



April 11, 2025

Consumer Affairs Office
Minnesota Public Utilities Commission
121 7th Place East, Suite 350
St. Paul, MN 55101

RE: EERA Hearing Comments
Gopher State Solar Project
PUC Docket No. IP7119/GS-24-106
OA H Docket No. 24-2500-40416

Dear Consumer Affairs Office:

Minnesota Department of Commerce, Energy Environmental Review and Analysis (EERA) offers the following comments on the Gopher State Solar Project (Project) proposed by Gopher State Solar, LLC (Gopher State Solar).

In these comments EERA:

- Recommends modifications to the draft decommissioning plan,
- Recommends modifications to the draft vegetation management plan,
- Summarizes changes between the sample site permit filed by the Minnesota Public Utilities Commission (Commission) and the proposed draft site permit (PDSP) included as Appendix C of the Environmental Assessment (EA) prepared for the Project.

Decommissioning Plan

Site permits for wind and solar facilities issued by the Commission require permittees to file decommissioning plans prior to construction. The intent of the decommissioning plan is to ensure that the site is restored at the end of the energy facility's useful life, and that the restoration costs are borne by the permittee.

EERA Staff Comments on Gopher State Solar Draft Decommissioning Plan

Department of Commerce Energy Environmental Review and Analysis (EERA) staff has reviewed the draft decommissioning plan (draft plan) for the proposed Gopher State Solar Project included as Appendix F of the Site Permit Application filed August 19, 2024.

EERA staff's review is guided by the recommendation of the Solar and Wind Decommissioning Working Group (SWDWG). As discussed in EERA staff's recommendations on decommissioning plans in Docket 17-123, the decommissioning plan should serve as a stand-alone document to orient the reader to the project as it is on the ground.

EERA Comments and Recommendations

- **Plan Cover:** The cover should be updated to include the project docket number and the revised date.
- **Independent Preparer:** Meets EERA expectations. The plan and cost estimate have been prepared by Verdanterra.
- **Decommissioning Objective:** Partially meets EERA expectations. Although the text in Section 2 indicates an intent to restore the project area to allow the site to return to agricultural use, EERA recommends the plan include a separate heading and clear statement of the objective of decommissioning the project. It is anticipated that the objective for most facilities will be to restore the site to its prior use as required in site permits (typically located in Section 9 of the standard site permit). It is possible that in the future, restoration to a different use (e.g. commercial or residential), may be sought as urban areas expand towards solar facilities on what had been exurban areas, but at this stage the objective should be consistent with the standard permit language.
- **Scheduled Updates:** Partially meets EERA expectations. Although Section 6 of the plan indicates that the plan will be updated every five years and when ownership changes, EERA recommends putting information on updates under a separate heading. EERA staff recommends a “permit version” of the decommissioning plan filed with pre-construction documents, and then scheduled updates every five years thereafter. The plan should also be updated any time there is a change in ownership or permit amendments. Updates allow for updated information on permits, decommissioning methods, costs, and financial assurance.
- **Project Description:** Partially meets EERA expectations. EERA recommends several technical revisions to clarify the project that is constructed:
 - The pre-construction update should clarify the project that Gopher State Solar is constructing; at that point it will no longer be a proposal.
 - Clarify the size of the site in acres and include a table township, range, and sections in the site.
 - Clarify the number and total acreage of stormwater ponds and swales that are referenced in Section 3-1.
 - Include information on the substation, O&M facility, and gen-tie line in the project description.
 - Anticipated date of commercial operation (will be updated once this is certain).
 - A better site map showing the location of project components (e.g arrays, roads, cabling, switching station, O&M facility, inverter location, stormwater retention areas), similar to the project detail map in the Environmental Assessment.
 - The date and eDocket location of the site permit when issued. Future updates should also reference past decommissioning plans and provide a link to those plans.

- A short statement on landownership. Clarify the landownership at the time of construction. Clarify whether Gopher State owns all of the site, or whether any of the site is leased.
- **Use of Generation Output.** Does not meet EERA expectations at this time. EERA understands that the offtaker of the power is currently unknown. The pre-construction version of the plan should include a general statement of where the generation will be used. Examples include, but are not limited to:
 - Power Purchase Agreement (PPA). For any portion of the output sold through a PPA, the description should include the offtaker and the expiration date of any PPA(s).
 - Utility-owned generation portfolio.
- **Permits and Notifications:** Does not meet EERA expectations. EERA recommends that the pre-construction version of the plan include a list of permits required for decommissioning and local government notifications. EERA anticipates that the required permits may change over time, but the periodic reviews provide an opportunity for the list to be identified. Recently issued permits require the decommissioning plan be provided to local governments, so plan to document compliance with that provision once the plan is filed as a pre-construction document.
- **Tasks and Timing:** The information in Section 3 “Decommissioning Activities” generally meets EERA expectations. EERA recommends the pre-construction version of the plan be revised to clarify removal of stormwater facilities, the compatibility between agricultural uses and re-seeding with native species during restoration, assumptions for waste disposal and timeframe schedule prior to filing as a pre-construction filing:
 - Move the discussion about removal of stormwater ponds and engineered drainage swales out of the substation heading and into its own heading.
 - Section 3.2 and the cost estimate in Appendix B appear to anticipate re-seeding approximately 50 percent of the site with native species. Clarify how the re-seeding with native species is compatible with returning the site to agricultural use as anticipated in Section 2. Would this be at the landowner’s request? How does this work with the VMP?
 - Add a short section in the text that generally discusses assumptions for disposal and identifies landfill and recycling facilities in place at this time (see, for example, Section 2.5 of 2021 the [decommissioning plan](#) for Sherco Solar).
 - Provide additional detail on the timeframe/schedule for decommissioning. A Gantt chart is not necessary at this time, but something more detailed than “12 months.” (see, for example, section 2.3 of the 2021 [decommissioning plan](#) for Sherco Solar).
- **Cost Estimate:** The cost information in Attachment B partially meets EERA expectations at this time. EERA expects a more detailed cost estimate that includes both gross and net costs as well as assumptions on transport and the salvage locations. See, e.g., Section 6 and Attachment B of the Decommissioning Plan for Lake Wilson Solar (eDocket ID: [20232-193057-10](#)) . EERA is

unclear on the basis for assuming a 95 percent salvage value for PV modules. EERA notes that the resale market for PV panels is not well established and using current pricing for used panels 25 years into the future is very speculative. EERA anticipates that both the resale and recycling markets for PV panels will become more stable over time and will continue to monitor for all solar projects. EERA recommends that both gross and net costs be updated at five-year intervals.

- **Financial Assurance:** Partially meets EERA expectations. Consistent with the SWDWG's recommendations, EERA recommends that the revised decommissioning plan filed prior to construction clarify the anticipated beneficiary of the financial assurance, the types of financial assurance mechanism under consideration by Gopher State Solar, and a schedule for funding the financial assurance. The text in Section 7 anticipates that "financial assurance will be posted as a bond / letter of credit or some other form of financial assurance prior to the start of construction." EERA recommends that the pre-construction filing clarify what other forms are under consideration by Gopher State Solar. Identify how this plan will comply with Renville County's needs for financial bonds. The SWDWG recommends that permittees begin funding the financial assurance instrument no later than 10 years after the facility begins operation and that the instrument be fully funded prior to the end of any power purchase agreement. EERA anticipates bringing the matter to the Commission at the time surety is established to allow the Commission to weigh in on the amount (gross or net costs), mechanism, and beneficiary.

Vegetation Management Plan

EERA, on behalf of the interagency Vegetation Management Planning Work Group (VMPWG), respectfully submits comments on the Gopher State Solar Vegetation Management Plan (VMP). The VMPWG and Department of Commerce Energy Environmental Review and Analysis (EERA) staff have reviewed the VMP for the proposed Gopher State Solar Project included as Appendix E of the Site Permit Application filed August 19, 2024.

The VMPWG is not recommending any action by the Commission at this time but is providing comments to facilitate transparency in the record as the VMPWG works with the applicant to arrive at a VMP that is adequate to meet pre-construction compliance filing requirements and expectations.

VMPWG Comments and Recommendations

- **Site Preparation:** Clarify Best Management Practices (BMPs) for site preparation. Describe how topsoil will be separated. Avoid spray drift. Provide a table showing the planned sequence for construction, planting, and management activities including the proposed month and a summary of the activity.
- **Panel height:** Does not meet expectations. The current panel height design includes panels that could be as low as 18 inches off the ground. In order to properly meet the Minnesota [Department of Natural Resources' \(DNR\) Solar Technical Guidance standards](#) and the [Minnesota Board of Water and Soil Resources' \(BWSR\) Habitat Friendly Solar standards](#), panel heights should be adjusted to allow additional room for proper maintenance and snow removal.

- **Seed mixes:** Does not meet expectations. The proposed seeding plan does not comply with an anticipated permit condition of perennial native vegetation being used on the majority of the site. The VMP states the benefits of using native, pollinator-friendly vegetation. However, the proposed seed mix for the array areas is largely comprised of non-native species, and is not suitable for supporting a diversity of pollinator species. The proposed array seed mix will not meet the DNR's Solar Technical Guidance standards, or the BWSR Habitat Friendly Solar Standard. Using a dominant mix of non-native species increases the likelihood of the species becoming outcompeted by weed species.
 - Utility-scale solar projects are strongly encouraged to meet the [Board of Soil and Water Resources \(BWSR\) Habitat Friendly Solar Standard](#), which could be met if the array mixes are adjusted to have a dominance of at least 50 percent native species.
 - Certain components of the seed mix, including Eastern Red Cedar, are not compatible with prairie mixes and not recommended for use per the DNR. Seed mixes should be developed to meet either a high or mid-diversity standard, laid out in the [Department of Natural Resources' Solar Tech guidance](#).
 - All mixes need to list planned seeds per square foot as well as the planned acreage for the seed mix.
- **Management:** For mechanical mowing and haying, haying should ideally occur in early fall to maximize forage for pollinators. Hayed/mowed vegetation should be bagged and removed off site to prevent smothering new growth. Haying/mowing equipment should be cleaned prior to use on site to prevent the spread of non-native and invasive species into the planting.
- **Grazing:** Clarify if a grazing plan will be considered. If grazing is utilized, a grazing plan should summarize the goals of grazing, the type and number of animals to be used, plans for fencing, the time and duration of grazing, and the decision making process for ensuring that vegetation is not over-grazed.
- **Herbicide:** Provide additional information about anticipated herbicide use, including herbicide type, surfactant, rate, and frequency. Read and follow local, state and federal regulations regarding pesticide application procedures. Know the exact location of the area to be treated, as well as the potential hazard of spray drift or subsequent pesticide movement to surrounding areas. Avoid spray drift, as it is illegal to allow spray drift to move off the target site.
- **Monitoring:** A qualified third-party independent monitor with sufficient botanical experience identifying native plants, native plant communities, invasive species, and non-native species typical of Minnesota, should complete the vegetation monitoring to ensure an unbiased reporting of vegetation establishment. Identify a third-party monitor.
- **Reporting:** Both quantitative and qualitative monitoring data should be included in annual reports. Identify the anticipated reporting timeline.
- **Maps:** Additional maps to be provided:
 - Seeding/Planting Zone Map showing labeled zones where various planting/seeding will be conducted and specific seed mixes will be used.

- Monitoring Plan Map showing proposed monitoring locations.

Site Permit Modifications

The Commission issued a sample site permit on October 8, 2024.¹ EERA included a Proposed Draft Site Permit (PDSP) as Appendix C of the Environmental Assessment (EA).² EERA's PDSP indicated changes from the Commission-issued sample permit by underline and strikeout. In these comments, EERA summarizes the changes between the sample permit and EERA's PDSP.

Updated Project Description (Cover, Sections 1, 2 and 9)

EERA's proposed PDSP updates the sample permit to include project-specific information in the cover and in sections 1, 2, 9, and 14.

Vegetative Screening Along Roadsides (Special Condition 5.1)

EERA recommends a special condition requiring Gopher State Solar to coordinate with jurisdictional road management authorities to develop vegetative screening plans for state, county, and township roads adjacent to or bisecting the Project. Vegetative screening plans must comply with jurisdictional ROW management and/or setback requirements.

Renville County Setbacks (Special Condition 5.2)

EERA recommends a special condition requiring Gopher State Solar to adhere to all Renville County renewable energy setback requirements, except for drain tile, in which the Gopher State Solar shall adhere to the 40-foot drain tile setback to the extent practical.

Road Use and Development Agreement (Special Condition 5.3)

EERA recommends a special condition requiring Gopher State Solar enter into a Road Use and Development Agreement with Renville County and affected Townships. Gopher State Solar shall keep records of its Road Use and Development Agreement and provide them upon the request of Commission staff.

¹ Public Utilities Commission, Sample Site Permit, October 8, 2024, eDocket No. [202410-210821-01](#).

² DOC EERA, Environmental Assessment: Gopher State Solar Project. Appendix C, Proposed Draft Site Permit. March 19, 2025, eDocket No. [20253-216593-04](#)

Decommissioning Plan (Special Condition 5.4)

EERA recommends a special condition requiring Gopher State Solar to coordinate with Renville County to develop a mutually agreeable decommissioning plan consistent with Section 9.1 of the site permit.

Ownership Change Notification (Special Condition 5.5)

EERA recommends a special condition requiring Gopher State Solar to notify Renville County officials if there is an ownership change pursuant to Section 2.1 of the site permit and provide the new contact information.

Emergency Response Training (Special Condition 5.6)

EERA recommends a special condition requiring Gopher State Solar to work with and train with local emergency response teams that may have to enter the Project to ensure teams are aware of access points and can perform their duties safely.

Northern Long-Eared Bat (Special Condition 5.7)

EERA recommends a special condition requiring Gopher State Solar to comply with the USFWS guidance and requirements in effect regarding the Northern Long-Eared Bat (NLEB), including tree-clearing restrictions if applicable.

Bald Eagle (Special Condition 5.8)

EERA recommends a special condition that if, in consultation with the U.S. Fish and Wildlife Service, a bald eagle nest must be removed for construction of the project, Gopher State Solar shall file with the Commission the documentation authorizing any Bald Eagle nest removal at least 14 days prior to the pre-construction meeting.

EERA appreciates the opportunity to comment on the proposed project.

Sincerely,

A handwritten signature in purple ink that reads "Jessica Livingston". The signature is fluid and cursive, with the first name "Jessica" and last name "Livingston" clearly legible.

Jessica Livingston
EERA Environmental Review Manager