



## Case Study

**Organization**  
American Electric Power

**Location**  
Columbus, Ohio

**Industry**  
Electric Utilities

# AEP Plans Transmission Routes in Just Two Weeks

American Electric Power (AEP) sustains the largest electric transmission network in the United States and the greatest number of extra-high-voltage transmission lines—more than all other US transmission systems combined. With so much system activity, project planning is a high priority. AEP sought to streamline project planning.

## What did they do?

In the past, a transmission line plan started with a planner putting screen captures into PowerPoint. This information had no geographic reference and was not captured in a database, so if the file got lost, the project was restarted from scratch. As the file moved from planning to engineering and other departments, multiple file versions built up. Using an ArcGIS<sup>SM</sup> Online, geographic information system (GIS) specialist Michael Bowen built a web application that contained all proposed routes as layers. Everyone across departments could refine the route layers from a single view to reflect environmental issues, rights-of-way, and other considerations.

## Do I need this?

If you have many teams collaborating on route planning, you should consider using ArcGIS Online. AEP was able to give access to specific named users—including project managers, planners, engineers, and siting staff—who could change proposed routes in real time. ArcGIS Online supported better collaboration among teams and departments by allowing data and layers to be easily integrated and shared. AEP sped up its planning process, from project concept to execution, thanks to everyone accessing real-time information.

“Before using ArcGIS Online, we would pass .mxd files back and forth or put the project on a shared drive. That meant 15 people might access and manipulate the file at once, creating an undesirable versioning nightmare. ArcGIS Online just makes the process so simple.”

**Michael J. Bowen**  
GIS Specialist  
American Electric Power



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