

July 14, 2023

Via Electronic Filing

Will Seuffert Executive Secretary Minnesota Public Utilities Commission 121 7th Place East, Suite 350 St. Paul, MN 55101-2147

Re: In the Matter of Establishing an Updated Estimate of the Costs of Future Carbon Dioxide Regulation on Electricity Generation under Minn. Stat. 216H.06

In the Matter of Establishing Estimated Costs of Future Carbon Dioxide Regulation on Electricity Generation

PUC Docket Number/s: E999/DI-22-236; E999/CI-07-1199

Comments of Great River Energy

Dear Mr. Seuffert:

Great River Energy ("GRE") appreciates the opportunity to provide comments in this matter as requested by the Minnesota Public Utilities Commission ("Commission") in its January 11, 2023, Notice of Comment Period ("Notice"). GRE provides its comments on the range of cost estimates for the future cost of carbon dioxide (" CO_2 ") regulation on electricity generation for the topics listed in the original notice, and the supplemental topics as presented in the Commission's March 29, 2023, Second Notice of Extended and Supplemental Comment Period ("Second Notice").

These comments are notable as they come following the passage of Minnesota House File 7 ("HF7") which was signed into law on February 7, 2023, establishing the first carbon-free standard ("CFS") in Minnesota's history. Prior to its passage, there was no legislative standard requiring utilities to reduce CO_2 emissions further than goal-based legislation. With the passage of the new law, Minnesota has joined other states such as California and New York that have passed a legislative decarbonization standard, aimed at reducing greenhouse gas ("GHG") emissions.

The new law largely adopts two new mandates for the state's electric utilities: the CFS, and an updated renewable energy standard ("RES"). These standards serve as the new regulation with which utilities must comply when conducting resource planning actions in the state. They explicitly define the percentage of retail electric sales that must be met by carbon-free resources and set a goal of 100 percent carbon-free retail electric sales by 2040. Previously, GRE and other intervenors in this proceeding had to

postulate a hypothetical CO₂ regulation at either the state or federal level and estimate compliance costs and timing, whereas now these details are no longer unknown.

The Agencies' recommendations in the January 5, 2023 report are largely aligned with the previous application of an approximated regulatory value. However, since issuance of these recommendations, there have been major changes to both state and federal policy. These changes have in part codified goals that must be met under the new standards. The Minnesota future cost of CO_2 regulation calculation has historically been a quantitative exercise to identify a value that approximates compliance with future CO_2 regulations, which is then incorporated in planning proceedings as stated in Minnesota Statute Section 216H.06:

By January 1, 2008, the Public Utilities Commission shall establish an estimate of the likely range of costs of future carbon dioxide regulation on electricity generation. The estimate, which may be made in a commission order, must be used in all electricity generation resource acquisition proceedings. The estimates, and annual updates, must be made following informal proceedings conducted by the commissioners of commerce and pollution control that allow interested parties to submit comments.

The language clearly indicates that the future cost of CO₂ regulation value is meant to approximate the costs of compliance with a CO₂ limiting regulation. The impacts of the policies that have been signed into law in Minnesota, and are in advanced stages, but not yet final form at the federal level, represent these costs and remove the hypothetical estimation that was previously necessary. The CFS requirements in Minn. Stat. § 216B.1691 as passed in 2023 give utilities a CO₂ policy around which to plan, thereby removing any uncertain costs of compliance. The costs to comply with the new CFS will be determined during utilities' resource planning processes as requirements are included in modeling exercises.

The Environmental Protection Agency ("EPA") has proposed new source performance standards for fossil fuel fired units under the Clean Air Act ("CAA") sections 111(b) and 111(d). Those changes are proposed at this current time, and the costs of which, when final, will be reflected in the capacity expansion modeling work as all other emissions standards are under the CAA. No additional costs need to be considered by the Commission and applied to emissions in this case, as compliance with the CAA, and any other environmental standard is a de facto requirement with operation of fossil fuel unit and incorporated in the costs of that unit in the models. This is due to the fact that sections 111(b) and 111(d) would establish emission limits for new and existing fossil fuel-fired power plants based on proven, costeffective control technologies. Indeed, the incorporation of those costs to comply with any standard, internalize any externalities that may be present. The investment of capital into a unit to comply with new standards removes the external costs to human health and the environment and obviates the necessity for an external calculation of potential costs of compliance or externalities.

Simply put, any integrated resource plan filing of GRE would include compliance with *both* state policy standards and federal emissions standards, and further imposition of external costs would be unnecessary as the net present value of revenue requirements would be reflective of the cost of compliance.

If the Commission determines that Minn. Stat. Sec. 216H.06 nevertheless requires the determination of a future cost of CO_2 regulation, GRE proposes the following two options:

- Future cost of CO₂ regulation set at \$0/MWh. As indicated previously, the costs to comply with relevant state and federal requirements are included in the optimization equations of the capacity expansion modeling, and additional imposition of CO₂ regulatory costs either endogenous or exogenous to the modeling, risks double counting the costs of compliance leading to erroneous modeling results.
- 2. If a quantified value is desired, the cost of renewable energy certificates ("RECs") should be used as they represent the compliance mechanism for demonstrating achievement of the CFS milestones. As utilities illustrate compliance with the interim standards of the CFS, it is possible that remaining natural gas generation, or the non-renewable share of net purchases from the MISO market, may require REC retirements to meet the standard. It follows from this policy mechanism then that the marginal cost of incremental compliance is the price of a REC. As entities must procure additional RECs for each MWh of generation required to meet the CFS milestones, the cost of compliance for this CO₂ regulation therefore is the cost to the entity to procure/retire one REC to offset one MWh of generation. GRE would propose a long-term REC value of \$4/MWh to approximate the cost to forward purchase multiple years of RECs for compliance with the standard.

In lieu of providing an escalation factor for the recommended value in option two, GRE would recommend that in each annual filing under the E999/CI-07-1199 docket, a cost estimate of a multi-year REC purchase is proposed to better approximate the future marginal cost of compliance with the CFS.

GRE appreciates the opportunity to provide these Comments and looks forward to further discussions in the current proceeding.

Respectfully submitted,

s/ Zac Ruzycki

Zac Ruzycki Director, Resource Planning