



12300 Elm Creek Boulevard
Maple Grove, Minnesota 55369-4718
763-445-5000
greatriverenergy.com

March 31, 2016

VIA ELECTRONIC FILING

Mr. Daniel P. Wolf
Executive Secretary
Minnesota Public Utilities Commission
350 Metro Square Building
121 Seventh Place East
St. Paul, MN 55101

Re: *In the Matter of the Route Permit Application by Great River Energy and Minnesota Power for a 115 kV Transmission Line near Menahga, Minnesota - Docket No. ET2, E015/TL-14-797 – Request for Minor Alteration*

Dear Mr. Wolf:

Great River Energy, on behalf of Great River Energy and Minnesota Power ("Permittees"), requests that the Minnesota Public Utilities Commission ("Commission") approve a minor alteration of the route permitted (the "Permitted Route") in the Route Permit issued by the Commission on March 14, 2016 for the Menahga Area 115 kV Project ("Project") pursuant to Minnesota Rule 7850.4800.

Specifically, Great River Energy requests that the Commission approve two route/alignment modifications to the Permitted Route in the Blueberry Substation to Red Eye Substation segment in Wadena County to address landowner concerns. A minor alteration approval is appropriate because the requested changes have impacts comparable to the impacts associated with the Permitted Route and configuration and therefore do not result in significant change in the human or environmental impact of the facility.

Background

On March 14, 2016, the Commission issued an Order granting Permittees a Route Permit for the Project.

Minnesota Power will own and construct only a small portion of the Menahga Project, including the Straight River Substation and the short transmission line between the Straight River Substation and the Straight River Switch. Great River Energy will own and construct the remainder of the Menahga Project, including the segment between Blueberry Station and Red Eye Substation.

Since the January 28, 2016 meeting during which the Commission orally approved the Certificate of Need and Route Permit, Great River Energy has undertaken more site-specific review, including real estate records review and landowner discussions, and commenced detailed design work. Through these efforts, Great River Energy has identified two areas where route adjustments would be appropriate to minimize impacts to human settlement.

Applicable Law

A minor alteration is a change in a high voltage transmission line that does not result in significant changes in the human or environmental impact of the facility subject to the Power Plant Siting Act, Minnesota Statutes Chapter 216E. Minn. R. 7850.4800, Subp. 1. Permittees requesting a minor alteration must submit the application to the Commission. Minn. R. 7850.4800, Subp. 2. The Commission is authorized to approve a minor alteration after providing “at least a ten-day period for interested persons to submit comments on the application or to request that the matter be brought to the [C]ommission for consideration.” Minn. R. 7850.4800, Subp. 2.

The Minor Alterations

Great River Energy requests two alterations in the Blueberry Substation to Red Eye Substation segment of the Project. An overview map showing the alterations is enclosed as **Exhibit A**. Each of the alterations is described in more detail below.

Minor Alteration 1:

In the Order issued March 14, 2016, the Permitted Route between the Blueberry Substation and 350th Street is as follows: the line exits the Blueberry Substation and follows the existing Great River Energy 34.5 kV line east about 1,000 feet to the existing Minnesota Pipe Line corridor, turns to the southeast and parallels on the west side of the pipeline corridor for about ¼ mile to the south side of 350th Street, then heads east along 350th Street for about 1/3 mile. The line then turns south to follow 119th Avenue.

Great River Energy has had conversations with the landowner who owns the property along the pipeline corridor and 350th Street. This landowner is very concerned about impacts to the pond that he created (with input from the US Army Corps of Engineers) along the pipeline corridor (south of Structures 105 and 106 – **Exhibit B**) and impacts to his business and home along 350th Street, even if the transmission line were to be located on the opposite side of 350th Street. The landowner requested that the line not follow the pipeline corridor at all and that the re-routed transmission line be completely within his property. He has proposed that the transmission line would parallel the south side of Great River Energy’s 34.5 kV corridor for about ½ mile to just before his east property line, where the line would turn south for approximately ¼ mile to 119th Avenue (**Exhibit B**).

Great River Energy reviewed the landowner's request and determined it is constructible and reasonable. With the exception of wetland impacts, it will have impacts comparable to the original alignment. Approximately ¼ mile of the proposed new alignment is cross-country through a forested wetland (impacting about 2.4 additional acres). The proposed new alignment would reduce construction costs by an estimated \$84,000.

Minor Alteration 2:

Along the original 119th Avenue alignment between 350th Street and County State Aid Highway 13, the transmission line comes within approximately 275 feet of a home in Section 4, T137N, R35W. During the January 28, 2016 meeting during which the Commission orally approved the Certificate of Need and Route Permit, the Commission directed Great River Energy to work with this landowner on the alignment near the house to minimize impacts. The landowner has requested that the alignment be modified as shown in **Exhibit C**.

Great River Energy has reviewed the alternative and concluded it is constructible and reasonable. The property owner located to the south of Minor Alteration 2, who is affected by Structures 66 to 69, was consulted on this modification and is in agreement with the proposal. This alignment will have impacts similar to the original alignment except that the line would impact an additional approximately 1.5 acres of shrubby and forested wetland. The proposed new alignment would add approximately \$65,000 to Project costs.

Summary of Routing Factors

The routing factors identified in Minnesota Rule 7850.4100 are discussed in **Table 1**. Detailed information comparing impacts between the proposed minor alteration alignments and the original alignments is provided in **Table 2**.

Table 1. Routing Factors

| Minn. R. 7850.4100 | |
|--|--|
| A. Human settlement | Both minor alterations will result in decreased impacts on residential property. |
| B. Effects on public health and safety | No additional impacts on public health and safety are anticipated for the proposed minor alterations. |
| C. Effects on land-based economies | The original alignments both cross more agricultural land than the proposed minor alteration alignments (significantly more in the Minor Alteration 1 area). Effects on forested lands are similar. No effects on mining or tourism are anticipated for any of the alignments. |
| D. Effects on archaeological and historic resources | Cultural resources in the minor alteration areas will be evaluated in spring 2016. No effects on cultural resources are anticipated; however, if sites are identified, Great River Energy will coordinate with the U.S. Army Corps of Engineers and the Minnesota State Historic Preservation Office. |
| E. Natural environment | The minor alterations are not expected to increase impacts to air quality, rivers, lakes, streams, flora or fauna. Minor Alteration 1 will eliminate potential impacts to a pond along the pipeline corridor. The minor alterations will result in more impacts to wetlands (approximately 2.4 additional acres for Minor Alteration 1 and 1.5 additional acres for Minor Alteration 2 – see Table 2). |
| F. Effects on rare and unique natural resources | No additional impacts on rare and unique natural resources are anticipated for the proposed minor alterations. |
| G. Design options that maximize energy efficiencies, mitigate adverse environmental effects and accommodate expansion | Not applicable |
| H. Use or paralleling of existing rights-of-way, survey lines, natural division lines, and agricultural field boundaries | <p>Minor Alteration 1 uses a combination of existing transmission line ROW and a section line division (0.75 mile); the original alignment uses a combination of existing transmission line ROW, pipeline ROW and road ROW (0.68 mile).</p> <p>Minor Alteration 2 utilizes about 810 feet of agricultural field boundary; the original alignment utilizes about 562 feet of road ROW.</p> |
| I. Use of existing large electric power generating plant sites | Not applicable |

| | |
|--|---|
| J. Use of existing transmission line rights-of-way | <p>Minor Alteration 1 would use about ½ mile more existing transmission ROW (following Great River Energy's 34.5 kV line) than the original alignment.</p> <p>Minor Alteration 2 does not use existing transmission line ROW, nor does the original alignment in this area.</p> |
| K. Electrical system reliability | Both the minor alteration alignments and the original alignments will enable reliable transmission of electricity. |
| L. Costs | <p>Minor Alteration 1 is estimated to cost about \$84,000 less than the original alignment.</p> <p>Minor Alteration 2 is estimated to cost about \$65,000 more than the original alignment.</p> |

Table 2. Minor Alterations/Original Alignments Resource Details^a

| | Units | Minor Alteration 1 | Original Alignment | Minor Alteration 2 | Original Alignment |
|--|---------------|--------------------|--------------------|--------------------|--------------------|
| Total Length | Feet Miles | 3960 0.75 | 3580 0.68 | 1860 0.35 | 1753 0.33 |
| Length parallel to existing ROWs, survey lines, natural division lines, and ag field boundaries | Feet Miles | 3960 0.75 | 3580 0.68 | 810 0.15 | 562 0.11 |
| Use of existing transmission line ROW | Feet Miles | 2612 0.49 | 0 0 | 0 0 | 0 0 |
| Roads Crossed | Number | 1 | 1 | 0 | 0 |
| Parcels Crossed | Number | 3 | 3 | 2 | 1 |
| Residences within 150 feet of Transmission Line | Number | 0 | 0 | 0 | 0 |
| Wetlands Crossed | Number | 2 | 1 | 1 | 0 |
| Forested Land Impacted | Acres | 1.3 | 1.2 | 0 | 0 |
| Agricultural Land Impacted | Acres | 0.1 | 2.9 | 1.7 | 1.8 |
| Developed Land Impacted | Acres | 0 | 0 | 0 | 0 |
| Forested Wetlands Impacted | Acres | 2.9 | 0.5 | 1.5 | 0 |
| Open Land Impacted (Grassland) | Acres | 2.7 | 3.2 | 1.1 | 1.0 |

^a<https://gisdata.mn.gov/dataset/biota-landcover-gap>

Notice

Great River Energy has developed a landowner list (**Exhibit D**) identifying those landowners within and immediately adjacent to the proposed ROW for the new alignments. They have been copied on this submittal.

Conclusion

Great River Energy believes that neither of the proposed minor alterations significantly changes the impacts of the Project on humans or the environment and both should be approved. The minor alterations are similar in:

- Length
- Use of existing ROWs and other boundaries
- Roads and parcels crossed
- Proximity to residences
- Forested, developed and open lands impacted, and
- Cost

The minor alterations would impact more wetlands. In comparison, the original alignments impact more agricultural land, particularly in the Minor Alteration 1 area. The tradeoffs in impacts are appropriate to accommodate the landowners' requests to reduce impacts on their respective properties.

Great River Energy respectfully requests that the Commission approve these minor alteration requests.

Please contact me at (763) 445-5214 if you have any questions regarding this filing.

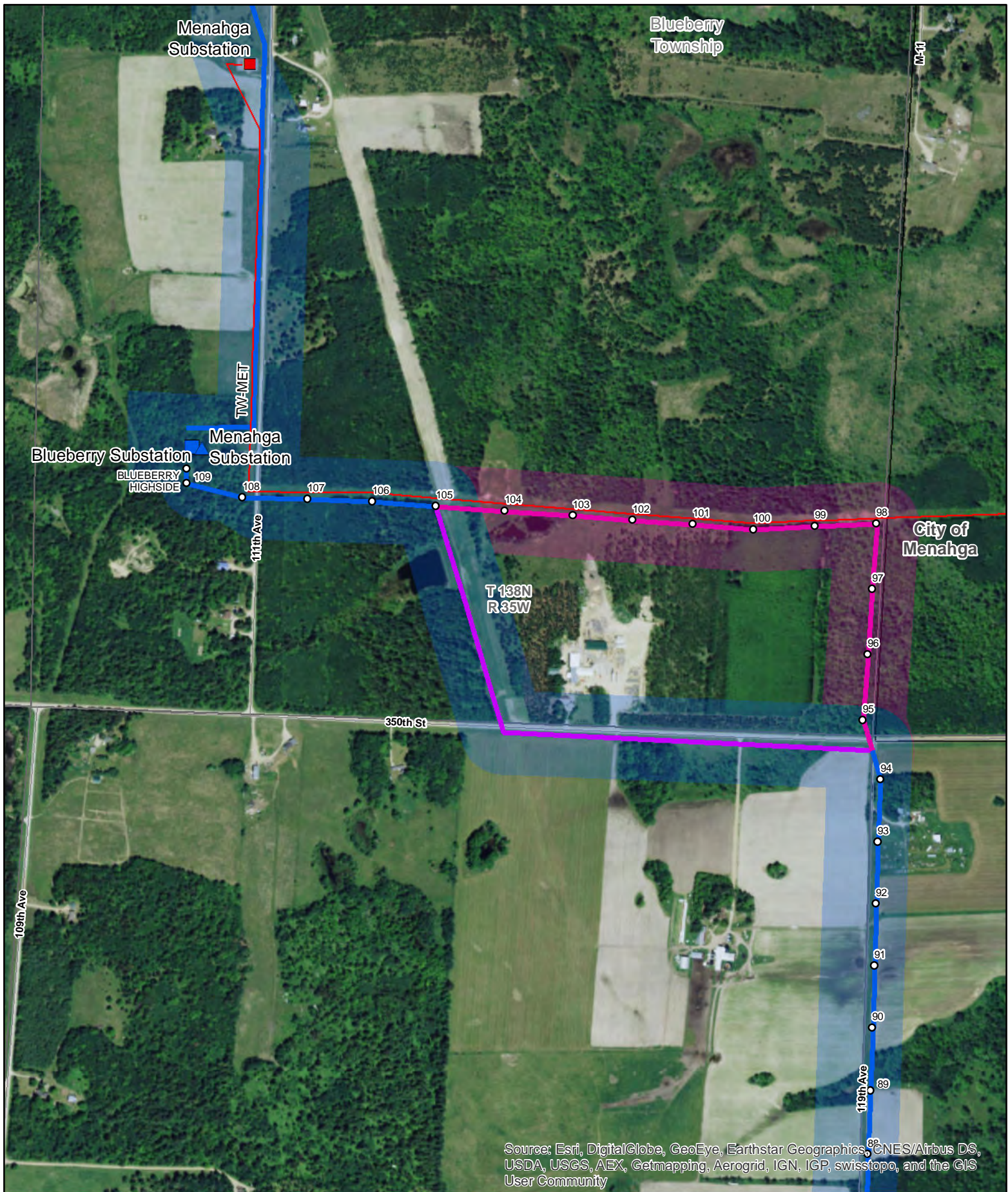
Sincerely,

GREAT RIVER ENERGY



Carole L. Schmidt
Supervisor, Transmission Permitting and Compliance

Attachments: **Exhibit A** – Map Showing Minor Alteration Requests
Exhibit B – Minor Alteration 1
Exhibit C – Minor Alteration 2
Exhibit D – Affected Landowner List



Great River Energy

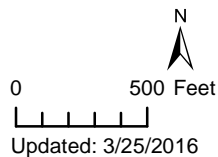
- Anticipated alignment 115 kV transmission line
- Original alignment
- Proposed minor alteration alignment
- Structure location
- Proposed transmission substation

Permitted route (500 feet)

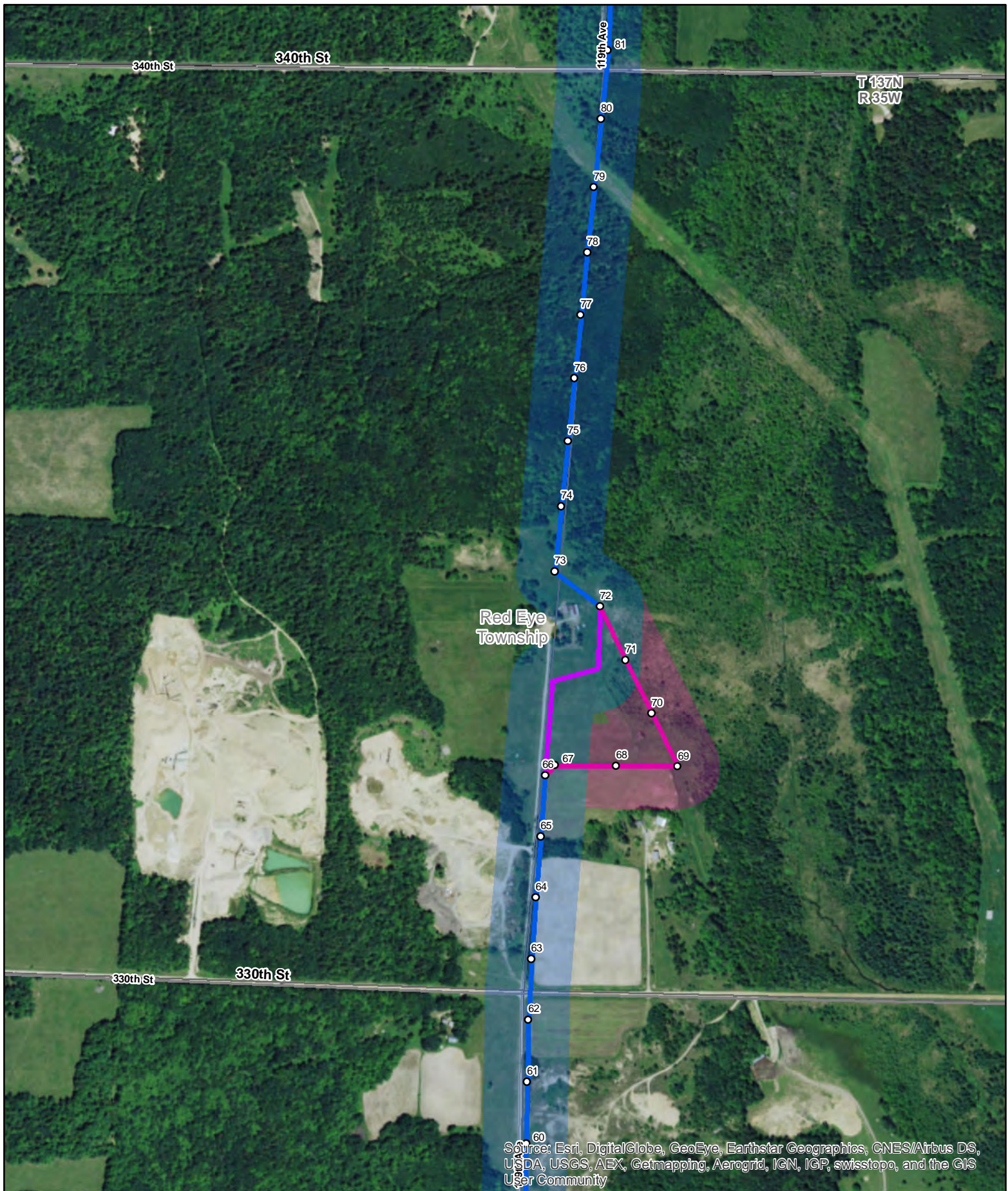
Alteration route (500 feet)

Todd-Wadena

- Proposed distribution substation
- GIS Data sources include:
MNGEO, MNDNR, MNDOT, and Great River Energy.
Aerial Imagery from ESRI web service



Menahga Area 115 kV Project Route Permit Minor Alterations Exhibit B

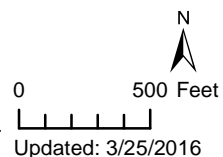


Great River Energy

- Anticipated alignment 115 kV transmission line
- Original alignment
- Proposed minor alteration alignment
- Structure location

- Permitted route (500 feet)
- Alteration route (500 feet)

GIS Data sources include:
MNGEO, MNDNR, MNDOT, and Great River Energy.
Aerial Imagery from ESRI web service



Menahga Area 115 kV Project Route Permit Minor Alterations Exhibit C

EXHIBIT D

DANIEL R. & TIFFANY L. BESONEN
12038 330TH ST
MENAHA, MN 56464

BENJAMIN W. & KATHY M. OLSON
11498 310TH ST
SEBEKA, MN 56477

BENJAMIN W & KATHY M OLSON
33388 119TH AVE
MENAHA, MN 56464

PETER, MARK & LYNN HENDRICKSON
11719 350TH ST
MENAHA, MN 56464

DURWIN J & LORI A TOMPERI
11508 350TH ST
MENAHA, MN 56464