

April 15, 2022

Public Advisor
Minnesota Public Utilities Commission
121 7th Place East, Suite 350
St. Paul, MN 55101-2147

RE: EERA Hearing Comments
Hayward Solar Project
Docket No. IP-7053/GS-21-113

Dear Public Advisor,

Department of Commerce, Energy Environmental Review and Analysis (EERA) staff has reviewed the Commission's sample site permit for the Hayward Solar Project, the environmental assessment prepared by EERA staff, and the direct testimony of the applicant, Hayward Solar, LLC (Hayward Solar). EERA staff provides the following comments:

1. As an initial matter, EERA staff notes that Section 4.3 of the sample permit is improperly numbered.¹ After reaching Section 4.3.7 (Aesthetics), the section begins numbering again; thus, instead of being Section 4.3.8, the Topsoil Protection text is noted as Section 4.3.1. For the purpose of comments here, EERA staff will refer to the sample permit as currently numbered.
2. Section 4.3.8 of the sample permit is titled "Beneficial Habitat." However, the text of the section incorporates two topics – beneficial habitat and a vegetation management plan (VMP). Consistent with recent Commission permits, EERA staff suggests that these topics be noted and discussed separately.² EERA staff suggests that Section 4.3.8 discuss only beneficial habitat and that any VMP permit condition be included as a special condition in Section 5 of the permit. EERA staff suggests the following text for Section 4.3.8 of the permit:³

¹ Commission Sample Site Permit, January 3, 2022, eDockets Number [20221-181162-01](#) [hereinafter Sample Permit].

² See, e.g., Order Granting Certificate of Need and Issuing Site Permit, Louise Solar Project, March 18, 2022, eDockets Number [20223-183951-01](#) [hereinafter Louise Solar Site Permit].

³ Adapted from Louise Solar Site Permit.

4.3.8 Beneficial Habitat

The Permittee shall implement site restoration and management practices that provide for native perennial vegetation and foraging habitat beneficial to gamebirds, songbirds, and pollinators; and that improve soil water retention and reduce storm water runoff and erosion. To ensure continued management and recognition of beneficial habitat, the Permittee is encouraged to meet the standards for Minnesota's Habitat Friendly Solar Program by submitting project plans, seed mixes, a completed project planning assessment form, and any other applicable documentation used to meet the standard to the Board of Water and Soil Resources (BWSR). All documents required by BWSR for meeting Habitat Friendly Solar Certification and maintenance of that Certification, if filed with BWSR, should also be filed with the Commission

3. EERA staff recommends that a VMP be developed and filed with the Commission 14 days prior to any pre-construction meeting for project. Staff notes that Hayward Solar has developed a draft VMP for the project in consultation with state agencies and has no objection to a VMP requirement in a Commission site permit.⁴ EERA staff recommends that the VMP be a special permit condition and recommends the following permit language:⁵

5.1 Vegetation Management Plan

The Permittee shall develop a vegetation management plan using best management practices established by the DNR and BWSR. The vegetation management plan shall be prepared in coordination with the Department of Commerce, DNR, BWSR, and MPCA. The vegetation management plan and documentation of the coordination efforts between the Permittee and the coordinating agencies shall be filed at least 14 days prior to the pre-construction meeting. The Permittee shall provide all affected landowners with a copy of the plan.

The vegetation management plan must include the following:

- Management objectives addressing short term (Year 0-5, seeding and establishment) and long term (Year 5 through the life of the permit) goals.
- A description of planned restoration and vegetation management activities, including how the site will be prepared, timing of activities, how seeding will occur (broadcast, drilling, etc.), and the types of seed mixes to be used.
- A description of how the site will be monitored and evaluated to meet management goals.

⁴ Hayward Solar, Direct Testimony of Michael Roth, March 22, 2022, eDockets Number [20223-184071-04](#) [hereinafter Roth Direct Testimony].

⁵ Adapted from Louise Solar Site Permit.

- A description of the management tools used to maintain vegetation (e.g., mowing, spot spraying, hand removal, fire, grazing, etc.), including the timing and frequency of maintenance activities.
- Identification of the third-party (e.g., consultant, contractor, site manager, etc.) responsible for restoration, monitoring, and long-term vegetation management of the site.
- Identification of on-site noxious weeds and invasive species (native and non-native) and the monitoring and management practices to be utilized.
- A site plan showing how the site will be revegetated and that identifies the corresponding seed mixes. Best management practices should be followed concerning seed mixes, seeding rates, and cover crops.

Additionally, and for future solar projects, EERA staff recommends that a VMP be a standard permit condition in the Commission’s sample site permit.

4. EERA staff recommends that an agricultural impact mitigation plan (AIMP) be developed and filed with the Commission 14 days prior to any pre-construction meeting for project. Staff notes that Hayward Solar has developed a draft AIMP for the project in consultation with the Minnesota Department of Agriculture (MDA).⁶ EERA staff recommends that the AIMP be a special permit condition and recommends the following permit language:

5.2 Agricultural Impact Management Plan

The Permittee shall develop an agricultural impact mitigation plan (AIMP) in coordination with the MDA. The AIMP shall be filed at least 14 days prior to the pre-construction meeting. The Permittee shall provide all affected landowners with a copy of the plan.

Additionally, and for future solar projects, EERA staff recommends that an AIMP be a standard permit condition in the Commission’s sample site permit.

5. EERA staff recommends that the project employ a third-party monitor to ensure that conditions in any Commission site permit are met. Hayward Solar has noted in its testimony that it is responsible for constructing and operating the project in accordance with any Commission permit.⁷ Accordingly, Hayward Solar believes that a third-party monitor is not necessary for the project.⁸

EERA acknowledges Hayward Solar’s commitment to any Commission permit issued for the project. This said, the Commission, aided by EERA staff, is responsible for ensuring compliance with its permit. Without a third-party monitor, the Commission and EERA staff must rely on local residents to observe any permit non-compliance and to then report this non-compliance. EERA staff believes this is not a tenable process for ensuring permit

⁶ Roth Direct Testimony.

⁷ Id.

⁸ Id.

compliance. Accordingly, recent Commission permits have required the use of a third-party monitor to ensure permit compliance.⁹

Additionally, Hayward Solar proposes the use of a third-party monitor in its AIMP to ensure that the AIMP is complied with.¹⁰ This monitor would report to the MDA.¹¹ EERA staff suggests that this monitoring function could be expanded from the AIMP to the Commission's permit and that reporting could be expanded to include EERA staff. MDA has indicated to EERA staff that it has no objection to a shared monitoring function.¹²

EERA staff recommends that a third-party monitor be a special permit condition and recommends the following permit language:¹³

5.3 Independent Monitor

The Permittee shall employ an independent, third-party monitor to ensure compliance with this site permit. Prior to construction, and in consultation with Department of Commerce, Energy Environmental Review and Analysis (EERA) staff, the Permittee shall develop a scope of work for the monitor. If the monitor will report to several agencies (e.g., the Minnesota Department of Agriculture and Commerce) the scope of work must be developed in coordination with all agencies. The scope of work must be approved by EERA and all agencies receiving monitoring reports. All costs for the monitor will be borne by the Permittee.

The Permittee shall file an approved scope of work for the monitor with the Commission 30 days prior to commencing construction. The Permittee shall file the name, address, email, phone number, and emergency phone number of the third-party monitor 14 days prior to commencing construction.

6. The environmental assessment (EA) notes that noise levels related to the installation of foundation posts may temporarily exceed state noise standards.¹⁴ Further, the EA indicates that even if noise levels are not exceeded, the continuing, rhythmic nature of the noise would create impacts for local residents.¹⁵

EERA staff recommends that the permittee be required to confer and coordinate with local residents, including the KOA campground north of I-90, regarding noise impacts when

⁹ Louise Solar Site Permit; Order Issuing Amended Site Permit, Community Wind South Repower Project, March 15, 2022, eDockets Number [20223-183785-01](#); Order Adopting Administrative Law Judge Report and Issuing Route Permit, Frazee to Erie 115 kV Transmission Line Project, December 17, 2021, eDockets Numbers [202112-180819-01](#).

¹⁰ Agricultural Impact Mitigation Plan (AIMP), Hayward Solar, LLC, Appendix D to Site Permit Application, May 5, 2021, eDockets Numbers [20215-173906-08](#), [20215-173906-09](#).

¹¹ Id. See Section 4.1 of the AIMP.

¹² EERA staff personal communication with MDA staff, April 11, 2022.

¹³ Adapted from Louise Solar Site Permit.

¹⁴ Environmental Assessment, Hayward Solar Project, March 2022, eDockets Number [20223-183372-01](#) (see Chapter 4.3.5) [hereinafter Environmental Assessment].

¹⁵ Id.

foundations posts will be installed. EERA staff recommends that noise coordination be a special permit condition and recommends the following permit language:

5.4 Noise Coordination

The Permittee shall coordinate with local residents, including the KOA campground north of I-90, regarding potential noise impacts prior to the installation of any foundation posts. The Permittee shall take reasonable measures to minimize the noise impacts associated with installation of the posts.

7. The EA notes that a snowmobile trail, Freeborn County Trail 133, proceeds through the project area.¹⁶ Potential impacts to this trail could be mitigated by rerouting parts of the trail.¹⁷ EERA staff recommends the permittee be required to coordinate with local snowmobile trail associations to reroute the snowmobile trail to mitigate impacts of the project. EERA staff recommends the following permit language:

5.5 Snowmobile Trails

The Permittee shall coordinate with local snowmobile trail associations to reroute Freeborn County Trail 133 and any associated snowmobile trails impacted by the project.

8. The EA notes that potential impacts to wildlife, particularly deer, could be mitigated by placing visibility markers at appropriate locations along the project's perimeter fencing.¹⁸ EERA staff recommends that the permittee be required to place such markers on the project's perimeter fencing. EERA staff recommends the following permit language:

5.6 Perimeter Fencing

The Permittee shall place visibility markers at appropriate locations along the project's perimeter fencing to mitigate impacts to wildlife. The Permittee shall coordinate with the DNR regarding the locations of visibility markers.

9. The Commission's sample permit requires the permittee to develop and implement a decommissioning plan.¹⁹ The sample permit requires that the plan be filed with the Commission 14 days prior to a pre-operation meeting. Hayward Solar has submitted an initial decommissioning plan with its site permit application.²⁰

EERA staff recommends that the permittee be required to file its decommissioning plan 14 days prior to the project's pre-construction meeting. This timing – prior to pre-construction rather than prior to pre-operation – is consistent with Commission practice for projects with

¹⁶ Environmental Assessment, Chapter 4.3.8.

¹⁷ Id.

¹⁸ Environmental Assessment, Chapter 4.7.6.

¹⁹ Sample Permit, Section 9.1.

²⁰ Decommissioning Plan, Hayward Solar, LLC, Appendix F to Site Permit Application, May 5, 2021, eDockets Number [20215-173907-01](#).

decommissioning plans.²¹ EERA staff recommends the following edits to the sample permit:²²

9.1 Decommissioning Plan

The Permittee shall comply with the provisions of the most recently filed and accepted decommissioning plan. The initial version of the decommissioning plan was submitted for this project as part of the May 5, 2021, site permit application. The Permittee shall file ~~submit~~ an updated decommissioning plan, incorporating comments and information from the permit issuance process and any updates associated with final construction plans, ~~to~~ with the Commission at least fourteen 14 days prior to the ~~pre-operation~~ pre-construction meeting, and provide updates to the plan every five years thereafter. The decommissioning plan shall be updated every five years following the commercial operation date.

The decommissioning plan shall provide information identifying all surety and financial securities established for decommissioning and site restoration.

In addition, and to aid Hayward Solar in the development a pre-construction decommissioning plan, EERA staff provide the following comments:

- Staff recommends that the plan include a site map identifying major components of the project.
- An updated plan should include a discussion of the use of generation output and should describe permits necessary for decommissioning the project.
- Staff notes that the plan indicates a net financial decommissioning surplus. This surplus is based on what EERA staff believes is a relatively high value for used solar panels at the project's end of life. Staff acknowledges the difficulty in estimating the value of used solar panels 30 years into the future. Staff recommends that the permittee continue to evaluate the value of used solar panels, at a minimum, on the five-year schedule required by the Commission's sample permit. A section should be added to the plan reflecting the Commission's required five-year update schedule. Further, the plan should note that it must be updated with any change of project ownership.
- Consistent with Solar and Wind Decommissioning Working Group recommendations, staff recommends that a financial surety for decommissioning the project be established no later than the tenth year of operation and that the surety provide for full decommissioning costs prior to the expiration of any power purchase agreement.²³ A final, updated plan should discuss the anticipated beneficiary of the surety.

²¹ See, e.g., Order Granting Certificate of Need and Issuing Site Permit, September 17, 2021, eDockets Number [20219-178050-01](#) [hereinafter Walleye Wind Site Permit].

²² Adapted from Walleye Wind Site Permit.

²³ Solar and Wind Decommissioning Working Group, Report and Recommendations, August 2018, Docket M-17-123, eDockets Number [20188-146145-02](#).

EERA staff appreciates the opportunity to provide these comments.

Sincerely,

A handwritten signature in black ink, appearing to read "Ray Kirsch". The signature is written in a cursive, flowing style with a large initial "R" and "K".

Ray Kirsch
Environmental Review Manager