9 STEPS TO PERFORM A DESKTOP ANALYSIS

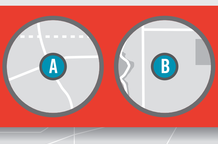
A BETTER PROCESS FOR ROUTING NATURAL GAS FACILITIES

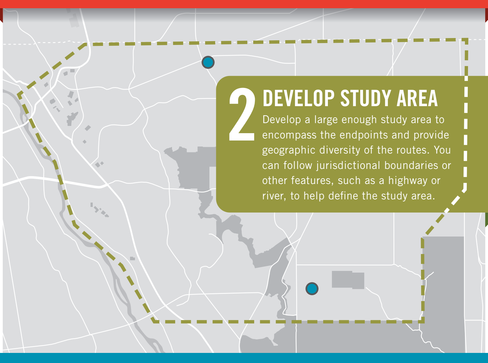
Routing a natural gas pipeline is a complicated process that requires a large amount of upfront research before a route is identified. Enter the desktop analysis. An in-depth investigation of a large study area, a desktop analysis allows you to:

- Gather GIS datasets, land use data, public comments, agency input, etc.
- Evaluate many different criteria and routes simultaneously
- Identify opportunities and constraints through data analysis
- Determine the best alternative route… ultimately saving time and money

1 IDENTIFY ENDPOINTS

To begin the desktop analysis, define your project endpoints.





2 DEVELOP STUDY AREA

Develop a large enough study area to encompass the endpoints and provide geographic diversity of the routes. You can follow jurisdictional boundaries or other features, such as a highway or river, to help define the study area.

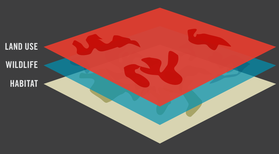
3 DEVELOP EVALUATION CRITERIA

Review the study area and develop evaluation criteria to analyze the routes. The criteria should be customized to reflect the constraint features within the study area.

- ☑ LENGTH OF ROUTE
- ☑ NWI WETLANDS
- ☑ STREAM CROSSINGS

4 GATHER OPPORTUNITES AND CONSTRAINTS

Gather GIS datasets from federal, state and local agency websites for environmental and land use data within the study area to identify opportunities and constraints.

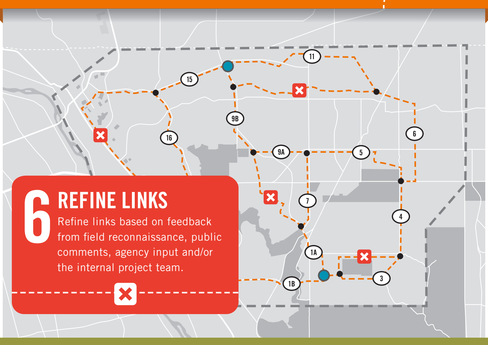


OPPORTUNITIES:
Areas compatible to route a transmission line (i.e., adjacent to existing transmission line or roadway)

CONSTRAINTS:
Conflicting land use and environmentally sensitive areas

5 IDENTIFY LINKS

Develop route links by maximizing areas of opportunity while minimizing or avoiding areas of constraints.

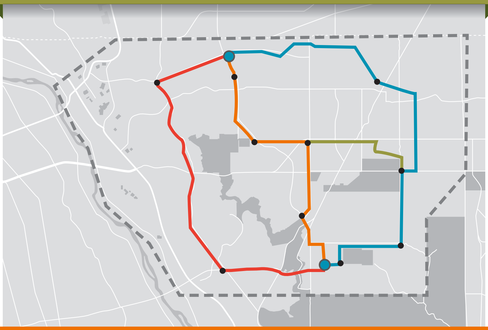


6 REFINE LINKS

Refine links based on feedback from field reconnaissance, public comments, agency input and/or the internal project team.

7 IDENTIFY ALTERNATE ROUTES

Identify geographically diverse end-to-end routes using the refined links in a forward progressing manner.



8 DATA ANALYSIS OF ROUTES

Using the evaluation criteria developed for the project, analyze each route using GIS data to create the metrics for comparison.

9 SELECT BEST ALTERNATIVE

Select the route that best balances the potential impacts of all the routes. The shortest route is not always the best route. Often additional route lengths can save time and money by avoiding difficult and costly permitting constraints.

LET'S TALK ROUTING AND SITING

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For more information about this topic, check out Anastacia's article *A Different Approach: Routing and Siting from the Electric Transmission Perspective.*

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