
7-8 per mile

Conductor Clearance
25ft Minimum

A mixture of direct embed steel monopoles and drilled pier foundations will be utilized depending on soil conditions at each location. Drilled pier foundation are regularly used for large angles and dead-end structures. Number of arms on the new structures is dependent upon single or double circuit design and presence of distribution.

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Structures in DeKalb County

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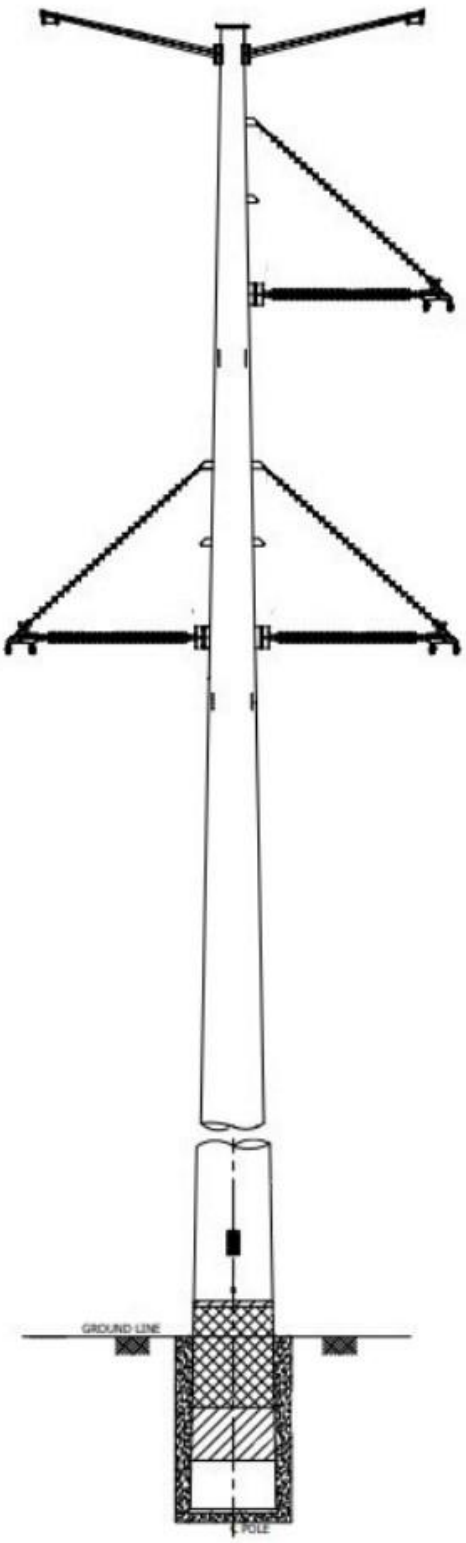

Typical New Structures

138/345kV

Weathering Steel Monopoles

Average Height
80-140ft

Average Span Length
700-900ft

Structures Per Mile
7-8 per mile

Conductor Clearance
25ft Minimum

A mixture of direct embed steel monopoles and drilled pier foundations will be utilized depending on soil conditions at each location. Drilled pier foundation are regularly used for large angles and dead-end structures. Number of arms on the new structures is dependent upon single or double circuit design and presence of distribution.

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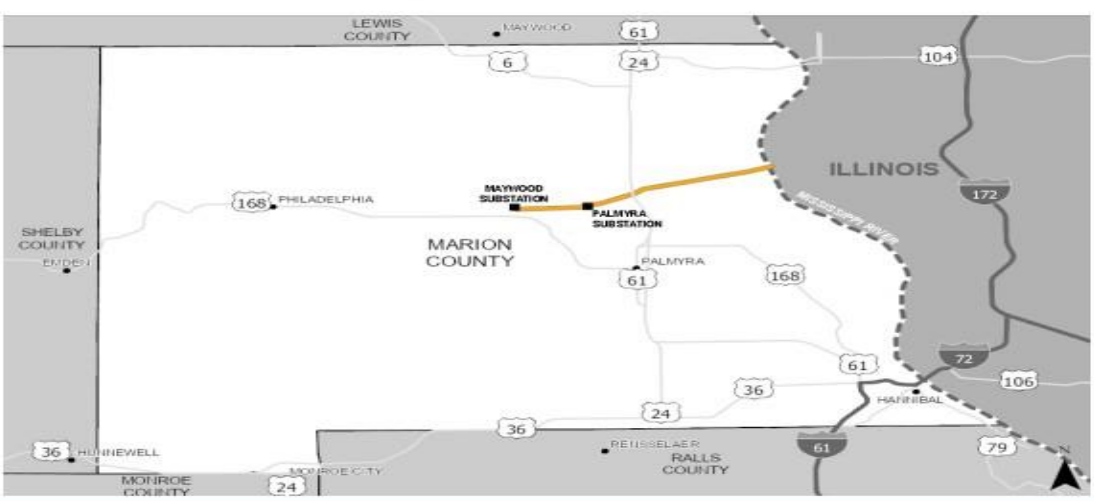
ABOUT THE PROJECT

Ameren Transmission Company of Illinois (ATXI) and Ameren Missouri are working together to build a more reliable and resilient energy grid for the future.

The Maywood-Mississippi River Crossing (MMRX) Project is located in Marion County and includes the construction of approximately nine miles of new 345 kV transmission line from ATXI's existing Maywood substation near Palmyra, Missouri across the Mississippi River to Illinois. Approximately eight miles of the project will be rebuilt along existing corridors and co-located with Ameren Missouri's existing 161 kV transmission line. The project also includes upgrades to the Maywood substation.

PROJECT MAP



Ameren MISSOURI

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Structures in Marion County

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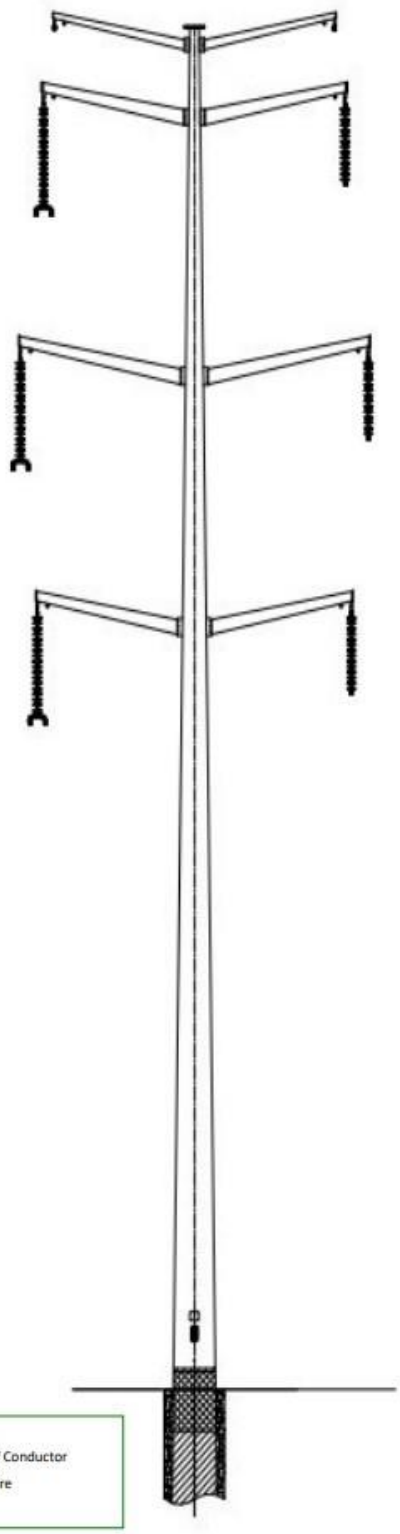

Double Circuit
- 6 Arms for Phases of Conductor
- 2 Arms for Shield Wire

Typical New Structures

161/345kV

Weathering Steel Monopoles

Average Height
80-140ft

Average Span Length
700-900ft

Structures Per Mile
7-8 per mile

Conductor Clearance
25ft Minimum

A mixture of direct embed steel monopoles and drilled pier foundations will be utilized depending on soil conditions at each location. Drilled pier foundation are regularly used for large angles and dead-end structures. Number of arms on the new structures is dependent upon single or double circuit design and presence of distribution.

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Structures in Marion County

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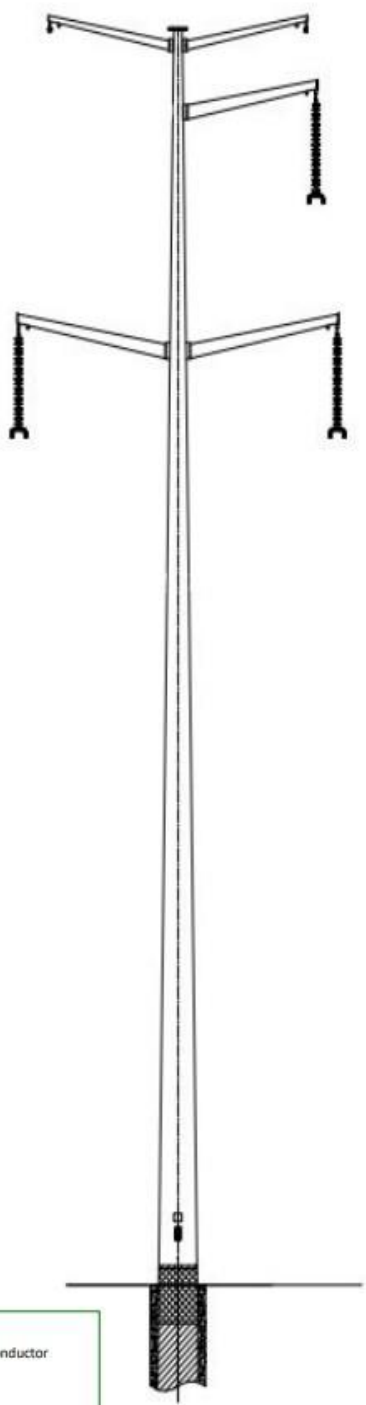

Single Circuit
- 3 Arms for Phases of Conductor
- 2 Arms for Shield Wire

Typical New Structures

345kV

Weathering Steel Monopoles

Average Height
80-140ft

Average Span Length
700-900ft

Structures Per Mile
7-8 per mile

Conductor Clearance
25ft Minimum

A mixture of direct embed steel monopoles and drilled pier foundations will be utilized depending on soil conditions at each location. Drilled pier foundation are regularly used for large angles and dead-end structures. Number of arms on the new structures is dependent upon single or double circuit design and presence of distribution.

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WHAT IS ENERGY RELIABILITY? ENERGY RELIABILITY?

Our energy grid is similar to our road system in the way they allow energy from generation sources to travel short or long distances, as needed, at any given moment. On the road, when your main route is closed for construction, you review your options and find an alternative. In some cases, alternatives just don't exist, or they can't handle the increased traffic and users experience backups.

The energy grid is no different! If a large storm were to take out multiple transmission or distribution lines or "routes" in your area, local homes and businesses would be served by a lower capacity which could lead to reliability issues in the area.

With this program we can add more capacity or "alternate routes" to meet the changing needs in your community!

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ANTICIPATED SCHEDULE

WINTER TO SUMMER **2024**

- Project Planning
- Routing
- Stakeholder & Public Egagement

SUMMER **2024**

- Finalize route and file a Certificate of Convenience and Necessity (CCN) application with Missouri Public Service Commission (MoPSC).

MID **2025**

- Receive a CCN decision from the MoPSC
- Real Estate begins
- Permitting and agency coordination; and environmental studies/surveys.

FALL **2026**

- Construction Begins (Different start dates in each community)

MID **2028**

- Program in-service

FALL **2028**

- Restoration complete

*All items shown are pending regulatory approvals. Schedule is subject to change.

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FULFILLING A NEED

The program will prepare the grid for the future by replacing aging infrastructure, adding transmission capacity to ensure energy **reliability and resiliency**, and promoting more access to energy sources for communities.

Increasing transmission capacity to meet changing energy needs.

Supporting lower energy supply costs.

Improving energy reliability for the surrounding region and local communities.

Promoting access to diverse energy sources.

Growing economic development opportunities.

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CONSTRUCTION

CONSTRUCTION WILL BEGIN IN 2026

Transmission line construction is completed in intermittent phases and will not be constant on landowner property. We will provide more information before construction begins on any landowner property. On most structures, there will be six major stages of construction including:

Surveys, soil borings, vegetation management and access roads

Assemble structure on the ground

Dig structure holes

Lift structure into hole and backfill with concrete

String wires

Energize line and restore easement

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ENVIRONMENTAL REVIEW & AGENCY COORDINATION

Our team coordinates with federal, state and local agencies regarding protected or sensitive resources within the program area. Sometimes additional permits or approvals from these agencies are necessary for construction:

U.S. ARMY CORPS OF ENGINEERS
Section 404 Clean Water Act
Section 10 Rivers and Harbors Act

U.S. FISH AND WILDLIFE SERVICE
Endangered Species Act, Bald and Golden Eagle Protection Act, and Migratory Bird Treaty Act

MISSOURI ENVIRONMENTAL PROTECTION AGENCY
Section 401 Water Quality Certificate and General NPDES Permit for stormwater discharge from construction site

MISSOURI HISTORIC PRESERVATION AGENCY
Section 106 Cultural Resources Review

MISSOURI DEPARTMENT OF TRANSPORTATION
Road permits

MISSOURI DEPARTMENT OF NATURAL RESOURCES
State protected natural features and species

MISSOURI DEPARTMENT OF AGRICULTURE
Working with agricultural communities

LOCAL PERMITS
Erosion control and road crossings

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VEGETATION MANAGEMENT

Safety and reliability are the driving factors behind managing trees, and other forms of vegetation, around our transmission lines. Trees and other vegetation can damage the line and hinder our ability to deliver electric services safely and reliably. They can make the job of storm restoration more difficult, extend restoration times and pose additional hazards to line crews.

To protect the public and reduce the risk of extended power outages, Ameren has a vegetation management program designed to ensure proper clearances around the lines as required by federal and state agencies. The program reduces the potential for damage and allows access for crews to maintain and repair transmission equipment.

This vegetation management work may include:

TREE LINE USA.
An Arbor Day Foundation Program

- **Inspections**
- **Mowing and Removal of Vegetation**
- **Manual and Aerial Trimming**

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REAL ESTATE

Ameren's real estate team will have several land agents assisting landowners during the entire real estate process for existing and new corridors. Discussions with landowners will include topics such as:

- Land surveys and studies
- Access roads
- Structure/line design
- Right-of-way clearing
- Compensation
- Property restoration

EASEMENTS

The typical total easement width for the new structures is 150 feet. The width requested along existing corridors will vary depending on the current easement widths in those locations.

Easements allow our team access for construction, operation and maintenance of the transmission line. In general, the land can continue to be used as before, provided that the use does not interfere with the transmission line.

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WE VALUE YOUR INPUT

TELL US YOUR THOUGHTS

COMMENT FORM
Submit a comment form today or email/mail it to us later.

ONLINE COMMENT MAP
Submit a comment on our online comment map.

VIRTUAL ENGAGEMENT
Review similar information from today's open house.

PROGRAM WEBSITE
Learn more at Ameren.com/NorthernMoGrid

CONTACT US
1.833.799.1633 connect@AmerenGridMO.com

Ameren TRANSMISSION

Visit our Interactive Map